About NRDC
The Natural Resources Defense Council is an international nonprofit environmental organization with more than 1.2 million members and online activists. Since 1970, our lawyers, scientists, and other environmental specialists have worked to protect the world’s natural resources, public health, and the environment. NRDC has offices in New York City, Washington, D.C., Los Angeles, San Francisco, Montana and Beijing. Visit us at www.nrdc.org.

Acknowledgments

NRDC would like to thank David Gordon, Janine Harris, Henry Henderson, Michele Mehta, and Josh Mogerman for researching and reviewing various aspects of the report this year and Carol James for distributing the report nationwide. Thank you to Anthony Clark and Lisa Goffredi for managing the production of the report, to Bonnie Greenfield for designing it, and to Rita Barol, Scott Dodd, Kathryn McGrath, Will Tam, and Auden Shim for creating a dynamic presentation of the report on the NRDC website. We would also like to thank Ynes Cabral for her skillful Spanish translations and Ted Lamm and Elise Marton for their proofreading assistance. Many thanks to members of our media team Courtney Hamilton, Elizabeth Heyd, Serena Ingre, Jessica Lass, Josh Mogerman, Lily Oster, Jenny Powers, and Kate Slusark for orchestrating the release of the report to the press. Thanks to Sarah Chasis, Noah Garrison, Larry Levine, Michele Mehta, Leila Monroe, Adrianna Quintero, and Andrew Wetzler for releasing the report for NRDC this year and Christy Leavitt, Natalie Roy, and Jennifer Peters for arranging for releases by chapters of Environment America and the Clean Water Network.

We wish also to thank the U.S. EPA for sharing data with us again this year, and to the state program coordinators, who provided information for the state chapters along with review of the monitoring and notification data. Thanks, especially, to all those federal, state, and local officials who work hard every day to keep our beaches clean and to clean up the sources of beachwater pollution.

NRDC President: Frances Beinecke
NRDC Executive Director: Peter Lehner
NRDC Publications Editor: Anthony Clark
NRDC Publications Director: Lisa Goffredi
NRDC Director of Communications: Phil Gutis
Production: Bonnie Greenfield
NRDC Director of Marketing and Operations: Alexandra Kennaugh
Table of Contents

Executive Summary ......................................................................................... v
National Overview ........................................................................................ 1

Chapter 1
Sources of Beachwater Pollution and Strategies for Reduction ....................... 13

Chapter 2
Health Risks and Economic Impacts of Beach Pollution .................................. 24

Chapter 3
Beachwater Monitoring and Closing/Advisory Practices .................................. 39

Chapter 4
Plan of Action ............................................................................................... 41

Chapter 5
State Summaries ............................................................................................ 46
Alabama Florida Louisiana Minnesota North Carolina South Carolina
Alaska Georgia Maine Mississippi Ohio Texas
California Hawaii Maryland New Hampshire Oregon Virginia
Connecticut Illinois Massachusetts New Jersey Pennsylvania Washington
Delaware Indiana Michigan New York Rhode Island Wisconsin

Figures
Figure 1. Regional Differences in Percent Exceedance of National Standards, 2005–2008 ................................................................. 2
Figure 2. Regional Differences in Closing/Advisory Days, 2005–2008 ................................................................................................. 2
Figure 3. Total Closing/Advisory Days, 2000–2008 (excluding extended and permanent) ................................................................. 3
Figure 4. Reported Reasons for Closings/Advisories, 2008 ..................................................................................................... 4
Figure 5. Reported Reasons for Closings/Advisories, 2000–2008 ..................................................................................................... 4
Figure 6. Sources of Pollution That Caused Closings/Advisories, 2008 ............................................................................................... 5
Figure 7. Sources of Pollution That Caused Closings/Advisories, 2000–2008 .................................................................................... 5
Figure 8. Percent Exceedance for All Coastal and Great Lakes States Combined, 2005–2008 ................................................................. 6
Figure 9. Influence of Heavy Rainfall on Occurrence of \textit{E. coli} Infections .............................................................................................. 15
Figure 10. A Re-Engineered Stormwater Outfall in Racine, Wisconsin ................................................................................................. 16
Figure 11. A Rough Illustration of the Prevalence of Combined Sewer Systems in the United States ......................................................... 17
Figure 12. Geographic Location of the Reported Disease Outbreaks ................................................................................................. 26
Figure 13. Expansion of HAB Problems in the U.S. ......................................................................................................................... 29
Figure 14. Lag Time Associated with Current Water Quality Monitoring and Public Notification Methods ................................................................................. 32
Figure 15. The Value of the Coastal Economy (2007) ......................................................................................................................... 33
Tables
Table 1. Rank of States by Monitored Beachwater Quality in 2008 ................................................................. 7
Table 2. Beaches with More Than 25 Percent of Samples Exceeding Daily National Standards in 2008 .................. 8
Table 3. Repeat Offenders: Beaches with More Than 25 Percent of Samples Exceeding Daily National Standards
Each Year, 2005–2008 ...................................................................................................................................... 11
Table 4. Details on the 62 Waterborne Disease Outbreaks Reported to CDCP: Jan 2003–Dec 2004 ..................... 25
Table 5. Pathogens and Swimming-Associated Illnesses ..................................................................................... 25
Table 6. Possible Influence of Climate Change on Climate-Susceptible Pathogens ............................................. 27
Table 7. Algae and Their Threats to Human Health ............................................................................................ 29
Table 8. Beachwater Quality Standards Required by the BEACH Act ............................................................... 30
Table 9. Cost Estimates for Illnesses Associated with Polluted Water Due to Lost Wages and Medical Care ........ 35
In 2008, beach closings and advisories hit their fourth highest level in the 19 years the Natural Resources Defense Council (NRDC) has been tracking them. The number of closing and advisory days at ocean, bay, and Great Lakes beaches topped 20,000 for the fourth year in a row, confirming that our nation’s beaches continue to suffer from serious water pollution that puts swimmers at risk.

For the fourth consecutive year, we were able to determine not only the number of closings and advisories, but also the number of times that each beach violated current public health standards. Analysis of beach monitoring data showed that the percent of water samples exceeding national health standards remained steady at 7 percent in 2008, 2007, and 2006, and 8 percent in 2005.

Improved test results combined with fewer preemptive rainfall closings and advisories due to drier weather translated into a better beach season last year for swimmers in many coastal communities. However, relying on dry weather to keep contaminated runoff from polluting beachwater is not a long term public health protection strategy; when the rains return, so do the beach closings and advisories. Even in the relatively dry 2008 beach season, stormwater runoff contributed to two-thirds of the closing/advisory days with a reported contamination source, indicating that there are sources of human or animal wastes that are not being adequately addressed.

**POLLUTED WATER MAKES BEACHGOERS SICK**

In its most recent report, the Centers for Disease Control and Prevention concluded that the incidence of infections associated with recreational water use has steadily increased over the past several decades. Data on the incidence of waterborne illness in the United States is notoriously insufficient because many people who get sick have no idea that ingesting contaminated water was the cause. Epidemiological studies such as those conducted by the EPA in the Great Lakes show that as many as 10 percent of beachgoers report getting sick after swimming in beachwaters open for swimming. With U.S. coastal populations growing, we can continue to expect more Americans to get sick until the sources of beachwater contamination are addressed.

**POLLUTED WATER HURTS COASTAL ECONOMIES**

Dirty coastal waters not only threaten our health, they hurt our economy. Coastal “tourism and recreation constitute some of the fastest growing business sectors—enriching economies and supporting jobs in communities virtually everywhere along the coasts of the continental United States, southeast Alaska, Hawaii, and our island territories and commonwealths,” according to the U.S. Commission on Ocean Policy.¹ That popularity translates into new employment opportunities: in 2000, U.S. coastal tourism and recreation created 1.67 million jobs—a 41 percent increase from 1990—earning workers $13.8 billion in wages. Annual economic output nearly doubled during the same time period to $29.5 billion.

**BEACHWATER MONITORING STANDARDS ARE INADEQUATE**

The federal public-health standard is more than 20 years old, does not provide information on the full range of waterborne illnesses that make beachgoers sick, and requires test methods that usually take 24 hours to complete. Even if a
beach is deemed “safe” under the federal public health standard, it may still contain undetected human or animal waste that can make swimmers sick. Congress required the EPA to modernize this outdated standard as part of the BEACH Act, but the EPA has not yet done so. Three summers ago, NRDC sued the EPA to force it to comply with the BEACH Act by accelerating its timetable for proposing new standards, setting standards that fully protect the public, and establishing testing methods that will enable public health officials to make prompt decisions about closing their beaches and issuing advisories.

Americans need to know that the waters in which we swim, surf, and dive are safe. At a minimum, that means that recreational waters must be tested regularly, and the results must be measured against effective health standards. When waters do not meet these standards, authorities must promptly and clearly notify the public.

INADEQUATE CONTROLS ON BEACH POLLUTION SOURCES

While authorities are doing a better job monitoring beaches than in the past, that monitoring reveals the extent to which they are failing to clean up the sources of beachwater pollution. In 2008, 62 percent of beach closing/advisory days were reported as due to unknown sources of contamination. Beach officials cannot clean up sources of pollution if they cannot identify them in the first place. One problem is that BEACH Act grants are currently not available for source identification and correction. NRDC is therefore supporting federal legislation—the Clean Coastal Environment and Public Health Act (H.R. 2093/S. 878)—that would increase the funding authorized for BEACH Act grants and allow them to be used for sanitary surveys, source tracking, and other means of identifying and addressing the direct sources of the contamination. Expanded funding should allow monitoring to cover all designated coastal beaches. In the meantime, as a result of NRDC’s lawsuit, the EPA is moving forward with developing an improved public health standard and approving faster test methods.

Clearly it is time for the EPA and state and local authorities to seriously address the sources of beachwater pollution, which most often are stormwater and sewage pollution. Prevention is the best way to make sure that a day at the beach will not turn into a night in the bathroom, or worse, in a hospital emergency room.

GLOBAL WARMING WILL MAKE BEACHWATER POLLUTION WORSE

The U.S. House of Representatives has already passed and the Senate is now considering legislation that would limit U.S. emissions of global warming pollution, invest in clean energy technologies, and create millions of jobs in the new energy economy. Passage of this legislation is critical to addressing the wide range of impacts of global warming on coastal communities, which will exacerbate existing causes of beachwater pollution that threaten public health. The Intergovernmental Panel on Climate Change found that “water-borne diseases and degraded water quality are very likely to increase with more heavy precipitation.”

RECOMMENDATIONS FOR IMPROVING BEACHWATER QUALITY AND PROTECTING SWIMMERS’ HEALTH

• The EPA should propose new health standards for beachwater quality that fully protect the public and establish testing methods that will enable public health officials to make prompt decisions about closing their beaches and issuing advisories.

• The EPA and states should tighten and enforce controls on all sources of beachwater pollution. Controls on sewage overflows, urban stormwater, and other sources of polluted runoff are particularly critical. The best way to prevent swimmers from getting sick is to clean up the water.

• Congress should pass the Clean Coastal Environment and Public Health Act (H.R. 2093/S. 878), which would reauthorize the federal BEACH Act of 2000, increase the authorized funding and allow that funding to be used for
identifying and correcting sources of beachwater contamination, require the EPA to approve and states to use rapid test methods for monitoring beachwater pollution, and improve coordination between the public health officials who monitor the beachwater and the environmental agencies who regulate the sources of beachwater pollution.

• Congress should also pass the American Clean Energy and Security Act (H.R. 2454, also known as ACES), which will reduce emissions of global warming pollution and help communities prepare for flooding, sea level rise, increased stormwater pollution, sewer overflows, and other adverse impacts of climate change.

• Congress should substantially increase the federal appropriations available to meet clean water and beach protection needs through the Clean Water State Revolving Fund, federal BEACH Act grants, and a Clean Water Trust Fund or other dedicated source of clean water funding.

• Congress should pass the Sewage Overflow Community Right-to-Know Act (H.R. 753/S. 937), which would require immediate reporting of sewage overflows to public health authorities and to the general public, allowing for prompt responses to overflows that would minimize human exposure and environmental harm.

• State and local governments should issue preemptive advisories where a correlation between rainfall and elevated bacteria levels exists or when sewer overflows or other catastrophic events jeopardize beachwater safety.

• A portion of the revenues generated by tourism should be allocated to monitoring and prevention programs to ensure that swimming in coastal waters does not jeopardize the health of beachgoers.

• Voters should support increased federal, state, and local funding for urban stormwater programs and for repairing, rehabilitating, and upgrading our aging sewer systems. The public also should support funding for maintaining and expanding natural areas such as wetlands, shoreline buffers, and coastal vegetation that trap and filter pollution before it reaches the beach.

• Individuals can help clean up beach pollution. Simple measures, including conserving water, redirecting runoff, using such natural fertilizers as compost for gardens, maintaining septic systems, and properly disposing of animal waste, litter, toxic household products, and used motor oil can reduce the amount of pollution in coastal waters.

Notes
National Overview

In 2008, the number of closing and advisory days at ocean, bay, and Great Lakes beaches reached 20,341 days nationwide, the fourth highest level since NRDC began tracking these events 19 years ago and the fourth consecutive year above 20,000. The record high of 25,643 days was reached in 2006 when a dramatic increase in the amount of rain in some parts of the country contributed to the large increase in closing/advisory days.

While there was an overall 10 percent decrease nationally in the number of closing/advisory days in 2008 compared to 2007, differing weather patterns across the country resulted in some regions experiencing a decrease and others an increase. In the West, relatively dry conditions in California and Hawaii contributed to a 21 percent decrease. Similarly, drier conditions reaching from the DelMarVa peninsula to the southeastern states and the Gulf of Mexico contributed to decreases of 67 percent, 12 percent, and 39 percent, respectively. To the north, wetter than usual conditions led to increases in closing/advisory days of 13 percent in the Great Lakes and 64 percent in New England. The New York/New Jersey region had a slight increase in the number of closings and advisories, some of which were caused by medical waste.

The percent of all samples exceeding national health standards remained generally unchanged at 7 percent in 2008, 2007, and 2006, and 8 percent in 2005 (the multi-year graphs in this report include only those beaches with monitoring data reported in each of the four years). Regionally, the differences in percent exceedance during this four-year period differ from 0 to 4 percentage points from year to year. The waters along the Great Lakes coastlines appear to be the dirtiest while the waters along the Southeast and DelMarVa coasts are relatively cleaner.

Although it is tempting to make comparisons between year-to-year changes in water quality and year-to-year changes in closing/advisory days, there are confounding factors that make such a comparison cumbersome. For example, some states take the average of multiple samples at each monitoring station when making closing/advisory decisions; the average value may not exceed the standard even though one or more of the multiple samples did. In this case, no action would be taken. While this makes sense when making closing/advisory determinations, NRDC includes the results of every reported sample when calculating the percent of all samples that exceed the standard in a given year. Similarly, some localities will resample a beach after an exceedance before notifying the public. If the resample does not exceed the standard, the public is not notified.

Furthermore, many states preemptively close a beach or issue an advisory in response to events such as heavy rainfall, known sewage leaks, chemical spills, high winds, etc. without waiting for the results of beachwater monitoring. The proportion of closing/advisory days due to preemptive actions varies greatly from year to year and from region to region. In 2008, the New York/New Jersey coastal region had the highest proportion (76 percent of all closing/advisory days), followed by the West (49 percent), New England (17 percent), the Great Lakes (16 percent), the Gulf Coast (7 percent), and the Southeast (1 percent). There were no preemptive closings or advisories in the DelMarVa peninsula in 2008.

Beach officials in all states continue to use traditional methods approved by the EPA that usually require 24 hours to quantify bacterial indicator levels in beachwater samples. One state, New Hampshire, is preparing to use rapid test methods. The State Microbiology Laboratory currently has all necessary equipment to initiate this process; when preparations are complete, bacteria levels in beachwater samples in New Hampshire will be quantified using a rapid test method alongside approved analysis methods. In Pennsylvania, a rapid method of determining bacterial levels, quantitative real-time polymerase chain reaction (qPCR), is used in the event of a preemptive advisory issued by the Presque Isle Beach manager to confirm within four hours that E. coli concentrations warrant issuing an advisory. Advisories or restrictions based on monitoring data in Pennsylvania, however, are determined solely by using the standard culture-based method, not by qPCR analysis. Puerto Rico and a number of states, including Alabama, California, Florida, Michigan, Ohio, South Carolina, and Rhode Island have participated or will participate in EPA's National Epidemiological and Environmental Assessment of Recreational (NEEAR) Water Studies. These studies are being conducted to help gain a better
understanding of the relationship between bacterial indicators, swimming at the beach, and people's health. Beachgoers are interviewed and water samples are collected and analyzed for bacteria using several analysis methods including rapid test methods. Several states have conducted studies of rapid test methods in addition to the NEEAR studies. California has invested an estimated $3 million in rapid test method investigations, and other states that have conducted or participated in rapid test method research outside of the NEEAR studies include Indiana, Minnesota, Wisconsin, and New Jersey.

Beachwater quality generally depends on many complex factors, but for some beaches, predictions of beachwater quality based on a few physical measurements of daily conditions can be fairly accurately calculated. Some states have taken

**Figure 1. Regional Differences in Percent Exceedance of National Standards, 2005–2008**

<table>
<thead>
<tr>
<th>Region</th>
<th>2005</th>
<th>2006</th>
<th>2007</th>
<th>2008</th>
</tr>
</thead>
<tbody>
<tr>
<td>DelMarVa</td>
<td>4%</td>
<td>5%</td>
<td>3%</td>
<td>2%</td>
</tr>
<tr>
<td>Great Lakes</td>
<td>7%</td>
<td>6%</td>
<td>8%</td>
<td>7%</td>
</tr>
<tr>
<td>Gulf</td>
<td>13%</td>
<td>13%</td>
<td>15%</td>
<td>12%</td>
</tr>
<tr>
<td>New England</td>
<td>6%</td>
<td>5%</td>
<td>4%</td>
<td>6%</td>
</tr>
<tr>
<td>NY-NJ</td>
<td>4%</td>
<td>6%</td>
<td>8%</td>
<td>4%</td>
</tr>
<tr>
<td>Southeast</td>
<td>5%</td>
<td>3%</td>
<td>2%</td>
<td>2%</td>
</tr>
<tr>
<td>West</td>
<td>9%</td>
<td>8%</td>
<td>5%</td>
<td>7%</td>
</tr>
</tbody>
</table>

**Figure 2. Regional Differences in Closing/Advisory Days, 2005–2008**

<table>
<thead>
<tr>
<th>Region</th>
<th>2005</th>
<th>2006</th>
<th>2007</th>
<th>2008</th>
</tr>
</thead>
<tbody>
<tr>
<td>DelMarVa</td>
<td>251</td>
<td>360</td>
<td>303</td>
<td>101</td>
</tr>
<tr>
<td>Great Lakes</td>
<td>2,791</td>
<td>3,003</td>
<td>3,043</td>
<td>3,437</td>
</tr>
<tr>
<td>Gulf</td>
<td>3,631</td>
<td>3,134</td>
<td>4,336</td>
<td>2,657</td>
</tr>
<tr>
<td>New England</td>
<td>1,030</td>
<td>1,746</td>
<td>939</td>
<td>1,544</td>
</tr>
<tr>
<td>NY-NJ</td>
<td>558</td>
<td>1,093</td>
<td>1,455</td>
<td>1,481</td>
</tr>
<tr>
<td>Southeast</td>
<td>1,349</td>
<td>1,307</td>
<td>485</td>
<td>426</td>
</tr>
<tr>
<td>West</td>
<td>6,280</td>
<td>11,510</td>
<td>9,042</td>
<td>7,105</td>
</tr>
</tbody>
</table>
advantage of this and have created computer beachwater quality models that rely on data from physical measurements such as rainfall levels, wind speed and direction, tides, wave heights, and currents. These models prepare rapid predictions of beachwater quality and allow for beaches to be closed or placed under advisory the day that bacterial levels are expected to be high, rather than 24 hours after high levels of bacteria are present. States using computer models to inform closing and advisory decisions for at least some of their beaches in 2008 were California, Illinois, Indiana, New York, Ohio, Pennsylvania, and Wisconsin. Other states, including Maryland, Rhode Island, Michigan, Oregon, and New Hampshire, are gathering data necessary for and investigating the use of beachwater quality computer models for at least some of their beaches.

Because the water quality at many beaches is adversely impacted by stormwater runoff, another, less sophisticated means of protecting public health is to preemptively close beaches or issue advisories when indicator bacteria levels are expected to be high after rainfall events. In 2008, nine states reported preemptive rainfall closures or advisories at specific beaches: California, Connecticut, Hawaii, Indiana, Massachusetts, New Jersey, New York, South Carolina, and Wisconsin. Many states report that they have developed standards for issuing preemptive rainfall advisories based on rainfall intensity or some other rain-related factor for at least some of their beaches. States with quantitative rainfall standards include California, Connecticut, Delaware, Florida, Hawaii, Maine, Massachusetts, Michigan, New Jersey, New York, Pennsylvania, Rhode Island, and South Carolina. Rainfall standards are under development in New Hampshire. Some states, including California, Minnesota, Mississippi, Rhode Island, and Washington, issue standing advisories warning the public to avoid beachwater contact after heavy rainfall or when storm drains are running. These standing advisories are not reported in the closing and advisory data that the states send the EPA. In North Carolina, standing rainfall advisories take the form of permanent signs posted on either side of storm drain outfalls stating that swimming between the signs is not recommended when there is water flowing through the drain.

MAJOR FINDINGS

This section provides a national perspective on the major findings of NRDC’s Testing the Waters report regarding 2008 beachwater quality, closings and advisories, and the sources of pollution that caused them. For more information on state programs and specific beaches, see individual state summaries in Chapter 5.

![Total Closing/Advisory Days, 2000–2008 (excluding extended and permanent)](image)

**Figure 3. Total Closing/Advisory Days, 2000–2008 (excluding extended and permanent)**

*Note: Because of inconsistencies in monitoring and closing/advisory practices among states and the different levels of data submission over time, it is difficult to make comparisons between states or to assess trends based on the closing/advisory data.*
Beach Closings/Advisories and Pollution Sources

During 2008, U.S. ocean, bay, and Great Lakes beaches had 20,341 days of closings and advisories, 45 extended closings and advisories (7 to 13 consecutive weeks), and 59 permanent closings and advisories (more than 13 consecutive weeks). Including the days represented by extended closings and advisories raises the total to 23,166 beach closing and advisory days.

The number of beach closing and advisory days decreased 10 percent (2,242 days) in 2008 from the previous year (see Figure 3). The major factors leading to the decrease in 2008 appear to be decreased rainfall in many areas of the country.

Figure 4. Reported Reasons for Closings/Advisories, 2008

Figure 5. Reported Reasons for Closings/Advisories, 2000–2008

Key: (A) Based on monitoring that detected bacteria levels exceeding standards. (B) In response to known pollution event without relying on monitoring. (C) Preemptive due to rain known to carry pollution to swimming waters. (D) Other reason. (E) Real-time, predictive computer modeling.
including the coastal areas of Hawaii, the Southeast, Gulf of Mexico, and Southern California. In addition, reductions in state funding led to decreased monitoring (and therefore monitoring-related beach advisories) in Southern California. Nationwide, the number of beaches monitored at least once per week was 2,753 in 2008, down slightly from 2,775 in 2007.

The continued high number of closings/advisories is an indication that regular monitoring continues to reveal serious water pollution at our nation's coastal, bay, and Great Lakes beaches. Figure 4 (page 4) shows that 14,889 (73 percent)

**Figure 6. Sources of Pollution That Caused Closings/Advisories, 2008**

![Chart showing sources of pollution causing closings/advisories in 2008](chart)

**Figure 7. Sources of Pollution That Caused Closings/Advisories, 2000–2008**

![Chart showing sources of pollution causing closings/advisories from 2000 to 2008](chart)

**Note:** Total days shown are greater than annual totals because more than one pollution source may have contributed to each closing/advisory. **Key:**
- (A) Sewage spills and overflows
- (B) Polluted runoff, stormwater, or preemptive due to rain
- (C) Unknown
- (D) Other reasons (including those with no source information provided).
of the 2008 beach closings and advisories were issued because water quality monitoring revealed bacteria levels exceeding health and safety standards (up from 71 percent in 2007 and 68 percent in 2006).

Major reasons why officials closed beaches or issued advisories in 2008 were as follows (see Figure 4):

• 73 percent (14,889) were based on monitoring that detected bacteria levels exceeding beachwater quality standards (an increase from 71 percent in 2007 and 68 percent in 2006);

• 22 percent (4,516) were precautionary, due to rainfall known to carry pollution to swimming waters (a decrease from 25 percent in 2007 and 33 percent in 2006, two relatively wet years);

• 2 percent (430) were in response to known pollution events, such as sewage treatment plant failures or breaks in sewage pipes. In other words, localities did not wait for monitoring results to decide whether to close beaches or issue advisories (down from 3 percent in both 2007 and 2006);

• 2 percent (395) were due to other causes, such as dredging and algal blooms (unchanged from 2007 levels); and

• 1 percent (111) were preemptive due to real-time computer modeling that use readily measurable physical parameters such as wind speed and wave heights to predict indicator bacterial levels. This is the first time NRDC is able to report this reason for beach closings and advisories.

The major pollution sources listed as responsible for 2008 beach closings and advisories are highlighted below. The following total is greater than 20,341 days and 100 percent because more than one source contributed to some beach closings and advisories (see Figure 6):

• Unknown sources of pollution caused 12,631 closing/advisory days (62 percent of this year’s total), compared to 8,524 days in 2007 (33 percent of that year’s total). Sewage or stormwater discharges usually cause elevated bacteria levels, but efforts to determine the causes of increased bacteria levels have not kept pace with new or more frequent monitoring practices.

• Polluted runoff and stormwater caused or contributed to 7,324 closing/advisory days (36 percent of this year’s total), compared to 10,394 days in 2007 (40 percent of that year’s total).

• Sewage spills and overflows caused or contributed to 1,710 closing/advisory days (8 percent of this year’s total), compared to 4,097 days in 2007 (16 percent of that year’s total) (includes combined sewer overflows, sanitary sewer overflows, breaks or blockages in sewer lines, and faulty septic systems).

• Elevated bacteria levels from miscellaneous sources, such as boat discharges or wildlife, accounted for 2,137 closing/advisory days (11 percent of this year’s total), compared to 3,087 days in 2007 (12 percent of that year’s total); in 2008, the vast majority (1,588 days) were attributed to wildlife sources.

### Beachwater Quality

For the fourth consecutive year, NRDC used the percentage of all beachwater samples collected in 2008 that exceeded the BEACH Act required daily maximum standards to compare water quality at beaches ringing our nation from the Pacific Northwest to Southern California, from New England to the Florida Keys, and all along the U.S. Great Lakes shoreline. For marine waters, the standard is 104 enterococcus colony-forming units per 100 milliliters (ml), and for the freshwater, the standard is 235 $E. coli$ colony-forming units per 100 ml.
For the 2008 beach season, the NRDC data set includes monitoring results for 132,465 samples, up from 131,977 in 2007, 106,417 in 2006, and 115,419 in 2005 at 3,601 beaches and beach segments (an increase from 3,516 in 2007, 3,500 in 2006, and 3,274 in 2005); most state and local officials divide longer beaches into manageable monitoring segments. The percent of all samples exceeding national health standards remained generally unchanged at 7 percent in 2006 through 2008 and 8 percent in 2005. (Note: to make this four-year comparison, NRDC includes only the 2,608 beaches reported in each of these four years.)

In 2008, beaches in Louisiana, Ohio, and Indiana were highest in percent of samples exceeding national standards. It is important to note that a poor ranking, while a clear indication of dirty coastal recreational waters, is not necessarily an indication of a bad actor. For example, four of the five worst-ranked states always close a beach or issue an advisory when a sample exceeds the standard; they do not wait for the results of a resample, or check other conditions first as some other states do. (Only a handful of states generally resample before issuing an advisory: Connecticut, New Jersey, and Washington.) Three of the four lowest-ranked states have among the highest percent of Tier 1 beaches that are monitored more frequently than once a week (Tier 1 beaches are popular and/or have known pollution sources in the vicinity of the beach).

### Table 1. Rank of States by Monitored Beachwater Quality in 2008 (Percent Beachwater Samples Exceeding the National Daily Standard)

<table>
<thead>
<tr>
<th>Rank</th>
<th>State</th>
<th>Percent Exceedance</th>
<th>Total Samples</th>
<th>All Reported Beaches</th>
<th>Tier 1 Beaches</th>
<th>Tier 1 Beaches Monitored More Than Once a Week</th>
<th>Resample or Other Info Needed Before Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>30</td>
<td>LA</td>
<td>29%</td>
<td>691</td>
<td>29</td>
<td>7</td>
<td>0%</td>
<td>sometimes*</td>
</tr>
<tr>
<td>29</td>
<td>OH</td>
<td>19%</td>
<td>2,429</td>
<td>45</td>
<td>6</td>
<td>100%</td>
<td>no</td>
</tr>
<tr>
<td>28</td>
<td>IN</td>
<td>18%</td>
<td>1,671</td>
<td>28</td>
<td>7</td>
<td>71%</td>
<td>no</td>
</tr>
<tr>
<td>27</td>
<td>IL</td>
<td>15%</td>
<td>4,140</td>
<td>67</td>
<td>48</td>
<td>96%</td>
<td>no</td>
</tr>
<tr>
<td>26</td>
<td>WI</td>
<td>14%</td>
<td>4,366</td>
<td>193</td>
<td>102</td>
<td>29%</td>
<td>no</td>
</tr>
<tr>
<td>25</td>
<td>RI</td>
<td>14%</td>
<td>2,842</td>
<td>234</td>
<td>20</td>
<td>70%</td>
<td>almost never</td>
</tr>
<tr>
<td>24</td>
<td>MS</td>
<td>14%</td>
<td>1,235</td>
<td>22</td>
<td>16</td>
<td>0%</td>
<td>no</td>
</tr>
<tr>
<td>23</td>
<td>PA</td>
<td>9%</td>
<td>1,534</td>
<td>12</td>
<td>9</td>
<td>89%</td>
<td>no</td>
</tr>
<tr>
<td>22</td>
<td>CA</td>
<td>8%</td>
<td>26,542</td>
<td>647</td>
<td>266</td>
<td>9%</td>
<td>no</td>
</tr>
<tr>
<td>21</td>
<td>NY</td>
<td>8%</td>
<td>8,667</td>
<td>365</td>
<td>86</td>
<td>9%</td>
<td>sometimes</td>
</tr>
<tr>
<td>20</td>
<td>AL</td>
<td>8%</td>
<td>964</td>
<td>97</td>
<td>9</td>
<td>89%</td>
<td>no</td>
</tr>
<tr>
<td>19</td>
<td>SC</td>
<td>8%</td>
<td>2,576</td>
<td>64</td>
<td>7</td>
<td>0%</td>
<td>sometimes</td>
</tr>
<tr>
<td>18</td>
<td>TX</td>
<td>6%</td>
<td>13,625</td>
<td>169</td>
<td>60</td>
<td>0%</td>
<td>no</td>
</tr>
<tr>
<td>17</td>
<td>MI</td>
<td>6%</td>
<td>5,008</td>
<td>922</td>
<td>201</td>
<td>3%</td>
<td>no</td>
</tr>
<tr>
<td>16</td>
<td>ME</td>
<td>6%</td>
<td>1,309</td>
<td>60</td>
<td>57</td>
<td>5%</td>
<td>sometimes</td>
</tr>
<tr>
<td>15</td>
<td>MA</td>
<td>6%</td>
<td>7,599</td>
<td>605</td>
<td>12</td>
<td>100%</td>
<td>no</td>
</tr>
<tr>
<td>14</td>
<td>MN</td>
<td>5%</td>
<td>1,177</td>
<td>89</td>
<td>18</td>
<td>44%</td>
<td>no</td>
</tr>
<tr>
<td>13</td>
<td>OR</td>
<td>5%</td>
<td>1,481</td>
<td>59</td>
<td>59</td>
<td>0%</td>
<td>almost never</td>
</tr>
<tr>
<td>12</td>
<td>CT</td>
<td>4%</td>
<td>1,933</td>
<td>66</td>
<td>54</td>
<td>0%</td>
<td>yes</td>
</tr>
<tr>
<td>11</td>
<td>WA</td>
<td>4%</td>
<td>2,767</td>
<td>746</td>
<td>118</td>
<td>0%</td>
<td>usually</td>
</tr>
<tr>
<td>10</td>
<td>NJ</td>
<td>3%</td>
<td>4,050</td>
<td>268</td>
<td>218</td>
<td>0%</td>
<td>yes</td>
</tr>
<tr>
<td>9</td>
<td>FL</td>
<td>3%</td>
<td>16,024</td>
<td>634</td>
<td>553</td>
<td>0%</td>
<td>sometimes</td>
</tr>
<tr>
<td>8</td>
<td>MD</td>
<td>2%</td>
<td>3,329</td>
<td>71</td>
<td>26</td>
<td>23%</td>
<td>sometimes</td>
</tr>
<tr>
<td>7</td>
<td>GA</td>
<td>2%</td>
<td>977</td>
<td>41</td>
<td>17</td>
<td>0%</td>
<td>no</td>
</tr>
</tbody>
</table>

7 Natural Resources Defense Council
For the third consecutive year, NRDC highlighted beaches exceeding the national daily standard more than 25 percent of the time. In 2008, this list included 123 beaches in the following 20 states: Alabama, California, Florida, Illinois, Indiana, Louisiana, Massachusetts, Maine, Michigan, Minnesota, Mississippi, North Carolina, New Jersey, New York, Ohio, Oregon, Rhode Island, Texas, Virginia, and Wisconsin (see Table 2). Those violations are pretty good indications that the beachwater was contaminated with human or animal waste, and that beachgoers were either swimming in that waste or banned from doing so due to the health risks. Twenty-four beach areas in the following eight states made this list in each of the last four years (2005 through 2008): California, Florida, Illinois, New Jersey, Ohio, Texas, Virginia, and Wisconsin (see Table 3).
<table>
<thead>
<tr>
<th>State</th>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>2008 Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>OH</td>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>1</td>
<td>Daily</td>
<td>109</td>
<td>47%</td>
</tr>
<tr>
<td>CA</td>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>1</td>
<td>Daily</td>
<td>203</td>
<td>46%</td>
</tr>
<tr>
<td>LA</td>
<td>Cameron</td>
<td>Little Florida</td>
<td>no data</td>
<td>2/mo</td>
<td>29</td>
<td>45%</td>
</tr>
<tr>
<td>LA</td>
<td>Cameron</td>
<td>Holly Beach 6</td>
<td>3</td>
<td>2/mo</td>
<td>31</td>
<td>45%</td>
</tr>
<tr>
<td>LA</td>
<td>Cameron</td>
<td>Long Beach</td>
<td>no data</td>
<td>2/mo</td>
<td>31</td>
<td>45%</td>
</tr>
<tr>
<td>OH</td>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>1</td>
<td>Daily</td>
<td>109</td>
<td>45%</td>
</tr>
<tr>
<td>MA</td>
<td>Norfolk</td>
<td>Rhoda</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>44%</td>
</tr>
<tr>
<td>LA</td>
<td>Cameron</td>
<td>Holly Beach 4</td>
<td>3</td>
<td>2/mo</td>
<td>32</td>
<td>44%</td>
</tr>
<tr>
<td>WI</td>
<td>Manitowoc</td>
<td>Fischer Park Beaches</td>
<td>3</td>
<td>1/wk</td>
<td>36</td>
<td>44%</td>
</tr>
<tr>
<td>LA</td>
<td>Cameron</td>
<td>Holly Beach 3</td>
<td>3</td>
<td>2/mo</td>
<td>30</td>
<td>43%</td>
</tr>
<tr>
<td>FL</td>
<td>Franklin</td>
<td>Carrabelle Beach</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>43%</td>
</tr>
<tr>
<td>FL</td>
<td>Wakulla</td>
<td>Shell Point Beach</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>43%</td>
</tr>
<tr>
<td>CA</td>
<td>Los Angeles</td>
<td>Malibu Beach-Paradise Cove</td>
<td>1</td>
<td>1/wk</td>
<td>57</td>
<td>42%</td>
</tr>
<tr>
<td>ME</td>
<td>Knox</td>
<td>Laie Beach</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>42%</td>
</tr>
<tr>
<td>NY</td>
<td>Niagara</td>
<td>Krull Park</td>
<td>2</td>
<td>1/wk</td>
<td>24</td>
<td>42%</td>
</tr>
<tr>
<td>LA</td>
<td>Cameron</td>
<td>Constance Beach</td>
<td>no data</td>
<td>2/mo</td>
<td>31</td>
<td>42%</td>
</tr>
<tr>
<td>CA</td>
<td>Orange</td>
<td>Doheny State Beach-North Beach</td>
<td>1</td>
<td>2/wk</td>
<td>41</td>
<td>41%</td>
</tr>
<tr>
<td>FL</td>
<td>Taylor</td>
<td>Keaton Beach</td>
<td>1</td>
<td>1/wk</td>
<td>22</td>
<td>41%</td>
</tr>
<tr>
<td>LA</td>
<td>Cameron</td>
<td>Gulf Breeze</td>
<td>no data</td>
<td>2/mo</td>
<td>32</td>
<td>41%</td>
</tr>
<tr>
<td>WI</td>
<td>Manitowoc</td>
<td>Neshotah Beach</td>
<td>2</td>
<td>2/wk</td>
<td>39</td>
<td>41%</td>
</tr>
<tr>
<td>OH</td>
<td>Erie</td>
<td>Bay View West</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>41%</td>
</tr>
<tr>
<td>NY</td>
<td>Suffolk</td>
<td>Tanner Park</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>41%</td>
</tr>
<tr>
<td>CA</td>
<td>Orange</td>
<td>Doheny State Beach-North of San Juan Creek</td>
<td>1</td>
<td>2/wk</td>
<td>57</td>
<td>40%</td>
</tr>
<tr>
<td>FL</td>
<td>Taylor</td>
<td>Hagen's Cove</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>40%</td>
</tr>
<tr>
<td>MA</td>
<td>Essex</td>
<td>Kings At Kimball</td>
<td>2</td>
<td>1/wk</td>
<td>25</td>
<td>40%</td>
</tr>
<tr>
<td>WI</td>
<td>Kenosha</td>
<td>Eichelman Beach</td>
<td>2</td>
<td>2/wk</td>
<td>43</td>
<td>40%</td>
</tr>
<tr>
<td>MS</td>
<td>Harrison</td>
<td>Gulfport Central Beach</td>
<td>1</td>
<td>1/wk</td>
<td>84</td>
<td>40%</td>
</tr>
<tr>
<td>CA</td>
<td>San Diego</td>
<td>Tijuana Slough National Wildlife Refuge-Tijuana Rivermouth</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>38%</td>
</tr>
<tr>
<td>MA</td>
<td>Essex</td>
<td>Kings (DCR-DUPR)</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>38%</td>
</tr>
<tr>
<td>NJ</td>
<td>Ocean</td>
<td>Beachwood Beach West (Beachwood)</td>
<td>1</td>
<td>1/wk</td>
<td>29</td>
<td>38%</td>
</tr>
<tr>
<td>CA</td>
<td>Sonoma</td>
<td>Campbell Cove State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>43</td>
<td>37%</td>
</tr>
<tr>
<td>NY</td>
<td>Wayne</td>
<td>Pultneyville Mariners Beach</td>
<td>3</td>
<td>1/wk</td>
<td>19</td>
<td>37%</td>
</tr>
<tr>
<td>MI</td>
<td>Wayne</td>
<td>Pier Park</td>
<td>1</td>
<td>2/wk</td>
<td>35</td>
<td>37%</td>
</tr>
<tr>
<td>RI</td>
<td>Washington</td>
<td>Saunderstown Yacht Club</td>
<td>2</td>
<td>4/yr</td>
<td>38</td>
<td>37%</td>
</tr>
<tr>
<td>FL</td>
<td>Wakulla</td>
<td>Mash Island</td>
<td>1</td>
<td>1/wk</td>
<td>46</td>
<td>37%</td>
</tr>
<tr>
<td>CA</td>
<td>Orange</td>
<td>Poche County Beach</td>
<td>1</td>
<td>2/wk</td>
<td>58</td>
<td>36%</td>
</tr>
<tr>
<td>WI</td>
<td>Manitowoc</td>
<td>Red Arrow Park Beach Manitowoc</td>
<td>2</td>
<td>2/wk</td>
<td>36</td>
<td>36%</td>
</tr>
<tr>
<td>WI</td>
<td>Kenosha</td>
<td>Alford Park Beach</td>
<td>3</td>
<td>1/wk</td>
<td>23</td>
<td>35%</td>
</tr>
<tr>
<td>WI</td>
<td>Kenosha</td>
<td>Pennoyer Park Beach</td>
<td>3</td>
<td>1/wk</td>
<td>23</td>
<td>35%</td>
</tr>
<tr>
<td>State</td>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>2008 Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------</td>
<td>------------</td>
<td>-------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>--------------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>WI</td>
<td>Manitowoc</td>
<td>Memorial Drive Wayside Beach South</td>
<td>2</td>
<td>2/wk</td>
<td>34</td>
<td>35%</td>
</tr>
<tr>
<td>RI</td>
<td>Newport</td>
<td>Atlantic Beach Club</td>
<td>1</td>
<td>3/wk</td>
<td>108</td>
<td>35%</td>
</tr>
<tr>
<td>LA</td>
<td>Cameron</td>
<td>Martin Beach</td>
<td>no data</td>
<td>2/wk</td>
<td>32</td>
<td>34%</td>
</tr>
<tr>
<td>WI</td>
<td>Ozaukee</td>
<td>Harrington State Park Beach North</td>
<td>1</td>
<td>4/wk</td>
<td>65</td>
<td>34%</td>
</tr>
<tr>
<td>NY</td>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>1</td>
<td>1/wk</td>
<td>88</td>
<td>34%</td>
</tr>
<tr>
<td>OH</td>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>1</td>
<td>Daily</td>
<td>108</td>
<td>34%</td>
</tr>
<tr>
<td>WI</td>
<td>Sheboygan</td>
<td>Kohler Andrae State Park North Picnic Beach</td>
<td>1</td>
<td>4/wk</td>
<td>54</td>
<td>33%</td>
</tr>
<tr>
<td>IL</td>
<td>Cook</td>
<td>Winnetka Elder Park Beach</td>
<td>1</td>
<td>Daily</td>
<td>67</td>
<td>33%</td>
</tr>
<tr>
<td>CA</td>
<td>Orange</td>
<td>Riveria Beach</td>
<td>no data</td>
<td>2/wk</td>
<td>61</td>
<td>33%</td>
</tr>
<tr>
<td>CA</td>
<td>San Francisco</td>
<td>Candlestick Point-Windsurfer Circle</td>
<td>1</td>
<td>1/wk</td>
<td>78</td>
<td>32%</td>
</tr>
<tr>
<td>WI</td>
<td>Manitowoc</td>
<td>Hika Park Bay</td>
<td>3</td>
<td>1/wk</td>
<td>22</td>
<td>32%</td>
</tr>
<tr>
<td>NJ</td>
<td>Ocean</td>
<td>Maxon (Pt Pleasant)</td>
<td>1</td>
<td>1/wk</td>
<td>25</td>
<td>32%</td>
</tr>
<tr>
<td>AL</td>
<td>Baldwin</td>
<td>Mary Ann Nelson Beach</td>
<td>3</td>
<td>2/mo</td>
<td>28</td>
<td>32%</td>
</tr>
<tr>
<td>NY</td>
<td>Chautauqua</td>
<td>Sunset Bay Beach Club</td>
<td>3</td>
<td>1/wk</td>
<td>28</td>
<td>32%</td>
</tr>
<tr>
<td>LA</td>
<td>Cameron</td>
<td>Holly Beach 2</td>
<td>3</td>
<td>2/mo</td>
<td>31</td>
<td>32%</td>
</tr>
<tr>
<td>LA</td>
<td>Cameron</td>
<td>Holly Beach 1</td>
<td>3</td>
<td>2/mo</td>
<td>31</td>
<td>32%</td>
</tr>
<tr>
<td>ME</td>
<td>Waldo</td>
<td>Ducktrap River</td>
<td>1</td>
<td>2/wk</td>
<td>31</td>
<td>32%</td>
</tr>
<tr>
<td>NY</td>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>1</td>
<td>2/wk</td>
<td>41</td>
<td>32%</td>
</tr>
<tr>
<td>WI</td>
<td>Ozaukee</td>
<td>County Road D Boat Launch Beach</td>
<td>1</td>
<td>4/wk</td>
<td>62</td>
<td>32%</td>
</tr>
<tr>
<td>WI</td>
<td>Ozaukee</td>
<td>Harrington State Park Beach South</td>
<td>1</td>
<td>4/wk</td>
<td>63</td>
<td>32%</td>
</tr>
<tr>
<td>IL</td>
<td>Cook</td>
<td>Evanstonsouth Beach</td>
<td>1</td>
<td>Daily</td>
<td>151</td>
<td>32%</td>
</tr>
<tr>
<td>RI</td>
<td>Newport</td>
<td>Easton's Beach</td>
<td>1</td>
<td>2/wk</td>
<td>290</td>
<td>32%</td>
</tr>
<tr>
<td>CA</td>
<td>Orange</td>
<td>Capistrano Beach</td>
<td>1</td>
<td>2/wk</td>
<td>58</td>
<td>31%</td>
</tr>
<tr>
<td>NJ</td>
<td>Ocean</td>
<td>River (Pt Pleasant)</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>31%</td>
</tr>
<tr>
<td>LA</td>
<td>Cameron</td>
<td>Rutherford Beach</td>
<td>no data</td>
<td>2/mo</td>
<td>29</td>
<td>31%</td>
</tr>
<tr>
<td>OH</td>
<td>Lorain</td>
<td>Lakeview Beach</td>
<td>2</td>
<td>4/wk</td>
<td>55</td>
<td>31%</td>
</tr>
<tr>
<td>IL</td>
<td>Cook</td>
<td>Northwestern University Beach</td>
<td>1</td>
<td>5/wk</td>
<td>58</td>
<td>31%</td>
</tr>
<tr>
<td>MN</td>
<td>St Louis</td>
<td>Park Point Southworth Marsh Beach</td>
<td>1</td>
<td>2/wk</td>
<td>61</td>
<td>31%</td>
</tr>
<tr>
<td>WI</td>
<td>Ozaukee</td>
<td>Cedar Beach Rd Beach</td>
<td>1</td>
<td>4/wk</td>
<td>64</td>
<td>31%</td>
</tr>
<tr>
<td>CA</td>
<td>San Francisco</td>
<td>Candlestick Point-Sunnysdale Cove</td>
<td>1</td>
<td>1/wk</td>
<td>75</td>
<td>31%</td>
</tr>
<tr>
<td>CA</td>
<td>Orange</td>
<td>Doheny State Beach-3000° South Outfall</td>
<td>1</td>
<td>2/wk</td>
<td>59</td>
<td>31%</td>
</tr>
<tr>
<td>CA</td>
<td>Los Angeles</td>
<td>Avalon Beach-South of Gp Pier</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>30%</td>
</tr>
<tr>
<td>MI</td>
<td>Arenac</td>
<td>Singing Bridge Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>30%</td>
</tr>
<tr>
<td>WI</td>
<td>Manitowoc</td>
<td>Memorial Drive Wayside Beach North</td>
<td>2</td>
<td>2/wk</td>
<td>37</td>
<td>30%</td>
</tr>
<tr>
<td>OH</td>
<td>Erie</td>
<td>Edison Creek</td>
<td>3</td>
<td>3/wk</td>
<td>40</td>
<td>30%</td>
</tr>
<tr>
<td>RI</td>
<td>Washington</td>
<td>Camp Grosvenor</td>
<td>1</td>
<td>3/wk</td>
<td>43</td>
<td>30%</td>
</tr>
<tr>
<td>FL</td>
<td>Escambia</td>
<td>Bayou Chico</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>30%</td>
</tr>
<tr>
<td>OH</td>
<td>Lorain</td>
<td>Century Beach</td>
<td>2</td>
<td>4/wk</td>
<td>96</td>
<td>30%</td>
</tr>
</tbody>
</table>
### Table 3. Repeat Offenders: Beaches with More Than 25 Percent of Samples Exceeding Daily National Standards Each Year, 2005–2008 (alphabetical by state, county, and beach)

<table>
<thead>
<tr>
<th>State</th>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Potential pollution sources (reported by EPA)</th>
</tr>
</thead>
<tbody>
<tr>
<td>CA</td>
<td>Los Angeles</td>
<td>Avalon Beach-near Busy B Cafe</td>
<td>1</td>
<td>1/wk</td>
<td>Unknown</td>
</tr>
<tr>
<td>CA</td>
<td>Los Angeles</td>
<td>Avalon Beach-north of GP Pier</td>
<td>1</td>
<td>1/wk</td>
<td>Unknown</td>
</tr>
<tr>
<td>CA</td>
<td>Los Angeles</td>
<td>Avalon Beach-south of GP Pier</td>
<td>1</td>
<td>1/wk</td>
<td>Unknown</td>
</tr>
<tr>
<td>CA</td>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>1</td>
<td>Daily</td>
<td>Unknown</td>
</tr>
<tr>
<td>CA</td>
<td>Los Angeles</td>
<td>Santa Monica State Beach-Santa Monica Canyon</td>
<td>1</td>
<td>1/wk</td>
<td>Unknown</td>
</tr>
<tr>
<td>CA</td>
<td>Orange</td>
<td>Doheny State Beach-250’ S of San Juan Creek</td>
<td>1</td>
<td>2/wk</td>
<td>Unknown</td>
</tr>
<tr>
<td>CA</td>
<td>Orange</td>
<td>Doheny State Beach-3000’ South Outfall</td>
<td>1</td>
<td>2/wk</td>
<td>Unknown</td>
</tr>
</tbody>
</table>
## State County Beach Tier Monitoring Frequency Potential pollution sources (reported by EPA)

<table>
<thead>
<tr>
<th>State</th>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Potential pollution sources</th>
</tr>
</thead>
<tbody>
<tr>
<td>CA</td>
<td>Orange</td>
<td>Doheny State Beach-North of San Juan Creek</td>
<td>1</td>
<td>2/wk</td>
<td>Unknown</td>
</tr>
<tr>
<td>CA</td>
<td>Orange</td>
<td>Doheny State Beach-Surfzone at Outfall</td>
<td>1</td>
<td>2/wk</td>
<td>Unknown</td>
</tr>
<tr>
<td>CA</td>
<td>Orange</td>
<td>Newport Bay-Newport Blvd Bridge</td>
<td>1</td>
<td>1/wk</td>
<td>Unknown</td>
</tr>
<tr>
<td>CA</td>
<td>Orange</td>
<td>Newport Bay-Ski Zone</td>
<td>1</td>
<td>1/wk</td>
<td>Unknown</td>
</tr>
<tr>
<td>FL</td>
<td>Dixie</td>
<td>Shired Island</td>
<td>1</td>
<td>1/wk</td>
<td>Unknown</td>
</tr>
<tr>
<td>FL</td>
<td>Taylor</td>
<td>Cedar Island</td>
<td>1</td>
<td>1/wk</td>
<td>Boats, Runoff, Wildlife, Stormwater, Septic systems, Other, Unknown</td>
</tr>
<tr>
<td>FL</td>
<td>Taylor</td>
<td>Dekle Beach</td>
<td>1</td>
<td>1/wk</td>
<td>Boats, Runoff, Wildlife, Stormwater, Septic systems, Other, Unknown</td>
</tr>
<tr>
<td>FL</td>
<td>Taylor</td>
<td>Keaton Beach</td>
<td>1</td>
<td>1/wk</td>
<td>Boats, Runoff, Wildlife, Stormwater, Other, Unknown</td>
</tr>
<tr>
<td>IL</td>
<td>Lake</td>
<td>North Point Marina North Beach</td>
<td>1</td>
<td>Daily</td>
<td>Unknown</td>
</tr>
<tr>
<td>NJ</td>
<td>Ocean</td>
<td>Beachwood Beach West</td>
<td>1</td>
<td>1/wk</td>
<td>None Listed</td>
</tr>
<tr>
<td>OH</td>
<td>Cuyahoga</td>
<td>Villa Angela St. Pk.</td>
<td>1</td>
<td>Daily</td>
<td>None Listed</td>
</tr>
<tr>
<td>OH</td>
<td>Ottawa</td>
<td>Camp Perry</td>
<td>2</td>
<td>4/wk</td>
<td>None Listed</td>
</tr>
<tr>
<td>TX</td>
<td>Nueces</td>
<td>Ropes Park</td>
<td>1</td>
<td>1/wk</td>
<td>None Listed</td>
</tr>
<tr>
<td>VA</td>
<td>King George</td>
<td>Fairview Beach</td>
<td>1</td>
<td>1/wk</td>
<td>Unknown</td>
</tr>
<tr>
<td>WI</td>
<td>Kenosha</td>
<td>Eichelman</td>
<td>2</td>
<td>2/wk</td>
<td>Unknown</td>
</tr>
<tr>
<td>WI</td>
<td>Milwaukee</td>
<td>South Shore</td>
<td>1</td>
<td>Daily</td>
<td>Unknown</td>
</tr>
<tr>
<td>WI</td>
<td>Sheboygan</td>
<td>Kohler Andrae North Picnic</td>
<td>1</td>
<td>4/wk</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

### Notes
1. NRDC report closing/advisory days for events lasting six consecutive weeks or less. Extended events (7 to 13 consecutive weeks) and permanent events (greater than 13 consecutive weeks) are reported separately.
Chapter 1

Sources of Beachwater Pollution and Strategies for Reduction

Most beach closings and advisories are issued because beachwater monitoring has detected unsafe levels of bacteria. These unsafe levels indicate the presence of pathogens, microscopic organisms from human and animal wastes that pose a threat to human health. The key known contributors of these contaminants are stormwater runoff that carries agricultural and human waste, untreated or partially treated discharges from sewage treatment plants, sanitary sewers, septic systems, and wildlife. Advisories may also be issued as a precautionary measure when a pollution event is expected to occur—for instance, during rainstorms. Beach closings and advisories also occur in response to specific pollution events, such as a known sewage spill, an overflow from an animal-waste lagoon, red tides (harmful algal blooms), or an oil spill.

Using funding provided by the Beaches Environmental Assessment and Coastal Health (BEACH) Act, all coastal states have beachwater monitoring programs and report information about their beachwater monitoring and notification activities to the U.S. EPA. The data set collected under the BEACH Act is the most complete and systematic source of information about the causes of poor beachwater quality.

States are asked to report one of six reasons for closings and advisories at beaches:

- Monitoring that revealed elevated bacteria levels
- Preemptive—Rainfall
- Preemptive—Sewage discharge or spill
- Preemptive—Chemical or oil discharge or spill
- Model prediction
- Policy dictates action

States can also report a reason as something other than these choices.

According to the reported data, 73 percent of beach closings and advisories in 2008 were based on monitoring that revealed elevated bacteria levels. Twenty-two percent were precautionary due to rain that was expected to carry pollution into coastal waters, 2 percent were issued preemptively because of a known sewage spill, 1 percent were preemptive based on computer modeling, and 2 percent were issued for other reasons (chemical or oil discharges or spills, policy that dictated action, boating, dredging, and algal blooms).

In addition to reporting a reason for each closing and advisory, states are asked to report one or more sources of contamination for closings and advisories. Reportable sources are:

- Agricultural runoff
- Boat discharge
- Concentrated animal feeding operation
- Combined sewer overflow
- Publicly owned treatment works (“treatment works” is another term for sewage treatment plant)
- Non-storm-related/urban/dry weather runoff
- Septic system leakage
- Sewer line leak/break/blockage
- Sanitary sewer overflow
- Storm-related/wet-weather runoff
- Wildlife

Stormwater runoff was the most frequently identified source of beach closing and advisory days.
Beach managers may also report “other” and/or “unknown” as a source. Sources of closings and advisories are reported more haphazardly than reasons, and care must be taken when drawing conclusions from this information. However, a broad picture does emerge. For example, about half of the contamination in 2008 was attributed at least in part to unidentified sources. This is significant, because contamination cannot be prevented unless its source is understood.

Stormwater runoff was the most frequently identified source of beach closing and advisory days in 2008. Human sewage (from septic tanks, sewer lines, or sewage treatment plants) was the second-largest reported source of beachwater closing and advisory days, with wildlife following close behind. A state-by-state breakdown of pollution sources can be found in the state summaries in Chapter 5.

Information about sources of contamination is invaluable in terms of addressing poor water quality, but determining the sources takes time, money, and expertise. One way to identify sources is to conduct a sanitary survey. Beach sanitary surveys involve collecting information at the beach, and sometimes information about the surrounding watershed. Information collected at the beach may include data regarding discharge from any outfalls, the number of birds at the site, the amount of litter, and the presence of seaweed or algae. Information about the watershed may reflect land use, the use of residential septic tanks, and locations of wastewater treatment facilities. After a pilot study of sanitary surveys was conducted at 36 beaches in Wisconsin, the number of closing and advisory events attributed to unknown sources decreased from 84 percent to 24 percent. Sanitary surveys used to be associated mainly with drinking water and shellfish safety programs, but more and more states are conducting sanitary surveys of their recreational beaches, either annually or when exceedances are found.

In many cases, neither a visual survey nor an assessment of upstream sewage treatment plants or animal feedlots reveals the source of beachwater contamination. This is the case when many small or nonpoint sources are contributing to the contamination. Sometimes chemical markers (such as pharmaceuticals or their metabolites) are measured to determine whether a human sewage source is responsible for high bacteria counts. The presence of caffeine or optical whiteners used in laundry detergents is also used to determine whether contamination with human sewage has occurred.

There are also many methods for identifying species responsible for fecal organisms present in water. Most microbial source tracking, as this process is called, relies on matching DNA or RNA “fingerprints” from bacterial strains found in contaminated beachwater with those of bacteria found in various animal hosts and human sewage. Quantitative PCR, or qPCR, is an example of a laboratory technique used in microbial source tracking that can also be used to quantify the amount of fecal organisms present in water.

The ways in which beachwater becomes contaminated are described in more detail in the following sections.

**URBAN RUNOFF**

The EPA estimates that more than 10 trillion gallons of untreated stormwater make their way into our surface waters each year. Contaminated urban stormwater fouls about a quarter of our nation’s polluted estuaries and lakes and is a significant source of bathing-beach pollution in many regions.

More than half of the people in the United States live in coastal towns and cities, occupying only 17 percent of the nation’s land mass (excluding Alaska). Between 1980 and 2003, the coastal population grew by 33 million, and it is projected to increase by another 19 million by 2015. As the population along the U.S. coast grows, more land is converted to impervious surfaces that shed rather than absorb falling rain. Today, stormwater runoff from urban and suburban areas is posing a significant problem that is growing rapidly with rising populations and sprawling development. At the current rate, by 2025 more than a quarter of all of our coastal acreage will be developed. Unless strong measures are taken to ensure that developers use sustainable practices such as on-site retention of stormwater, runoff from these areas will increasingly degrade coastal waters and pollute our beaches.

Stormwater runoff starts as rain or snowmelt. As it washes over roads, rooftops, parking lots, construction sites, and lawns, it becomes contaminated with oil and grease, pesticides, litter, and pollutants from vehicles. On its way to storm
drains, it also often picks up fecal matter from dogs, cats, pigeons, other urban animals, and even humans. In Los Angeles County, for instance, the sewer system is separate from the storm drain system, yet storm drains leading to Santa Monica Bay have been found to contain human enteric viruses, indicating the presence of human waste. Human waste may find its way into storm drain systems from adjacent sewage pipes that leak, or from businesses or residences that have illegally connected their sewage discharge to the storm drains. Illicit discharges also occur when people empty holding tanks from recreational vehicles and trailers into storm drains.

The amount of pollution present in stormwater runoff tends to correlate with the amount of impervious cover. A study conducted in South Carolina found that a watershed that was 22 percent covered by impervious surfaces had an average fecal coliform count seven times higher than a watershed that was 7 percent covered by impervious surfaces. However, even in less densely populated areas, uncontrolled runoff can foul beaches.

Discharges of polluted stormwater result in elevated bacteria levels and increased illness rates among swimmers, and the association between heavy precipitation (leading to increased runoff) and waterborne disease outbreaks is well documented (see Figure 9). A Southern California study showed the direct effect on coastal water quality of urban stormwater runoff draining from the Santa Ana River. Where the river meets the ocean, fecal indicator bacteria concentrations were found to be as much as 500 percent above California's ocean bathing water standards.

Strategies for reducing contamination carried by stormwater runoff fall into three categories: stormwater treatment, stormwater reduction, and reduction of the sources of stormwater contamination. Detection and correction of improper connections between storm drains and sanitary sewers is an example of contamination reduction. Detecting these connections can be complicated, however. Storm drain systems can be quite lengthy; in Los Angeles County, for instance, there are thousands of miles of storm drains. Records of storm drain pathways are not always accurate or available, and many times contaminating discharges are intermittent, which complicates the search. In eastern Michigan, a scent-trained dog is being used to locate improper sewer connections to municipal storm drain systems.

There are many means of treating stormwater to reduce bacterial contaminants, including bioretention areas, marshland buffers, filters installed in outfall catch basins, and UV disinfection. In North Carolina, a $1.1 million unit for treating bacteria in a stormwater outfall will begin operating in Dare County in the fall of 2009. In this system, the

---

**Figure 9. Influence of Heavy Rainfall on Occurrence of E. coli Infections**

The graph shows the relationship between unusually heavy rainfall and the number of confirmed cases of E. coli infection that occurred during a massive disease outbreak in Ontario, Quebec, in May 2000. The incubation period for E. coli is usually three to four days, which is consistent with the lag between extreme precipitation events and surges in the number of cases.
stormwater enters a central chamber and passes through filters lining the chamber before being routed to an outfall at the beach. The water quality from this device will be monitored, and if it is successful, more such units will be installed statewide.

Beginning in late 2000, a stormwater outfall that was affecting water quality at North Beach and Zoo Beach in Racine, Wisconsin, was reengineered to create a system that removes solid wastes from stormwater and then routes it to a series of infiltration/evaporation basins planted with native wetland species (see Figure 10). To prevent very high flows from causing damage to the wetland/infiltration basins, runoff from larger storms (five-year or greater, excluding the first flush) bypasses the treatment structures and wetlands, immediately discharging through a bypass outlet and emptying directly into Lake Michigan. In addition to this stormwater treatment system, other strategies for improving water quality at these beaches were undertaken, including grooming beaches more deeply and not leveling the sand during grooming so that the sand dries out faster, which reduces transport of *E. coli* into the water when waves wash ashore, installing trash cans with liners so they can be emptied by lifeguards on an as-needed basis instead of overflowing and attracting seagulls, posting signs that feeding seagulls is prohibited, and stenciling storm drains with the words “No dumping, drains to lake.” During the summer of 2000, before these measures were taken, North Beach was under advisory for 62 days (more than half the time) and Zoo Beach for 39 days. Since then, the number of advisories has dropped dramatically: In the summer of 2008 one advisory day was issued at North Beach and three were issued at Zoo Beach, despite the fact that June 2008 saw record rainfall.

Reducing stormwater flow can consist of collecting stormwater in basins, rain barrels, or cisterns for later use, or adopting development practices that allow stormwater to soak into the ground and replenish groundwater instead of running off into storm drains. Many of the strategies for reducing stormwater flow to reduce bacterial contamination of beaches have the added benefits of augmenting the water supply, providing wildlife habitat, minimizing greenhouse gases generated to power drinking water systems, and being aesthetically pleasing.

Stormwater runoff is not the only type of urban runoff that can carry bacterial pollution to the coast. In dry weather, runoff occurs as a result of landscape irrigation, the draining of swimming pools, car washing, and various commercial activities. Even though it is much smaller in volume than stormwater runoff, dry weather runoff can be a significant source of beachwater contamination, especially along the coast of California, where it is dry during the summer when the beaches are most heavily used. Along the densely populated Santa Monica Bay in California, more than 20 low-flow diversion facilities have been constructed to route dry weather runoff through sanitary sewage treatment after trash and debris have been screened out. Sanitary sewage treatment plants in this area have the capacity to treat dry weather runoff, but they cannot handle the huge volume of runoff that is generated during storms.

Urban runoff has been found to have significant impacts on aquatic life in receiving waters. Urban runoff can lead to excess sedimentation, suffocating fish eggs and smothering the habitat of bottom-dwelling organisms such as aquatic
insects, which are a food source for many fish and other wildlife species. Toxic chemicals washed into the water can increase the susceptibility of aquatic organisms to disease, interfere with reproduction, reduce the viability of offspring, or cause direct mortality.\textsuperscript{18}

EPA regulations require cities and industrial and construction sites to obtain permits, develop stormwater management plans, and implement best management practices to control pollutants in stormwater runoff. However, only limited progress has been made to date. Vigorous implementation and enforcement and ambitious pollutant reduction goals are necessary to make this effort successful. Unfortunately, despite the magnitude of problems caused by stormwater pollution, the EPA has still not set baseline technology standards to control stormwater pollution from construction and development.\textsuperscript{19}

**HUMAN SEWAGE**

Sewage overflows from aging sanitary and combined sewer systems, leaking sewage pipes, and malfunctioning sewage treatment plants and pump stations have always been a major cause of ocean, bay, and Great Lakes beach closings and advisories.

**Combined Sewer Overflows**

Combined sewer systems carry both raw sewage from residences and industrial sites and stormwater runoff from streets to sewage treatment plants. As shown in Figure 11, combined sewer systems are concentrated in the Great Lakes states and in the Northeast. During periods of heavy rainfall or snowmelt, the volume of the combined wastewater can become too great for the treatment plant to handle. In such circumstances, the excess flow is diverted to outfall points that discharge pollutants—including raw sewage; floatables such as trash, syringes, and tampon applicators; toxic industrial waste; and contaminated stormwater—into the nearest stream or coastal waterway. This is known as a combined sewer overflow, or CSO.

CSOs are a major cause of pathogen contamination in marine and Great Lakes waters near urban areas, discharging 850 billion gallons of raw sewage and stormwater annually.\textsuperscript{20} According to the EPA, 43,000 CSO events occur per year.

**Figure 11. A Rough Illustration of the Prevalence of Combined Sewer Systems in the United States\textsuperscript{21}**

![Combined Sewer Systems Map](image-url)
nationwide. Although they are most prevalent in urban areas, CSOs affect 46 million people in 746 communities throughout 32 Northeast and Great Lakes states. CSOs contaminate shellfish waters as well as recreational beaches. Shellfish harvesting is restricted in the majority of the 659 shellfish beds located close to a CSO outfall. Although an EPA policy that aims to reduce these overflows has been in effect since 1994, virtually all combined sewer systems continue to overflow when it rains. As of 2004, only 59 percent of communities with CSOs had submitted plans for controlling them.

Global climate change is predicted to increase the amount of rainfall in the Great Lakes region and the Northeast. Since these are the regions where the majority of combined sewer systems are concentrated, an increase in CSOs can be expected. This is discussed in more detail in the section on climate change at the end of this chapter.

Sanitary Sewer Overflows and Discharges From Sewer-Line Breaks
Sanitary sewer systems carry human and industrial waste from buildings to sewage treatment plants where it is treated. These systems can discharge untreated sewage when the treatment plants are overwhelmed or malfunction or when sewer lines break, posing a threat to bathing beach safety.

As of 2004, separate sanitary sewers were serving 164 million people nationwide. Although most of these systems were built more recently than the combined sewer systems, they are aging and deteriorating rapidly. A nationwide survey of 42 treatment plants found some that have been in use for as long as 117 years; the average is 33 years. As population and sewer load increases and rehabilitation and maintenance schedules lag, pipes can deteriorate and break, spilling sewage directly onto streets or into waterways. The EPA has estimated that 23,000 to 75,000 sanitary sewer overflows (SSOs) occur annually, discharging a total of 3 billion to 10 billion gallons per year.

Nearly 70 percent of sewage overflows from human-waste sewage lines are due to obstructions such as tree roots or grease clogs, line breaks, and mechanical failures. Wet weather places demands on sanitary sewer systems even though they do not treat stormwater runoff. Even when there are no improper connections between stormwater and sanitary sewers, water seeps through manholes and into the sewer lines and also falls onto the surface of the treatment units during rain events. This can lead to the discharge of raw sewage from manholes, overflowing pipes, and treatment-plant bypasses. Although only 26 percent of sanitary sewer overflows nationwide were caused by wet weather events and related inflow and infiltration, these events accounted for nearly 75 percent of the total SSO volume discharged. In January 2001, the EPA proposed SSO regulations that would have required improved capacity, operation, and maintenance as well as public notification when overflows occur. Unfortunately, the Bush administration shelved them.

When a sewer overflow threatens beachwater quality, there needs to be immediate communication between those responsible for the overflow and those charged with protecting public health. The public also has the right to know that an overflow or discharge has occurred and should be informed when it happens, not several days later, after beachwater monitoring results have been analyzed and reported.

To close these communication gaps and improve coordination between sanitation and public health officials, the Sewage Overflow Community Right-to-Know Act (H.R. 753/S. 937) should be passed. It would amend the Federal Water Pollution Control Act, directing owners or operators of sewage treatment plants to: 1) institute an alert system for sanitary sewer overflows, 2) notify the public of such overflows in areas where human health is potentially affected within 24 hours, 3) immediately notify public health authorities and other affected entities, and 4) provide specified reports to the administrator of the EPA or the state.

Inadequately Treated Sewage
Sewage plants near coastal waters tend to serve densely populated, rapidly growing urban areas. When too many homes and businesses are hooked up to a sewage treatment plant, the plant is prone to more frequent bypasses and inadequate treatment. Moreover, sewage treatment plants can, and often do, malfunction as the result of human error, breakage of old equipment, or unusual conditions in the raw sewage. When that happens, raw or partially treated sewage may be discharged into coastal waterways and their tributaries. Some sewage systems also bypass all or a portion of their treatment plants when flows exceed capacity during rain events. This practice can also put pathogens in waterways and should be phased out.
Under section 301(h) of the federal Clean Water Act, sewage treatment plants may obtain a waiver allowing them to forgo basic federal secondary treatment requirements, discharging into marine waters wastes that have undergone only primary treatment. Releasing primary-treated sewage into water bodies degrades receiving waters and poses serious risks to public health and the marine ecosystem. The vast majority of pathogens are not removed by primary treatment of wastewater. For example, 85 percent of Shigella bacteria, 85 to 100 percent of salmonella, 50 to 100 percent of Entamoeba histolytica, and more than 90 percent of fecal coliform may remain in wastewater even after primary treatment. In contrast, secondary treatment removes up to 95 percent of suspended solids in the waste stream and is significantly more effective than primary treatment in removing biologic pathogens. For example, secondary treatment removes 80 to 90 percent of Shigella bacteria, 70 to 99 percent of salmonella, and 75 to 99 percent of enteric viruses prior to discharge of the effluent.

While sewage treatment plants with a waiver under section 301(h) have become increasingly rare in the United States, there are still approximately 30 waivers being used. Recently, NRDC prevented a 301(h) waiver from being issued to the sewage treatment plant in Morro Bay, California. After years of pressure from environmental groups and the public, local officials voted unanimously to upgrade the plant. The plant now will go from discharging dirty wastewater to creating some of the cleanest in the nation—clean enough to be recycled and reused for irrigation at nearby golf courses and elsewhere.

**SEPTIC SYSTEMS**

Dwellings built near the coast may be equipped with underground septic systems. If not sited, built, and maintained properly, these systems can leach wastewater into coastal recreational waters. Homeowners often do not adequately maintain their septic systems. There is no federal regulatory program to control waste issuing from septic systems, and local governments and states rarely inspect these systems sufficiently to prevent such failures. Fecal matter from malfunctioning or overloaded septic systems can contaminate bathing beaches. Runoff can also carry bacteria from failing inland septic systems into streams that empty into recreational waters. According to the 2001 American Housing Home Survey, 6 percent of septic systems fail annually, resulting in improper treatment of 66 billion to 144 billion gallons of sewage. The EPA estimates that one-third of new construction and 25 percent of existing U.S. dwellings use some kind of septic tank or on-site waste disposal system.

**Boating Waste**

Marinas are generally located in areas that are naturally sheltered or where a breakwater has been constructed. This shelter results in reduced circulation of clean water around the docks, which allows waste to accumulate and pose a serious health threat. Waste may also be discharged improperly from boats that are in use, posing a health and aesthetic threat to bathing beaches. Elevated concentrations of fecal coliform have been found in areas with high boating density.

Federal law requires boats with onboard toilets either to treat the waste with chemicals before discharging it or to hold the waste and later pump it out into a sewage treatment plant. Also, the federal Clean Vessel Act (CVA) of 1992 provides federal grant money to states for building pump-out and dump stations in marinas so boaters can dispose of human wastes in an environmentally sound manner. However, many marinas still lack sufficient pump-out facilities, and compliance with the law appears to be poor in many areas. Military warships are not subject to the federal law requiring storage or treatment of human wastes before discharging them.

**BEACHGOERS**

In the 2005 study “Outbreaks Associated With Recreational Water in the United States,” researchers found that bathers themselves were an important localized source of contamination leading to illness outbreaks. All swimmers release fecal...
organisms when they enter the water in a process called bather shedding. Results from one study showed that bathers shed on the order of 600,000 cfu per person of enterococci bacteria during the first 15 minutes of water contact.43 Beachgoers who swim while ill can spread diseases to other bathers. Fecal accidents are also a health risk, as are diaper-aged children if care isn’t taken to ensure that their wastes are kept from entering the water. The presence of \textit{E. coli} and coliform bacteria has been shown to correlate to the number of visitors and periods of high recreational use (generally the summer and weekends).44

**WILDLIFE AND PET WASTE**

Municipalities sometimes list waterfowl as the cause of beach closings or advisories. During migration season, large or excessive populations of waterfowl can gather at beaches or in suburban areas that drain into recreational waters. These dense clusters can occur when other potential waterfowl habitats are unavailable, often because wetlands have been filled or ecological conditions have been altered (for example, when Canada geese that were previously migratory become resident). Waterfowl are also attracted by food sources, including trash left on beaches and in overflowing garbage cans. To improve beachwater quality, the city of Racine, Wisconsin, has an ordinance that prohibits feeding seagulls. Waterfowl congregate more freely when areas adjacent to beaches have been cleared of trees and bushes that would provide cover for predators.

Pet waste deposited on or near the beach also carries pathogens that can wind up in beachwater when pet owners do not pick up and properly dispose of their pet’s waste. The fecal matter from these animals can overload the normal capacity of a beach to absorb wastes, degrading water quality, particularly if there is no vegetation around the waterway to absorb the waste.

**AGRICULTURAL DISCHARGES AND AGRICULTURAL RUNOFF**

Runoff from farms and animal feeding operations may contain high concentrations of pathogenic animal waste, fertilizers, and pesticides. The EPA has stated that agricultural runoff is responsible for as much as 70 percent of all water quality problems that have been identified in the United States.45 The production of farm animals has increasingly shifted toward huge, industrial-scale operations where large numbers of animals are confined together. These confined animal feeding operations (CAFOs) produce vast quantities of manure that far exceed the assimilation capacity of neighboring crops and pastures and are a contributing source in 20 percent of impaired rivers and streams.46 Animal waste from large feedlots has been linked to outbreaks of a toxic microorganism, \textit{Pfiesteria piscicida}, in the Chesapeake Bay region and in North Carolina, causing numerous waterway closings and serious human and aquatic health impacts. Animal waste can also contain pathogens usually not found in human waste, such as \textit{E. coli} O157:H7, which contaminated baby spinach last fall and resulted in 205 confirmed illnesses and three deaths.47

In addition to the pathogenic threat to swimmers from agricultural discharges and agricultural runoff, animal wastes and farm fertilizers are rich in nutrients like nitrogen and phosphorous. When excessive nutrients are discharged into aquatic ecosystems, eutrophication occurs and aquatic plants become more abundant. As these plants die, they sink to the bottom and are decomposed by microbes that consume oxygen. This can lead to hypoxia, a depletion of dissolved oxygen in the water. Aquatic life flees areas of hypoxia when it can, and dies when it cannot. Nitrogen-driven coastal eutrophication is widespread and increasing in the United States.48

Nitrate and other nutrients are known to be a factor in the creation of a large zone of hypoxia in the Gulf of Mexico.49 This “dead zone” is believed to cover approximately 8,000 square miles, an area roughly the size of New Jersey.50 It is the second-largest zone of hypoxia in the world and has compromised fishing resources that are an important source of human nutrition. While natural conditions created zones of hypoxia in the Gulf of Mexico several times prior to the advent of commercial fertilizers, the size of the current zone has increased rapidly over the past several decades.51 The Chesapeake Bay also has a hypoxic zone that is sensitive to nitrogen loading. This dead zone was among the largest recorded in 2008.52
BEACH INFRASTRUCTURE AND WATER QUALITY

Often, manmade modifications intended to make a beach more attractive or accessible to visitors are conducive to poor water quality. Breakwaters reduce waves and make for peaceful swimming areas, but they also inhibit water circulation and trap polluted waters in areas where bathers congregate. Parking lots are constructed at the edge of beaches for ease of access, but pavement prevents water from soaking into the ground. Simple strategies like separating roads and parking lots from the beach with a strip of vegetation can reduce local stormwater flow.

CLIMATE CHANGE AND SOURCES OF BEACHWATER POLLUTION

Beachwater quality is generally adversely affected by increased rainfall. Scientists agree that in many regions of the United States, climate change will cause increased frequency and magnitude of rain and large storms; increased runoff, coastal flooding, and coastal erosion; and warmer water and air temperatures. These changes will exacerbate existing causes of beachwater pollution that threaten public health. The Intergovernmental Panel on Climate Change found that “water-borne diseases and degraded water quality are very likely to increase with more heavy precipitation.”

The frequency and severity of combined sewer overflow (CSO) events is directly related to climate—especially increased precipitation, which causes greater runoff. As more high-intensity rainfall events occur, the risk increases that combined sewer systems will overload, discharging untreated stormwater runoff and wastewater directly into lakes, rivers, and oceans. Global climate change is predicted to increase the amount of rainfall, leading to increased sewer overflows in the Great Lakes and Northeast, key regions where the majority of combined sewer systems are concentrated. Indeed, in the Great Lakes region, climate modeling predicts that the regional average annual CSO frequency between 2060 and 2099 will increase between 13 and 70 percent. Given the uncertainty in predicting future climate, communities must decide whether to ensure mitigation effectiveness based on predicted changes, or face potentially significant retrofit costs in the future to maintain effective mitigation.

Even in areas that have separate sewer systems, like much of the West, an increase in extreme rainfall events can still lead to more pollution in coastal waters via increased stormwater runoff. For instance, in California, warmer temperatures can mean more winter precipitation that falls as rain and less that falls as snow, leading to more winter runoff. More winter runoff over saturated soils will result in larger sediment flows and more bacteria in beachwaters. Rising sea levels will submerge tidal wetlands that filter stormwater runoff and improve beachwater quality.

The U.S. Centers for Disease Control and Prevention finds that the “combined effects of increased temperature and precipitation are likely to worsen the burden of water- and food-borne disease in the U.S., though the magnitude of this effect is difficult to project with certainty.” Thus, pathogens such as Cryptosporidium parvum and Giardia lamblia, which are associated with polluted runoff and CSOs, can be expected to increase in recreational waters as climate change causes increased precipitation and runoff. An article in Climate Research concurs, concluding that “a wetter climate in the [Mid-Atlantic region] could lead to higher C. parvum loads in water.” A major cryptosporidium outbreak in Milwaukee in 1993, which killed 54 and sickened more than 400,000 people, occurred after heavy rains and runoff compromised a drinking water treatment plant.

Notes
5. Ibid., p.1.


13 Kinzelman, J., City of Racine Health Department, personal communication, July 2009.

14 Ibid.


16 Tam, W., “Infrastructure Improvements in the City of Los Angeles for Santa Monica Bay Beaches,” National Beach Conference, Huntington Beach, CA., April 2009.


22 EPA, Report to Congress: Impacts and Control of CSOs and SSOs, pp.4–19.

23 Ibid., pp. 4–13.

24 Ibid., pp. 5–14.

25 Ibid., pp. 6–15.


27 Ibid., pp. 4–22.


29 EPA, “Report to Congress: Impacts and Control of CSOs and SSOs,” p. 2-1.

30 Ibid., pp. 4–29.

31 Ibid., pp. 4–27.

32 Ibid., pp. 4–27.

33 33 U.S.C. 1342, sec. 402(r).5


36 Ibid., p. 92.

37 Ibid., p. 92.


41 A 1987 Maryland survey found that 80 percent of boaters did not comply with the law. See Alliance for Chesapeake Bay, “Chesapeake Bay Citizen Report,” 1989, p. 1. A similar survey of Puget Sound boaters, conducted in the summer of 1988, found that 37 percent had no toilet equipment or discharged raw sewage directly into the water. See Puget Sound Water Quality Authority, Managing Nonpoint Pollution: An Action Plan Handbook for Puget Sound Watersheds, 1989, pp. 8–10.


59  Ibid. at 18.


Chapter 2

Health Risks and Economic Impacts of Beach Pollution

**DISEASES CAUSED BY PATHOGENS IN BATHING WATERS**

Polluted waters may contain disease-causing organisms called pathogens. The most common types of pathogens are those associated with human and animal waste, including bacteria, viruses, and protozoa. Swimmers in sewage-polluted water can contract any illness that is spread by fecal contact, including gastroenteritis, respiratory infection, and ear and skin infections (see Table 4). (Gastroenteritis, or stomach flu, is inflammation of the stomach and the small intestine, symptoms of which can include vomiting, diarrhea, stomachache, nausea, headache, and fever.)

The Centers for Disease Control and Prevention concluded that the incidence of infections associated with recreational water use has steadily increased over the past several decades.

Giardiasis, caused by the protozoa *Giardia lamblia*, is the most commonly reported intestinal disease in North America. Most swimming-related illnesses last from a few days to several weeks, but in some cases pathogens may cause severe, long-term illness or even death. There is usually a delay of several days to two weeks between contact with contaminated water and expression of symptoms, and most people who get sick from swimming are not aware of the link. Sensitive populations such as children, the elderly, or those with a weakened immune system are particularly at risk for long-term effects. For example, diarrhea can be 10 times more likely to result in death in individuals over the age of 74 compared to those between the ages of 5 and 24.

Since 1971, the Centers for Disease Control and Prevention (CDCP), the EPA, and the Council of State and Territorial Epidemiologists have worked to maintain the Waterborne Disease and Outbreak Surveillance System for collecting and reporting waterborne diseases and outbreak-related data. Their most recent report, released in 2006, summarizes findings for January 2003–December 2004. During this survey period, 62 waterborne disease outbreaks were reported (see Table 5 and Figure 12). These outbreaks caused illness in 2,698 people, resulting in 58 hospitalizations and one death. The Centers for Disease Control and Prevention concluded that the incidence of infections associated with recreational water use has steadily increased over the past several decades. The increase is attributed to a combination of factors, such as the emergence of new pathogens, increased participation in aquatic activities, and better reporting.

Because the CDCP relies on voluntary reporting of illnesses, the incidences may be much higher than those cases accounted for. Based on beach visitation rates and monitoring data, researchers have estimated that 689,000 to 4,003,000 gastrointestinal illness episodes and 693,000 respiratory illness episodes occurred each year between 2000 and 2004 at Southern California beaches. While these estimates are subject to a great deal of uncertainty, they provide insight into the potential for under-reporting of swimming-related illnesses.

In 2005, the first major report of the National Epidemiological Environmental Assessment of Recreational (NEEAR) Water Study examined the association between recreational freshwater quality and gastrointestinal illness as well as upper respiratory illness, rash, eye ailments, and earache after swimming at two beaches in the Great Lakes region. Both beaches are known to be affected by sewage discharges from waste treatment plants. In 2003, water samples were collected from each beach and tested for enterococcus using rapid and traditional culture-based methods. At one beach (Indiana Dunes National Lakeshore on Lake Michigan in Indiana), the NEEAR study found that the incidence of gastrointestinal illness was 10 percent among subjects who came in contact with the water, representing twice the number of illnesses reported by non-swimmers. At a second beach (on Lake Erie near Cleveland, Ohio) the rate of gastrointestinal illness among swimmers was as high as 14 percent. The illnesses correlated to the presence of enterococcus bacteria. Two additional freshwater beaches were added to the study in 2004: Silver Beach, near St. Joseph, Michigan, and Washington Beach, near Saginaw, Michigan.
### Table 4. Details on the 62 Waterborne Disease Outbreaks Reported to CDCP: Jan 2003–Dec 2004

<table>
<thead>
<tr>
<th>Associated Illnesses</th>
<th>Incidence</th>
<th>Etiologic Agents Identified:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gastroenteritis</td>
<td>30 (48.4%)</td>
<td>Bacterium 32.3%</td>
</tr>
<tr>
<td>Dermatitis</td>
<td>13 (21.0%)</td>
<td>Parasite 24.2%</td>
</tr>
<tr>
<td>Acute Respiratory Illness</td>
<td>7 (11.3%)</td>
<td>Virus 9.7%</td>
</tr>
<tr>
<td>Others:</td>
<td>12 (19.3%)</td>
<td>Chemical or Toxin 4.8%</td>
</tr>
<tr>
<td>Amebic Meningoencephalitis, Meningitis, Leptospirosis, Otitis, Externa, Mixed Illnesses</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

### Table 5. Pathogens and Swimming-Associated Illnesses

<table>
<thead>
<tr>
<th>Pathogenic Agent</th>
<th>Disease</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Bacteria</strong></td>
<td></td>
</tr>
<tr>
<td>Campylobacter jejuni</td>
<td>Gastroenteritis</td>
</tr>
<tr>
<td>E. coli</td>
<td>Gastroenteritis</td>
</tr>
<tr>
<td>Salmonella typhi</td>
<td>Typhoid fever</td>
</tr>
<tr>
<td>Other salmonella species</td>
<td>Various enteric fevers (often called paratyphoid), gastroenteritis, septicemia (generalized infections in which organisms multiply in the bloodstream)</td>
</tr>
<tr>
<td>Shigella dysenteriae and other species</td>
<td>Bacterial dysentery</td>
</tr>
<tr>
<td>Vibrio cholera</td>
<td>Cholera</td>
</tr>
<tr>
<td>Vibrio vulnificus</td>
<td>Skin and tissue infection, death in those with liver problems</td>
</tr>
<tr>
<td>Yersinia spp.</td>
<td>Acute gastroenteritis (including diarrhea, abdominal pain)</td>
</tr>
<tr>
<td>Aeromonas hydrophila</td>
<td>Dysenteric illness, wound infections, gastroenteritis, septicemia</td>
</tr>
<tr>
<td>Leptospira</td>
<td>Leptospirosis</td>
</tr>
<tr>
<td>Helicobacter pylori</td>
<td>Chronic and severe inflammation of the stomach, increased likelihood of developing gastric cancer</td>
</tr>
<tr>
<td>Legionella pneumoniae</td>
<td>Fever, pneumonia</td>
</tr>
<tr>
<td><strong>Viruses</strong></td>
<td></td>
</tr>
<tr>
<td>Adenovirus</td>
<td>Respiratory and gastrointestinal infections</td>
</tr>
<tr>
<td>Coxsackievirus (some strains)</td>
<td>Various, including severe respiratory disease, fever, rash, paralysis, aseptic meningitis, myocardiitis</td>
</tr>
<tr>
<td>Echovirus</td>
<td>Various, similar to coxsackievirus (evidence is not definitive except in experimental animals)</td>
</tr>
<tr>
<td>Hepatitis</td>
<td>Infectious hepatitis (liver malfunction); also may affect kidneys and spleen</td>
</tr>
<tr>
<td>Norwalkvirus</td>
<td>Gastroenteritis</td>
</tr>
<tr>
<td>Poliovirus</td>
<td>Poliomyelitis</td>
</tr>
<tr>
<td>Reovirus</td>
<td>Respiratory infections, gastroenteritis</td>
</tr>
<tr>
<td>Rotavirus</td>
<td>Gastroenteritis</td>
</tr>
<tr>
<td>Calicivirus</td>
<td>Gastroenteritis</td>
</tr>
<tr>
<td>Polyomavirus</td>
<td>Cancer of the colon</td>
</tr>
<tr>
<td><strong>Protozoa</strong></td>
<td></td>
</tr>
<tr>
<td>Balantidium coli</td>
<td>Dysentery, intestinal ulcers</td>
</tr>
<tr>
<td>Acanthamoeba</td>
<td>Eye infections</td>
</tr>
<tr>
<td>Microsporidia</td>
<td>Diarrhea</td>
</tr>
</tbody>
</table>
Testing the Waters 2009

<table>
<thead>
<tr>
<th>Pathogenic Agent</th>
<th>Disease</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Bacteria</strong></td>
<td></td>
</tr>
<tr>
<td><em>C. jejuni</em></td>
<td>Abscess in liver or other organs</td>
</tr>
<tr>
<td><em>Cryptosporidium</em></td>
<td>Gastroenteritis</td>
</tr>
<tr>
<td><em>Entamoeba histolytica</em></td>
<td>Amoebic dysentery, infections of other organs</td>
</tr>
<tr>
<td><em>Giardia lamblia</em></td>
<td>Diarrhea (intestinal parasite)</td>
</tr>
<tr>
<td><em>Isospora belli and Isospora hominis</em></td>
<td>Intestinal parasites, gastrointestinal infection</td>
</tr>
<tr>
<td><em>Toxoplasma gondii</em></td>
<td>Toxoplasmosis</td>
</tr>
<tr>
<td><em>Cyclospora</em></td>
<td>Gastroenteritis</td>
</tr>
</tbody>
</table>

Park Beach in Michigan City, Indiana. Overall, enterococcus measured using the rapid test method was more strongly associated with illness at these four freshwater beaches than was enterococcus measured using the traditional culture-based method. The study also showed that children 10 years old and younger were especially susceptible to gastrointestinal illness following swimming exposure. The Centers for Disease Control and Prevention have noted that children under the age of nine have more reports of diarrhea and vomiting from exposure to waterborne pathogens than any other age group, with at least a twofold increase occurring over the summer swimming months.

A large-scale 1995 epidemiological study investigated possible adverse health effects associated with swimming in ocean waters contaminated by urban runoff. The Santa Monica Bay Restoration Project study involved initial interviews with 15,492 beachgoers who bathed and immersed their heads, as well as follow-up interviews with 13,278, to ascertain the occurrence of certain symptoms such as fever, chills, nausea, and diarrhea. The study found an increase in risk of

---

Figure 12. Geographic Location of the Reported Disease Outbreaks

Source: http://www.cdc.gov/mmwr/preview/mmwrhtml/ss5512a1.htm

Note: These numbers are largely dependent on reporting and surveillance activities in individual states and do not necessarily indicate the true incidence in a given state.

*Guam also reported one recreational water-associated outbreak in 2004.
illness associated with swimming near flowing storm drain outlets in Santa Monica Bay, compared with swimming more than 400 yards away. For example, swimmers near storm drains were found to have a 57 percent greater incidence of fever than those swimming farther away. This study also confirmed the increased risk of illness associated with swimming in areas with high densities of indicator bacteria. Illnesses were reported more often on days when water samples tested positive for enteric bacteria.

In a California study, the rates of reported health symptoms among surfers were compared in urban North Orange County and rural Santa Cruz County during two winters to determine the health impacts of exposure to urban runoff. The urban North Orange County surfers who were interviewed for the study reported almost twice as many symptoms as the rural Santa Cruz County surfers. There were numerous illnesses reported by the study participants, including respiratory disease, fever, nausea, gastrointestinal illness, sore throat, vomiting, and others. In both study years the risk of illness increased for all symptom categories by 10 percent for each 2.5 hours of weekly water exposure.

Swimmers who contract a waterborne illness may also pass the disease on to household members, multiplying the effect of the polluted water. While swimming-related illnesses are usually not life-threatening, they can take a substantial toll in terms of convenience, comfort, and the well-being of the people affected.

Climate change is expected to increase the incidence of diseases contracted by swimmers. The bacterium Vibrio cholerae, which causes cholera, is an example of a pathogen that presents an increased threat to humans as a result of climate change. Extreme weather events and warmer waters can foster growth of the bacterium—one study found that V. cholerae was nearly 20 times more likely to occur at a temperature of 19° C or higher than at lower temperatures. In 2005, cases of illness due to V. cholerae occurred in association with Hurricane Katrina. Increased freshwater runoff, high in nutrients and low in salinity, also may favor the growth of V. cholerae. As one study of Chesapeake Bay concluded, “increased climate variability, accompanied by higher stream flow rates and warmer temperatures, could favor conditions that increase the occurrence of V. cholerae in Chesapeake Bay.”

<table>
<thead>
<tr>
<th>Table 6. Possible Influence of Climate Change on Climate-Susceptible Pathogens</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pathogen</td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td>Vibrio Species</td>
</tr>
<tr>
<td>Vibrio Species</td>
</tr>
<tr>
<td>Vibrio Species</td>
</tr>
<tr>
<td>Changes in precipitation</td>
</tr>
<tr>
<td>Sea level changes</td>
</tr>
<tr>
<td>Naegleria fowleri</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Basis for Assessment</th>
</tr>
</thead>
<tbody>
<tr>
<td>Likelihood of climate event is high, and evidence supports growth trend in ambient waters; adaptive (control) measures (refrigeration) would reduce this effect for post-harvest oysters</td>
</tr>
<tr>
<td>Likelihood of climate event is high, and evidence supports environmental growth trend</td>
</tr>
<tr>
<td>Likelihood of climate event is high, and evidence collected to date supports trend; more data needed to confirm pathogen distribution patterns</td>
</tr>
<tr>
<td>Likelihood of climate event is probable, but additional research is needed to confirm pathogen distribution patterns</td>
</tr>
<tr>
<td>Likelihood of climate event is high, but more research is needed to confirm disease trend</td>
</tr>
<tr>
<td>Pathogen</td>
</tr>
<tr>
<td>--------------</td>
</tr>
<tr>
<td>Cryptosporidium</td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td>Giardia</td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td></td>
</tr>
</tbody>
</table>

**THREATS TO SWIMMERS FROM HARMFUL ALGAL BLOOMS**

Harmful algal blooms (HABs), which are known as “red tides” when they occur in marine waters, are a growing problem in surface waters where nutrient-rich pollution can spur algal growth. Several species of phytoplankton, including *Karenia brevis*, *Alexandrium tamarense*, and *Pseudo-nitzschia australis*, produce potent toxins that can make people sick if they are exposed to contaminated water or if they eat contaminated fish or shellfish. These toxic organisms are a natural part of the phytoplankton community, but when conditions are right, they experience a rapid growth in numbers, resulting in a “bloom.” HABs can last for days, weeks, or months, and cause serious and potentially life-threatening human illnesses that have a slew of symptoms, including diarrhea, nausea, vomiting, abdominal cramping, chills, diminished temperature sensation, muscular aches, dizziness, anxiety, sweating, seizures, numbness and tingling of the mouth and digits, and paralysis, as well as cardiovascular and respiratory symptoms (Table 7).15 Approximately 10 percent of all foodborne disease outbreaks in the United States are caused by eating seafood contaminated by algal toxins.16 Toxins produced by harmful algae can aerosolize and cause respiratory distress even in beach visitors who do not enter the water.

Although the most common type of poisoning related to toxic blooms comes from eating contaminated shellfish, there are also instances in which such blooms have directly affected fishermen and swimmers and other recreational users of near shore marine and riverine waters. Toxic outbreaks of such organisms as *Pfiesteria piscicida*, which was first discovered in North Carolina in 1991, have been found to be associated with fish kills and with skin and neurological damage as well as memory loss.17 There were also instances in 1996 in which red tide algal blooms of *Gymnodinium breveii* on the west coast of Florida resulted in respiratory illness in beachgoers.

While red tides are a natural phenomenon, they are exacerbated by human impacts such as nutrient overloads into coastal waters, which spur their growth. The incidence of HABs has increased over the past 30 years, particularly along the New England coastline (see Figure 13).18 Analyzing data over a 50-year period from the southwest coast of Florida, researchers at the University of Miami determined that *K. brevis* red tides are occurring with greater frequency, closer to shore, and during more months of the year. They attribute this phenomenon to greater inputs of nutrients into coastal
K. brevis red tides are also becoming more common elsewhere in the Gulf of Mexico. For example, along the Texas coast, red tide blooms occurred in all but one year between 1995 and 2002. In August and September of 2007, red tides occurred off the coast of Delaware, the first documented occurrence of *K. brevis* north of Cape Hatteras, North Carolina.

Climate change may be contributing to the increases in frequency, intensity, and duration of harmful algal blooms that have occurred on a global scale in the past few decades. The blooms are influenced by weather patterns, ocean temperature, and nutrients in the water. For example, heavy rains lead to increased runoff, and this runoff, especially nutrient-rich fertilizers from agriculture, is linked to the proliferation of harmful algal blooms. In the Gulf Coast, for instance, precipitation and runoff have both increased significantly over the past 100 years.

As is the case with pathogens, warmer waters may also result in expanded ranges of some harmful algae species. For instance, shellfish toxicity from harmful algae in Puget Sound occurs in late summer and early fall when temperatures are warmest. Given that temperatures in the Puget Sound are expected to increase, so too will the window of time during which these harmful algae bloom. Climate change might already be expanding the range of a few new toxic species of algae into the Chesapeake Bay estuary and causing others to bloom earlier. For example, a toxic alga normally associated with Florida and the Gulf Coast, *Alexandrium monilatum*, was believed to have been responsible for killing whelks.

### Table 7. Algae and Their Threats to Human Health

<table>
<thead>
<tr>
<th>Algal Blooms</th>
<th>Health Risk</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cyanobacteria (mainly <em>Microcystis</em> and <em>Anabaena</em>)</td>
<td>Severe dermatitis, burning or itching of the skin, erythematous wheals, redness of lips and eyes, sore throat, asthma symptoms, dizziness</td>
</tr>
<tr>
<td><em>Karenia brevis</em> (and other marine algae)</td>
<td>Irritation of the skin, eyes, nose, and throat, coughing, shortness of breath</td>
</tr>
<tr>
<td><em>Pfiesteria piscicida</em></td>
<td>Headache, confusion, skin rash, eye irritation, respiratory irritation</td>
</tr>
<tr>
<td><em>Alexandrium tamarense</em></td>
<td>Paralytic Shellfish Poisoning: tingling, numbness, and burning of the perioral region, ataxia, giddiness, drowsiness, fever, rash, and staggering; respiratory arrest in more severe cases</td>
</tr>
<tr>
<td><em>Pseudo-nitzschia australis</em></td>
<td>Amnesic Shellfish Poisoning: nausea, vomiting, abdominal cramps, and diarrhea; in more severe cases dizziness, headache, seizures, disorientation, short-term memory loss, respiratory difficulty, and coma</td>
</tr>
</tbody>
</table>

waters due to increased agricultural runoff and sewage discharges in the watershed over that time period. *K. brevis* red tides are also becoming more common elsewhere in the Gulf of Mexico. For example, along the Texas coast, red tide blooms occurred in all but one year between 1995 and 2002. In August and September of 2007, red tides occurred off the coast of Delaware, the first documented occurrence of *K. brevis* north of Cape Hatteras, North Carolina.

Climate change may be contributing to the increases in frequency, intensity, and duration of harmful algal blooms that have occurred on a global scale in the past few decades. The blooms are influenced by weather patterns, ocean temperature, and nutrients in the water. For example, heavy rains lead to increased runoff, and this runoff, especially nutrient-rich fertilizers from agriculture, is linked to the proliferation of harmful algal blooms. In the Gulf Coast, for instance, precipitation and runoff have both increased significantly over the past 100 years.

As is the case with pathogens, warmer waters may also result in expanded ranges of some harmful algae species. For instance, shellfish toxicity from harmful algae in Puget Sound occurs in late summer and early fall when temperatures are warmest. Given that temperatures in the Puget Sound are expected to increase, so too will the window of time during which these harmful algae bloom. Climate change might already be expanding the range of a few new toxic species of algae into the Chesapeake Bay estuary and causing others to bloom earlier. For example, a toxic alga normally associated with Florida and the Gulf Coast, *Alexandrium monilatum*, was believed to have been responsible for killing whelks.

### Figure 13. Expansion of HAB Problems in the United States

(a species of sea snail) in the York River in Virginia in 2007. This bloom represented a potential shift northward for this particular alga. Also, a large bloom of a toxic alga normally found in the Caribbean Sea, *Cochlodinium polykrikoides*, killed young fish and oysters in the lower Chesapeake Bay in August 2007.  

Land use and development practices along coastlines and in watersheds can lead to increased runoff into water bodies and result in a greater number of red tide events. Man-made alterations to hydrology, such as dredging and filling, can slow water circulation and thus impede the ability of the water body to cleanse itself of harmful algae. Filter-feeding shellfish serve as natural cleansers of phytoplankton, so human activities that diminish shellfish populations reduce an ecosystem’s capacity to naturally cleanse itself of toxic algae.

Efforts to deal with red tides have focused on mitigating the effects of these events, primarily through improved systems to monitor for harmful algal blooms, educate and communicate the risks to the general population, and learn more about the causes of harmful algal blooms and how they affect humans and aquatic life. Other techniques to prevent HABs involve restricting the movement of harmful algal species via the shellfish market and ship ballast water. For example, ballast water may be heated or chemically treated to prevent the introduction of invasive species, and trade may be restricted in shellfish from areas experiencing red tides. Strong efforts need to be made to control nutrient pollution from nonpoint sources (e.g., agricultural runoff and septic tank runoff) as well as from point sources (e.g., sewage treatment and aquaculture facilities) to reduce the number of red tide events.

### WATER QUALITY STANDARDS

Current federal standards for recreational water quality are based on the concentration of fecal indicator bacteria, usually *enterococcus* and *E. coli*. They are called indicator bacteria because, although they may not be directly harmful to humans, they indicate the likely presence of fecal contamination, are relatively easy to test for, and are typically found in the presence of harmful pathogens. Testing for the full range of pathogens found in beachwaters is difficult, partly because if they are present they are often found at very low concentrations.

Under the Clean Water Act, the EPA is required to develop water quality criteria for pollutants based on their impact on human health and aquatic life. States then create limits, or standards, for these pollutants using the EPA recommended water quality criteria or other criteria that the EPA deems as protective. In 1986, the EPA developed criteria for testing recreational waters using *E. coli* and *enterococcus* bacteria as pathogen indicators in Great Lakes (fresh) waters, and *enterococcus* as indicators in marine and fresh waters, based on prior scientific research on their effectiveness (see Table 8).  

As of 2000, only 11 states had adopted the 1986 criteria. Recognizing the need for consistent water quality criteria at recreational beaches, Congress passed the Beach Environmental Assessment and Coastal Health (BEACH) Act in 2000, amending the Clean Water Act to improve beachwater quality monitoring programs and processes for notifying the public of health risks from contamination at beaches. Under the BEACH Act, states were required to adopt standards based on the EPA’s 1986 criteria for pathogen indicators. In addition, the EPA was required to complete studies on the human health effects of pathogens in coastal recreational waters and to develop new criteria and methods for detecting pathogens by 2005.  

The EPA is now conducting additional epidemiological studies, setting new water quality criteria, and validating rapid test methods as a result of a settlement of an enforcement action brought by NRDC to enforce the BEACH Act requirements.

---

**Table 8. Beachwater Quality Standards Required by the BEACH Act**

<table>
<thead>
<tr>
<th>Water Type</th>
<th>Indicator</th>
<th>Standard for Multiple Samples&lt;sup&gt;a&lt;/sup&gt;</th>
<th>Standard for a Single Sample&lt;sup&gt;b&lt;/sup&gt;</th>
</tr>
</thead>
<tbody>
<tr>
<td>Marine</td>
<td>Enterococcus</td>
<td>35 per 100 ml</td>
<td>104 per 100 ml</td>
</tr>
<tr>
<td>Fresh</td>
<td>Enterococcus</td>
<td>33 per 100 ml</td>
<td>61 per 100 ml</td>
</tr>
<tr>
<td></td>
<td><em>E. coli</em></td>
<td>126 per 100 ml</td>
<td>235 per 100 ml</td>
</tr>
</tbody>
</table>

<sup>a</sup> Geometric mean of at least five samples over a 30-day period.

<sup>b</sup> For designated beach areas.
The gastrointestinal illness rates predicted by the fecal indicator bacteria concentrations set by the EPA in 1986 have been confirmed throughout the world. However, the acceptable illness rate for full-body water contact that was used when setting the standards is high. Under the levels set by the EPA in the 1986 criteria, 19 out of 1,000 people swimming in ocean waters and 8 out of 1,000 swimmers in fresh waters just meeting these standards will become ill. Put another way, if a family of four were to swim once per week in the summer (June, July, and August) in ocean waters that just meet the EPA’s standard, one member of the family would probably become ill.

According to a 2007 report by the U.S. Government Accountability Office (GAO), the current water quality criteria have other significant limitations. The GAO concluded that the current indicators may not identify all health risks. For instance, the GAO pointed out that standards were developed primarily to address the risk of contracting gastroenteritis, but not necessarily to address rashes, earaches, pinkeye, respiratory infections, or very serious illnesses such as hepatitis and encephalitis (inflammation of the brain). An epidemiological study at four Great Lakes beaches noted that rates of gastrointestinal illness correlated with enterococcus levels, but other illnesses known to be associated with swimming did not.

The ability to test for pathogens instead of fecal indicator bacteria would strengthen the link between health standards and illness. While quantifying the concentrations of the multitude of pathogenic bacterial and viral species in recreational waters is difficult and expensive, the technologies for molecular methods are advancing and the possibility of directly detecting the relative presence of microbes has been demonstrated. Molecular methods take advantage of the fact that fecal indicator bacteria and pathogens themselves have unique genetic sequences that can be detected. Quantitative polymerase chain reaction (qPCR) is an example of a molecular method for quantifying very small amounts of specific sequences of RNA or DNA. Because molecular methods do not involve culturing live cells, there is a possibility that water quality standards could be developed for species that are not easily cultured. However, most molecular methods do not differentiate between live and dead cells, which is particularly problematic when measuring for water quality in waters that receive disinfected sewage. Also, molecular methods are susceptible to interference from chemicals, which could cause an underestimation of health risk.

Another potential problem with the EPA’s bacterial indicator is that the underlying epidemiological studies used to develop pathogen indicators have been based primarily on exposure to human feces–dominated point-source contamination coming from pipes. In many coastal areas, diffuse, nonpoint sources—including urban runoff, septic system discharges, and animal waste—can be larger sources of pathogens in recreational waters. The EPA is now conducting studies at stormwater impacted beaches to address this concern.

A single gram of dog feces is estimated to contain 23 million bacteria, and waterfowl feces contains similar amounts. There is a widely held belief in the beachwater quality community that since the standards currently in use were developed by studying beachwater that was contaminated with human sewage, then only human fecal contamination makes humans sick and fecal matter from other animals is not pathogenic. For example, some states will leave a beach that is exceeding water quality standards open if source tracking reveals the source of indicator bacteria to be animals, because they believe the water is safer for swimming than it would be if the source of indicator bacteria were humans. However, EPA has analyzed this issue and has concluded that “both human and animal feces in recreational waters continue to pose threats to human health.” In addition, the results thus far of an epidemiological study at Doheny Beach in Southern California, which is impacted by gull fecal matter, indicate that human illness rates from nonhuman fecal contamination may be similar to illness rates from human sources of fecal contamination. Drinking water contaminated with animal waste killed seven and hospitalized nearly 100 people with bloody diarrhea and vomiting in Walkerton, Ontario, in 2000.

Geographic differences in climate conditions, such as the amount of UV exposure, and temperature, for example, may affect the life cycle of pathogens and their impact on human health. As a result, pathogens can behave in different ways in tropical waters than in temperate waters. The current standards fail to capture the variability in the potential for
pathogens to regrow, persist, and die off, or to address variability in indicator/illness relationships. The EPA is now conducting research to attempt to address these concerns.

Standards could include requirements about sampling locations and times. Recent studies establish that ambient concentrations of bacteria in dynamic aquatic environments can vary radically within short distances and time spans. Also, since human viruses are generally more resistant to sunlight than the indicator organisms that are measured, sampling is best conducted in the early morning hours.

**TIMELINESS OF ANALYSIS METHODS**

Perhaps the most significant challenge associated with current fecal indicator bacteria standards is that current approved detection methods for fecal indicator bacteria require a long incubation period, usually producing results in 24 hours. This lag time between when pathogen-contaminated waters are sampled and when the public is notified creates a window of time in which swimmers may be exposed to contaminated water (see Figure 14). In addition, it results in beaches being closed on days when the beachwater may meet standards.

The limitations of frequently used methods for monitoring beachwater quality to protect public health were illustrated by one local beach manager who demonstrated that at a particular beach, advisories and closings based on monitoring results were issued inaccurately 100 percent of the time. Samples taken when the beach was under advisory or closed due to the previous day's monitoring results showed that the beachwater quality met standards on the days that the beach was under advisory or closing in every case.

The EPA included rapid detection technologies as part of its freshwater epidemiological surveys conducted in the Great Lakes in 2004. The study concluded that the use of faster indicators of recreational water quality would result in the ability to make decisions about recreational water quality on the day of sample collection and could thereby lower gastrointestinal illnesses in beach communities. The economic benefit of faster testing and earlier posting was found to be about $202,000 per year for two Great Lakes beaches. Racine, Wisconsin, is one city that has been testing and piloting different rapid detection technologies since 2006 with the goal of obtaining EPA approval.

The EPA has been conducting research for several years on the use of rapid test methods to determine beachwater quality, particularly using qPCR methods, including how the qPCR results correlate with other test methods of determining fecal indicator bacteria concentrations, whether qPCR detects all strains of fecal indicator bacteria, and whether the methods can be used to correlate the amount of indicator present with illness rates in swimmers.

Another promising rapid test method is immunomagnetic separation/adenosine triphosphate (IMS/ATP), which exploits the unique properties of the surfaces of target cells (e.g., enterococci or *E. coli*) to capture and tag the cells and count their concentrations in a given sample. The use of IMS/ATP techniques for detecting microbes in surface
waters has not been studied as much as the use of qPCR, but it is being used in epidemiological studies this year. One of the challenges of IMS/ATP is that strains of indicator bacteria for which antibodies do not yet exist are not detected.49

In 2009, more epidemiological studies using rapid test methods are being conducted at beaches in many areas, including California, Florida, and Puerto Rico.

Beachwater quality generally depends on many complex factors, but for some beaches, predictions of beachwater quality can be calculated fairly accurately based on a few physical measurements of daily conditions. Some states have taken advantage of this and have created computer beachwater quality models that rely on data from physical measurements such as rainfall levels, wind speed and direction, tides, wave heights, and currents. These models prepare rapid predictions of beachwater quality and allow for beaches to be closed or placed under advisory the day that bacterial levels are expected to be high, rather than 24 hours after samples with high bacteria concentrations are taken. Because the water quality at many beaches is adversely impacted by stormwater runoff, another, less sophisticated means of protecting public health is to preemptively close beaches or issue advisories when indicator bacteria levels are expected to be high after rainfall events. These preemptive rainfall advisories can be based on rainfall intensity or some other rain-related factor. States should always provide adequate warnings to swimmers when there has been a sewage spill.

THE ECONOMIC IMPACTS OF BEACH POLLUTION

Beaches, rivers, and lakes are the number one vacation destination for Americans; about one-fourth of the population goes swimming in our waterways every year.50 Americans take more than 1.8 billion trips annually—or an average of approximately six trips per person per year—to fish, swim, boat, or just relax. In 2007, the nation's shoreline-adjacent counties contributed $5.5 trillion toward the nation's gross domestic product and 47 million jobs (Figure 15).51 One report estimates that by 2010 more than 70 million individuals will visit ocean beaches annually—an increase of 50 percent above the figure for the year 2000. By 2010, Americans will spend almost 1 billion days by the beach each year.52 Economic activity directly associated with the ocean contributed more than $138 billion to the U.S. economy in 2004.53 Approximately 85 percent of all U.S. tourism revenue is received in coastal states.54

![Figure 15. The Value of the Coastal Economy (2007)](image-url)
Polluted water puts these revenues at risk. A 2007 study by the National Oceanic and Atmospheric Administration (NOAA) found that an increase in water quality in Long Beach, California, to the healthier standards of Huntington City Beach would create $8.8 million in economic benefits over a 10-year period. A similar 2006 study compared the 1996 water quality of the Chesapeake Bay to the quality it would have had if legislation to clean the waters had never been passed. The study estimated that the water quality improvements increased annual boating, fishing, and swimming revenue between $357.9 million and $1.8 billion.

The property value of houses and land near waters is also threatened by pollution. An American Housing Survey found that, all other things being equal, a location within 300 feet of a waterbody increases the value of a home by up to 28 percent. The New Jersey Department of Environmental Protection included beaches when recently conducting a study on the value of certain natural features in the state. Assuming that people are willing to pay to be close to environmental features that are attractive to them, the study analyzed the effect of proximity to beaches on actual residential housing prices. The study focused on seven local housing markets located in Middlesex, Monmouth, Mercer, and Ocean counties, which are representative of the state as a whole. Results showed that in four of the seven markets, sale prices for homes within 300 feet of a beach were between $81,000 and $194,000 higher than homes more than 300 feet away.

Researchers concluded that higher property values are associated with proximity to beaches and open water, and that people are willing to pay more to be closer to these attractive environmental features. Similarly, property values in close proximity to water increase with water quality improvements. Along Maryland’s western shore of the Chesapeake Bay, localized improvements in fecal coliform counts so that state standards are met would increase waterfront property values by approximately 6 percent.

In addition to harming people, pathogen pollution causes ecological impacts, which in turn have economic impacts. Each year, 4 million visitors augment the 90,000 inhabitants of the Florida Keys; its reefs are the biggest diving destination in the world. A 2003 study estimates that reef-related sales in Broward County, Florida, contribute more than $2 billion to the economy and provide more than 35,000 jobs. Yet coral reefs are adversely impacted by a combination of rising temperatures, increasing nutrients, and pathogen pollution from sources such as untreated or inadequately treated sewage. Diseases killing coral, sponges, and other marine life were first identified about 30 years ago, and most were unknown just 10 years ago. Fecal contamination from sewage in the Florida Keys is thought to be a major source of disease in coral. Elkhorn coral (Acropora palmata) was once the most common coral in the Caribbean; more than 90 percent has died since 1980. In 2006, the species was listed on the U.S. Endangered Species List. Scientists in Queensland, Australia—using an epidemiological technique first used to link smoking to lung cancer in the 1960s—have uncovered a causal link between agricultural pollution, low coral biodiversity, and poor recolonization of the reef. Hard coral biodiversity was found to be almost twice as high on the reefs far from agricultural areas as on the reefs close by. Upsetting the nutrient balance of the oceans can stimulate the growth of algae. Algal growth on reefs may damage coral by taking over habitat space that would otherwise be occupied by coral.

Explosive growth of toxin-producing algae, or harmful algal blooms, occurs in many coastal states. These events also create substantial economic costs in terms of their impact on public health (lost work days and medical costs), commercial fisheries, recreation and tourism, and monitoring and management. A 2006 report estimates that harmful algal blooms cost the United States $82 million a year. Over the last several decades, algal blooms in the United States have caused more than $1 billion in cumulative economic loss.

Polluted beaches cause a loss to those who had planned to visit the beach and swim in the water that in turn costs local economies in the form of lost tourist dollars and jobs. Coastal tourism, attributable in part to clean beaches, generates substantial revenues for state and local governments. Economists estimate that a typical swimming day is worth $30.84 to each individual. Depending on the number of potential visitors to a beach, this “consumer surplus” loss can be quite significant. For example, one study estimated economic losses as a result of closing a Lake Michigan beach due to pollution as ranging between $7,935 and $37,030 per day.

While beach closings may be necessary to protect swimmers, they are no substitute for efforts to clean up our waters. In fact, the Lake Michigan study estimated that even a perfectly implemented beach closing policy would result in considerable economic losses and reduce predicted illnesses by only 42 percent. Another study, performed in Orange County, California, evaluated the economic burden of several individual illnesses that can be contracted from swimming
in polluted recreational marine waters. For the two beaches studied, researchers estimated the cumulative public health cost from lost wages and medical care to treat the more than 74,000 incidents of illness annually by calculating a cost for each illness (Table 9). The total annual burden was $3.3 million, excluding personal out-of-pocket expenses associated with having a prescription filled after a doctor visit or the costs of self-medication.74

Coastal industries like commercial fin fishing and shell fishing are also affected by beach pollution. In 2006, the U.S. commercial fishing industry (including processors and retailers) generated more than $44 billion in income and supported more than 1.5 million jobs.75 According to the National Oceanic and Atmospheric Administration's National Marine Fisheries Service, U.S. fishermen in the 50 states brought 9.3 billion pounds of commercial fish and shellfish to market in 2007, with a total annual value of $4.2 billion.76 This value increases more than tenfold, to an estimated $44 billion, in the retail marketplace.77 In 2006, 13.6 million individuals participated in recreational angling, thus contributing $82 billion directly to the economy and generating more than 500,000 jobs.78

Harmful algal blooms, spurred by nutrients delivered by stormwater and other sources, can close shellfish beds for prolonged periods. In the spring and summer of 2005, shellfish beds from Maine to Cape Cod that represented more than 35 percent of the nation's clam harvest were closed due to the worst toxic algal bloom in New England since 1972. The problem was so bad that the governor of Massachusetts asked the Small Business Administration to declare an "economic injury disaster" for the state's fishermen and related businesses.79

Some areas either do not monitor their beaches or do not close them when water quality fails to meet standards. This can result in lower short-term losses for businesses in the area, but it also means that those who get sick will incur medical costs and lost workdays as a result. Cleaning up the sources of pollution so that beachwater does not pose a health risk is the optimal solution. In the meantime, protecting public health will require improved beachwater monitoring and closing of beaches when contamination is detected or suspected, rather than allowing people to swim and get sick. Given the large number of people using beaches and the substantial income from coastal tourism, the cost of monitoring programs is reasonable.

### Table 9. Cost Estimates for Illnesses Associated with Polluted Water Due to Lost Wages and Medical Care

<table>
<thead>
<tr>
<th>Type of Illness</th>
<th>Cost Per Illness</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gastrointestinal Illness</td>
<td>$36.58</td>
</tr>
<tr>
<td>Acute Respiratory Disease</td>
<td>$76.76</td>
</tr>
<tr>
<td>Per Ear Ailment</td>
<td>$37.86</td>
</tr>
<tr>
<td>Per Eye Ailment</td>
<td>$27.31</td>
</tr>
</tbody>
</table>


### Notes


35 Natural Resources Defense Council
9 Figure from the *Morbidity and Mortality Report*.
13 Louis et al. (2003).
15 Woods Hole Oceanographic Institution http://www.whoi.edu/redtide/
21 State of Delaware, Department of Natural Resources and Environmental Control, Information on Red Tides, at http://www.dnrec.delaware.gov/Pages/RedTideInformation.aspx.
23 Wad M. Khairy. Assessing and Modeling Flood Event and Climate Change in the Gulf Coast Region (Ch. 10 from Integrated Assessment of the Climate Change Impacts on the Gulf Coast Region), Findings of the Gulf Coast Regional Assessment, June 2003, pp. 166.
30 33 USC 1342(q).
31 33 U.S.C. 1254, sec. 104(v) and 33 U.S.C 1314(q), sec. 304(a).
73 Ibid., p. 2737.
78 Ibid, p. 11.
Chapter 3

Beachwater Monitoring and Closing/Advisory Practices

THE FEDERAL BEACH ACT

The federal Environmental Assessment and Coastal Health (BEACH) Act has vastly improved the number and quality of coastal monitoring and public notification programs, but they are still not necessarily comprehensive or sufficiently protective of the health of beachgoers.

The BEACH Act was passed by Congress to improve states’ beach monitoring programs and public notification methods to protect the public from the health risks of beachwater contamination through standardized water quality criteria. The BEACH Act authorizes the EPA to award grants to states for implementing programs to monitor coastal recreational waters adjacent to beaches used by the public for compliance with the standards for pathogen indicators. Grant funds are also used to notify the public promptly of any exceedances through posting or equivalent means. There is no federal requirement that states monitor their beaches or notify the public when water quality standards are violated, and the EPA has not required participating states to adhere to any minimum standards for monitoring and notification other than requiring that the public health standard applied to test results be at least as protective as the federal minimum.

The BEACH Act authorizes $30 million a year for state grants for monitoring and public notification, but appropriations have funded only about one-third of that level each year. The EPA awarded $10 million in annual grants to states for use in improving monitoring and notification programs in 2002 through 2005, and $9.9 million in 2006 and 2007. In 2008, the EPA awarded only $9.75 million in grants to states, and slightly more than that was awarded in 2009.

The BEACH Act also directed the EPA to conduct the necessary epidemiology studies to assess the full human health risk from exposure to pathogens in coastal recreational waters by 2003 and to subsequently publish new or revised criteria based on these studies by October 2005, and every five years thereafter. States must then adopt these new or revised criteria. After the EPA failed to meet these deadlines, NRDC filed a lawsuit to enforce the law. The EPA is now under a consent decree requirement to complete the new standards by October 2012. In the meantime, swimmers continue to be at an unnecessarily elevated risk due to the limited scope of recreational water standards.

BEACHWATER MONITORING AND PUBLIC NOTIFICATION PROGRAMS VARY BY STATE

Despite the passage of the BEACH Act, there is still a considerable amount of variability among state beachwater monitoring programs and public notification programs, and some state programs may not be adequate for protecting public health. The EPAs current published standards include a geometric mean value for multiple samples taken over 30 days, and an instantaneous single-sample value. Some state and local agencies apply both the geometric mean and the single-sample standards and issue beach closings or advisories if either standard is exceeded; others apply the geometric mean standard or the single-sample standard but not both.

States also vary as to how often they sample. Some states monitor their high-priority beaches almost daily, while other states monitor their high-priority beaches once or twice a week. Although the EPA has recommended daily beach
monitoring of high-priority beaches, local governments have stated that they lack the necessary staff and funding to carry this out. As a result, beaches may remain open during a contamination event on days when they are not sampled.

Moreover, sampling methods differ by state. While most states are consistent in sampling at the same time of day and the same location, there is variability in the depth at which samples are taken. In spite of the EPA’s recommendation that samples be collected 12 inches below the surface at a depth of approximately three feet, states reported collecting samples at varying depths, which affects the microbial indicator level found in the beachwater.

Public notification programs are inconsistent and may be insufficient for protecting public health. Along with different standards for triggering an advisory or closure, states vary as to whether or not they issue a public health advisory or close a beach or both when sampling has found bacteria levels that exceed the standards. Some states wait until there have been two consecutive standard violations before an advisory is issued. At the other extreme, there are a handful of states that use predictive modeling to issue preemptive closures or advisories when an exceedance of standards is expected based on beachwater conditions such as wind direction, water temperature and turbidity, and currents.

Methods for notifying the public of health advisories and beach closures are variable among states as well, and may make it unnecessarily difficult for beachgoers to get notifications promptly and to get complete information, including the effective date of the closure or advisory. States make use of a variety of notification methods, including toll-free phone lines, signs posted at beaches, electronic notifications, newspaper notices, and television and radio coverage in conjunction with the weather report. (For information on individual state monitoring and public notification programs, see Chapter 5, State Summaries.)
Plan of Action

When NRDC first issued *Testing the Waters* in 1991, most beaches in the United States were rarely, if ever, monitored for pollution, and the public was usually not informed whether the beaches were safe for swimming. That situation has improved considerably due to years of public education and advocacy by NRDC and other public health and environmental advocates, the passage of the federal BEACH Act in 2000, and the settlement of NRDC litigation against the U.S. Environmental Protection Agency (EPA) to enforce the terms of the BEACH Act last year. The settlement requires the EPA to update beachwater quality standards and test methods to provide faster and more accurate information to beachgoers about beachwater safety.

As discussed below, Congress has legislation pending that would codify and even strengthen the basic terms of that settlement and update funding provisions for beachwater monitoring and cleanup. While that effort is not yet complete, NRDC has largely shifted its focus from warning the public or closing beaches when they are unsafe to addressing the sources of beachwater pollution so that our beachwater will not pose a threat to public health. In addition to the specific sources of beachwater pollution—such as stormwater, sewage, and agricultural waste—is the looming threat of global warming, which has already begun to have devastating effects on coastal water resources. Unless the United States passes comprehensive climate legislation, other actions that we take to protect our beaches may be for naught.

The following recommendations comprise NRDC’s comprehensive 2009 National Beach Protection Program, an agenda for improving coastal water quality monitoring of protecting public health by preventing beachwater pollution and warning the public when it is not safe to swim.

**NRDC’S NATIONAL BEACH PROTECTION PROGRAM**

*Pass the Clean Coastal Environment and Public Health Act (H.R. 2093/S. 878) to Reauthorize and Improve the BEACH Act of 2000.* Since the passage of the Beaches Environmental Assessment and Coastal Health (BEACH) Act in 2000, federal funding has helped every coastal state in the United States, including the Great Lakes states and Alaska, develop programs that test beachwater for fecal contamination. While those testing programs represent a significant step forward, we are not doing everything we can to keep our beaches safe and beachgoers from getting sick. The bills now pending in Congress would reauthorize the BEACH Act and build on its ability to protect public health at the beach. The Senate bill contains many of the same provisions as the House bill, but would also authorize funding to clean up identified sources of beachwater pollution and would require states to use a four-hour rapid testing method so that the public obtains timely notification when beachwaters are unsafe. Current methods require a long incubation period, usually producing results in 24 hours. This lag time between sampling of pathogen-contaminated waters and notifying the public creates a dangerous window during which swimmers can be infected. Rapid testing methods that give results in four hours or less would allow closure or advisory decisions to be made the same day samples are taken.

Enacting the stronger provisions within these two bills would: 1) increase the funding available annually to state and local public health agencies to test and clean up waters; 2) require the EPA to approve and beaches to use a rapid test method; 3) authorize funding for programs to identify and clean up sources of beachwater pollution; and 4) improve coordination between beachwater managers and the environmental officials who can prevent beachwater pollution. By enacting this legislation, Congress would ensure that U.S. beaches are adequately monitored, the public receives timely and accurate information when beaches are not safe, and sources of beachwater pollution would begin to be identified and cleaned up. If adequately funded, these bills will help keep our beaches clean and safe.
Pass the American Clean Energy and Security Act (H.R. 2454, also known as ACES). The House of Representatives has already passed and the Senate is now considering legislation that would limit U.S. emissions of global warming pollution, invest in clean energy technologies, and create millions of jobs in the new energy economy. Passage of this legislation is critical to addressing the wide range of impacts of global warming on coastal communities. Those impacts include more stormwater pollution and sewer overflows due to an increase in heavy rainfall events, coastal flooding and loss of freshwater resources due to sea level rise, and warmer water and air temperatures. Both the range and frequency of toxic algal blooms and pathogen-contaminated beachwaters will be increased by warmer ocean temperatures. The Intergovernmental Panel on Climate Change found that “water-borne diseases and degraded water quality are very likely to increase with more heavy precipitation.” The changes will exacerbate existing causes of beachwater pollution that threaten public health.

Close the Funding Gap. Documented needs for water and wastewater infrastructure in the United States are between $500 and $600 billion, according to the EPA. Congress should assist state and local communities in meeting these needs by substantially increasing available federal resources through the creation of a Clean Water Trust Fund or other dedicated source of clean water funding, and by increasing annual funding to the Clean Water and Safe Drinking Water State Revolving Funds. Communities also need to spend smarter by linking water and sewer rates to water use and degradation, preserving and enhancing the use of wetlands and forests, and using soil and vegetation to reduce beachwater pollution. In watersheds with at least 13.5 percent wetland coverage, periods of rainfall do not substantially increase fecal coliform bacteria counts. The Water Quality Investment Act/Water Infrastructure Financing Act (H.R. 1262/S. 1005), which has been passed by the U.S. House of Representatives and is currently pending in the Senate, would authorize between $14 and $16.8 billion for the Clean Water State Revolving Fund over the next five years and provide critical assistance for projects that repair and rebuild failing water and wastewater infrastructure. This funding includes support for low-impact development (LID) and between $1.8 and $2.5 billion in authorized funds for grants to help communities address combined sewer overflows.

LID strategies can employ a variety of technologies to improve rainwater and stormwater management. LID technologies can retain and filter rainwater where it falls and let it soak back into the ground, rather than dumping it into waterways. Using strategically placed rain gardens in yards, tree boxes along city sidewalks, green roofs planted with absorbent vegetation on top of buildings, and permeable pavement (instead of asphalt or concrete) that allows water to penetrate the material can all improve water quality and reduce stormwater loads. LID also involves capturing and storing rainwater in rain barrels or cisterns and reusing it, most often for irrigation or other non-potable uses.

Finally, the Clean Coastal Environment and Public Health Act has proposed to reauthorize and increase the federal grants made available to states under the BEACH Act. This funding is crucial and not only should be authorized but should be fully appropriated to provide states with the full support they need to tackle beachwater contamination and protect the public and the environment.

Implement and Enforce Better Controls on Pollution Sources. Preventing beachwater contamination is the best tool for protecting humans and aquatic life. For an aggressive prevention strategy, we need stricter controls on stormwater and sewer overflows. Federal stormwater permitting requirements for municipal systems, industrial stormwater dischargers, and construction sites are now in place, but these programs need to be implemented and enforced so that discharges do not contribute to beachwater pollution. The EPA needs to require programs to use up-to-date technologies to reduce contaminated stormwater discharges and put additional controls in place where basic technologies are not sufficient to make beachwater safe. Under court order, the EPA is now required to establish effluent limitation guidelines and new source performance standards for construction and development by December 1, 2009. It is critically important that these standards mandate the use of the best technologies for reducing stormwater pollution.

Our goals are not being met by conventional stormwater management, and communities often struggle with the economic burden of repairing or expanding existing stormwater infrastructure. We need to be using effective and innovative stormwater management approaches such as LID that can be used to achieve more economically sustainable and environmentally sound solutions. LID implementation should be required for all development and redevelopment (including road retrofit and renovation projects) and in every municipal stormwater permit.
Although the EPA's combined sewer overflow policy has been in place since 1994, many of the roughly 772 communities nationwide with combined stormwater and sewage systems have not yet begun implementation of a long-term plan to control combined sewer overflows and to include in such plans low-impact development approaches that provide more environmental benefits per dollar expended. Sanitary sewer overflows are illegal, yet the EPA has estimated that there are more than 23,000 sanitary sewer overflows every year into rivers, lakes, wetlands, and coastal waters. The EPA needs to enhance its implementation and enforcement of this provision of the law.

The EPA also needs to plug the loopholes that allow large feedlots to continue to discharge animal wastes into waterways. The EPA estimates that large feedlots produce about three times the amount of waste that people do nationwide, but lack treatment facilities for livestock waste even remotely comparable to those that treat human sewage. According to these estimates, only 42 percent of the large feedlot operations that are supposed to have Clean Water permits have obtained them under a Bush administration permitting rule that is riddled with loopholes and very difficult to enforce. The EPA needs to revise that rule to close the loopholes and require all large feedlots to keep animal waste out of waterways.

**Improve Coordination Between Sanitation and Public Health Officials.** Improved monitoring, immediate reporting of overflows to public health authorities and to the general public, and prompt response to overflows to minimize human exposure and environmental harm are critical steps that need to be taken to close the communication gaps between those responsible for sewage and stormwater treatment and those charged with protecting public health. The public has the right to know when there is a sewer overflow or stormwater discharge that threatens beachwater quality, and should be informed when it happens, not days later when the beachwater monitoring results finally arrive. We urge passage of the Sewage Overflow Community Right-to-Know Act (H.R. 753/S. 937), which would direct owners or operators of publicly owned treatment works to: 1) institute an alert system for sanitary sewer overflows; 2) notify the public of such overflows in areas where human health is potentially affected within 24 hours; 3) immediately notify public health authorities, such as beach managers and other affected entities; and 4) provide specified reports to the Administrator of the EPA or the state. As noted above, NRDC also supports the Clean Coastal Environment and Public Health Act provision to require public health officials to inform environmental agencies when they find a violation so that its source can be addressed.

**10 SIMPLE THINGS INDIVIDUALS CAN DO TO HELP IMPROVE BEACHWATER QUALITY AND PROTECT THEIR HEALTH**

Everyone can help reduce beachwater pollution. For example, we can all take steps to reduce the amount of water sent to sewage treatment plants—which have the potential to overflow—and we can all play a part in reducing polluted runoff. Individuals can also make a difference by becoming educated and expressing their desire for clean, healthy water. Below are 10 simple actions individuals can take to improve our beachwater.

1. **Be a good steward at the beach.** Pick up your garbage if you bring a picnic to the beach, and do not feed the birds or other wildlife. Seagulls and other wildlife are attracted to the garbage and food waste that people often leave behind on the beach, and feeding them will only encourage their permanent presence there. Waste from wildlife is one of the three largest known sources of bacterial pollution and can lead to beach closures. Ask your local beach management agency to invest in secure garbage cans with tight-fitting lids. Make sure children not yet toilet trained are dressed in a swim diaper and rubber pants or a similar tight-fitting outer garment. An extra layer of protection in addition to a swim diaper is necessary to help prevent bacteria from entering the water.

2. **Clean up after your pet.** Don’t leave pet waste on the ground. It could contain harmful bacteria and excess nutrients that can wash into storm drains and eventually pollute local waters. Flush it, bag it, or look for signs in public parks that direct pet owners to appropriate trash receptacles.

3. **Conserve water.** Extra water overwhelms sewage treatment plants and contributes to raw sewage overflows. Here are some ways you can reduce the amount of water you use at home: 1) do not let water run unnecessarily when brushing...
your teeth, shaving, or washing dishes; 2) install a water-saving toilet to save thousands of gallons annually; and 3) install faucet aerators and a water-efficient showerhead to cut the amount of water you use by 50 percent, and to save energy by reducing hot water use.\(^\text{10}\)

4. **Direct runoff to the soil, not the street.** Help keep stormwater from running off your property and into local waterways and the sewer systems. Direct rain gutters and downspouts on your home to soil, grass, or gravel areas, and not blacktop, cement, or other hard surfaces. Learn about creating a rain garden or using rain barrels. Sweep your driveway and sidewalks, rather than hosing them down.

5. **Don’t pour it down the drain.** When you dump paint, oil, harsh cleansers, and other hazardous products down the drain, they can find their way into nearby bodies of water. Contact your local sanitation, public works, or environmental health department to find out about hazardous waste collection days and sites. Wash your car at a car wash, where the contaminated rinse water has a chance of being treated before being discharged to sewage treatment.

6. **Maintain your septic system.** Have your septic tank cleaned out every three to five years. Such maintenance prolongs the life of your system and can help prevent groundwater contamination and beachwater contamination.

7. **Practice proper lawn and garden care.** Use natural fertilizers such as compost on your garden, and minimize the use of chemical fertilizers, pesticides, and herbicides. Landscape with natural vegetation rather than lawns, which require fertilizers and herbicides, to reduce the amount of polluted runoff. Do not allow water used to irrigate your landscaping to hit paved surfaces and run off.

8. **Practice proper marine and recreational boating waste disposal.** Dispose of your boat sewage in onshore sanitary facilities. Don’t dump sewage or trash overboard. Boating wastes discharged into coastal waters can be a significant cause of high pathogen concentrations.

9. **Support local, state, and federal legislation that promotes the cleanup of pollution sources.** Write to your representatives and senators and let them know you support strong beach legislation and clean water protections. Tell your local government to move forward quickly to address sewage overflows and stormwater. Make sure you tell officials that you are willing to pay for programs to monitor beaches and reduce runoff pollution.

10. **Learn about the water quality at local beaches and choose your beach carefully.** Go to NRDC’s website (www.nrdc.org), the EPA’s website (www.epa.gov and then BEACON), or your local beach manager (usually the local public health authority), all of which have data on beach monitoring and notification policies and on closings/advisories. Also, to show your concern, ask the local beach manager the following questions: What are the sources of pollution affecting the waters where I swim? What sort of water quality monitoring is performed at these beaches? Are beaches always closed when monitoring shows that the bacterial standard is exceeded? What is the current status of these waters (are they closed or open?), and what warning signs can I look for? Whenever possible, swim at the beaches that your research shows have the cleanest waters or are carefully monitored with strict closure or advisory procedures in effect. Stay away from beaches with visible discharge pipes, and avoid swimming at urban beaches after a heavy rainfall.

For more ways you can prevent beachwater pollution, visit NRDC’s Your Oceans website (http://oceans.nrdc.org/coastaldwellers/guide).

**Notes**

8 Information provided to NRDC by US EPA staff, July 2009.
9 33 U.S.C. 1342, sec. 402(r).
10 The Earth Works Group, 50 Simple Things You Can Do to Save the Earth, 1989.
Chapter 5

State Summaries

The following pages contain the summaries of state beachwater quality standards, monitoring and closing/advisory practices, and NRDC’s 2008 monitoring results and closings and advisories, listed alphabetically by state. It is impossible to make direct comparisons between states or to assess trends over time on the basis of advisory and closure data. Standards, monitoring, and closing/advisory practices vary from state to state, making it difficult to know, for example, whether a state with many closings has vigilant health officials or has more coastal pollution. High numbers of closings and advisories, while indicating pollution problems, may also indicate that the state or county is making a good effort to protect the public health by monitoring its waters and informing the public when they are polluted. States with comprehensive programs and closure practices should be commended for their efforts.

A more meaningful way of tracking the beachwater quality between states over time is to compare the percent of monitoring samples taken at each beach that exceed the BEACH Act daily maximum bacterial standard. For the fourth consecutive year, thanks to provisions of the BEACH Act that require the EPA to make beach monitoring data available from all states receiving BEACH Act grants, NRDC was able to provide these values for beaches in all 30 coastal and Great Lakes states. In the state summaries that follow, the state’s national ranking in percent exceedances is based on BEACH Act-approved daily maximum standards for bacterial indicators during water-contact recreation. Thus, all monitoring samples were compared to the same standard to arrive at the national ranking. However, each state summary also includes a table listing each reported beach, its monitoring frequency, the total number of samples reported, and the percent of these samples that exceeded bacterial standards. The standards used to determine the percent exceedances in the tables in the state chapters are based on state standards that in some cases are different from the BEACH Act daily maximum bacterial standards.

NRDC included U.S. territories for the purpose of comparing total closing/advisory days with earlier years. However, we did not include them in the more detailed 2008 beach season analysis that follows in this chapter.

SOURCES OF INFORMATION

For the sixth consecutive year, our research for Testing the Waters is based primarily on the EPA’s electronic reporting system designed to meet the requirements of federal BEACH Act grants given to all 35 coastal and Great Lakes states and territories. Information from the electronic reporting system has been supplemented by NRDC surveys of state and local officials. Beach monitoring coordinators in nearly every state cooperated with NRDC with a great deal of patience and grace and provided interesting and meaningful information for this report. NRDC is thankful for their time and their openness.

Unfortunately, the EPA’s electronic data submission system continues to experience technical problems, resulting in delays in data availability and incomplete or inaccurate data. Therefore, NRDC requested 2008 beach season monitoring and closing/advisory data directly from the states. When states provided these data, NRDC used them; otherwise, we used monitoring data downloaded from the EPA’s STORET website and closing/advisory data sent to us by the EPA. NRDC received monitoring data from 18 states (Alabama, Alaska, California, Connecticut, Hawaii, Illinois, Indiana, Maine, Maryland, Minnesota, New Hampshire, North Carolina, Oregon, Rhode Island, South Carolina, Texas, Virginia, and Washington) and downloaded data for 12 states from STORET (Delaware, Florida, Georgia, Louisiana, Massachusetts, Michigan, Mississippi, New Jersey, New York, Ohio, Pennsylvania, and Wisconsin). Eight states sent their closing/advisory data (Alabama, California, Illinois, Maine, Massachusetts, New Jersey, Pennsylvania, and Rhode Island) and the EPA sent the data for the remaining 22 states (Alaska, Connecticut, Delaware, Florida, Georgia, Hawaii, Indiana, Louisiana, Maryland, Michigan, Minnesota,
Mississippi, New Hampshire, New York, North Carolina, Ohio, Oregon, South Carolina, Texas, Virginia, Washington, and Wisconsin) and territories (Guam, Northern Mariana Islands, Puerto Rico, and the U.S. Virgin Islands).

NRDC sent its analysis of these data as well as the narrative material for each state summary to the state for review and comment.

Many states have dedicated and talented individuals that work hard to improve their beachwater quality and to protect public health when beachwater quality is poor. States that do more than monitor their beachwater and issue closings and advisories should be recognized for their extra efforts. For the introduction to each state's program, NRDC asked the state beach program coordinators about additional efforts being taken in their state, such as projects to improve beachwater quality and studies undertaken to determine the sources of contamination at beaches that have ongoing water quality problems.

The state summaries are organized into sections as described below.

**Standards**
The presence of an indicator organism and the amount of the indicator organism that must be present before the state considers issuing beach closings and/or advisories are two important measures for determining the efficacy of beach monitoring programs.

**Indicator Organisms:** The EPA recommends, and the federal BEACH Act of 2000 requires, using the enterococcus indicator for marine waters and enterococcus or *E. coli* indicators for the Great Lakes and other freshwaters. These indicators provide the most reliable estimate currently available of the degree to which disease-causing organisms are present in the water. Monitoring programs in all states now test for enterococcus or *E. coli*. Some states test for bacterial indicators in addition to enterococcus and *E. coli*.

**Standards:** NRDC contacted the state beach coordinator in each of the 30 coastal and Great Lakes states to obtain updated information on bacterial standards that are applied when making beach closing and advisory decisions. Not all states apply the EPA-recommended standards for water-contact recreation at all of their beaches. Information about any use of predictive models and preemptive standards is included in this section.

**Monitoring**
**Determination of Sampling Locations and Frequency:** States were asked to verify the factors they used in determining which beaches to monitor and which beaches, if any, to monitor more frequently. They were also asked if any special efforts were made to sample near stormwater outfalls or other potential sources of contamination.

**Practice:** Each state was asked about their sampling practices: what depth of water, what time of day, what days of the week, and how much time elapses before sampling results are known.

**Results:** This section describes the number of beaches monitored at each monitoring frequency and gives the state's rationale for determining monitoring frequency. For the fourth year in a row, NRDC was able to provide the percent of samples that exceeded state standards. Information on monitoring frequency and percent exceedance are organized by county and beaches in decreasing order of percent exceedance. For this section, NRDC calculated percent exceedance by taking the number of samples exceeding the state's daily maximum standards and divided that number by the total number of samples collected during the calendar year (replicate samples on the same day are each counted as an individual sample). These exceedance determinations are used for tracking water quality over time; NRDC does not compare these calculations with specific beach closings or advisories.

**Closings and Advisories**
**Closing and advisory issuance:** This section describes how the state determines whether to issue a closing or advisory. Some states resample before issuing a closing or advisory, or take other factors, such as the presence of wildlife, into
account before issuing a closing or advisory when a sample exceeds standards. This section also contains information about how the public is notified when a closing or advisory is issued.

**Reopening procedures:** Information in this section includes whether the monitoring frequency is increased after a beach is closed or placed under advisory.

**Number of closings and advisories:** A complete picture of beach closings/advisories for all 30 U.S. coastal and Great Lakes states is provided in the state summaries and tables included in the following pages. Information on beach closings and advisories is organized alphabetically by county and beach name.

In an effort to be consistent in tabulating closings and advisories, NRDC used the following guidelines:

- Closings or advisories issued for an individual beach for one day are counted as one closing/advisory day.
- Extended closings/advisories are those lasting more than 6 to 13 consecutive weeks.
- Permanent closings/advisories include those lasting longer than 13 consecutive weeks, as well as standing advisories that warn against swimming whenever certain conditions occur, such as a heavy rainfall or stormdrain flow.
- If a reported advisory at a specific beach overlapped with a general rain advisory that applied to all beaches within the same jurisdiction, the overlapping days were subtracted from the advisory for that specific beach to avoid double counting. However, if a specific beach was closed during a general rain advisory, NRDC did not modify the reported duration. Individual and total beach closing and advisory information is included in each state summary.
- Reported closing/advisory days include only events lasting six consecutive weeks or less.

**Example: 2008 Beach Closings/Advisories**

<table>
<thead>
<tr>
<th>County</th>
<th>Beach Name</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Jones</td>
<td>East Beach</td>
<td>6/6</td>
<td>6/7</td>
<td>Preempt-rain</td>
<td>Combined-sew-over</td>
</tr>
<tr>
<td>Jones</td>
<td>Long Beach</td>
<td>5/5</td>
<td>5/9</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Smith</td>
<td>North Beach</td>
<td>5/11</td>
<td>6/30</td>
<td>Preempt-sew</td>
<td>Sew-break</td>
</tr>
<tr>
<td>Smith</td>
<td>West Beach</td>
<td>1/1</td>
<td>12/31</td>
<td>Bacteria</td>
<td>Septic, Stormwater, Wildlife</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** Combined-sew-over, combined sewer overflow; Preempt-rain, preemptive due to heavy rainfall; Preempt-sew, preemptive due to sewage discharge or spill; Sew-break, sewer line blockage/break.

**Causes of closings and advisories:** The EPA asks states to report a cause and a source for each closing and advisory event. This information is given in this section. In 2008, some states began systematically reporting factors important in diagnosing sources of contamination at some of their monitored beaches to the EPA based on sanitary surveys. Results from this initial reporting effort are not included in the state summaries in this chapter as they are incomplete.

**Explanation of Frequently Used Terms in Beach Closing/Advisory Tables**

<table>
<thead>
<tr>
<th>Causes</th>
<th>Sources</th>
</tr>
</thead>
<tbody>
<tr>
<td>Preempt-other: Preemptive due to reasons not listed here</td>
<td>Boat: Boat discharge</td>
</tr>
<tr>
<td>Preempt-rain: Preemptive due to rainfall</td>
<td>Comb-sew-overflow: Combined sewer overflow</td>
</tr>
<tr>
<td>Preempt-model: Preemptive due to results of predictive computer model</td>
<td>POTW: Publicly owned treatment works</td>
</tr>
<tr>
<td>Preempt-sew: Preemptive due to sewage discharge or spill</td>
<td>RivCrk: Rivers, creeks, and lagoons opening onto beaches</td>
</tr>
<tr>
<td>Preempt-sick: Preemptive due to illness outbreak</td>
<td>Sanitary-sew-over: Sanitary sewer overflow</td>
</tr>
<tr>
<td></td>
<td>Sew-break: Sewer line blockage/break</td>
</tr>
<tr>
<td></td>
<td>Sew-discharge: Sewage discharge</td>
</tr>
<tr>
<td></td>
<td>Sew-pump: Sewage pump station failure</td>
</tr>
<tr>
<td></td>
<td>Other: Strong waves or wind, chemical spills, no lifeguard, jellyfish, etc.</td>
</tr>
</tbody>
</table>
ALABAMA
20th in beachwater quality (8% of samples exceeded national standards)

Alabama has 97 coastal beaches stretching along 50 miles of Gulf coast and 70 miles of bay and island shoreline. All of Alabama’s coastal beaches are in Baldwin and Mobile Counties.

The Alabama Department of Environmental Management (ADEM) administers the state’s beachwater quality monitoring program. ADEM determines sampling practices, locations, standards, and notification protocols and practices throughout the state. Monitoring is conducted throughout the year, with more frequent monitoring from May to September.

Sources of bacterial contamination in Alabama’s coastal recreational waters include shoreline development, wastewater collection and treatment facilities, septic tanks, urban runoff, disposal of human waste from boats, commercial and domestic animals, wildlife, and bathers themselves.

Alabama received a $258,390 federal BEACH Act grant in 2008 and was eligible for a $262,000 grant in 2009. The federal grant fully funds Alabama’s beach monitoring and notification program.

Standards
Indicator Organism: Enterococcus

Standards: An enterococcus single-sample maximum of 104 cfu/100ml is the standard used to issue beach advisories in Alabama. There are no standards for preemptive rainfall or sewage spill advisories, but full-scale advisories for all sites have been issued by the county health departments after hurricanes.1

Monitoring
Determination of Monitoring Locations and Frequency: Monitoring frequency is determined using a quantitative ranking scheme that weights three factors: the amount of use, a measure of risk, and the presence of important factors.2 Tier 1 beaches are monitored twice a week, Tier 2 beaches are monitored once a week, Tier 3 beaches are monitored every other week, and Tier 4 beaches are monitored on an as-needed basis.

Practice: Samples are collected before 1:00 pm, 6 to 12 inches below the surface of the water, usually in knee-deep water. Typically, results of samples are known 24 hours after sampling takes place.1 Routine sampling takes place on Mondays and Wednesdays unless a holiday interferes, in which case it takes place on Tuesdays and Thursdays.

Results: In 2008, Alabama reported 97 coastal beaches, 8 (8%) of which were monitored more than once a week, 12 (12%) once a week, 5 (5%) every other week, and 72 (74%) were not monitored. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season). In 2008, 8 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance in 2008 were Mary Ann Nelson Beach in Baldwin County (32%), Dog River, Alba Club in Mobile County (26%),
and Spanish Cove (20%), Kee Avenue (16%), Volanta Avenue (14%), Pirate’s Cove (14%), May Day Park (14%), Fairhope Public Beach (13%), Orange Street Pier/Beach (11%), and Camp Beckwith in Baldwin County (7%).

Both Baldwin and Mobile Counties had an average exceedance rate of 8 percent.

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 24 beaches, the percent of samples exceeding the standard increased to 8 percent in 2008 from a consistent 7 percent in 2005 through 2007.

### 2008 Alabama Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Baldwin</td>
<td>Mary Ann Nelson Beach</td>
<td>3</td>
<td>2/mo</td>
<td>28</td>
<td>32%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Spanish Cove</td>
<td>2</td>
<td>1/wk</td>
<td>35</td>
<td>20%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Kee Avenue</td>
<td>2</td>
<td>1/wk</td>
<td>64</td>
<td>16%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Volanta Avenue</td>
<td>2</td>
<td>1/wk</td>
<td>36</td>
<td>14%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Pirate’s Cove</td>
<td>1</td>
<td>2/wk</td>
<td>59</td>
<td>14%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>May Day Park</td>
<td>2</td>
<td>1/wk</td>
<td>37</td>
<td>14%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Fairhope Public Beach</td>
<td>1</td>
<td>2/wk</td>
<td>63</td>
<td>13%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Orange Street Pier/Beach</td>
<td>2</td>
<td>1/wk</td>
<td>38</td>
<td>11%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Camp Beckwith</td>
<td>1</td>
<td>2/wk</td>
<td>58</td>
<td>7%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Camp Dixie</td>
<td>1</td>
<td>2/wk</td>
<td>54</td>
<td>6%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Florida Point</td>
<td>1</td>
<td>2/wk</td>
<td>52</td>
<td>2%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Gulf Shores Public Beach</td>
<td>1</td>
<td>2/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Cotton Bayou</td>
<td>1</td>
<td>2/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Little Lagoon Pass Beach</td>
<td>2</td>
<td>1/wk</td>
<td>29</td>
<td>0%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Gulf State Park - Pavilion</td>
<td>1</td>
<td>2/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Alabama Point (Gulf Of Mexico)</td>
<td>2</td>
<td>1/wk</td>
<td>29</td>
<td>0%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Orange Beach Waterfront Park</td>
<td>2</td>
<td>1/wk</td>
<td>30</td>
<td>0%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Bear Point Civic Association</td>
<td>3</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Escambia Avenue</td>
<td>3</td>
<td>2/mo</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Bon Secour National Wildlife Refuge</td>
<td>3</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Fort Morgan Public Beach</td>
<td>3</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Ponce De Leon Annex</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Our Road</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Ponce De Leon Court Lot 35</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Perdido Bay Rec. Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Pensacola Ave.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Pelican Pt.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Palmetto Ave.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Pinewood Ave.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Oak St. #91</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>North Road</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Navy Cove</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Ponce De Leon Court Lot 50</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>---------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Murphy Lane</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Romar Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Mullet Dr.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Morgantown Park</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Montgomery Ave.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Mobile Ave.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>N. Mobile St/Perdido Ave.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>South Wilson Blvd</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Boggy Point</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Koa Campground</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Lafite Road</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Mcdonald Ave.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Yupon Ave.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Wydell St.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Wolf Bay Lodge</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Randolf Rd.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Sunset Dr.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Ponce De Leon Court Lot 51</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Sibley St/Steadmans Landing</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Seabright Ave.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Sea Cliff Dr.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Zundall Lane</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Rester St.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Ponce De Leon Dr Public Access</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Ponce De Leon Dr Access East</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Village Pt. Foundation</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Anderson Street</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Live Oak</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Belrose Ave. Daphne</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Bayou Drive</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Bay Side Drive</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Bay Front Park (Daphne)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Bay Ave.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Boykin Street Access</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Barklay Ave.</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Buchanan Street Access</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>Alabama Point (Perdido Pass)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>7th Street Access</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>6th Street Access</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>5th Street Access</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baldwin</td>
<td>13th Street Access</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>
### County | Beach | Tier | Monitoring Frequency | Total Samples | Percent Exceedance
--- | --- | --- | --- | --- | ---
Baldwin | 10th Street Access | No data | None | 0 | N/A
Baldwin | Marjon Lane | No data | None | 0 | N/A
Baldwin | Battles Rd | No data | None | 0 | N/A
Baldwin | Fort Morgan National Park | No data | None | 0 | N/A
Baldwin | Laine Court Park | No data | None | 0 | N/A
Baldwin | Josaphine Park | No data | None | 0 | N/A
Baldwin | Holly Ave. | No data | None | 0 | N/A
Baldwin | Haupt Road | No data | None | 0 | N/A
Baldwin | Bernard Court | No data | None | 0 | N/A
Baldwin | Gore Road | No data | None | 0 | N/A
Baldwin | Fish Trap Access | No data | None | 0 | N/A
Baldwin | Cypress Ave. | No data | None | 0 | N/A
Baldwin | Choctaw Road North | No data | None | 0 | N/A
Baldwin | Cedar St. E | No data | None | 0 | N/A
Baldwin | Cedar St. | No data | None | 0 | N/A
Baldwin | Camp Baldwin | No data | None | 0 | N/A
Baldwin | Cabana Beach Association | No data | None | 0 | N/A
Baldwin | Gulf Coast Remainder | No data | None | 0 | N/A
Mobile | “Dog River, Alba Club” | 2 | 1/wk | 39 | 26%
Mobile | Fowl River @ Hwv 193 | 2 | 1/wk | 31 | 0%
Mobile | Dauphin Island East End | 2 | 1/wk | 22 | 0%
Mobile | Dauphin Island Public Beach | 2 | 1/wk | 29 | 0%
Mobile | Bay Front Park | No data | None | 0 | N/A

N/A: Not applicable

### Advisories

**Advisory Issuance:** Alabama does not issue beach closings; the state’s policy is to issue advisories only. Although Alabama calculates a geometric mean, only the enterococcus single-sample maximum standard is used to issue beach advisories in Alabama. When a sample exceeds the standard, there are no overriding factors that can be taken into account before issuing an advisory. Beaches are given green status when sampling results meet the standard. When sample results exceed the standard, a yellow advisory is issued. Yellow indicates that there may be an increased risk of illness associated with swimming in such water, and that the beach is being immediately retested. If a resample, taken the next day, also exceeds the standard, a red public health advisory is issued. Red indicates that resampling revealed enterococcus levels over the EPA threshold. All Alabama monitored beaches have signs (at each of the 25 sampled sites) with the most recent water quality status. Additional sampling is not conducted when there are rainfall events.

Advisories are posted on the ADEM website as well as being announced on local radio and television stations and in newspapers. Advisories can be issued for a section of a beach or for an entire beach.

**Reopening Procedures:** Once an exceedance is reported, samples are collected daily until results are below the EPA threshold.

**Number of Advisories:** Total advisory days for 10 events lasting six consecutive weeks or less decreased 53% to 14 days in 2008 from 30 days in 2007, 44 days in 2006, and 27 days in 2005. There were no extended or permanent events in...
2008 or 2007. Extended events are those in effect between 7 and 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks.

**Causes of Advisories:** All advisory days in 2008 were due to monitoring that revealed elevated bacteria levels from unknown sources of contamination.

<table>
<thead>
<tr>
<th>2008 Alabama Beach Advisories</th>
</tr>
</thead>
<tbody>
<tr>
<td>County</td>
</tr>
<tr>
<td>--------</td>
</tr>
<tr>
<td>Baldwin</td>
</tr>
<tr>
<td>Baldwin</td>
</tr>
<tr>
<td>Baldwin</td>
</tr>
<tr>
<td>Baldwin</td>
</tr>
<tr>
<td>Baldwin</td>
</tr>
<tr>
<td>Baldwin</td>
</tr>
<tr>
<td>Baldwin</td>
</tr>
<tr>
<td>Baldwin</td>
</tr>
<tr>
<td>Mobile</td>
</tr>
<tr>
<td>Mobile</td>
</tr>
</tbody>
</table>

**Notes**

2. Baldwin County Health Department, Risk Based Beach Evaluation and Ranking, not dated.
Alaska has nearly 34,000 miles of coastal shoreline. Because of low temperatures, its coastal waters do not attract large numbers of swimmers. However, recreational shoreline activities do occur, and a survey has identified more than 200 recreational beaches in the state. Counties that have recreational beaches include Juneau, Bristol Bay, and Dillingham.

In 2008, Alaska conducted its second year of beachwater quality monitoring and notification. The Alaska Department of Environmental Conservation administers the program and contracts with local agencies and non-profit groups, who conduct monitoring and notification activities. In 2009, the state plans to send a contractor to sample recreational beaches that are not participating in the program at least once during the season.

Agencies that choose to participate in the program are encouraged to sample for eight weeks during the summer season. All Alaskan sampling events have an associated short sanitary survey.

Some local entities are using the beach monitoring data to identify and prioritize beach cleanup activities. Program grantees use beach monitoring data and beach surveys to educate the public about potential sources of beach contamination with the goal of preventing pollution and decreasing the likelihood of people becoming ill after using the beaches for recreational purposes. In addition, signs are posted to educate beach users about appropriate beach use.

The Alaska Department of Environmental Conservation’s Division of Environmental Health is responsible for monitoring for harmful algal blooms. This agency notifies the public about potential risks of paralytic shellfish poisoning from “red tides.” Sampling is conducted and closings are issued when blooms are observed. In 2008, the beaches that were sampled for fecal indicator bacteria did not overlap with beaches that are sampled for harmful algal blooms.

Alaska received a $147,650 federal BEACH Act grant in 2008 and was eligible for a $150,000 grant in 2009. BEACH Act grants fully fund Alaska’s coast beach monitoring program.

Standards
Indicator Organisms: Fecal coliform, Enterococcus

Standards: Water quality standards for the monitoring program include Alaska’s fecal coliform standard (in a 30-day period, the geometric mean of five samples may not exceed 100 cfu/100 ml, and not more than one sample may exceed 200 cfu/100 ml) and an enterococcus standard (single-sample maximum of 276 cfu/100 ml, 30-day 5-sample geometric mean of 35 cfu/100 ml). The enterococcus standards are the BEACH Act-required standards for moderately and lightly used beaches. Alaska does not have an E. coli standard, but the results from field-based methods for E. coli can be used as a stand-in for fecal coliform in remote locations. If this were to occur, the fecal coliform standard would be applied to E. coli results. Thus far, all monitoring locations are using membrane filtration methods for analyzing samples and E. coli has not been used as a stand-in for fecal coliform.

Alaska has no preemptive standards for issuing beach closings or advisories due to rainfall or known sewage spills.

Monitoring
Determination of Monitoring Locations and Frequency: When selecting beaches to be monitored, factors such as proximity to an established road system and distance from a laboratory are considered, along with the types of recreational activities that occur, the levels of use, and the types of nearby pollution sources.

Practice: Samples are collected twelve inches below the surface in water that is three feet deep, at high tide if possible. Samples are collected on weekdays. Sample results are generally known within 36 hours of sampling. In locations where
processing samples within six hours is not feasible, field-based screening methods that provide results for E. coli in 18 hours and enterococcus in 24 hours can be used.

Results: In 2008, Alaska reported 18 coastal beaches, 1 (6%) of which was monitored every other week, 2 (11%) less than once a month, and 15 (83%) for which there was no monitoring information. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, none of the reported beach monitoring samples exceeded the state’s daily maximum bacterial standards.

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported in both 2007 and 2008. For this consistent set of three beaches, the percent of samples exceeding the standard remained steady at 0 percent.

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bristol Bay</td>
<td>King Salmon Beach (No. Naknek)</td>
<td>1</td>
<td>4/yr</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Dillingham</td>
<td>Kanakanak Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Juneau</td>
<td>Sandy Beach 5, Douglas</td>
<td>3</td>
<td>5/yr</td>
<td>26</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>Harris and Aurora Harbors</td>
<td>No data</td>
<td>No data</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>West Beach</td>
<td>No data</td>
<td>No data</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>Petroglyph Beach</td>
<td>No data</td>
<td>No data</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>Anchor Point to Happy Valley Creek</td>
<td>No data</td>
<td>No data</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>Snag Point</td>
<td>No data</td>
<td>No data</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>Sandy Beach Park</td>
<td>No data</td>
<td>No data</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>North Kenai Beach</td>
<td>No data</td>
<td>No data</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>Lutak Inlet</td>
<td>No data</td>
<td>No data</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>Whisky Bill Beach</td>
<td>No data</td>
<td>No data</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>Portage Cove</td>
<td>No data</td>
<td>No data</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>Homer Spit</td>
<td>No data</td>
<td>No data</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>Letnikof Cove</td>
<td>No data</td>
<td>No data</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>City Park</td>
<td>No data</td>
<td>No data</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>Scandinavian Beach</td>
<td>No data</td>
<td>No data</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>No data</td>
<td>Naknek River</td>
<td>No data</td>
<td>No data</td>
<td>9</td>
<td>0%</td>
</tr>
</tbody>
</table>

N/A: Not applicable

Advisories

Advisory Issuance: An exceedance of either the single-sample maximum or the geometric mean standards for either enterococcus or fecal coliform triggers consideration of an advisory. The authority for issuing advisories is delegated to the local governments that choose to participate in the program. A bacterial exceedance is one of many factors that can be used to determine whether or not to issue a beach advisory.1 The state encourages participating municipalities to issue an advisory when a sample exceeds the standards, after consulting with the BEACH Program Manager. Notification
activities are delegated to local government. The state recommends notification via signs, press releases to television and radio stations, and fliers. Advisories are issued for whole beaches, not sections of a beach.

**Reopening Procedures:** If a beach is placed under advisory, monitoring will occur daily until standards are met.¹

**Number of Advisories:** There were no advisories in Alaska in 2008 or 2007.

**Notes**

1 Erin Strang, Alaska Department of Environmental Conservation, personal communication, February 2009.
California has more than 400 beaches stretching along more than 500 miles of Pacific Ocean and San Francisco Bay coastline in 17 counties. Some of the nation's most popular beaches are in California. More than 450 million tourists and residents go to the beach every year, many of them to swim, wade, surf, and dive.

The California Department of Health Services administers the BEACH Act grant. Beachwater quality monitoring is performed by county health agencies in the coastal counties as well as by publicly owned sewage treatment plants, other dischargers along the coastal zone, environmental groups, and numerous citizen-monitoring groups. Local health agencies are responsible for posting advisories and issuing closings. Individual counties determine sampling locations, and sampling depth and minimum sampling frequency are determined by state law. Most counties sample at more locations and often more frequently than required by state law.

Beachwater quality monitoring in California occurs from at least April 1 to October 31, with most beaches in Southern California or in Santa Cruz, San Mateo, and San Francisco Counties monitored year-round. A veto of beach funds by the Governor in September, 2008 caused San Diego County to stop monitoring in late September, with Ventura and Santa Barbara Counties discontinuing monitoring activities later in the year. In 2009, the State Water Control Board Division of Financial Assistance is using funding from a bond issued in 2002 to provide limited temporary funding so county agencies can continue their beachwater quality monitoring programs. This source of funds will last until June 2010. Ventura County resumed its beachwater quality monitoring in late June of 2009, with a reduction in monitoring locations from 53 to 40.

Results from California's beach monitoring program are used by the Clean Beach Initiative as they allocate funds to improve beachwater quality. Over $100 million has been allocated to improve water quality at California's high-priority beaches, and major improvements have been seen from projects that divert dry weather runoff to sewage treatment, such as the Santa Monica Canyon project. These projects are expected to improve water quality only during dry weather, which is during the summer when beach use is greatest. (The California coast enjoys a Mediterranean climate, which typically consists of two seasons: a wet spring and a dry summer.) Examples of other appropriations include $100,000 for storm drain diversions at Capitola Beach in Santa Cruz County and $2 million for storm drain filtration and disinfection at two drains at the Surfrider/Malibu Lagoon in Los Angeles County. Polluted urban stormwater runoff continues to be the largest source of pollution in Santa Monica Bay and across California, according to the State Water Board.

California is beginning a statewide investigation of standardized source tracking procedures and is performing a set of studies at numerous beaches up and down the coast.

Every five years, the California regional water quality control boards renew regional stormwater permits for major urbanized areas under the federal National Pollutant Discharge Elimination System program. NRDC has fought hard for these permits to include low-impact development strategies. Low-impact development strategies can stop pollution at the source by, for instance, using trees, vegetation, wetlands, and open space that minimize impermeable surfaces and therefore reduce polluted urban runoff. These strategies reduce beach pollution and do so cost-effectively. Recently, a plan was adopted for Ventura County that, for the vast majority of storms, will result in no polluted runoff coming from new development and redevelopment. North Orange County adopted a similar plan.

California conducts a Thank You Ocean campaign, one of whose goals is to educate the public about what they can do to improve beachwater quality.

California received a $514,720 federal BEACH Act grant from the U.S. EPA in 2008 and was eligible for a $517,000 grant in 2009. Federal BEACH Act funds support only a small portion of California's beach monitoring program. In

California Sources of Contamination

- Stormwater 3%
- Sewage 9%
- Other 6%
- Unknown 81%
addition to the BEACH Act grant monies, the state allocated $1 million for monitoring from April 1 to October 31 in 2008. Monitoring activities are conducted by counties and other entities, which spend several times more than what the state and the BEACH Act grant provide. In addition to the Clean Beach Initiative, California has spent more than $3 million on projects that evaluate and test rapid methods of determining bacterial contamination and an equal amount funding three epidemiological studies in 2008 and 2009 at Doheny Beach.2

**Standards**

**Indicator Organisms:** Total coliform, fecal coliform, and enterococcus

**Standards:** For total coliform, the single-sample standard is 1,000 cfu/100 ml if the ratio of fecal/total coliform bacteria exceeds 0.1. Otherwise, the single-sample standard for total coliform is 10,000 cfu/100 ml. The total coliform standard for the geometric mean of at least five weekly samples collected during a 30-day period is 1000 cfu/100 ml. For fecal coliform, the single-sample standard is 400 cfu/100 ml and the standard for the geometric mean of at least five weekly samples collected during a 30-day period is 200 cfu/100 ml. In some jurisdictions, E. coli is used as a surrogate for fecal coliform; in this case, the standard is the same as for fecal coliform. For enterococcus, the single sample standard is 104 cfu/100 ml and the standard for the geometric mean of at least five weekly samples collected during a 30-day period is 35 cfu/100 ml.

In addition to advisories triggered by indicator exceedances, three-day preemptive rain advisories are automatically issued for all beaches in five counties (Los Angeles, Monterey, Orange, San Diego, and Santa Cruz) when rainfall exceeds predetermined levels, regardless of whether bacterial monitoring samples have been collected and analyzed. Los Angeles County advises swimmers that to stay safe when swimming in the ocean, ocean water should be avoided for 72 hours after a rainstorm.4 These general advisories affect all beaches in the county. As a general rule, the Recreational Health Program issues a rain advisory when there is 0.1 inch or more of rainfall at the University of Southern California rain gauge, but it varies depending on factors such as how long it has been since the last rainfall, how sporadic the rainfall is, and where it is falling, since, according to the agency, much of the watershed that feeds storm drain flow is in the hills and mountains, which have different rainfall levels than at the rain gauge. Orange County issues preemptive countywide rain advisories, warning of elevated bacteria levels in the ocean for a period of at least 72 hours after rain events of 0.2 inches or more. San Diego County issues preemptive rain advisories for a period of up to 72 hours after a rain event of 0.2 inches or more. Since 2003, San Diego County has used a predictive model to trigger beach closings at three south county beaches near the outlet of the Tijuana River. These beaches are Imperial Beach, Coronado Beach, and Silver Strand State Beach. The model assesses the need for closures based on real time information about ocean currents in addition to other parameters. Use of the model allows the San Diego County Department of Environmental Health to make more accurate and timely notifications to protect the health of beachgoers.5

Preemptive advisories are also issued for reasons other than rain, such as excessive debris on the beach. Finally, preemptive closings are issued when there is a known sewage spill or when sewage is suspected of impacting a beach.

**Monitoring**

**Determination of Monitoring Locations and Frequency:** Monitoring locations in California are selected based on the number of visitors, the location of storm drains, NPDES effluent discharge requirements, and legislative requirements. Monitored beaches represent the vast majority of beach day use in California. All beaches along the San Francisco Bay are monitored per legislation. Samples are usually collected in the most likely areas of possible contamination. In Los Angeles County, for example, sampling points are located where creeks or storm drains enter the surf zone, which are usually permanently posted as being under advisory. Most other counties may permanently post outfalls and sample 25 yards up or down the coast from the outfall to predict further impacts to beach bathing areas.2

**Practice:** Samples are taken in ankle-deep water, usually in the morning. Sampling can occur any day of the week but is most commonly conducted Monday through Friday. Typically, sampling results are available 24 hours later.
Results: In 2008, California reported 426 coastal beaches, 3 (1%) of which were monitored daily, 27 (6%) more than once a week, 243 (57%) once a week, 1 (<1%) every other week, 12 (3%) once a month, 4 (1%) less than once a month, 125 (29%) not monitored, and 7 (2%) for which there was no monitoring information. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). NRDC considered a sample on a given day at a given beach station to be an exceedance if any one of California’s bacterial standards were exceeded. Please note that even if all bacterial standards were exceeded on a given day at a given station, NRDC counted that as one exceedance. For example, if a sample exceeded the enterococcus, *E. coli*, and total coliform standards on a given day, NRDC counted that as one exceedance, not three. (Note that when determining California’s ranking as 22nd in the nation in beachwater quality, NRDC analyzed results based on the single-sample maximum BEACH Act standard of 104 cfu/100 ml enterococcus.) In 2008, 10 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Avalon Beach-North of GP Pier in Los Angeles County (64%), Ventura River (mouth) in Ventura County (63%), Newport Bay-Vaugh’s Launch (50%) and Doheny State Beach-Surfzone at Outfall in Orange County (49%), Cabrillo Beach in Los Angeles County (49%), Doheny State Beach-250’ S of San Juan Creek (48%) and Doheny State Beach-North Beach in Orange County (44%), and Santa Monica State Beach-Santa Monica Pier (43%) and Malibu Beach-Paradise Cove in Los Angeles County (42%).

Los Angeles County had the highest percent exceedance rate in 2008 (20%) followed by San Francisco (13%), Contra Costa (12%), Alameda (9%), Orange (9%), Santa Barbara (9%), Sonoma (7%), San Luis Obispo (6%), San Mateo (6%), Santa Cruz (6%), Humboldt (6%), San Diego (6%), Monterey (4%), Ventura (4%), Marin (2%), and Mendocino (1%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 227 beaches, the percent of samples exceeding the standard increased to 11 percent in 2008 from 7 percent in 2007, but decreased from 2006 and 2005 levels (12 and 13 percent, respectively).

## 2008 California Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Alameda</td>
<td>Crown Beach-Bird Sanctuary</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>52</td>
<td>21%</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach-Bath House</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>50</td>
<td>14%</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach-2001 Shoreline Dr.</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>45</td>
<td>7%</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach-Sunset Rd.</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>45</td>
<td>4%</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach-Windsurf Corner</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>45</td>
<td>4%</td>
</tr>
<tr>
<td>Alameda</td>
<td>Alameda Point</td>
<td>Not Tier 1</td>
<td>No data</td>
<td>85</td>
<td>4%</td>
</tr>
<tr>
<td>Contra Costa</td>
<td>Keller Beach-North Beach</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>46</td>
<td>17%</td>
</tr>
<tr>
<td>Contra Costa</td>
<td>Keller Beach-Mid Beach</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>45</td>
<td>11%</td>
</tr>
<tr>
<td>Contra Costa</td>
<td>Keller Beach-South Beach</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>44</td>
<td>7%</td>
</tr>
<tr>
<td>Del Norte</td>
<td>Beachfront Park</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Del Norte</td>
<td>Clifford Kamph Memorial Park</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Del Norte</td>
<td>Crescent Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>
## County Beach Tier Monitoring Frequency Total Samples Percent Exceedance

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Del Norte</td>
<td>Enderts Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Del Norte</td>
<td>High Bluff Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Del Norte</td>
<td>Kellogg Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Del Norte</td>
<td>Lake Earl Wildlife Area Beaches</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Del Norte</td>
<td>Pebble Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Del Norte</td>
<td>Pelican Bay State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Del Norte</td>
<td>Point St. George</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Del Norte</td>
<td>South Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Del Norte</td>
<td>Wilson Creek Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Clam Beach Co. Park</td>
<td>1</td>
<td>1/wk</td>
<td>91</td>
<td>9%</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Luffenholtz Beach</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>5%</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Moonstone Beach</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>5%</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Trinidad State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>2%</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Agate Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Baker Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Big Lagoon</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Black Sands Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Carruthers Cove Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Centerville Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>College Cove</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Crab Co. Park</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Dead Man's Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Dry Lagoon</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Eel River State Wildlife Area</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Freshwater Lagoon</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Gold Bluffs Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Hidden Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Indian Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Little Black Sands Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Little River State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Mattole River Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Redwood Creek Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Samoa Dunes Rec. Area</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Shelter Cove</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>South Spit</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Stone Lagoon</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach-north of GP Pier</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>64%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>1</td>
<td>Daily</td>
<td>203</td>
<td>49%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>236</td>
<td>43%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach-Paradise Cove</td>
<td>1</td>
<td>1/wk</td>
<td>57</td>
<td>42%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach-bet. BBC and TC</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>35%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>----------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach-south of GP Pier</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>33%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-Molino Ave-Beach</td>
<td>1</td>
<td>1/wk</td>
<td>70</td>
<td>33%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach-Ballona Creek</td>
<td>1</td>
<td>1/wk</td>
<td>234</td>
<td>32%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach-Santa Monica Canyon</td>
<td>1</td>
<td>1/wk</td>
<td>236</td>
<td>31%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Surfrider Beach</td>
<td>1</td>
<td>1/wk</td>
<td>236</td>
<td>31%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-west side of Belmont Pier</td>
<td>1</td>
<td>1/wk</td>
<td>66</td>
<td>29%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach-Redondo Pier</td>
<td>1</td>
<td>1/wk</td>
<td>236</td>
<td>28%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach</td>
<td>1</td>
<td>1/wk</td>
<td>64</td>
<td>28%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach-near Busy B Cafe</td>
<td>1</td>
<td>1/wk</td>
<td>32</td>
<td>28%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-10th Place-Beach</td>
<td>1</td>
<td>1/wk</td>
<td>71</td>
<td>27%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach-Wilshire Blvd.</td>
<td>1</td>
<td>1/wk</td>
<td>57</td>
<td>26%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>1</td>
<td>1/wk</td>
<td>69</td>
<td>26%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach-Malibu Pier</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>25%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Puerco Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>25%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach-Latigo Shore Dr.</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>24%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>1</td>
<td>1/wk</td>
<td>61</td>
<td>23%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-36th Place-Beach</td>
<td>1</td>
<td>1/wk</td>
<td>61</td>
<td>23%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-Coronado Ave-Beach</td>
<td>1</td>
<td>1/wk</td>
<td>62</td>
<td>23%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach-Montana Ave.</td>
<td>1</td>
<td>1/wk</td>
<td>49</td>
<td>22%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach-2nd St Bridge &amp; Bayshore</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>21%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach-Topsail Street</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>20%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-east side of Belmont Pier</td>
<td>1</td>
<td>1/wk</td>
<td>62</td>
<td>19%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Topanga State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>236</td>
<td>19%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-3rd Place-Beach</td>
<td>1</td>
<td>1/wk</td>
<td>63</td>
<td>19%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-5th Place-Beach</td>
<td>1</td>
<td>1/wk</td>
<td>63</td>
<td>19%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-16th Place-Beach</td>
<td>1</td>
<td>1/wk</td>
<td>64</td>
<td>19%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach-Pico Kender storm drain</td>
<td>1</td>
<td>1/wk</td>
<td>236</td>
<td>18%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach-near storm drain</td>
<td>1</td>
<td>1/wk</td>
<td>29</td>
<td>17%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach-Brooks Ave.</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>17%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach-1st &amp; Bayshore</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>17%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach-Strand Street</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>17%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-Granada Ave-Beach</td>
<td>1</td>
<td>1/wk</td>
<td>61</td>
<td>16%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Marina Del Rey Beach</td>
<td>1</td>
<td>1/wk</td>
<td>236</td>
<td>16%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Big Rock Beach</td>
<td>1</td>
<td>1/wk</td>
<td>50</td>
<td>16%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-B-69</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>16%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Inner Cabrillo Beach</td>
<td>1</td>
<td>5/wk</td>
<td>203</td>
<td>14%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Zuma Beach-Trancas Beach</td>
<td>1</td>
<td>1/wk</td>
<td>49</td>
<td>14%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach-Alamitos-Bay shore float</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>13%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Royal Palms Beach</td>
<td>Not Tier 1</td>
<td>Daily 60</td>
<td>13%</td>
<td></td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach-56th Place-On Bayside</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>13%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------------</td>
<td>--------------------------------------------------------------</td>
<td>------</td>
<td>---------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-54th Place-Beach</td>
<td>1</td>
<td>1/wk</td>
<td>61</td>
<td>13%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach-Malibu Colony Dr.</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>13%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Leo Carillo State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>50</td>
<td>12%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-Prospect Ave-Beach</td>
<td>1</td>
<td>1/wk</td>
<td>59</td>
<td>12%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-72nd Place-Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>11%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-55th Place-Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>11%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Manhattan Beach-27th Street extended</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>11%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach-Herondo Street</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>11%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Will Rogers State Beach-Bel Air Bay Club</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>11%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Zuma Beach-Westward Beach</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>11%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach-Venice Pier</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>10%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach-Topaz Street</td>
<td>1</td>
<td>1/wk</td>
<td>50</td>
<td>10%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach-62nd Place-Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>9%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>El Segundo Beach</td>
<td>1</td>
<td>1/wk</td>
<td>46</td>
<td>9%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Will Rogers State Beach-17200 Pacific Coast Hwy</td>
<td>1</td>
<td>1/wk</td>
<td>46</td>
<td>9%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Will Rogers State Beach-Temescal Canyon sd</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>9%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Palos Verdes Beach-near Busy B Cafe</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>8%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Will Rogers State Beach-Pulga storm drain</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>8%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Hermosa Beach-26th Street</td>
<td>1</td>
<td>1/wk</td>
<td>46</td>
<td>7%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach-Hyperion Plant</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>6%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach-Ashland storm drain</td>
<td>1</td>
<td>1/wk</td>
<td>236</td>
<td>6%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach-Avenue I extended</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>6%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach-Windward storm drain</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>6%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach-World Way</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>4%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach-Nicholas Beach</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>4%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach-Culver Blvd</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>4%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach-Imperial Hwy. storm drain</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>4%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Hermosa Beach Pier</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>4%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Outer Cabrillo Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>4%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Manhattan Beach-40th Street extended</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>2%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Manhattan Beach-Manhattan Beach Pier</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>2%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Portuguese Bend</td>
<td>1</td>
<td>Daily</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Palos Verdes Beach-Abalone Cove</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Palos Verdes Beach-Long Point</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Armarillo Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Basin H</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Bluff Cove</td>
<td>1</td>
<td>2/mo</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Broad Beach</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Carbon Beach</td>
<td>1</td>
<td>5/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------------</td>
<td>---------------------------------</td>
<td>-----------------------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Coral Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dan Blocker County Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>El Matador State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>El Pescador State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Escondido Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>La Costa Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>La Piedra State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Las Flores Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Las Tunas County Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Lagoon State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Point</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Nicholas Canyon County Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>No Name</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Point Dume County Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Point Fermin Park</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Robert Meyer Memorial State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>South Topanga State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>South Will Rogers State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Torrance Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Zuma Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Marin</td>
<td>Millerton Point</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>16%</td>
</tr>
<tr>
<td>Marin</td>
<td>McNears Beach</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>10%</td>
</tr>
<tr>
<td>Marin</td>
<td>Fort Baker, Horseshoe Cove</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>8%</td>
</tr>
<tr>
<td>Marin</td>
<td>Chicken Ranch Beach at Creek</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>5%</td>
</tr>
<tr>
<td>Marin</td>
<td>Drake’s Beach</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>3%</td>
</tr>
<tr>
<td>Marin</td>
<td>Bolinas Beach</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Marin</td>
<td>China Camp</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Marin</td>
<td>Dillon Beach</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Marin</td>
<td>Heart’s Desire</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Marin</td>
<td>Lawson’s Landing</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Marin</td>
<td>Limantour Beach</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Marin</td>
<td>Miller Point</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Marin</td>
<td>Muir Beach</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>0%</td>
</tr>
<tr>
<td>Marin</td>
<td>Paradise Cove</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Marin</td>
<td>Rodeo Beach (Chronkite)</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>0%</td>
</tr>
<tr>
<td>Marin</td>
<td>Schoonmaker Beach</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Marin</td>
<td>Shell Beach</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Marin</td>
<td>Stinson Beach</td>
<td>1</td>
<td>1/wk</td>
<td>61</td>
<td>0%</td>
</tr>
<tr>
<td>Marin</td>
<td>Golden Hinde</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Marin</td>
<td>Kehoe Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Marin</td>
<td>Marshall Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------------</td>
<td>------------------------------</td>
<td>-------------------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Marin</td>
<td>McClures Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mendocino</td>
<td>MacKerricher State Park</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>4%</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Big River-Mendocino Bay Headlands SP</td>
<td>1</td>
<td>1/wk</td>
<td>30</td>
<td>0%</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Caspar Headlands SB</td>
<td>1</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Hare Creek</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Pudding Creek Beach</td>
<td>1</td>
<td>1/wk</td>
<td>29</td>
<td>0%</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Van Damme SP</td>
<td>1</td>
<td>1/wk</td>
<td>30</td>
<td>0%</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Albion River</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Anchor Bay</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Arena Cove</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Chadbourne Gulch</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Guadalupe River</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Irish Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Jug Handle State Reserve</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Manchester SB</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Navarro River Redwood SP</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Russian Gulch SP</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Schooner Gulch</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Ten Mile River</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mendocino</td>
<td>Westport/Union Landing</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monterey</td>
<td>Monterey State Beach-Del Monte Beach</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>18%</td>
</tr>
<tr>
<td>Monterey</td>
<td>Lover's Point</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>3%</td>
</tr>
<tr>
<td>Monterey</td>
<td>Spanish Bay</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>3%</td>
</tr>
<tr>
<td>Monterey</td>
<td>Stillwater Cove</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>3%</td>
</tr>
<tr>
<td>Monterey</td>
<td>Carmel River State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>35</td>
<td>3%</td>
</tr>
<tr>
<td>Monterey</td>
<td>Asilomar State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>32</td>
<td>0%</td>
</tr>
<tr>
<td>Monterey</td>
<td>Marina State Beach</td>
<td>Not Tier 1</td>
<td>2/yr</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Monterey</td>
<td>Monastery Beach</td>
<td>Not Tier 1</td>
<td>2/yr</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Monterey</td>
<td>Monterey State Beach-Monterey Beach Hotel</td>
<td>1</td>
<td>1/wk</td>
<td>31</td>
<td>0%</td>
</tr>
<tr>
<td>Monterey</td>
<td>San Carlos Beach</td>
<td>1</td>
<td>1/wk</td>
<td>32</td>
<td>0%</td>
</tr>
<tr>
<td>Monterey</td>
<td>Seaside Beach</td>
<td>Not Tier 1</td>
<td>No data</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Monterey</td>
<td>Andrew Molera State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monterey</td>
<td>Fort Ord Dunes State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monterey</td>
<td>Garrapata State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monterey</td>
<td>Heritage Harbor</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monterey</td>
<td>John Little State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monterey</td>
<td>Julia Pfeiffer Burns State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monterey</td>
<td>Maccabee Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monterey</td>
<td>Moss Landing State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monterey</td>
<td>Pacific Grove City Beaches</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------------</td>
<td>---------------------------------------------------------</td>
<td>-----------------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Monterey</td>
<td>Point Lobos State Reserve State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monterey</td>
<td>Point Sur SHP</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monterey</td>
<td>Salinas River State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monterey</td>
<td>Seal Rock, Pebble Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monterey</td>
<td>Zmudowski State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Vaugh's Launch</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>50%</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach-Surfzone at Outfall</td>
<td>1</td>
<td>2/wk</td>
<td>59</td>
<td>49%</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach-250’ S of San Juan Creek</td>
<td>1</td>
<td>2/wk</td>
<td>40</td>
<td>48%</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach-North Beach</td>
<td>1</td>
<td>2/wk</td>
<td>41</td>
<td>44%</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach-North of San Juan Creek</td>
<td>1</td>
<td>2/wk</td>
<td>57</td>
<td>40%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-SKI ZONE</td>
<td>1</td>
<td>1/wk</td>
<td>8</td>
<td>38%</td>
</tr>
<tr>
<td>Orange</td>
<td>Poche County Beach</td>
<td>1</td>
<td>2/wk</td>
<td>58</td>
<td>36%</td>
</tr>
<tr>
<td>Orange</td>
<td>Riviera Beach</td>
<td>Not Tier 1</td>
<td>2/wk</td>
<td>61</td>
<td>33%</td>
</tr>
<tr>
<td>Orange</td>
<td>Capistrano Beach</td>
<td>1</td>
<td>2/wk</td>
<td>58</td>
<td>31%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach-Santa Ana River-South</td>
<td>1</td>
<td>5/wk</td>
<td>65</td>
<td>31%</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach-3000’ South Outfall</td>
<td>1</td>
<td>2/wk</td>
<td>59</td>
<td>31%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Newport Blvd Bridge</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>30%</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach-1000’ South Outfall</td>
<td>1</td>
<td>2/wk</td>
<td>57</td>
<td>25%</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach-4000’ South Outfall</td>
<td>1</td>
<td>2/wk</td>
<td>60</td>
<td>22%</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente City Beach-20000’ South Outfall</td>
<td>1</td>
<td>2/wk</td>
<td>60</td>
<td>22%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach-Grant Street</td>
<td>1</td>
<td>5/wk</td>
<td>42</td>
<td>21%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Newport Dunes Middle</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>20%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Northstar Beach</td>
<td>1</td>
<td>1/wk</td>
<td>43</td>
<td>19%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-33rd Street</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>18%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-19th Street</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>17%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour-Harbour Channel</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>17%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-43rd Street</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>17%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Newport Dunes North</td>
<td>1</td>
<td>1/wk</td>
<td>43</td>
<td>16%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach-Magnolia Street</td>
<td>1</td>
<td>5/wk</td>
<td>186</td>
<td>16%</td>
</tr>
<tr>
<td>Orange</td>
<td>Capistrano Bay District</td>
<td>1</td>
<td>2/wk</td>
<td>113</td>
<td>16%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Alvarado/Bay Island</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>15%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Bayside Drive Beach</td>
<td>1</td>
<td>1/wk</td>
<td>43</td>
<td>14%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Rhine Channel</td>
<td>1</td>
<td>1/wk</td>
<td>43</td>
<td>14%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach-Santa Ana River - North</td>
<td>1</td>
<td>5/wk</td>
<td>66</td>
<td>14%</td>
</tr>
<tr>
<td>Orange</td>
<td>Aliso County Beach-Aliso Beach</td>
<td>Not Tier 1</td>
<td>No data</td>
<td>80</td>
<td>13%</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor-Builo Line/Baby Beach</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>13%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach-50’ N of Santa Ana River</td>
<td>1</td>
<td>5/wk</td>
<td>189</td>
<td>12%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Garnet Avenue</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>12%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Lido Yacht Club</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>12%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Newport Dunes East</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>12%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------------</td>
<td>-----------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Newport Dunes West</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>12%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Onyx Avenue</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>12%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Ruby Avenue</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>12%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Via Genoa</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>12%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach-Bluffs</td>
<td>1</td>
<td>5/wk</td>
<td>188</td>
<td>11%</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor-West End/Baby Beach</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>11%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour-Coral Cay</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>11%</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor-Swim Area/Baby Beach</td>
<td>1</td>
<td>1/wk</td>
<td>39</td>
<td>10%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour-Sunset Aquatic Park</td>
<td>1</td>
<td>1/wk</td>
<td>39</td>
<td>10%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour-Anderson Street</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>10%</td>
</tr>
<tr>
<td>Orange</td>
<td>Monarch Beach</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>10%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach-Lancaster/62nd</td>
<td>1</td>
<td>5/wk</td>
<td>40</td>
<td>10%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-10th Street</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>10%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-15th Street</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>10%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Bayshore Beach</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>10%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Grand Canal</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>10%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Rocky Point</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>10%</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente City Beach-450’ North of Pier</td>
<td>1</td>
<td>2/wk</td>
<td>57</td>
<td>9%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach-Brookhurst Street</td>
<td>1</td>
<td>5/wk</td>
<td>187</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor-East End/Baby Beach</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor-MDP18</td>
<td>1</td>
<td>1/wk</td>
<td>39</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor-Youth Dock</td>
<td>1</td>
<td>1/wk</td>
<td>39</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour-Mothers Beach</td>
<td>1</td>
<td>1/wk</td>
<td>39</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Sapphire Avenue</td>
<td>1</td>
<td>1/wk</td>
<td>39</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach-SCE Plant</td>
<td>1</td>
<td>5/wk</td>
<td>186</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour-11th Street Beach</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour-Clubhouse</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Abalone Avenue</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-De Anza</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-N Street Beach</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Park Avenue</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay-Promontory Point</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Seal Beach Surfside-1st Street</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>8%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach-17th Street</td>
<td>1</td>
<td>5/wk</td>
<td>188</td>
<td>7%</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor-Harbor Entrance</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>7%</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente State Beach-Avenida Calafia</td>
<td>1</td>
<td>2/wk</td>
<td>57</td>
<td>7%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach-Orange Street</td>
<td>1</td>
<td>5/wk</td>
<td>186</td>
<td>7%</td>
</tr>
<tr>
<td>Orange</td>
<td>Aliso County Beach-Aliso Beach-South</td>
<td>Not Tier</td>
<td>No data</td>
<td>80</td>
<td>6%</td>
</tr>
<tr>
<td>Orange</td>
<td>Crystal Cove State Park-Crystal Cove</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>5%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach-52nd/53rd Street</td>
<td>1</td>
<td>5/wk</td>
<td>186</td>
<td>5%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach-Jack’s Snack Bar</td>
<td>1</td>
<td>5/wk</td>
<td>188</td>
<td>5%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------</td>
<td>-------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour-Admiralty Drive</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>5%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour-Trinidad Lane</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>5%</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach-Emerald Bay</td>
<td>1</td>
<td>2/wk</td>
<td>38</td>
<td>5%</td>
</tr>
<tr>
<td>Orange</td>
<td>Salt Creek County Beach Park-Salt Creek Beach</td>
<td>Not Tier 1</td>
<td>3/wk</td>
<td>96</td>
<td>5%</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor-Guest Dock</td>
<td>1</td>
<td>1/wk</td>
<td>39</td>
<td>5%</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor-Pier</td>
<td>1</td>
<td>1/wk</td>
<td>39</td>
<td>5%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour-Sea Gate</td>
<td>1</td>
<td>1/wk</td>
<td>39</td>
<td>5%</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach-Bluebird Canyon</td>
<td>1</td>
<td>2/wk</td>
<td>79</td>
<td>5%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach-Beach Hut</td>
<td>1</td>
<td>5/wk</td>
<td>188</td>
<td>5%</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach-Laguna Hotel</td>
<td>1</td>
<td>2/wk</td>
<td>81</td>
<td>4%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach-38th Street</td>
<td>1</td>
<td>5/wk</td>
<td>226</td>
<td>4%</td>
</tr>
<tr>
<td>Orange</td>
<td>Bolsa Chica Reserve</td>
<td>1</td>
<td>5/wk</td>
<td>188</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach-15th/16th Street</td>
<td>1</td>
<td>5/wk</td>
<td>188</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Crystal Cove State Park-Muddy Creek Surf</td>
<td>1</td>
<td>1/wk</td>
<td>36</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach-Corona Del Mar</td>
<td>1</td>
<td>5/wk</td>
<td>189</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour-Anaheim Bay</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour-Bolsa Chica</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour-Davenport Beach</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour-Humboldt Beach</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach-Little Corona</td>
<td>1</td>
<td>5/wk</td>
<td>38</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Seal Beach Surfside-100 Yds S of Pier</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor-Fuel Dock</td>
<td>1</td>
<td>1/wk</td>
<td>39</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor-Pilgrim</td>
<td>1</td>
<td>1/wk</td>
<td>39</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Seal Beach Surfside-8th Street</td>
<td>1</td>
<td>1/wk</td>
<td>39</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Aliso County Beach-Treasure Island Stairs</td>
<td>Not Tier 1</td>
<td>No data</td>
<td>79</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor-Harbor Patrol Dock</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente City Beach-Trafalgar Street Beach</td>
<td>1</td>
<td>2/wk</td>
<td>40</td>
<td>3%</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point-Ocean Institute Beach</td>
<td>Not Tier 1</td>
<td>2/wk</td>
<td>56</td>
<td>2%</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente State Beach-Las Palmaras</td>
<td>1</td>
<td>2/wk</td>
<td>56</td>
<td>2%</td>
</tr>
<tr>
<td>Orange</td>
<td>Bolsa Chica Beach</td>
<td>1</td>
<td>5/wk</td>
<td>188</td>
<td>2%</td>
</tr>
<tr>
<td>Orange</td>
<td>Aliso County Beach-Camel Point</td>
<td>Not Tier 1</td>
<td>No data</td>
<td>79</td>
<td>1%</td>
</tr>
<tr>
<td>Orange</td>
<td>Aliso County Beach-Table Rock</td>
<td>Not Tier 1</td>
<td>No data</td>
<td>79</td>
<td>1%</td>
</tr>
<tr>
<td>Orange</td>
<td>Aliso County Beach-Treasure Island Ramp</td>
<td>Not Tier 1</td>
<td>No data</td>
<td>79</td>
<td>1%</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach-Blue Lagoon</td>
<td>1</td>
<td>2/wk</td>
<td>79</td>
<td>1%</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach-Laguna Lido Apartment</td>
<td>1</td>
<td>2/wk</td>
<td>79</td>
<td>1%</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach-Victoria Beach</td>
<td>1</td>
<td>2/wk</td>
<td>79</td>
<td>1%</td>
</tr>
<tr>
<td>Orange</td>
<td>Salt Creek County Beach Park-Dana Strands-Selva Ramp</td>
<td>Not Tier 1</td>
<td>2/wk</td>
<td>79</td>
<td>1%</td>
</tr>
<tr>
<td>Orange</td>
<td>South Laguna-Three Arch Bay</td>
<td>1</td>
<td>2/wk</td>
<td>79</td>
<td>1%</td>
</tr>
<tr>
<td>Orange</td>
<td>South Laguna-Treasure Island Pier</td>
<td>1</td>
<td>2/wk</td>
<td>79</td>
<td>1%</td>
</tr>
<tr>
<td>Orange</td>
<td>Crystal Cove State Park-Crystal Cove Ramp</td>
<td>1</td>
<td>1/wk</td>
<td>188</td>
<td>1%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach-Balboa Pier</td>
<td>1</td>
<td>5/wk</td>
<td>188</td>
<td>1%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach-The Wedge</td>
<td>1</td>
<td>5/wk</td>
<td>189</td>
<td>1%</td>
</tr>
<tr>
<td>Orange</td>
<td>Crystal Cove State Park-El Morro</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>0%</td>
</tr>
<tr>
<td>Orange</td>
<td>Crystal Cove State Park-Pelican Point</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>0%</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach-Crescent Bay</td>
<td>1</td>
<td>2/wk</td>
<td>37</td>
<td>0%</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach-Laguna Main Beach</td>
<td>1</td>
<td>2/wk</td>
<td>37</td>
<td>0%</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach-Newport Pier</td>
<td>1</td>
<td>5/wk</td>
<td>188</td>
<td>0%</td>
</tr>
<tr>
<td>Orange</td>
<td>Seal Beach Surfside-14th Street</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>0%</td>
</tr>
<tr>
<td>Orange</td>
<td>Seal Beach Surfside-Sea Way</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>0%</td>
</tr>
<tr>
<td>Orange</td>
<td>South Laguna-Thousand Steps Beach</td>
<td>1</td>
<td>2/wk</td>
<td>79</td>
<td>0%</td>
</tr>
<tr>
<td>Orange</td>
<td>Sunset Beach</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Tijuana Slough National Wildlife Refuge-Tijuana Rivermouth</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>38%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Imperial Beach municipal beach-Cortez Ave</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>27%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Harbor Beach-San Luis Rey River outlet, south jetty</td>
<td>Not Tier 1</td>
<td>2/wk</td>
<td>72</td>
<td>22%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Tijuana Slough National Wildlife Refuge-N of Tijuana River</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>22%</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay Shelter Is</td>
<td>1</td>
<td>1/wk</td>
<td>5</td>
<td>20%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Dog Beach, O.B.</td>
<td>Not Tier 1</td>
<td>2/wk</td>
<td>69</td>
<td>17%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Imperial Beach municipal beach-End of Seacoast Dr</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>17%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Mariners Basin-Bonita Cove</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>16%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Border Field State Park-Monument Rd.</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>13%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Imperial Beach Pier</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>11%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Spanish Landing Park</td>
<td>1</td>
<td>1/wk</td>
<td>28</td>
<td>11%</td>
</tr>
<tr>
<td>San Diego</td>
<td>North Imperial Beach-Camp Surf (Carnation Ave)</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>38</td>
<td>11%</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Dieguito River Beach</td>
<td>1</td>
<td>2/wk</td>
<td>59</td>
<td>10%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Visitor’s Center</td>
<td>1</td>
<td>1/wk</td>
<td>30</td>
<td>10%</td>
</tr>
<tr>
<td>San Diego</td>
<td>WindanSea Beach-Bonair (NR)</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>10%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, De Anza Cove</td>
<td>1</td>
<td>1/wk</td>
<td>32</td>
<td>9%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Vacation Isle</td>
<td>1</td>
<td>1/wk</td>
<td>57</td>
<td>9%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Pacific Beach-Crystal Pier</td>
<td>1</td>
<td>1/wk</td>
<td>23</td>
<td>9%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Shoreline Park</td>
<td>Not Tier 1</td>
<td>No data</td>
<td>23</td>
<td>9%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Oceanside Pier area-Pier View Way</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>8%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Oceanside Pier area-Surfrider Way</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>8%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Oceanside Pier area-Tyson Street</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>8%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Cardiff State Beach</td>
<td>1</td>
<td>2/wk</td>
<td>101</td>
<td>8%</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay Coronado Cays</td>
<td>Not Tier 1</td>
<td>No data</td>
<td>26</td>
<td>8%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay-Fiesta Island</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>41</td>
<td>7%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Campland on the Bay</td>
<td>1</td>
<td>1/wk</td>
<td>28</td>
<td>7%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Tourmaline Surfing Park</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>71</td>
<td>7%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------------</td>
<td>--------------------------------------------</td>
<td>---------------</td>
<td>----------------------</td>
<td>--------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>San Diego</td>
<td>Ocean Beach-O.B. pier at Narrangaset</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>7%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Buccaneer Beach</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>82</td>
<td>6%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Oceanside municipal beach-Forester Street</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>5%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Silver Strand State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>5%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Border Field State Park-Border Fence, N side</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>5%</td>
</tr>
<tr>
<td>San Diego</td>
<td>La Jolla Cove</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>5%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Ocean Beach-Bermuda Ave</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>5%</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay-Silver Strand (bayside)</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>22</td>
<td>5%</td>
</tr>
<tr>
<td>San Diego</td>
<td>USMC Camp Pendleton</td>
<td>1</td>
<td>1/wk</td>
<td>23</td>
<td>4%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Ocean Beach-Newport Ave, north side of pier</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>4%</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay Glorietta Bay</td>
<td>1</td>
<td>1/wk</td>
<td>25</td>
<td>4%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Bayside Park</td>
<td>Not Tier 1</td>
<td>No data</td>
<td>26</td>
<td>4%</td>
</tr>
<tr>
<td>San Diego</td>
<td>South Carlsbad State Beach-Batiquitos Lagoon outlet</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>4%</td>
</tr>
<tr>
<td>San Diego</td>
<td>WindanSea Beach-Playa Del Norte</td>
<td>1</td>
<td>1/wk</td>
<td>28</td>
<td>4%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Torrey Pines State Beach</td>
<td>1</td>
<td>2/wk</td>
<td>59</td>
<td>3%</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay-Lawrence St</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>30</td>
<td>3%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Powerhouse Park 15th Street</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>34</td>
<td>3%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Oceanside municipal beach-Cassidy Street</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>3%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Oceanside municipal beach-St. Malo Beach</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>3%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Fletcher Cove</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>39</td>
<td>3%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Sunset Cliffs Park</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>2%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Coronado City beaches</td>
<td>1</td>
<td>3/wk</td>
<td>91</td>
<td>2%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Ocean Beach-Stub Jetty, south side</td>
<td>1</td>
<td>1/wk</td>
<td>46</td>
<td>2%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Leisure Lagoon</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>2%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Whispering Sands Nicholson Pt.</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>San Diego</td>
<td>La Jolla Shores Beach</td>
<td>1</td>
<td>1/wk</td>
<td>58</td>
<td>2%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Moonlight Beach</td>
<td>1</td>
<td>2/wk</td>
<td>58</td>
<td>2%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Bird Rock (NR)</td>
<td>Not Tier 1</td>
<td>2/yr</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Cardiff State Beach-Las Olas (Georges)</td>
<td>1</td>
<td>2/wk</td>
<td>38</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Cardiff State Beach-Seaside State Park</td>
<td>1</td>
<td>2/wk</td>
<td>38</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Carlsbad City Beach</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Carlsbad State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>58</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Coronado Cays (NR)</td>
<td>Not Tier 1</td>
<td>No data</td>
<td>114</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Coronado, Central beach</td>
<td>1</td>
<td>2/wk</td>
<td>55</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Harbor Beach</td>
<td>Not Tier 1</td>
<td>2/wk</td>
<td>37</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Imperial Beach municipal beach, other</td>
<td>1</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Bahia Point</td>
<td>1</td>
<td>1/wk</td>
<td>25</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Crown Point Shores</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Fanuel Park</td>
<td>1</td>
<td>1/wk</td>
<td>25</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Mariners Basin-Balboa Ct.</td>
<td>1</td>
<td>1/wk</td>
<td>25</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Sail Bay</td>
<td>1</td>
<td>1/wk</td>
<td>59</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Ventura Cove</td>
<td>1</td>
<td>1/wk</td>
<td>25</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Beach-Belmont Park</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>north Imperial Beach-Camp Surf jetty</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>23</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Ocean Beach-Bermuda Ave (NR)</td>
<td>1</td>
<td>1/wk</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Oceanside municipal beach-Wisconsin Street</td>
<td>1</td>
<td>1/wk</td>
<td>25</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Pacific Beach-Grand Ave.</td>
<td>1</td>
<td>1/wk</td>
<td>22</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Elijo State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>76</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Onofre State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>22</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Seascape Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>22</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Mission Bay-Cerezo Drive</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>South Carlsbad State Beach-Cencina Creek outlet</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>South Carlsbad State Beach-Palomar Airport</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>South Carlsbad State Beach-Poinsettia Lane</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>South Carlsbad State Beach-Ponto Drive</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>South Casa Beach S.D.</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Swami's Park</td>
<td>1</td>
<td>1/wk</td>
<td>23</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Tecolote Shores</td>
<td>1</td>
<td>1/wk</td>
<td>50</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Tide Beach Park</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>38</td>
<td>0%</td>
</tr>
<tr>
<td>San Diego</td>
<td>Agua Hedionda Lagoon</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>Del Mar City Beach</td>
<td>1</td>
<td>2/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>La Jolla Community Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>Leucadia</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>Marine Street Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, north pacific passage</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Quiviera Basin</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Riviera Shores</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, San Juan Cove</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Santa Barbara Cove</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>Oceanside Harbor</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay Chula Vista</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>Shell Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>Solana Beach City Beaches</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>Tijuana River</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Diego</td>
<td>Torrey Pines City Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach, at Pacheco St.</td>
<td>Not Tier 1</td>
<td>Irregular*</td>
<td>5</td>
<td>40%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach, at Vicente St.</td>
<td>Not Tier 1</td>
<td>Irregular*</td>
<td>5</td>
<td>40%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Candlestick Point-Windsurfer Circle</td>
<td>1</td>
<td>1/wk</td>
<td>78</td>
<td>32%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Candlestick Point-Sunnydale Cove</td>
<td>1</td>
<td>1/wk</td>
<td>75</td>
<td>31%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Fort Funston</td>
<td>Not Tier 1</td>
<td>Irregular*</td>
<td>4</td>
<td>25%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Candlestick Point-Jack Rabbit Beach</td>
<td>1</td>
<td>1/wk</td>
<td>66</td>
<td>18%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>----------------</td>
<td>-------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>---------------------</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Lobos Creek at Lower Parking Lot</td>
<td>1</td>
<td>1/wk</td>
<td>69</td>
<td>17%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Aquatic Park, Mid-beach</td>
<td>1</td>
<td>1/wk</td>
<td>70</td>
<td>14%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Crissy Field, New Beach</td>
<td>1</td>
<td>1/wk</td>
<td>65</td>
<td>12%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach, at Lincoln Ave.</td>
<td>1</td>
<td>1/wk</td>
<td>62</td>
<td>10%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach, at Balboa St.</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>7%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Aquatic Park-Hyde Street Pier</td>
<td>1</td>
<td>1/wk</td>
<td>63</td>
<td>6%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Opposite Seacliff 2 Pumping Station</td>
<td>1</td>
<td>1/wk</td>
<td>57</td>
<td>4%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach, at Sloat Blvd.</td>
<td>1</td>
<td>1/wk</td>
<td>58</td>
<td>3%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Upper Parking Lot</td>
<td>1</td>
<td>1/wk</td>
<td>69</td>
<td>3%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>China Beach</td>
<td>1</td>
<td>1/wk</td>
<td>57</td>
<td>2%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Crissy Field West</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>0%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Crissy Field, Trees</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Pismo State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>183</td>
<td>16%</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Olde Port Beach</td>
<td>1</td>
<td>1/wk</td>
<td>59</td>
<td>10%</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Avila Beach</td>
<td>1</td>
<td>1/wk</td>
<td>110</td>
<td>10%</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Cayucos Beach</td>
<td>1</td>
<td>1/wk</td>
<td>158</td>
<td>5%</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>San Simeon Beach</td>
<td>1</td>
<td>1/wk</td>
<td>100</td>
<td>3%</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Pismo State Beach, Oceano</td>
<td>1</td>
<td>1/wk</td>
<td>148</td>
<td>3%</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Montana De Oro</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>47</td>
<td>2%</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Morro Bay City Beach</td>
<td>1</td>
<td>1/wk</td>
<td>149</td>
<td>1%</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Morro Strand State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>46</td>
<td>0%</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Oceano Dunes State Rec Area</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>44</td>
<td>0%</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Hearst Memorial State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Leffingwell Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Moonstone Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>N Morro Strand State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>S Morro Strand State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Sewers</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Shell Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Spyglass Park</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Marina Lagoon</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>40%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Aquatic Park</td>
<td>1</td>
<td>1/wk</td>
<td>43</td>
<td>28%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Lakeshore Park</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>26</td>
<td>23%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point</td>
<td>1</td>
<td>1/wk</td>
<td>99</td>
<td>16%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Kiteboard Beach</td>
<td>Not Tier 1</td>
<td>No data</td>
<td>30</td>
<td>13%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Coyote Point County Park</td>
<td>1</td>
<td>1/wk</td>
<td>8</td>
<td>13%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Venice State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>12%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Fitzgerald Marine (Moss Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>50</td>
<td>8%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Oyster Point Marina</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>42</td>
<td>7%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Roosevelt State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>43</td>
<td>5%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>-------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pacifica State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>89</td>
<td>3%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Gazos Creek Access</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>3%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Sharp Park Beach #3</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>2%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Dunes State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>43</td>
<td>2%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Rockaway Beach</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>2%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Bean Hollow State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>29</td>
<td>0%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Coyote Point</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Francis State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>0%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Montara State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>0%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pescadero State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>31</td>
<td>0%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pomponio State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>32</td>
<td>0%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>San Gregorio State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>30</td>
<td>0%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Sharp Park Beach #6</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>0%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Surfers Beach</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>0%</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Ano Nuevo State Refuge</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Capistrano Blvd. Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>El Grandada</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Elmar Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Gray Whale State Beach</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Manor Beach</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Maverick’s Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Miramar Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Mori Point</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Naples Beach</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pebble Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pigeon Point Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point 2</td>
<td>Not Tier 1</td>
<td>4/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point Harbor</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Poplar Beach</td>
<td>Not Tier 1</td>
<td>10/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Redondo Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Ross’s Cove</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Sand Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Thornton State Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Tunitas Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Vallejo Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Arroyo Burro</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>27%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Goleta Beach</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>21%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>East Beach- Mission Creek</td>
<td>1</td>
<td>1/wk</td>
<td>46</td>
<td>13%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Guadalupe Dunes Beach</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>13%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Carpinteria State</td>
<td>1</td>
<td>1/wk</td>
<td>43</td>
<td>9%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Hope Ranch Beach</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>9%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Leadbetter</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>9%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Ocean Beach</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>8%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Gaviota Beach</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>7%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>East Beach Sycamore Creek</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>7%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Haskell's Beach</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>7%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Summerland Beach</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>7%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Jalama Beach</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>5%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Carpinteria City</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>5%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Refugio State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>5%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Sands Beach at Coal Oil Point</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>5%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Butterfly Beach</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>2%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>El Capitan State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>2%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Hammonds</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>2%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Rincon Beach</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>1000 Steps</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Arroyo Quemado</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Campus Pt.</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Depressions</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Devereaux</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Ellwood</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Isla Vista Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Loon Point</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Mesa Lane</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Miramar</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Padaro Lane</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Santa Claus Lane</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Surf Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>West Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Cowell Beach West of the Wharf</td>
<td>1</td>
<td>1/wk</td>
<td>83</td>
<td>25%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Capitola Beach west of Jetty</td>
<td>1</td>
<td>1/wk</td>
<td>78</td>
<td>17%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Capitola Beach east of Jetty</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>9%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Moran Lake, County Beach</td>
<td>1</td>
<td>1/mo</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Pajaro Dunes Beach</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>6%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>New Brighton State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>6%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Seabright Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>6%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Rio del Mar Beach</td>
<td>1</td>
<td>1/wk</td>
<td>71</td>
<td>4%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Natural Bridges State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Twin Lakes State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Main Beach at San Lorenzo River</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Main Beach at Boardwalk</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>2%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Seacliff State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>67</td>
<td>1%</td>
</tr>
</tbody>
</table>
## County Beach Tier Monitoring Frequency Total Samples Percent Exceedance

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Santa Cruz</td>
<td>Corcoran Lagoon Beach</td>
<td>1</td>
<td>1/mo</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Cowell's Beach at the Stairs</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Hidden Beach</td>
<td>1</td>
<td>1/mo</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Lighthouse Beach</td>
<td>1</td>
<td>1/mo</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Manresa State Beach</td>
<td>1</td>
<td>1/mo</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Mitchell's Cove Beach</td>
<td>1</td>
<td>1/mo</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Pleasure Point Beach</td>
<td>1</td>
<td>1/mo</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>San Vicente Beach</td>
<td>1</td>
<td>1/mo</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Scott Creek Beach</td>
<td>1</td>
<td>1/mo</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Sunny Cove Beach</td>
<td>1</td>
<td>1/mo</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Sunset State Beach</td>
<td>1</td>
<td>1/mo</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Waddell Creek Beach</td>
<td>1</td>
<td>1/mo</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Beercan Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Hooper's Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Neary Lagoon mouth</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Schwan Lake</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Seascape Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Trestle Beach</td>
<td>Not Tier 1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sonoma</td>
<td>Campbell Cove State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>43</td>
<td>40%</td>
</tr>
<tr>
<td>Sonoma</td>
<td>Still Water Cove Regional Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>3%</td>
</tr>
<tr>
<td>Sonoma</td>
<td>Black Point</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Sonoma</td>
<td>Doran Regional Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Sonoma</td>
<td>Goat Rock State Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Sonoma</td>
<td>Gualala Regional Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Sonoma</td>
<td>Salmon Creek State Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Ventura River (mouth)</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>63%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Kidde Beach</td>
<td>1</td>
<td>1/wk</td>
<td>67</td>
<td>12%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Rincon Beach - Flagpole</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>11%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Faria County Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>32</td>
<td>9%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Penninsula Beach</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>9%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Mandos Cove Beach</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>9%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Surfers Point at Seaside</td>
<td>Not Tier 1</td>
<td>1/wk</td>
<td>45</td>
<td>9%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Seaside Wilderness Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>25</td>
<td>8%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Rincon Beach - Creek Mouth</td>
<td>1</td>
<td>1/wk</td>
<td>28</td>
<td>7%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Surfers Knoll Beach</td>
<td>1</td>
<td>1/wk</td>
<td>43</td>
<td>5%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Emma Woods State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>5%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Hollywood Bch-La Crescen.</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>4%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Promenade Pk-Figueroa St.</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>4%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Silverstrand Bch-San Nic.</td>
<td>1</td>
<td>1/wk</td>
<td>46</td>
<td>4%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Hobie Beach</td>
<td>1</td>
<td>1/wk</td>
<td>23</td>
<td>4%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Oxnard Bch-Channel Way</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>4%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Ventura</td>
<td>Mussel Shoals Beach</td>
<td>1</td>
<td>1/wk</td>
<td>28</td>
<td>4%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Oxnard Bch-5th St.</td>
<td>1</td>
<td>1/wk</td>
<td>28</td>
<td>4%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Port Hueneme Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>28</td>
<td>4%</td>
</tr>
<tr>
<td>Ventura</td>
<td>McGrath State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>69</td>
<td>3%</td>
</tr>
<tr>
<td>Ventura</td>
<td>San Buenaventura State Beach</td>
<td>1</td>
<td>1/wk</td>
<td>109</td>
<td>1%</td>
</tr>
<tr>
<td>Ventura</td>
<td>County Line Beach</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Deer Creek Beach</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Hobson County Park</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Hollywood Bch-Los Robles</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>La Conchita Beach</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Marina Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Oil Piers Beach</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Ormond Beach</td>
<td>1</td>
<td>1/wk</td>
<td>76</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Oxnard Bch-Amalfi Way</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Oxnard Bch-Outrigger Way</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Oxnard Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Point Mugu Beach</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Promenade Pk-Calif. St.</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Promenade Pk-Oak St.</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Promenade Pk-Redwood Apts</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Rincon Beach - Footpath</td>
<td>1</td>
<td>1/wk</td>
<td>29</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Rincon Parkway North</td>
<td>1</td>
<td>1/wk</td>
<td>25</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Silverstrand Bch-S. Paula</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Silverstrand Bch-Sawtelle</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Solimar Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>South Jetty Beach</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Staircase Beach</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Sycamore Cove Beach</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>Ventura</td>
<td>Thornhill Broome Beach</td>
<td>1</td>
<td>1/wk</td>
<td>25</td>
<td>0%</td>
</tr>
</tbody>
</table>

N/A: Not applicable

*Fort Funston and the Pacheco St. and Vicente St. locations along Ocean Beach are only monitored when there is a known combined-sewer overflow event. Because of this sampling schedule, the exceedance rate at these beaches is expected to be high. The water quality results for Ocean Beach at Lincoln Ave. and at Sloat Blvd., where routine samples are collected once a week, are more representative of the typical water quality at Fort Funston, Pacheco St., and Vicente St. than the results for the samples that were taken after known combined-sewer overflow events.

**Closings and Advisories**

**Closing/Advisory Issuance:** Almost all counties monitor for all three organisms (total coliform, fecal coliform, and enterococcus), and an exceedance of the single-sample standard of any one of these three indicators triggers an advisory. Geometric mean standards are sometimes used to keep a beach posted after the single-sample maximum has been exceeded, but are rarely used by themselves to trigger a posting.2

There are four types of beachwater quality warnings issued: postings, closings, rain advisories, and permanent postings. Postings are triggered when a water sample fails to meet bacterial standards. Rain advisories are pre-emptive warnings.
that people should avoid swimming in ocean waters during a rain event and for three days after rainfall ceases, while permanent postings are sites where historic data shows that the beachwater generally contains elevated bacteria levels.¹

Beach closings are generally issued due to sewage spills or other serious health hazards, but local health officials sometimes decide to close a beach when more than one standard is exceeded or when exceedances are far in excess of the standards.² This is rare, however, and closings are generally issued only when it is suspected that sewage is impacting a beach.

Advisories are posted without resampling when a single-sample exceedance occurs. There is no protocol for delaying or foregoing an advisory when a single-sample exceedance occurs. Posted advisories usually are placed as signs at the beach and often along access points to the beach saying that swimming may cause illness. Closings are issued immediately upon notification by the agency responsible for the spill and closing signs are posted along the beach. Information about current posting (advisory) and closing events is also available for most counties on their web sites and telephone hotlines. Rain advisories are issued via county hotlines, newspapers, and radio.¹

Some beaches in California are relatively long. Long Beach, for example, is seven miles long. Therefore, health officials often issue advisories and closings for one or more sections of a large beach rather than the whole beach when high bacteria levels are detected at a monitoring site. For example, at beaches with multiple sampling stations, a section of beach that extends 100 yards on either side of a sampling station may have an advisory if it is the only station at the beach with an exceedance. Closing distances are based on the size of the sewage spill and the distance of the spill from impacted waters as well as tides and currents.²

Number of Closings and Advisories: California had 1,003 closing/advisory events lasting six consecutive weeks or less in 2008. Total closing/advisory days for events lasting six consecutive weeks or less decreased 13% to 4,133 days in 2008 from 4,736 days in 2007, 4,644 days in 2006, and 5,199 days in 2005. In addition, there were 3 extended events (148 days total) and 9 permanent events (1,700 days total) in 2008. Extended events are those in effect more than six consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. In 2007, there were 14 extended events (885 days total) and 7 permanent events (1,291 days total).

Causes of Closings and Advisories: For events lasting six consecutive weeks or less, 88% (3,649) of closing/advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, 4% (164) were preemptive (i.e. without waiting for monitoring results) due to heavy rainfall, and 8% (319) were preemptive due to known sewage spills/leaks.

The reported sources of beachwater contamination for 2008 are as follows: 81% (3,367) of closing/advisory days were from unknown sources of contamination, 3% (131) were from stormwater runoff, 9% (378) were from sewage spills/leaks, and 6% (257) were from other sources of contamination.

Reopening Procedures: In California, immediate resampling is often conducted to lift an advisory as soon as possible. For closings, two days of clean samples are required before reopening a beach. Additional sampling is not conducted before lifting rain advisories.

### 2008 California Beach Closings and Advisories

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Alameda</td>
<td>Alameda Point</td>
<td>4/9/08</td>
<td>4/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Alameda Point</td>
<td>4/16/08</td>
<td>4/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Alameda Point</td>
<td>5/7/08</td>
<td>5/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, 2001 Shoreline Dr.</td>
<td>2/21/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, 2001 Shoreline Dr.</td>
<td>6/17/08</td>
<td>6/20/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, 2001 Shoreline Dr.</td>
<td>9/26/08</td>
<td>10/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, 2001 Shoreline Dr.</td>
<td>12/11/08</td>
<td>12/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Bath House</td>
<td>1/9/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------------</td>
<td>-------------</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Bath House</td>
<td>2/21/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Bath House</td>
<td>6/17/08</td>
<td>6/20/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Bath House</td>
<td>10/22/08</td>
<td>10/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Bath House</td>
<td>11/12/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Bath House</td>
<td>11/26/08</td>
<td>12/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Bird Sanctuary</td>
<td>2/7/08</td>
<td>2/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Bird Sanctuary</td>
<td>2/21/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Bird Sanctuary</td>
<td>3/5/08</td>
<td>3/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Bird Sanctuary</td>
<td>3/19/08</td>
<td>3/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Bird Sanctuary</td>
<td>6/17/08</td>
<td>6/20/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Bird Sanctuary</td>
<td>9/26/08</td>
<td>9/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Bird Sanctuary</td>
<td>10/17/08</td>
<td>10/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Bird Sanctuary</td>
<td>12/11/08</td>
<td>12/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Sunset Rd.</td>
<td>2/21/08</td>
<td>2/25/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Sunset Rd.</td>
<td>6/17/08</td>
<td>6/20/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Windsurf Corner</td>
<td>2/21/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Windsurf Corner</td>
<td>6/11/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Alameda</td>
<td>Crown Beach, Windsurf Corner</td>
<td>6/17/08</td>
<td>6/20/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>Contra Costa</td>
<td>Keller Beach</td>
<td>4/9/08</td>
<td>4/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Contra Costa</td>
<td>Keller Beach</td>
<td>4/16/08</td>
<td>4/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Contra Costa</td>
<td>Keller Beach</td>
<td>5/21/08</td>
<td>5/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Contra Costa</td>
<td>Keller Beach</td>
<td>7/15/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Contra Costa</td>
<td>Keller Beach</td>
<td>8/27/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Contra Costa</td>
<td>Keller Beach</td>
<td>10/17/08</td>
<td>10/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Clam Beach Co. Park</td>
<td>4/24/08</td>
<td>4/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Clam Beach Co. Park</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Clam Beach Co. Park</td>
<td>8/21/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Clam Beach Co. Park</td>
<td>10/2/08</td>
<td>10/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Clam Beach Co. Park, North Mad River Mouth</td>
<td>1/10/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Clam Beach Co. Park, North Mad River Mouth</td>
<td>4/24/08</td>
<td>4/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Luffenholtz Beach, Luffenholtz Creek</td>
<td>4/24/08</td>
<td>4/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Luffenholtz Beach, Luffenholtz Creek</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Moonstone Beach</td>
<td>10/30/08</td>
<td>10/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Moonstone Beach</td>
<td>11/6/08</td>
<td>11/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Humboldt</td>
<td>Trinidad State Beach, Mill Creek Trinidad</td>
<td>4/24/08</td>
<td>4/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 1st &amp; Bayshore</td>
<td>2/11/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 1st &amp; Bayshore</td>
<td>3/10/08</td>
<td>3/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 1st &amp; Bayshore</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 1st &amp; Bayshore</td>
<td>9/3/08</td>
<td>9/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------------</td>
<td>------------------------------------------</td>
<td>------------</td>
<td>-----------</td>
<td>----------------------</td>
<td>-------------</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 1st &amp; Bayshore</td>
<td>11/10/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 2nd St Bridge &amp; Bayshore</td>
<td>2/11/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 2nd St Bridge &amp; Bayshore</td>
<td>3/24/08</td>
<td>3/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 2nd St Bridge &amp; Bayshore</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-sew Comb-sew-overflow</td>
<td></td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 2nd St Bridge &amp; Bayshore</td>
<td>10/27/08</td>
<td>10/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 2nd St Bridge &amp; Bayshore</td>
<td>11/10/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 2nd St Bridge &amp; Bayshore</td>
<td>12/1/08</td>
<td>12/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 56th Place-On Bayside</td>
<td>3/10/08</td>
<td>3/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 56th Place-On Bayside</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-sew Comb-sew-overflow</td>
<td></td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 56th Place-On Bayside</td>
<td>9/3/08</td>
<td>9/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, 6th Place-On Bayside</td>
<td>11/10/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, Alamitos-Bay shore float</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-sew Comb-sew-overflow</td>
<td></td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, Alamitos-Bay shore float</td>
<td>9/8/08</td>
<td>9/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, Alamitos-Bay shore float</td>
<td>11/10/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Alamitos Bay Beach, Alamitos-Bay shore float</td>
<td>11/24/08</td>
<td>11/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>All LA County Beaches</td>
<td>2/25/08</td>
<td>2/27/08</td>
<td>Preempt-rain Stormwater</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>All LA County Beaches</td>
<td>5/28/08</td>
<td>5/28/08</td>
<td>Preempt-rain Stormwater</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>All LA County Beaches</td>
<td>12/15/08</td>
<td>12/31/08</td>
<td>Preempt-rain Stormwater</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, bet. BBC and TC</td>
<td>5/6/08</td>
<td>5/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, bet. BBC and TC</td>
<td>5/28/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, bet. BBC and TC</td>
<td>7/1/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, bet. BBC and TC</td>
<td>7/15/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, bet. BBC and TC</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, bet. BBC and TC</td>
<td>8/26/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, near Busy B Cafe</td>
<td>7/1/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, near Busy B Cafe</td>
<td>7/15/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, near Busy B Cafe</td>
<td>7/30/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, near Busy B Cafe</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, near Busy B Cafe</td>
<td>9/9/08</td>
<td>10/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, near Busy B Cafe</td>
<td>10/15/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, near Busy B Cafe</td>
<td>10/21/08</td>
<td>10/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, near storm drain</td>
<td>5/6/08</td>
<td>5/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------</td>
<td>-----------------</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, near storm drain</td>
<td>7/8/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, near storm drain</td>
<td>7/22/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, north of GP Pier</td>
<td>1/1/08</td>
<td>2/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, north of GP Pier</td>
<td>5/13/08</td>
<td>5/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, north of GP Pier</td>
<td>5/28/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, north of GP Pier</td>
<td>6/3/08</td>
<td>6/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, north of GP Pier</td>
<td>7/1/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, north of GP Pier</td>
<td>8/5/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, north of GP Pier</td>
<td>8/19/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, north of GP Pier</td>
<td>9/9/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, south of GP Pier</td>
<td>1/1/08</td>
<td>2/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, south of GP Pier</td>
<td>5/13/08</td>
<td>5/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, south of GP Pier</td>
<td>6/3/08</td>
<td>6/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, south of GP Pier</td>
<td>7/8/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, south of GP Pier</td>
<td>8/5/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Avalon Beach, south of GP Pier</td>
<td>9/16/08</td>
<td>10/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Big Rock Beach</td>
<td>1/15/08</td>
<td>1/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Big Rock Beach</td>
<td>2/20/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Big Rock Beach</td>
<td>6/3/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Big Rock Beach</td>
<td>12/9/08</td>
<td>12/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>1/1/08</td>
<td>1/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>1/12/08</td>
<td>1/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>2/11/08</td>
<td>2/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>2/20/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>5/12/08</td>
<td>5/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>5/29/08</td>
<td>6/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>6/5/08</td>
<td>6/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>7/7/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>7/21/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>8/5/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>8/18/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>9/15/08</td>
<td>10/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Cabrillo Beach</td>
<td>10/16/08</td>
<td>10/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>2/11/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>3/18/08</td>
<td>3/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>3/24/08</td>
<td>3/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>3/31/08</td>
<td>4/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>4/14/08</td>
<td>4/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>6/16/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>7/7/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------------------------</td>
<td>--------</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>8/4/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>8/18/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>10/13/08</td>
<td>10/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>11/10/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-Center</td>
<td>12/1/08</td>
<td>12/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>2/11/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>3/18/08</td>
<td>3/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>3/24/08</td>
<td>3/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>3/31/08</td>
<td>4/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>7/7/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>8/4/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>8/18/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>9/3/08</td>
<td>9/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>9/29/08</td>
<td>10/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>10/13/08</td>
<td>10/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>11/1/08</td>
<td>11/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>11/24/08</td>
<td>11/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>12/1/08</td>
<td>12/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Colorado Lagoon-North</td>
<td>12/29/08</td>
<td>12/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach, Ballona Creek</td>
<td>2/15/08</td>
<td>2/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach, Ballona Creek</td>
<td>6/27/08</td>
<td>6/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach, Ballona Creek</td>
<td>7/7/08</td>
<td>7/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach, Ballona Creek</td>
<td>7/18/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach, Ballona Creek</td>
<td>7/23/08</td>
<td>7/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach, Ballona Creek</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach, Ballona Creek</td>
<td>8/8/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach, Ballona Creek</td>
<td>8/21/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach, Ballona Creek</td>
<td>10/20/08</td>
<td>10/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach, Ballona Creek</td>
<td>12/8/08</td>
<td>12/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Dockweiler State Beach, Culver Blvd</td>
<td>1/1/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>El Segundo Beach</td>
<td>12/23/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Hermosa Beach Pier</td>
<td>10/16/08</td>
<td>10/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Hermosa Beach, 26th Street</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Inner Cabrillo Beach</td>
<td>5/12/08</td>
<td>5/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Inner Cabrillo Beach</td>
<td>7/7/08</td>
<td>7/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Inner Cabrillo Beach</td>
<td>8/4/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Inner Cabrillo Beach</td>
<td>8/21/08</td>
<td>8/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

*Testing the Waters 2009*
<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Los Angeles</td>
<td>Leo Carillo State Beach</td>
<td>2/12/08</td>
<td>2/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Leo Carillo State Beach</td>
<td>10/15/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 10th Place-Beach</td>
<td>3/10/08</td>
<td>3/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 10th Place-Beach</td>
<td>5/5/08</td>
<td>5/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 10th Place-Beach</td>
<td>6/2/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 10th Place-Beach</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 10th Place-Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 10th Place-Beach</td>
<td>6/30/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 10th Place-Beach</td>
<td>7/7/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 10th Place-Beach</td>
<td>8/18/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 10th Place-Beach</td>
<td>8/25/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 10th Place-Beach</td>
<td>9/16/08</td>
<td>9/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 10th Place-Beach</td>
<td>11/10/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 10th Place-Beach</td>
<td>11/24/08</td>
<td>11/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 10th Place-Beach</td>
<td>12/8/08</td>
<td>12/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 10th Place-Beach</td>
<td>12/12/08</td>
<td>12/15/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 16th Place-Beach</td>
<td>3/3/08</td>
<td>3/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 16th Place-Beach</td>
<td>3/24/08</td>
<td>3/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 16th Place-Beach</td>
<td>5/5/08</td>
<td>5/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 16th Place-Beach</td>
<td>6/2/08</td>
<td>6/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 16th Place-Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 16th Place-Beach</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 16th Place-Beach</td>
<td>8/4/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 16th Place-Beach</td>
<td>8/25/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 16th Place-Beach</td>
<td>11/10/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 16th Place-Beach</td>
<td>12/1/08</td>
<td>12/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 16th Place-Beach</td>
<td>12/8/08</td>
<td>12/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 16th Place-Beach</td>
<td>12/12/08</td>
<td>12/15/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 36th Place-Beach</td>
<td>1/15/08</td>
<td>1/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 36th Place-Beach</td>
<td>4/14/08</td>
<td>4/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 36th Place-Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 36th Place-Beach</td>
<td>7/7/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 36th Place-Beach</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 36th Place-Beach</td>
<td>8/18/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 36th Place-Beach</td>
<td>8/25/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 36th Place-Beach</td>
<td>10/20/08</td>
<td>10/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 36th Place-Beach</td>
<td>12/12/08</td>
<td>12/15/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 3rd Place-Beach</td>
<td>2/11/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 3rd Place-Beach</td>
<td>5/5/08</td>
<td>5/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 3rd Place-Beach</td>
<td>6/2/08</td>
<td>6/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 3rd Place-Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>--------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------------------</td>
<td>-------------------</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 3rd Place-Beach</td>
<td>6/23/08</td>
<td>6/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 3rd Place-Beach</td>
<td>7/7/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 3rd Place-Beach</td>
<td>8/18/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 3rd Place-Beach</td>
<td>8/25/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 3rd Place-Beach</td>
<td>11/10/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 3rd Place-Beach</td>
<td>12/8/08</td>
<td>12/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 3rd Place-Beach</td>
<td>12/12/08</td>
<td>12/15/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 54th Place-Beach</td>
<td>3/3/08</td>
<td>3/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 54th Place-Beach</td>
<td>4/7/08</td>
<td>4/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 54th Place-Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 54th Place-Beach</td>
<td>8/12/08</td>
<td>8/16/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 54th Place-Beach</td>
<td>8/18/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 54th Place-Beach</td>
<td>9/8/08</td>
<td>9/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 54th Place-Beach</td>
<td>10/20/08</td>
<td>10/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 54th Place-Beach</td>
<td>12/12/08</td>
<td>12/15/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 55th Place-Beach</td>
<td>4/21/08</td>
<td>4/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 55th Place-Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 55th Place-Beach</td>
<td>8/18/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 55th Place-Beach</td>
<td>12/12/08</td>
<td>12/15/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 5th Place-Beach</td>
<td>5/5/08</td>
<td>5/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 5th Place-Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 5th Place-Beach</td>
<td>6/23/08</td>
<td>6/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 5th Place-Beach</td>
<td>7/7/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 5th Place-Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 5th Place-Beach</td>
<td>8/25/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 5th Place-Beach</td>
<td>12/8/08</td>
<td>12/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 5th Place-Beach</td>
<td>12/12/08</td>
<td>12/15/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 62nd Place-Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 62nd Place-Beach</td>
<td>8/12/08</td>
<td>8/16/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 62nd Place-Beach</td>
<td>11/10/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 62nd Place-Beach</td>
<td>12/8/08</td>
<td>12/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 62nd Place-Beach</td>
<td>12/12/08</td>
<td>12/15/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 72nd Place-Beach</td>
<td>2/11/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 72nd Place-Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 72nd Place-Beach</td>
<td>10/20/08</td>
<td>10/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 72nd Place-Beach</td>
<td>11/10/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 72nd Place-Beach</td>
<td>12/8/08</td>
<td>12/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, 72nd Place-Beach</td>
<td>12/12/08</td>
<td>12/15/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, B-69</td>
<td>6/23/08</td>
<td>6/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, B-69</td>
<td>11/10/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>----------</td>
<td>-------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------------------</td>
<td>----------------------</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, B-69</td>
<td>11/17/08</td>
<td>11/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Coronado Ave-Beach</td>
<td>1/15/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Coronado Ave-Beach</td>
<td>2/11/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Coronado Ave-Beach</td>
<td>4/14/08</td>
<td>4/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Coronado Ave-Beach</td>
<td>5/5/08</td>
<td>5/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Coronado Ave-Beach</td>
<td>6/2/08</td>
<td>6/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Coronado Ave-Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Coronado Ave-Beach</td>
<td>11/10/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, East side of Belmont Pier</td>
<td>1/15/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, East side of Belmont Pier</td>
<td>2/11/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, East side of Belmont Pier</td>
<td>4/7/08</td>
<td>4/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, East side of Belmont Pier</td>
<td>6/2/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, East side of Belmont Pier</td>
<td>7/7/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, East side of Belmont Pier</td>
<td>11/24/08</td>
<td>11/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, East side of Belmont Pier</td>
<td>12/12/08</td>
<td>12/15/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Granada Ave-Beach</td>
<td>6/2/08</td>
<td>6/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Granada Ave-Beach</td>
<td>6/16/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Granada Ave-Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Granada Ave-Beach</td>
<td>9/3/08</td>
<td>9/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Granada Ave-Beach</td>
<td>9/8/08</td>
<td>9/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Granada Ave-Beach</td>
<td>9/16/08</td>
<td>9/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Granada Ave-Beach</td>
<td>12/12/08</td>
<td>12/15/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Molino Ave-Beach</td>
<td>2/11/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Molino Ave-Beach</td>
<td>3/2/08</td>
<td>6/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Molino Ave-Beach</td>
<td>3/3/08</td>
<td>3/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Molino Ave-Beach</td>
<td>4/14/08</td>
<td>4/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Molino Ave-Beach</td>
<td>5/5/08</td>
<td>5/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Molino Ave-Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Molino Ave-Beach</td>
<td>7/7/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Molino Ave-Beach</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Molino Ave-Beach</td>
<td>8/4/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Molino Ave-Beach</td>
<td>8/25/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Molino Ave-Beach</td>
<td>11/24/08</td>
<td>11/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Molino Ave-Beach</td>
<td>12/1/08</td>
<td>12/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Molino Ave-Beach</td>
<td>12/12/08</td>
<td>12/15/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Molino Ave-Beach</td>
<td>12/29/08</td>
<td>12/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Prospect Ave-Beach</td>
<td>6/16/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Prospect Ave-Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Prospect Ave-Beach</td>
<td>8/18/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Prospect Ave-Beach</td>
<td>9/3/08</td>
<td>9/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, Prospect Ave-Beach</td>
<td>9/16/08</td>
<td>9/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>--------</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, West side of Belmont Pier</td>
<td>1/15/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, West side of Belmont Pier</td>
<td>4/7/08</td>
<td>4/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, West side of Belmont Pier</td>
<td>6/2/08</td>
<td>6/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, West side of Belmont Pier</td>
<td>6/16/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, West side of Belmont Pier</td>
<td>7/7/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, West side of Belmont Pier</td>
<td>8/4/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, West side of Belmont Pier</td>
<td>8/18/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Long Beach, West side of Belmont Pier</td>
<td>10/20/08</td>
<td>10/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Latigo Shore Dr.</td>
<td>5/13/08</td>
<td>5/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Latigo Shore Dr.</td>
<td>10/15/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Latigo Shore Dr.</td>
<td>12/9/08</td>
<td>12/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Latigo Shore Dr.</td>
<td>12/23/08</td>
<td>12/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Malibu Colony Dr.</td>
<td>1/3/08</td>
<td>1/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Malibu Colony Dr.</td>
<td>12/9/08</td>
<td>12/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Malibu Colony Dr.</td>
<td>12/23/08</td>
<td>12/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Malibu Pier</td>
<td>1/1/08</td>
<td>1/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Malibu Pier</td>
<td>2/20/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Malibu Pier</td>
<td>6/24/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Malibu Pier</td>
<td>7/1/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Malibu Pier</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Malibu Pier</td>
<td>12/9/08</td>
<td>12/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Malibu Pier</td>
<td>12/23/08</td>
<td>12/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Paradise Cove</td>
<td>2/12/08</td>
<td>2/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Paradise Cove</td>
<td>2/20/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Paradise Cove</td>
<td>5/13/08</td>
<td>5/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Paradise Cove</td>
<td>6/3/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Paradise Cove</td>
<td>7/8/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Paradise Cove</td>
<td>10/15/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Malibu Beach, Paradise Cove</td>
<td>12/23/08</td>
<td>12/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Manhattan Beach, 27th Street extended</td>
<td>1/1/08</td>
<td>1/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Manhattan Beach, 27th Street extended</td>
<td>1/17/08</td>
<td>1/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Manhattan Beach, 27th Street extended</td>
<td>2/19/08</td>
<td>2/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Manhattan Beach, 27th Street extended</td>
<td>2/21/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Manhattan Beach, 27th Street extended</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Marina Del Rey Beach</td>
<td>1/2/08</td>
<td>1/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Marina Del Rey Beach</td>
<td>2/11/08</td>
<td>2/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Marina Del Rey Beach</td>
<td>2/19/08</td>
<td>2/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Marina Del Rey Beach</td>
<td>2/21/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------------------</td>
<td>---------------</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Marina Del Rey Beach</td>
<td>5/8/08</td>
<td>5/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Marina Del Rey Beach</td>
<td>5/15/08</td>
<td>5/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Marina Del Rey Beach</td>
<td>10/9/08</td>
<td>10/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Marina Del Rey Beach</td>
<td>10/14/08</td>
<td>10/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach</td>
<td>12/11/08</td>
<td>12/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach</td>
<td>2/1/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach</td>
<td>3/24/08</td>
<td>3/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach</td>
<td>4/1/08</td>
<td>4/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach</td>
<td>5/27/08</td>
<td>5/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach</td>
<td>7/7/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach</td>
<td>8/4/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach</td>
<td>9/22/08</td>
<td>9/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach</td>
<td>10/6/08</td>
<td>10/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach</td>
<td>10/13/08</td>
<td>10/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach</td>
<td>11/10/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Mothers’ Beach, near Busy B Cafe</td>
<td>10/16/08</td>
<td>10/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Puerco Beach</td>
<td>1/15/08</td>
<td>2/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Puerco Beach</td>
<td>2/20/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Puerco Beach</td>
<td>5/28/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Puerco Beach</td>
<td>12/23/08</td>
<td>12/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Herondo Street</td>
<td>2/8/08</td>
<td>2/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Herondo Street</td>
<td>2/19/08</td>
<td>2/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Herondo Street</td>
<td>2/21/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Herondo Street</td>
<td>7/15/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Herondo Street</td>
<td>12/10/08</td>
<td>12/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Herondo Street</td>
<td>12/23/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Redondo Pier</td>
<td>1/2/08</td>
<td>1/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Redondo Pier</td>
<td>1/14/08</td>
<td>1/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Redondo Pier</td>
<td>2/8/08</td>
<td>2/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Redondo Pier</td>
<td>2/19/08</td>
<td>2/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Redondo Pier</td>
<td>2/21/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Redondo Pier</td>
<td>6/23/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Redondo Pier</td>
<td>6/30/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Redondo Pier</td>
<td>7/7/08</td>
<td>7/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Redondo Pier</td>
<td>7/21/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Redondo Pier</td>
<td>10/9/08</td>
<td>10/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Redondo Pier</td>
<td>10/20/08</td>
<td>10/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Redondo Pier</td>
<td>10/24/08</td>
<td>10/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Redondo Pier</td>
<td>12/4/08</td>
<td>12/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------------</td>
<td>--------</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Topaz Street</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Redondo Beach, Topaz Street</td>
<td>12/10/08</td>
<td>12/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Royal Palms Beach, White Point</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Ashland</td>
<td>2/21/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Montana Ave.</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Montana Ave.</td>
<td>10/15/08</td>
<td>10/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Montana Ave.</td>
<td>12/23/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Pico Kender storm drain</td>
<td>2/21/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Pico Kender storm drain</td>
<td>5/8/08</td>
<td>5/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Pico Kender storm drain</td>
<td>8/21/08</td>
<td>8/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Canyon</td>
<td>12/10/08</td>
<td>12/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Canyon</td>
<td>1/14/08</td>
<td>1/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Canyon</td>
<td>1/14/08</td>
<td>2/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Canyon</td>
<td>2/11/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Canyon</td>
<td>3/12/08</td>
<td>3/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Canyon</td>
<td>8/29/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Canyon</td>
<td>12/4/08</td>
<td>12/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Pier</td>
<td>2/11/08</td>
<td>2/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Pier</td>
<td>5/1/08</td>
<td>5/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Pier</td>
<td>5/15/08</td>
<td>5/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Pier</td>
<td>6/5/08</td>
<td>6/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Pier</td>
<td>6/23/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Pier</td>
<td>6/26/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Pier</td>
<td>6/30/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Pier</td>
<td>7/7/08</td>
<td>7/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Pier</td>
<td>7/16/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>--------</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Pier</td>
<td>8/4/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Pier</td>
<td>8/8/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Pier</td>
<td>8/21/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Pier</td>
<td>8/29/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Santa Monica Pier</td>
<td>12/10/08</td>
<td>12/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Strand Street</td>
<td>7/15/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Strand Street</td>
<td>10/15/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Wilshire Blvd.</td>
<td>5/20/08</td>
<td>5/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Wilshire Blvd.</td>
<td>6/3/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Wilshire Blvd.</td>
<td>7/15/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Wilshire Blvd.</td>
<td>8/5/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Wilshire Blvd.</td>
<td>8/12/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Wilshire Blvd.</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Wilshire Blvd.</td>
<td>10/15/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Santa Monica State Beach, Wilshire Blvd.</td>
<td>12/23/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Surfrider Beach</td>
<td>1/2/08</td>
<td>1/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Surfrider Beach</td>
<td>2/11/08</td>
<td>2/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Surfrider Beach</td>
<td>2/19/08</td>
<td>2/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Surfrider Beach</td>
<td>2/21/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Surfrider Beach</td>
<td>6/2/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Surfrider Beach</td>
<td>6/23/08</td>
<td>6/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Surfrider Beach</td>
<td>7/18/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Surfrider Beach</td>
<td>8/25/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Surfrider Beach</td>
<td>10/16/08</td>
<td>10/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Surfrider Beach</td>
<td>12/8/08</td>
<td>12/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Topanga State Beach</td>
<td>2/8/08</td>
<td>2/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Topanga State Beach</td>
<td>5/8/08</td>
<td>5/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Topanga State Beach</td>
<td>5/15/08</td>
<td>5/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Topanga State Beach</td>
<td>5/29/08</td>
<td>5/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Topanga State Beach</td>
<td>6/2/08</td>
<td>6/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Topanga State Beach</td>
<td>8/8/08</td>
<td>8/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>-----------</td>
<td>-------------</td>
<td>--------------</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach, Brooks Ave.</td>
<td>2/20/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach, Brooks Ave.</td>
<td>10/15/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach, Brooks Ave.</td>
<td>12/23/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach, Topsail Street</td>
<td>8/5/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach, Topsail Street</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach, Topsail Street</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach, Topsail Street</td>
<td>10/7/08</td>
<td>10/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach, Top Sail Street</td>
<td>12/23/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach, Venice Pier</td>
<td>7/15/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach, Venice Pier</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Venice City Beach, Windward storm drain</td>
<td>12/4/08</td>
<td>12/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Will Rogers State Beach, Bel Air Bay Club</td>
<td>4/29/08</td>
<td>5/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Will Rogers State Beach, Bel Air Bay Club</td>
<td>5/13/08</td>
<td>5/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Will Rogers State Beach, Bel Air Bay Club</td>
<td>6/24/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Will Rogers State Beach, Pulga storm drain</td>
<td>12/4/08</td>
<td>12/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>Will Rogers State Beach, Temescal Canyon sd</td>
<td>12/23/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Marin</td>
<td>Bolinas Beach</td>
<td>8/5/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Marin</td>
<td>Fort Baker, Horseshoe Cove-Northeast</td>
<td>4/17/08</td>
<td>4/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Marin</td>
<td>Fort Baker, Horseshoe Cove-Southwest</td>
<td>10/15/08</td>
<td>10/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Marin</td>
<td>McNears Beach</td>
<td>6/5/08</td>
<td>6/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monterey</td>
<td>All Monterey County Beaches</td>
<td>1/4/08</td>
<td>1/14/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monterey</td>
<td>All Monterey County Beaches</td>
<td>2/20/08</td>
<td>2/28/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monterey</td>
<td>All Monterey County Beaches</td>
<td>4/23/08</td>
<td>4/27/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Orange</td>
<td>All Orange County Beaches</td>
<td>1/4/08</td>
<td>1/10/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Orange</td>
<td>All Orange County Beaches</td>
<td>1/22/08</td>
<td>2/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Orange</td>
<td>All Orange County Beaches</td>
<td>2/3/08</td>
<td>2/6/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Orange</td>
<td>All Orange County Beaches</td>
<td>2/14/08</td>
<td>2/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Orange</td>
<td>All Orange County Beaches</td>
<td>2/21/08</td>
<td>2/27/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Orange</td>
<td>All Orange County Beaches</td>
<td>5/22/08</td>
<td>5/27/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Orange</td>
<td>All Orange County Beaches</td>
<td>11/4/08</td>
<td>11/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Orange</td>
<td>All Orange County Beaches</td>
<td>11/26/08</td>
<td>12/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Orange</td>
<td>All Orange County Beaches</td>
<td>12/15/08</td>
<td>12/28/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Orange</td>
<td>Bolsa Chica State Beach</td>
<td>11/4/08</td>
<td>11/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Bolsa Chica State Beach, Bolsa Chica Reserve</td>
<td>4/2/08</td>
<td>4/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Bolsa Chica State Beach, Bolsa Chica Reserve</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------------------</td>
<td>------------</td>
</tr>
<tr>
<td>Orange</td>
<td>Bolsa Chica State Beach, Bolsa Chica Reserve</td>
<td>11/4/08</td>
<td>11/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Capistrano Bay District, 10000’ South Outfall</td>
<td>10/1/08</td>
<td>10/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Capistrano Bay District, 10000’ South Outfall</td>
<td>11/25/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Capistrano Bay District, 7500’ South Outfall</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Capistrano Beach, 5000’ South Outfall</td>
<td>1/1/08</td>
<td>4/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Capistrano Beach, 5000’ South Outfall</td>
<td>9/9/08</td>
<td>9/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Capistrano Beach, 5000’ South Outfall</td>
<td>9/24/08</td>
<td>11/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Capistrano Beach, 5000’ South Outfall</td>
<td>11/13/08</td>
<td>11/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Capistrano Beach, 5000’ South Outfall</td>
<td>11/25/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Crystal Cove State Park, Pelican Point</td>
<td>7/16/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor, Buoy Line/ Baby Beach</td>
<td>4/11/08</td>
<td>4/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor, Buoy Line/ Baby Beach</td>
<td>5/16/08</td>
<td>5/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor, Fuel Dock</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor, MDP18</td>
<td>6/27/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor, Swim Area/ Baby Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor, Swim Area/ Baby Beach</td>
<td>8/10/08</td>
<td>8/13/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor, Swim Area/ Baby Beach</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor, Swim Area/ Baby Beach</td>
<td>11/21/08</td>
<td>11/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor, West End/ Baby Beach</td>
<td>1/1/08</td>
<td>2/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Dana Point Harbor, West End/ Baby Beach</td>
<td>12/10/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, 3000’ South Outfall</td>
<td>6/25/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, 3000’ South Outfall</td>
<td>8/20/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>1/1/08</td>
<td>4/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>4/8/08</td>
<td>4/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>4/29/08</td>
<td>5/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>5/16/08</td>
<td>5/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>5/17/08</td>
<td>5/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>5/29/08</td>
<td>6/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------</td>
<td>--------------------------------------------</td>
<td>--------------</td>
<td>------------</td>
<td>-------------</td>
<td>--------------</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>6/10/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>6/11/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>6/14/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>6/17/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>7/1/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>7/3/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>7/18/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>11/13/08</td>
<td>11/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Doheny State Beach, Surfzone at Outfall</td>
<td>11/26/08</td>
<td>12/1/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, 17th Street</td>
<td>11/11/08</td>
<td>11/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, 17th Street</td>
<td>11/22/08</td>
<td>11/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, 17th Street</td>
<td>12/2/08</td>
<td>12/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, Beach Hut</td>
<td>5/16/08</td>
<td>5/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, Beach Hut</td>
<td>5/18/08</td>
<td>5/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, Beach Hut</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, Bluffs</td>
<td>1/4/08</td>
<td>1/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, Bluffs</td>
<td>3/6/08</td>
<td>3/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, Bluffs</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, Bluffs</td>
<td>9/16/08</td>
<td>9/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, Bluffs</td>
<td>10/14/08</td>
<td>10/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, Bluffs</td>
<td>10/22/08</td>
<td>10/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, Bluffs</td>
<td>11/13/08</td>
<td>11/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, Bluffs</td>
<td>12/10/08</td>
<td>12/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, Bluffs</td>
<td>12/12/08</td>
<td>12/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington City Beach, Jack’s Snack Bar</td>
<td>12/12/08</td>
<td>12/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour, 11th Street Beach</td>
<td>1/3/08</td>
<td>1/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour, Admiralty Drive</td>
<td>7/10/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour, Anderson Street</td>
<td>5/1/08</td>
<td>5/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour, Clubhouse</td>
<td>1/3/08</td>
<td>1/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour, Clubhouse</td>
<td>1/17/08</td>
<td>1/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------------</td>
<td>------------------</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour, Coral Cay</td>
<td>2/29/08</td>
<td>3/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour, Davenport Beach</td>
<td>6/12/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour, Harbour Channel</td>
<td>4/24/08</td>
<td>5/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour, Harbour Channel</td>
<td>6/19/08</td>
<td>6/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington Harbour, Harbour Channel</td>
<td>8/7/08</td>
<td>8/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, 50' N of Santa Ana River</td>
<td>5/7/08</td>
<td>5/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, 50' N of Santa Ana River</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, 50' N of Santa Ana River</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, 50' N of Santa Ana River</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, 50' N of Santa Ana River</td>
<td>11/28/08</td>
<td>12/1/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Brookhurst Street</td>
<td>6/8/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Brookhurst Street</td>
<td>7/4/08</td>
<td>7/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Brookhurst Street</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Brookhurst Street</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Brookhurst Street</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Brookhurst Street</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Brookhurst Street</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Brookhurst Street</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Brookhurst Street</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Brookhurst Street</td>
<td>8/21/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Brookhurst Street</td>
<td>8/22/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>1/3/08</td>
<td>1/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>3/24/08</td>
<td>3/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>3/25/08</td>
<td>3/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>4/6/08</td>
<td>4/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>----------------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------------</td>
<td>----------------------</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>4/18/08</td>
<td>4/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>6/3/08</td>
<td>6/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>6/6/08</td>
<td>6/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>7/30/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>8/2/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>8/17/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>9/14/08</td>
<td>9/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>10/2/08</td>
<td>10/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>11/11/08</td>
<td>11/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>11/13/08</td>
<td>11/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, Magnolia Street</td>
<td>12/30/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, SCE Plant</td>
<td>3/19/08</td>
<td>3/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, SCE Plant</td>
<td>6/17/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, SCE Plant</td>
<td>6/22/08</td>
<td>6/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, SCE Plant</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, SCE Plant</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, SCE Plant</td>
<td>7/4/08</td>
<td>7/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, SCE Plant</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, SCE Plant</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, SCE Plant</td>
<td>10/28/08</td>
<td>10/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, SCE Plant</td>
<td>12/12/08</td>
<td>12/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Huntington State Beach, SCE Plant</td>
<td>12/14/08</td>
<td>12/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach</td>
<td>10/29/08</td>
<td>11/4/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach, Blue Lagoon</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach, Blue Lagoon</td>
<td>4/17/08</td>
<td>4/18/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach, Bluebird Canyon</td>
<td>4/18/08</td>
<td>4/19/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach, Bluebird Canyon</td>
<td>4/19/08</td>
<td>4/21/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach, Bluebird Canyon</td>
<td>4/21/08</td>
<td>4/22/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach, Bluebird Canyon</td>
<td>4/22/08</td>
<td>4/23/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------</td>
<td>-------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------------</td>
<td>------------</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach, Bluebird Canyon</td>
<td>11/11/08</td>
<td>11/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach, Emerald Bay</td>
<td>7/25/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach, Laguna Hotel</td>
<td>3/6/08</td>
<td>3/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Laguna Beach, Laguna Hotel</td>
<td>11/13/08</td>
<td>11/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Monarch Beach-North</td>
<td>10/16/08</td>
<td>10/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Monarch Beach-North</td>
<td>12/10/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, 10th Street</td>
<td>2/1/08</td>
<td>2/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, 33rd Street</td>
<td>1/1/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, 33rd Street</td>
<td>9/5/08</td>
<td>9/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, 33rd Street</td>
<td>11/25/08</td>
<td>12/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, 43rd Street</td>
<td>7/8/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, 43rd Street</td>
<td>11/13/08</td>
<td>11/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, 43rd Street</td>
<td>12/9/08</td>
<td>12/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Alvarado/Bay Island</td>
<td>1/3/08</td>
<td>1/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Bayshore Beach</td>
<td>2/2/08</td>
<td>2/6/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Bayshore Beach</td>
<td>8/15/08</td>
<td>8/18/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Bayshore Beach</td>
<td>8/19/08</td>
<td>8/22/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Bayshore Beach</td>
<td>1/23/08</td>
<td>1/25/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Bayside Drive Beach</td>
<td>4/8/08</td>
<td>4/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Bayside Drive Beach</td>
<td>4/22/08</td>
<td>4/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Bayside Drive Beach</td>
<td>5/27/08</td>
<td>5/29/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Bayside Drive Beach</td>
<td>12/2/08</td>
<td>12/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Garnet Avenue</td>
<td>7/22/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Grand Canal</td>
<td>6/3/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Lido Yacht Club</td>
<td>1/15/08</td>
<td>1/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Lido Yacht Club</td>
<td>12/9/08</td>
<td>12/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Newport Blvd Bridge</td>
<td>1/1/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Newport Blvd Bridge</td>
<td>8/29/08</td>
<td>9/2/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Newport Dunes East</td>
<td>2/20/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Newport Dunes Middle</td>
<td>12/2/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Northstar Beach</td>
<td>1/15/08</td>
<td>1/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Northstar Beach</td>
<td>4/1/08</td>
<td>4/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Northstar Beach</td>
<td>12/2/08</td>
<td>12/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Onyx Avenue</td>
<td>11/18/08</td>
<td>11/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Onyx Avenue</td>
<td>12/2/08</td>
<td>12/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Promontory Point</td>
<td>1/23/08</td>
<td>1/25/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Promontory Point</td>
<td>8/6/08</td>
<td>8/9/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Rhine Channel</td>
<td>4/15/08</td>
<td>4/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Rhine Channel</td>
<td>11/4/08</td>
<td>11/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>-----------------------------------------------</td>
<td>------------</td>
<td>-----------</td>
<td>--------------</td>
<td>-------------</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Ruby Avenue</td>
<td>2/20/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Bay, Via Genoa</td>
<td>7/29/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach</td>
<td>12/5/08</td>
<td>12/7/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach</td>
<td>12/8/08</td>
<td>12/11/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, 15th/16th Street</td>
<td>7/6/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, 15th/16th Street</td>
<td>7/25/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, 15th/16th Street</td>
<td>11/3/08</td>
<td>11/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, 15th/16th Street</td>
<td>11/11/08</td>
<td>11/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, 15th/16th Street</td>
<td>11/13/08</td>
<td>11/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, 52nd/53rd Street</td>
<td>3/27/08</td>
<td>3/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, Balboa Pier</td>
<td>10/26/08</td>
<td>10/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, Balboa Pier</td>
<td>11/11/08</td>
<td>11/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, Corona Del Mar</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, Corona Del Mar</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, Corona Del Mar</td>
<td>10/31/08</td>
<td>11/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, Corona Del Mar</td>
<td>11/14/08</td>
<td>11/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, Grant Street</td>
<td>2/14/08</td>
<td>2/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, Grant Street</td>
<td>3/6/08</td>
<td>3/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, Grant Street</td>
<td>4/17/08</td>
<td>4/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, Grant Street</td>
<td>7/10/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, Grant Street</td>
<td>11/13/08</td>
<td>11/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, Lancaster/62nd (Newport Slough)</td>
<td>4/24/08</td>
<td>4/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Newport Beach, Lancaster/62nd (Newport Slough)</td>
<td>6/5/08</td>
<td>6/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Poche Beach</td>
<td>5/8/08</td>
<td>5/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Poche Beach</td>
<td>5/13/08</td>
<td>5/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Poche Beach</td>
<td>5/14/08</td>
<td>5/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Poche Beach</td>
<td>5/18/08</td>
<td>5/21/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>Poche Beach</td>
<td>5/28/08</td>
<td>5/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Poche Beach</td>
<td>5/29/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Poche Beach</td>
<td>6/10/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Poche Beach</td>
<td>6/11/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Poche Beach</td>
<td>6/24/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Poche Beach</td>
<td>7/8/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Poche Beach</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Poche Beach</td>
<td>8/30/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Riviera Beach</td>
<td>8/13/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente City Beach, 20000’ South Outfall</td>
<td>1/4/08</td>
<td>1/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente City Beach, 20000’ South Outfall</td>
<td>1/10/08</td>
<td>2/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>----------</td>
<td>------------------------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------------</td>
<td>-----------------------------</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente City Beach, 20000' South Outfall</td>
<td>2/26/08</td>
<td>2/28/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente City Beach, 20000' South Outfall</td>
<td>2/28/08</td>
<td>3/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente City Beach, 20000' South Outfall</td>
<td>7/15/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente City Beach, 20000' South Outfall</td>
<td>7/15/08</td>
<td>7/17/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente City Beach, 20000' South Outfall</td>
<td>9/30/08</td>
<td>10/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente City Beach, 20000' South Outfall</td>
<td>10/15/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente City Beach, 20000' South Outfall</td>
<td>12/3/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente City Beach, 450' North of Pier</td>
<td>1/4/08</td>
<td>1/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>San Clemente State Beach, Avenida Calafia</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Seal Beach Surfside, 100 yds S of pier</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Seal Beach Surfside, 14th Street</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Seal Beach Surfside, 1st Street</td>
<td>5/8/08</td>
<td>5/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>Seal Beach Surfside, 1st Street</td>
<td>10/15/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Orange</td>
<td>South Laguna, Treasure Island Pier</td>
<td>5/20/08</td>
<td>5/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>All San Diego County beaches</td>
<td>1/5/08</td>
<td>1/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>San Diego</td>
<td>All San Diego County beaches</td>
<td>1/24/08</td>
<td>1/30/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>San Diego</td>
<td>All San Diego County beaches</td>
<td>2/3/08</td>
<td>2/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>San Diego</td>
<td>All San Diego County beaches</td>
<td>2/14/08</td>
<td>2/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>San Diego</td>
<td>All San Diego County beaches</td>
<td>2/20/08</td>
<td>2/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>San Diego</td>
<td>All San Diego County beaches</td>
<td>5/24/08</td>
<td>5/27/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>San Diego</td>
<td>All San Diego County beaches</td>
<td>11/26/08</td>
<td>11/30/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>San Diego</td>
<td>All San Diego County beaches</td>
<td>12/12/08</td>
<td>12/15/08</td>
<td>Preempt-rain</td>
<td>RivCrk</td>
</tr>
<tr>
<td>San Diego</td>
<td>All San Diego County beaches</td>
<td>12/21/08</td>
<td>12/24/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>San Diego</td>
<td>All San Diego County beaches</td>
<td>12/25/08</td>
<td>12/28/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>San Diego</td>
<td>Border Field State Park, Monument Rd.</td>
<td>8/27/08</td>
<td>8/29/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Buccaneer Beach, Loma Alta Creek outlet</td>
<td>1/15/08</td>
<td>1/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Buccaneer Beach, Loma Alta Creek outlet</td>
<td>2/2/08</td>
<td>2/5/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Buccaneer Beach, Loma Alta Creek outlet</td>
<td>2/5/08</td>
<td>2/19/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>Buccaneer Beach, Loma Alta Creek outlet</td>
<td>3/1/08</td>
<td>3/6/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>Cardiff State Beach, Cardiff/San Elijo Lagoon</td>
<td>3/4/08</td>
<td>3/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Cardiff State Beach, Cardiff/San Elijo Lagoon</td>
<td>4/21/08</td>
<td>5/4/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------------</td>
<td>-----------------</td>
</tr>
<tr>
<td>San Diego</td>
<td>Cardiff State Beach, Cardiff/San Elijo Lagoon</td>
<td>5/9/08</td>
<td>5/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Cardiff State Beach, Cardiff/San Elijo Lagoon</td>
<td>6/6/08</td>
<td>6/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Cardiff State Beach, Cardiff/ San Elijo Lagoon</td>
<td>8/9/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Carlsbad City Beach</td>
<td>9/8/08</td>
<td>9/12/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>Del Mar City Beach, 14th St</td>
<td>12/13/08</td>
<td>12/29/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Del Mar City Beach, San Deguito Rivermouth</td>
<td>12/17/08</td>
<td>12/26/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Dog Beach, O.B., San Diego River outlet</td>
<td>2/17/08</td>
<td>2/20/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>Dog Beach, O.B., San Diego River outlet</td>
<td>4/17/08</td>
<td>4/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Dog Beach, O.B., San Diego River outlet</td>
<td>5/8/08</td>
<td>5/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Dog Beach, O.B., San Diego River outlet</td>
<td>5/20/08</td>
<td>5/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Dog Beach, O.B., San Diego River outlet</td>
<td>7/22/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Dog Beach, O.B., San Diego River outlet</td>
<td>7/31/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Dog Beach, O.B., San Diego River outlet</td>
<td>8/21/08</td>
<td>8/24/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>Dog Beach, O.B., San Diego River outlet</td>
<td>9/4/08</td>
<td>9/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Dog Beach, O.B., San Diego River outlet</td>
<td>9/25/08</td>
<td>9/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Harbor Beach, San Luis Rey River outlet</td>
<td>1/15/08</td>
<td>4/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Harbor Beach, San Luis Rey River outlet</td>
<td>5/27/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>Harbor Beach, San Luis Rey River outlet</td>
<td>6/17/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Harbor Beach, San Luis Rey River outlet</td>
<td>6/26/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>Harbor Beach, San Luis Rey River outlet</td>
<td>10/1/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>Imperial Beach pier area</td>
<td>5/11/08</td>
<td>5/15/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Imperial Beach pier area</td>
<td>6/22/08</td>
<td>6/24/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Imperial Beach pier area</td>
<td>8/7/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>La Jolla Cove</td>
<td>8/5/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>La Jolla Cove</td>
<td>9/10/08</td>
<td>9/11/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>La Jolla Shores Beach, El Paseo Grande</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>La Jolla/ Bird Rock S.D.</td>
<td>6/5/08</td>
<td>6/7/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay Tecolote Shores</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, De Anza Cove</td>
<td>8/27/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------------</td>
<td>--------------</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Fiesta Island NW shore</td>
<td>9/17/08</td>
<td>9/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Leisure Lagoon</td>
<td>4/16/08</td>
<td>4/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Mariners Basin, Bonita Cove eastern shore</td>
<td>7/6/08</td>
<td>7/7/08</td>
<td>Preempt-other</td>
<td>Fuel diesel</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Mariners Basin, Bonita Cove eastern shore</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Mariners Basin, Bonita Cove eastern shore</td>
<td>8/27/08</td>
<td>9/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Mariners Basin, Bonita Cove eastern shore</td>
<td>9/17/08</td>
<td>9/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Sail Bay, Santa Clara Cove, S end</td>
<td>1/16/08</td>
<td>1/22/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Vacation Isle, North Cove</td>
<td>5/7/08</td>
<td>5/9/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Vacation Isle, North Cove</td>
<td>5/28/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Vacation Isle, North Cove</td>
<td>7/30/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Mission Bay, Visitor's Center</td>
<td>8/16/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Moonlight Beach, Cottonwood Creek outlet</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Moonlight Beach, Cottonwood Creek outlet</td>
<td>9/3/08</td>
<td>9/5/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>Moonlight Beach, Cottonwood Creek outlet</td>
<td>9/19/08</td>
<td>9/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>North Imperial Beach, Carnation Ave.</td>
<td>1/5/08</td>
<td>1/10/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>North Imperial Beach, Carnation Ave.</td>
<td>1/12/08</td>
<td>1/31/08</td>
<td>Preempt-sew</td>
<td>RivCrk</td>
</tr>
<tr>
<td>San Diego</td>
<td>North Imperial Beach, Carnation Ave.</td>
<td>2/3/08</td>
<td>2/7/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>North Imperial Beach, Carnation Ave.</td>
<td>2/12/08</td>
<td>2/18/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>North Imperial Beach, Carnation Ave.</td>
<td>2/20/08</td>
<td>2/26/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>North Imperial Beach, Carnation Ave.</td>
<td>2/28/08</td>
<td>3/1/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>North Imperial Beach, Carnation Ave.</td>
<td>3/4/08</td>
<td>3/7/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>North Imperial Beach, Carnation Ave.</td>
<td>3/17/08</td>
<td>3/18/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>North Imperial Beach, Carnation Ave.</td>
<td>5/24/08</td>
<td>5/26/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>North Imperial Beach, Carnation Ave.</td>
<td>6/12/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>North Imperial Beach, Carnation Ave.</td>
<td>6/19/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>North Imperial Beach, Carnation Ave.</td>
<td>8/22/08</td>
<td>8/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>North Imperial Beach, Carnation Ave.</td>
<td>11/26/08</td>
<td>12/5/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Ocean Beach, O.B. pier @ Narrangaset</td>
<td>8/21/08</td>
<td>8/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Ocean Beach, San Diego River-Dgo Beach</td>
<td>12/26/08</td>
<td>12/31/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay Chula Vista</td>
<td>6/5/08</td>
<td>6/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay Coronado Cays, Tidelands Park</td>
<td>4/18/08</td>
<td>4/19/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay Coronado Cays, Tidelands Park</td>
<td>4/24/08</td>
<td>4/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay Glorietta Bay</td>
<td>1/18/08</td>
<td>1/22/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------------</td>
<td>--------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------------</td>
<td>------------</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay Glorietta Bay</td>
<td>8/29/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay Shelter Is, Bessemer St.</td>
<td>7/3/08</td>
<td>7/7/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay Shelter Is, Lawrence St. outlet</td>
<td>4/17/08</td>
<td>4/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay Shelter Is, Lawrence St. outlet</td>
<td>7/30/08</td>
<td>8/1/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay Shelter Is, shoreline park</td>
<td>6/5/08</td>
<td>6/8/08</td>
<td>Bacteria</td>
<td>Wrack line</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay, Spanish Landing</td>
<td>6/3/08</td>
<td>6/8/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay, Spanish Landing</td>
<td>6/12/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Diego Bay, Spanish Landing</td>
<td>7/31/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Dieguito River Beach Del Mar</td>
<td>4/25/08</td>
<td>5/2/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Dieguito River Beach Del Mar</td>
<td>5/6/08</td>
<td>5/11/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Dieguito River Beach Del Mar</td>
<td>7/19/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Dieguito River Beach Del Mar</td>
<td>8/27/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>San Dieguito River Beach Del Mar</td>
<td>10/30/08</td>
<td>11/1/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Silver Strand State Beach</td>
<td>1/5/08</td>
<td>1/10/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Silver Strand State Beach</td>
<td>1/24/08</td>
<td>1/30/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Silver Strand State Beach</td>
<td>2/22/08</td>
<td>2/26/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Silver Strand State Beach</td>
<td>5/24/08</td>
<td>5/25/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>South Carlsbad State Beach, Batiquitos Lagoon outlet</td>
<td>5/21/08</td>
<td>5/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>South Carlsbad State Beach, Palomar Airport</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>South Casa Beach S.D.</td>
<td>11/27/08</td>
<td>12/31/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Tijuana Slough National Wildlife Refuge</td>
<td>5/24/08</td>
<td>5/28/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Tijuana Slough National Wildlife Refuge</td>
<td>7/9/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Tijuana Slough National Wildlife Refuge</td>
<td>9/3/08</td>
<td>9/6/08</td>
<td>Preempt-sew</td>
<td>Sewage</td>
</tr>
<tr>
<td>San Diego</td>
<td>Torrey Pines State Beach, Los Peñasquitos Lagoon</td>
<td>4/30/08</td>
<td>5/11/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>Tourmaline Surfing Park, inside cove at P.B. Point</td>
<td>6/3/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Tourmaline Surfing Park, inside cove at P.B. Point</td>
<td>7/2/08</td>
<td>7/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Diego</td>
<td>Tourmaline Surfing Park, inside cove at P.B. Point</td>
<td>9/16/08</td>
<td>9/18/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>Whispering Sands/ Nicholson Pt.</td>
<td>8/26/08</td>
<td>8/30/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Diego</td>
<td>WindanSea Beach, Bonair</td>
<td>8/26/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Dry weather runoff</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Aquatic Park</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Lobos Creek at Lower Parking Lot</td>
<td>5/29/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Lobos Creek at Lower Parking Lot</td>
<td>7/30/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Lobos Creek at Lower Parking Lot</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------------</td>
<td>----------------</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Lobos Creek at Lower Parking Lot</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Lobos Creek at Lower Parking Lot</td>
<td>8/21/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Lobos Creek at Lower Parking Lot</td>
<td>8/22/08</td>
<td>8/23/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Lobos Creek at Lower Parking Lot</td>
<td>8/27/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Lobos Creek at Lower Parking Lot</td>
<td>10/2/08</td>
<td>10/5/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Upper Parking Lot</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Upper Parking Lot</td>
<td>10/2/08</td>
<td>10/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Upper Parking Lot</td>
<td>10/16/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Baker Beach, Upper Parking Lot</td>
<td>10/30/08</td>
<td>10/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Candlestick Point, Sunnydale Cove</td>
<td>2/20/08</td>
<td>2/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Candlestick Point, Sunnydale Cove</td>
<td>3/13/08</td>
<td>3/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Candlestick Point, Sunnydale Cove</td>
<td>3/27/08</td>
<td>4/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Candlestick Point, Sunnydale Cove</td>
<td>5/22/08</td>
<td>5/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Candlestick Point, Sunnydale Cove</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Candlestick Point, Windsurfer Circle</td>
<td>2/20/08</td>
<td>2/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Candlestick Point, Windsurfer Circle</td>
<td>3/5/08</td>
<td>3/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Candlestick Point, Windsurfer Circle</td>
<td>3/13/08</td>
<td>3/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Candlestick Point, Windsurfer Circle</td>
<td>5/22/08</td>
<td>5/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Crissy Field, New Beach</td>
<td>4/2/08</td>
<td>4/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Crissy Field, New Beach</td>
<td>10/15/08</td>
<td>10/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Fort Funston</td>
<td>1/4/08</td>
<td>1/6/08</td>
<td>Preempt-rain</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Fort Funston</td>
<td>1/25/08</td>
<td>1/26/08</td>
<td>Preempt-rain</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach at Balboa St.</td>
<td>1/4/08</td>
<td>1/7/08</td>
<td>Preempt-rain</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach at Balboa St.</td>
<td>1/25/08</td>
<td>1/28/08</td>
<td>Preempt-rain</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach at Lincoln Ave.</td>
<td>1/4/08</td>
<td>1/8/08</td>
<td>Preempt-rain</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach at Lincoln Ave.</td>
<td>1/25/08</td>
<td>1/27/08</td>
<td>Preempt-rain</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach at Pacheco St.</td>
<td>1/4/08</td>
<td>1/7/08</td>
<td>Preempt-rain</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach at Pacheco St.</td>
<td>1/25/08</td>
<td>1/27/08</td>
<td>Preempt-rain</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach at Sloat Blvd.</td>
<td>1/4/08</td>
<td>1/7/08</td>
<td>Preempt-rain</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach at Sloat Blvd.</td>
<td>1/25/08</td>
<td>1/27/08</td>
<td>Preempt-rain</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach at Vicente St.</td>
<td>1/4/08</td>
<td>1/7/08</td>
<td>Preempt-rain</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>San Francisco</td>
<td>Ocean Beach at Vicente St.</td>
<td>1/25/08</td>
<td>1/27/08</td>
<td>Preempt-rain</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Avila Beach</td>
<td>1/8/08</td>
<td>1/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Avila Beach</td>
<td>10/15/08</td>
<td>10/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Avila Beach</td>
<td>12/16/08</td>
<td>12/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Avila Beach</td>
<td>12/30/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Cayucos Beach</td>
<td>5/13/08</td>
<td>5/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Montana De Oro</td>
<td>9/30/08</td>
<td>10/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-------------------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>-----------</td>
<td>-------------------</td>
<td>-----------</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Olde Port Beach</td>
<td>10/28/08</td>
<td>10/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Olde Port Beach</td>
<td>11/18/08</td>
<td>11/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Pismo State Beach</td>
<td>4/22/08</td>
<td>4/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Pismo State Beach</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>Pismo State Beach</td>
<td>9/23/08</td>
<td>9/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Luis Obispo</td>
<td>San Simeon Beach</td>
<td>12/23/08</td>
<td>12/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Aquatic Park</td>
<td>1/10/08</td>
<td>1/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Aquatic Park</td>
<td>1/25/08</td>
<td>2/13/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Aquatic Park</td>
<td>2/13/08</td>
<td>3/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Aquatic Park</td>
<td>4/2/08</td>
<td>5/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Aquatic Park</td>
<td>12/24/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Coyote Point County Park</td>
<td>1/24/08</td>
<td>1/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Dunes State Beach</td>
<td>1/30/08</td>
<td>2/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Fitzgerald Marine (Moss Beach)</td>
<td>1/30/08</td>
<td>2/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Fitzgerald Marine (Moss Beach)</td>
<td>11/6/08</td>
<td>11/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Gazos Creek Access</td>
<td>6/11/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Gazos Creek Access</td>
<td>7/10/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Kiteboard Beach</td>
<td>6/3/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Kiteboard Beach</td>
<td>6/18/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Lakeshore Park Rec Center</td>
<td>1/10/08</td>
<td>1/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Lakeshore Park Rec Center</td>
<td>1/25/08</td>
<td>2/13/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Lakeshore Park Rec Center</td>
<td>2/21/08</td>
<td>3/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Lakeshore Park Rec Center</td>
<td>4/2/08</td>
<td>5/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Lakeshore Park Rec Center</td>
<td>6/11/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Lakeshore Park Rec Center</td>
<td>6/25/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Lakeshore Park Rec Center</td>
<td>9/11/08</td>
<td>9/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Lakeshore Park Rec Center</td>
<td>12/24/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Oyster Point Marina</td>
<td>1/17/08</td>
<td>2/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Oyster Point Marina</td>
<td>7/30/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pacifica State Beach, Linda Mar Beach #5</td>
<td>1/3/08</td>
<td>1/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pacifica State Beach, Linda Mar Beach #5</td>
<td>1/25/08</td>
<td>1/30/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pacifica State Beach, Linda Mar Beach #5</td>
<td>1/30/08</td>
<td>2/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pacifica State Beach, Linda Mar Beach #5</td>
<td>10/17/08</td>
<td>10/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pacifica State Beach, Linda Mar Beach #5</td>
<td>11/6/08</td>
<td>11/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point, Pillar Point #7</td>
<td>1/30/08</td>
<td>2/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point, Pillar Point #7</td>
<td>2/13/08</td>
<td>3/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------</td>
<td>--------------</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point, Pillar Point #7</td>
<td>4/9/08</td>
<td>4/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point, Pillar Point #7</td>
<td>4/23/08</td>
<td>4/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point, Pillar Point #7</td>
<td>6/3/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point, Pillar Point #7</td>
<td>8/7/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point, Pillar Point #7</td>
<td>9/4/08</td>
<td>9/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point, Pillar Point #7</td>
<td>12/17/08</td>
<td>12/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point, Pillar Point #8</td>
<td>1/8/08</td>
<td>1/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point, Pillar Point #8</td>
<td>1/30/08</td>
<td>2/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point, Pillar Point #8</td>
<td>2/13/08</td>
<td>2/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Pillar Point, Pillar Point #8</td>
<td>2/27/08</td>
<td>3/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Roosevelt State Beach</td>
<td>1/30/08</td>
<td>2/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Roosevelt State Beach</td>
<td>2/27/08</td>
<td>3/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Surfers Beach</td>
<td>1/8/08</td>
<td>1/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Venice State Beach</td>
<td>1/3/08</td>
<td>1/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Venice State Beach</td>
<td>1/30/08</td>
<td>2/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Venice State Beach</td>
<td>2/21/08</td>
<td>3/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Mateo</td>
<td>Venice State Beach</td>
<td>10/17/08</td>
<td>10/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Arroyo Burro</td>
<td>1/9/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Arroyo Burro</td>
<td>2/27/08</td>
<td>2/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Arroyo Burro</td>
<td>4/16/08</td>
<td>4/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Arroyo Burro</td>
<td>6/25/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Arroyo Burro</td>
<td>7/16/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Arroyo Burro</td>
<td>7/23/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Arroyo Burro</td>
<td>8/8/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Arroyo Burro</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Arroyo Burro</td>
<td>9/10/08</td>
<td>9/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Arroyo Burro</td>
<td>10/1/08</td>
<td>10/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Butterfly Beach</td>
<td>1/9/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Carpinteria City</td>
<td>1/9/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Carpinteria State</td>
<td>1/9/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Carpinteria State</td>
<td>2/5/08</td>
<td>2/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>East Beach- Mission Creek</td>
<td>2/13/08</td>
<td>2/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>East Beach- Mission Creek</td>
<td>4/9/08</td>
<td>4/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>East Beach- Mission Creek</td>
<td>7/9/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>East Beach- Mission Creek</td>
<td>10/8/08</td>
<td>10/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>East Beach Sycamore Creek</td>
<td>1/9/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------------</td>
<td>-----------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------</td>
<td>-----------</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>East Beach Sycamore Creek</td>
<td>1/25/08</td>
<td>2/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>El Capitan State Beach</td>
<td>6/25/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Gaviota State Beach</td>
<td>1/9/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Gaviota State Beach</td>
<td>7/30/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Goleta Beach</td>
<td>1/9/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Goleta Beach</td>
<td>2/5/08</td>
<td>2/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Goleta Beach</td>
<td>2/13/08</td>
<td>2/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Goleta Beach</td>
<td>6/25/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Goleta Beach</td>
<td>7/9/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Goleta Beach</td>
<td>7/16/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Goleta Beach</td>
<td>8/20/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Guadalupe Dunes Beach</td>
<td>1/10/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Guadalupe Dunes Beach</td>
<td>2/5/08</td>
<td>2/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Guadalupe Dunes Beach</td>
<td>7/16/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Guadalupe Dunes Beach</td>
<td>8/21/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Hammonds</td>
<td>1/9/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Haskell’s Beach</td>
<td>6/25/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Hope Ranch Beach</td>
<td>1/9/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Hope Ranch Beach</td>
<td>2/27/08</td>
<td>2/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Jalama Beach</td>
<td>1/10/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Jalama Beach</td>
<td>1/24/08</td>
<td>1/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Leadbetter</td>
<td>2/27/08</td>
<td>2/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Leadbetter</td>
<td>6/25/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Leadbetter</td>
<td>8/6/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Leadbetter</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Leadbetter</td>
<td>9/4/08</td>
<td>9/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Ocean/Surf Beach</td>
<td>1/10/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Refugio State Beach</td>
<td>1/9/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Refugio State Beach</td>
<td>1/29/08</td>
<td>2/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Rincon Beach at Bates Beach</td>
<td>2/27/08</td>
<td>2/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Sands Beach at Coal Oil Point</td>
<td>1/9/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Sands Beach at Coal Oil Point</td>
<td>1/29/08</td>
<td>2/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Summerland Beach</td>
<td>1/24/08</td>
<td>1/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Summerland Beach</td>
<td>1/31/08</td>
<td>2/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Barbara</td>
<td>Summerland Beach</td>
<td>10/8/08</td>
<td>10/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Capitola Beach east of Jetty</td>
<td>4/2/08</td>
<td>4/8/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Capitola Beach east of Jetty</td>
<td>9/10/08</td>
<td>9/11/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Capitola Beach east of Jetty</td>
<td>9/30/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Capitola Beach east of Jetty</td>
<td>10/16/08</td>
<td>10/21/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Cowell Beach West of the Wharf</td>
<td>5/7/08</td>
<td>5/14/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Cowell Beach West of the Wharf</td>
<td>6/25/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-------------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------</td>
<td>------------</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Cowell Beach West of the Wharf</td>
<td>7/10/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Cowell Beach West of the Wharf</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Cowell Beach West of the Wharf</td>
<td>8/12/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Cowell Beach West of the Wharf</td>
<td>9/4/08</td>
<td>9/5/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Cowell Beach West of the Wharf</td>
<td>10/8/08</td>
<td>10/9/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Cowell Beach West of the Wharf</td>
<td>10/17/08</td>
<td>10/22/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Main Beach at Boardwalk</td>
<td>5/13/08</td>
<td>5/14/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Main Beach at Boardwalk</td>
<td>7/10/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Main Beach at Boardwalk</td>
<td>8/12/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Main Beach at San Lorenzo River</td>
<td>10/8/08</td>
<td>10/9/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>New Brighton State Beach</td>
<td>6/25/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Rio del Mar Beach, Aptos Creek Mouth</td>
<td>6/25/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Santa Cruz</td>
<td>Seabright Beach</td>
<td>10/8/08</td>
<td>10/9/08</td>
<td>Bacteria</td>
<td>RivCrk</td>
</tr>
<tr>
<td>Sonoma</td>
<td>Campbell Cove State Beach</td>
<td>5/7/08</td>
<td>5/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Sonoma</td>
<td>Campbell Cove State Beach</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Sonoma</td>
<td>Campbell Cove State Beach</td>
<td>7/9/08</td>
<td>7/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Sonoma</td>
<td>Campbell Cove State Beach</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Sonoma</td>
<td>Campbell Cove State Beach</td>
<td>9/4/08</td>
<td>9/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Sonoma</td>
<td>Campbell Cove State Beach</td>
<td>9/24/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Sonoma</td>
<td>Still Water Cove Regional Park</td>
<td>11/19/08</td>
<td>11/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Emma Woods State Beach</td>
<td>1/8/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Emma Woods State Beach</td>
<td>1/29/08</td>
<td>2/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Hobie Beach</td>
<td>4/9/08</td>
<td>4/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Hollywood Beach-La Crescen.</td>
<td>1/8/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Hollywood Beach-La Crescen.</td>
<td>1/29/08</td>
<td>2/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Kiddie Beach</td>
<td>1/8/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Kiddie Beach</td>
<td>1/29/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Kiddie Beach</td>
<td>2/20/08</td>
<td>2/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Kiddie Beach</td>
<td>3/4/08</td>
<td>3/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Kiddie Beach</td>
<td>3/18/08</td>
<td>3/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Mandos Cove Beach</td>
<td>1/8/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Mandos Cove Beach</td>
<td>1/23/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>McGrath State Beach (#26000)</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>McGrath State Beach (#27000)</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Mussel Shoals Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Oxnard Beach 5th St.</td>
<td>5/28/08</td>
<td>5/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Oxnard Beach Channel Way</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Penninsula Beach, Harbor Cove</td>
<td>1/8/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Penninsula Beach, Harbor Cove</td>
<td>1/29/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Penninsula Beach, Harbor Cove</td>
<td>2/20/08</td>
<td>2/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Port Hueneme Beach Park</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------------</td>
<td>--------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------</td>
<td>------------</td>
</tr>
<tr>
<td>Ventura</td>
<td>Promenade Park Beach Figueroa St.</td>
<td>1/8/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Promenade Park Beach Figueroa St.</td>
<td>1/29/08</td>
<td>2/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Rincon Beach-Creek Mouth</td>
<td>8/19/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Rincon Beach-Flagpole</td>
<td>1/8/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Rincon Beach-Flagpole</td>
<td>1/23/08</td>
<td>2/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Rincon Beach-Flagpole</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Rincon Beach-Flagpole</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Rincon Beach-Flagpole</td>
<td>10/21/08</td>
<td>10/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Rincon Beach-Footpath</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Rincon Beach-Footpath</td>
<td>9/16/08</td>
<td>9/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>San Buenaventura State Beach, Dover Lane</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Seaside Wilderness Park Beach</td>
<td>5/20/08</td>
<td>5/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Seaside Wilderness Park Beach</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Silverstrand Beach</td>
<td>1/29/08</td>
<td>2/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Silverstrand Beach</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Surfers Knoll Beach</td>
<td>10/1/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Surfers Knoll Beach</td>
<td>1/29/08</td>
<td>2/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Surfers Point at Seaside</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Surfers Point at Seaside</td>
<td>1/8/08</td>
<td>1/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Surfers Point at Seaside</td>
<td>1/29/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ventura</td>
<td>Surfers Point at Seaside</td>
<td>6/10/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** Comb-sew-overflow, Combined sewer overflow; Preempt-other, Preemptive due to reasons not listed here; Preempt-rain, Preemptive due to rainfall; Preempt-sew, Preemptive due to sewage discharge or spill; RivCrk, Rivers, creeks, and lagoons opening onto beaches; Sanitary-sew-over, Sanitary sewer overflow.

**Notes**
Connecticut

12th in beachwater quality (4% of samples exceeded national standards)

Connecticut has 66 public beaches stretching along 18 miles of Long Island Sound coastline. All counties with marine coastline (Fairfield, Middlesex, New Haven, and New London) have public beaches.

Beach monitoring efforts in Connecticut are coordinated and guided by the Connecticut Department of Public Health (CT DPH), which administers the state’s BEACH Act grant. The monitoring season stretches from Memorial Day to Labor Day. Nineteen shoreline health departments are responsible for monitoring and notification activities at municipal marine bathing areas, and the Connecticut Department of Environmental Protection (CT DEP) monitors the coastal state park beaches. The State of Connecticut Guidelines for Monitoring Bathing Water and Closure Protocol provides local health departments and the CT DEP with guidance for flexible beach monitoring and closure practices based on EPA standards. The CT DPH keeps track of monitoring data and sampling collection frequency, beach closings, beach advisories, the reasons for these beach events, and known potential sources of pollution.

CT DEP may use beach monitoring data to identify whether or not a waterbody meets water quality standards for recreational contact. If the waterbody is listed as impaired, the CT DEP is required to develop a Total Maximum Daily Load (TMDL) analysis to establish necessary reductions to allow for attainment of water quality standards and criteria.

State guidelines recommend that at the start of each bathing season a sanitary survey be conducted of any watershed that drains to a public bathing area. Also, when a single water sample exceeds the standards, the guidelines recommend a survey be made to determine if raw or partially treated sewage is contributing to the elevated bacterial concentrations.

In early 2009, representatives of US EPA Region 1 met with municipal government and public health representatives for the coastal towns of Norwalk and Stamford to discuss measures that could lead to reductions in beach closings. Beach monitoring and public notification data collected for these locations were a focal point of these discussions.

Connecticut received a $220,500 federal BEACH Act grant in 2008 and was eligible for a $223,000 grant in 2009. Connecticut uses its BEACH Act grant to fund monitoring guidance to coastal municipal officials and to offer sample analysis free of charge at the CT DPH lab in Hartford. Examples of costs not covered by the BEACH Act grant occur when: 1) shoreline towns and municipalities cover the cost for their marine beachwater sample collection and public notification efforts; 2) some shoreline towns choose to contract with municipal or local environmental laboratories for marine water sample analysis, and these costs are covered by those shoreline towns; 3) the cost of full time laboratory personnel required for sample analysis is covered by the state of Connecticut; 4) beach data collection, management and analysis for state park marine beaches are not covered by the U.S. EPA beach grant; 5) revision of the Quality Assurance Project Plan, which is required by the U.S. EPA for beach grant recipient states and territories, is covered by the State of Connecticut; and 6) the costs of oversight, audit and management of beach grant expenses are covered by the state of Connecticut.

Standards

Indicator Organism: Enterococcus

Standards: Local jurisdictions determine how they will apply water quality standards. The State of Connecticut Guidelines for Monitoring Bathing Water and Closure Protocol, developed jointly by the CT DPH and the CT DEP, encourage local health departments and the CT DEP to apply the BEACH Act–required single-sample maximum standard for marine and estuarine beaches for enterococcus of 104 cfu/100 ml when considering whether to close a beach or issue an
Testing the Waters 2009

advisory. The state Guidelines also encourage local health departments and the CT DEP to consider the geometric mean of the last five samples collected in a 30-day period. If this geometric mean is greater than 35 cfu/100 ml, then the state’s guideline is to consider closing the beach. The CT DPH encourages beach managers to take into consideration the range or spread of the sample values that generate geometric mean results greater than 35. Connecticut’s understanding is that the national geometric mean standard is based on epidemiology studies showing that both an exceedance of a geometric mean of 35 cfu/100 ml and a log standard deviation less than 0.7 may result in unacceptable illness rates.3

Local jurisdictions are responsible for determining their own preemptive closing and advisory practices. State guidance allows preemptive beach closings based on rainfall data2 and many municipalities have adopted a preemptive rainfall threshold. State guidance says that preemptive closings may be recommended by local jurisdictions if there is a known waste contamination event such as a sewage bypass, mechanical failure at a sewage treatment plant, or a sewer line break. If the beach is impacted by a mass of floating debris, the beach can be closed for safety reasons.2 In addition, local health departments may post an advisory or closure that responds to local conditions and to protect public health. Local health departments may also post an advisory at a beach or close it if there is a harmful algal bloom.1

Shoreline municipalities are sensitive to reports of swimmer’s itch. Swimmer’s itch, also called cercarial dermatitis, appears as a skin rash caused by an allergic reaction to certain parasites that infect some birds and mammals. These microscopic parasites are released from infected snails into fresh and salt water (such as lakes, ponds, and oceans). While the parasite’s preferred host is the specific bird or mammal, if the parasite comes into contact with a swimmer, it burrows into the skin, causing an allergic reaction and rash. Swimmer’s itch is found throughout the world and is more frequent during summer months. Connecticut beaches have been placed under advisory (sometimes lasting more than a week) when one or more cases of swimmer’s itch are reported.1

<table>
<thead>
<tr>
<th>County</th>
<th>Agency</th>
<th>Preemptive Standard</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fairfield Bridgeport Health Dept.</td>
<td>More than 1 inch of rain in 24 hours</td>
<td></td>
</tr>
<tr>
<td>Fairfield Darien Health Dept.</td>
<td>More than 1 inch of rain in 24 hours</td>
<td></td>
</tr>
<tr>
<td>Fairfield Fairfield Health Dept. Town of Fairfield</td>
<td>1.6 inches rain in 24 hours, closed for 24 hours</td>
<td></td>
</tr>
<tr>
<td>Fairfield Greenwich Dept. of Health</td>
<td>In Byram ≥ 0.5 inch (May–September). In Greenwich Point: “excessive rainfall” May–June; ≥ 1.5 inches July; ≥ 1.0 inch August–September. Islands not affected.</td>
<td></td>
</tr>
<tr>
<td>Fairfield Stamford Health Dept. Laboratory</td>
<td>1 inch in a 24-hour period in normal rain conditions, 0.5 inch in 24-hour period in drought conditions</td>
<td></td>
</tr>
<tr>
<td>Fairfield Stratford Health Dept.</td>
<td>1 to 2 inches in 24 hours, closed for 24 hours; 2 or more inches in 24 hours, closed for 48 hours</td>
<td></td>
</tr>
<tr>
<td>New Haven West Haven Health Dept.</td>
<td>About 1 inch in 24 hours</td>
<td></td>
</tr>
</tbody>
</table>

**Monitoring**

**Determination of Monitoring Locations and Frequency:** In Connecticut, beach tier does not determine sampling frequency.1 The State of Connecticut Guidelines for Monitoring Bathing Water and Closure Protocol recommends that beaches less than 300 feet long have one sampling location located in the middle of the beach, beaches between 300 and 700 feet long have at least 2 sampling locations, and beaches over 700 feet long have at least 3 sampling locations. Beach tiers are assigned at the end of the bathing season based on the sampling frequency reported by local health departments and the CT DEP for their respective beaches and the number of beach closing events for those beaches. Beaches that were sampled weekly and had no more than one closure event during the previous swim season are assigned Tier 1 status, beaches that were sampled weekly and had two or three closure events during the previous swim season are assigned Tier 2 status, and beaches that were not sampled weekly or that had more than three closure events during the previous swim season are assigned Tier 3 status.3 Sampling frequency and monitoring station locations are not necessarily adjusted or changed when a beach’s tier status changes.1
Additional sampling is suggested when there are higher bather loads, at culverts and drainage pipes after rain events, if waterfowl are congregating, or if sanitary survey information indicates potential for non-point contamination after a rain event.2

Practice: The monitoring practices at coastal beaches are the responsibility of the local health authorities (for municipal beaches) and the CT DEP (for state park beaches), who are encouraged to follow state guidelines that samples be taken in water that is 3-4 feet depth at a depth of 12–18 inches.2 Because Connecticut uses laboratory methods approved by the U.S. EPA, sampling results are available no sooner than 24 hours after the sample is delivered to the lab. Samples sent to the CT DPH state laboratory are collected on Mondays with a resample and collection option available on Wednesday. Local health departments that do not use the state laboratory may sample according to a different schedule.1

Results: Although all of Connecticut’s 66 public coastal beaches were reported as monitored at least once a week in 2008, the CT DPH told NRDC that its level of BEACH Act grant funding allowed it to maintain and report laboratory results for only 52 beaches in 2008. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including samples taken outside the official beach season, if any). In 2008, 4 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards.

The beaches with the highest percent exceedance rate in 2008 were Town Beach (Clinton) in Middlesex County (19%), Kiddie’s Beach in New London County (16%), Branford Point Beach in New Haven County (14%), Greenwich Point Beach (13%) and Byram Beach in Fairfield County (12%), Clark Avenue Beach in New Haven County (12%), Sherwood Island State Park Beach (9%) and Short Beach in Fairfield County (9%), West Haven West Beach in New Haven County (9%), and Middle Beach/Stannard Beach in Middlesex County (8%). The 10 beaches with no monitoring data reported for 2008 are: Bell Island Beach, Calf Pasture Beach, Hickory Bluff Beach, Marvin Beach, Pear Tree Point Beach, Rowayton Beach, Shady Beach, and Weed Beach in Fairfield County, White Sands Beach, and Soundview Beach in New London County.

Middlesex County had the highest percent exceedance in 2008 (6%) followed by Fairfield (5%), New Haven (5%), and New London (3%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 37 beaches, the percent of samples exceeding the standard remained essentially constant at 3 percent in 2005 and 4 percent from 2006 through 2008.

<table>
<thead>
<tr>
<th>2008 Connecticut Monitoring Frequency and Results by Beach</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>County</strong></td>
</tr>
<tr>
<td>----------------</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>-------------</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Fairfield</td>
</tr>
<tr>
<td>Middlesex</td>
</tr>
<tr>
<td>Middlesex</td>
</tr>
<tr>
<td>Middlesex</td>
</tr>
<tr>
<td>Middlesex</td>
</tr>
<tr>
<td>Middlesex</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
<tr>
<td>New Haven</td>
</tr>
</tbody>
</table>
### County Beach Monitoring Tier Frequency Total Percent

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>New Haven</td>
<td>East Haven Town Beach</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>0%</td>
</tr>
<tr>
<td>New Haven</td>
<td>West Wharf Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>New Haven</td>
<td>Lighthouse Point Beach</td>
<td>1</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>New Haven</td>
<td>Gulf Beach</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>New London</td>
<td>Kiddie’s Beach</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>16%</td>
</tr>
<tr>
<td>New London</td>
<td>Dubois Beach</td>
<td>1</td>
<td>1/wk</td>
<td>30</td>
<td>7%</td>
</tr>
<tr>
<td>New London</td>
<td>Noank Dock</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>New London</td>
<td>McCook Point Beach</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>New London</td>
<td>Hole-in-the-Wall Beach</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>New London</td>
<td>Rocky Neck State Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>74</td>
<td>3%</td>
</tr>
<tr>
<td>New London</td>
<td>Green Harbor Beach</td>
<td>1</td>
<td>1/wk</td>
<td>32</td>
<td>0%</td>
</tr>
<tr>
<td>New London</td>
<td>Eastern Point Beach</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>New London</td>
<td>Esker Point Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>New London</td>
<td>Ocean Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>0%</td>
</tr>
<tr>
<td>New London</td>
<td>Waterford Town Beach</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>0%</td>
</tr>
<tr>
<td>New London</td>
<td>Pleasure Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>New London</td>
<td>White Sands Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>New London</td>
<td>Soundview Beach</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>

N/A: Not applicable

### Closings and Advisories

**Closing and Advisory Issuance:** While state guidance has recommendations about beach closings only, both closings and advisories are issued at coastal beaches in Connecticut. Closing and advisory practices may differ among the different monitoring agencies within the state. The CT DPH collects notification data from all the managing entities using the U.S. EPA Beach Survey for regulated marine bathing areas. This survey asks respondents directly for aggregate public notification procedure data, and it is not possible to tell which public notification procedures were applied at the time of a specific closure or advisory event, nor is it possible to tell whether a particular procedure was applied to all closure or advisory events at a beach. However, it is possible to tell which notification procedures are preferred by the beach managing entities. Some local health departments use either the single-sample maximum or the geometric mean to trigger closing and advisory decisions, while for other local health departments and the CT DEP, the single-sample maximum triggers advisory and closing decisions, and exceedance of the geometric mean standard may trigger consideration of closings and advisories.¹

When routine samples exceed the state standards, the state recommends that a resample be taken and a sanitary survey be conducted to determine if raw or partially treated sewage is contributing to the elevated bacterial concentrations. If the survey reveals discharges of raw or partially treated sewage, then the state recommends that the bathing area be closed. If sample results exceed the standards and a sanitary survey reveals no evidence of sewage contamination, the state recommends that the bathing area be examined on an individual basis with consultation from the CT DPH before any decision about closure is made. A beach whose samples exceed the standards may remain open if a sanitary survey reveals no sign of a sewage spill.² Local authorities may adopt standards more protective of public health than the state standards and may issue advisories. Most municipalities resample before issuing an advisory and most municipalities also conduct a sanitary survey to determine if sewage is contributing to the elevated bacterial concentrations. Some municipalities collect multiple samples at each monitoring event and in most cases, if more than one sample exceeds the standard, they will close the beach without resample.¹
Local health departments are responsible for notifying the public about the status of the beaches in their jurisdictions and their notification methods vary. The CT DEP notifies the public of beach closings and advisories for the four state park marine beaches they monitor via press releases, their website, and a hotline. The status of these state park beaches is updated daily and is communicated from the CT DPH to neighboring health departments. Typically, Connecticut municipalities do not display signage or flags at regulated marine bathing areas indicating when a beach experiences elevated concentrations of the indicator organism enterococcus. Local directors of health are supposed to notify the CT DPH within four hours of a closure and when the beach is reopened.

Sections of a beach or a whole beach may be placed under advisory or closed, depending on the circumstances.

Reopening Procedures: The monitoring practices at coastal beaches are the responsibility of the local health authorities, who are encouraged to follow state guidelines that recommend additional sampling when there is a water quality violation, sewage spill, or pollution event. At the four state park marine beaches monitored by the CT DEP, resampling is done every day until a beach is reopened. State guidelines recommend that reopening a beach after closure will be based on obtaining satisfactory sample results. When rainfall thresholds are reached at beaches with preemptive rainfall advisories, beaches are automatically closed until test results indicate that there is no bacterial violation. States that monitor more frequently after an exceedance is found or after heavy rain will tend to have higher percent exceedance rates and lower total closing/advisory days than they would have had if their sampling schedule did not alter after an exceedance was found or after heavy rainfall occurred.

Number of Closings and Advisories: Connecticut had 67 closing and advisory events in 2008. Total closing/advisory days for 67 events lasting six consecutive weeks or less decreased 22% to 135 days in 2008 from 172 days in 2007, 224 days in 2006, and 200 days in 2005. In addition, there were no extended events and or permanent events in 2008 or 2007. Extended events are those more than six consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks.

Causes of Closings and Advisories: For events lasting six consecutive weeks or less, 28% (38) of closing/advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, 50% (67) were preemptive (i.e. without waiting for monitoring results) due to heavy rainfall, and 22% (30) were preemptive due to other reasons.

The reported sources of beachwater contamination were: 11% (15) of closing/advisory days from unknown sources of contamination, 64% (87) from stormwater and runoff, 1% (1) from sewage spills/leaks, and 24% (32) from wildlife.
<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fairfield</td>
<td>Cummings Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Cummings Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Cummings Beach</td>
<td>8/2/08</td>
<td>8/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Cummings Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>East (Cove Island) Beach</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>East (Cove Island) Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>East (Cove Island) Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>East (Cove Island) Beach</td>
<td>8/2/08</td>
<td>8/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>East (Cove Island) Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Great Captain’s Island Beach</td>
<td>9/7/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Greenwich Point Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Greenwich Point Beach</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Septic</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Greenwich Point Beach</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Greenwich Point Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Island Beach</td>
<td>9/7/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Long Beach (Marnick’s)</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Unknown</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Long Beach (Marnick’s)</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Preempt-rain</td>
<td>Unknown</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Long Beach (Proper)</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Unknown</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Long Beach (Proper)</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Preempt-rain</td>
<td>Unknown</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Long Beach (Proper)</td>
<td>8/26/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Pear Tree Point Beach</td>
<td>6/16/08</td>
<td>6/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Pear Tree Point Beach</td>
<td>7/3/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Pear Tree Point Beach</td>
<td>7/17/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Quigley Beach</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Quigley Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Quigley Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Quigley Beach</td>
<td>8/2/08</td>
<td>8/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Quigley Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Short Beach</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Short Beach</td>
<td>6/17/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Short Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Unknown</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Short Beach</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Preempt-rain</td>
<td>Unknown</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Short Beach</td>
<td>8/26/08</td>
<td>8/28/08</td>
<td>Preempt-rain</td>
<td>Unknown</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Weed Beach</td>
<td>6/16/08</td>
<td>6/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Weed Beach</td>
<td>7/3/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>Weed Beach</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>West Beach</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>West Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>West Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Fairfield</td>
<td>West Beach</td>
<td>8/2/08</td>
<td>8/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
</tbody>
</table>
## Notes

DELAWARE

1st in beachwater quality (1% of samples exceeded national standards)

Delaware has about 25 miles of Delaware Bay coastline, 26 miles of Atlantic Ocean coastline, and 115 miles of inland bay shoreline. All three of the state’s counties (Newcastle, Kent, and Sussex) have coastline.

The state’s marine beachwater monitoring program is administered by the Delaware Department of Natural Resources and Environmental Control (DNREC). The DNREC conducts monitoring activities and issues swimming advisories to local recreational water area administrators so they can regulate access to swimming waters.1 The local administrators always follow state recommendations.2 Delaware also monitors freshwater beaches; this summary only includes information about the state’s coastal monitoring.

In 2008, the monitoring season stretched from May 12 to September 19. A few coastal sites were sampled in the off-season by the DNREC and the Delaware Surfrider Chapter and analyzed by the University of Delaware’s College of Marine and Earth Studies.1

The state’s monitoring data are used to determine which watersheds should be assessed for placement of nutrient/bacteria buffers that reduce the introduction of pollutants.2 These buffers consist of setbacks or vegetation that reduce the amount of nutrients and bacteria that get carried to surface waters in runoff. The recreational water program notifies the DNREC’s groundwater discharge section when a violation of recreational water quality standards is found.1 This section is responsible for providing regulatory oversight over the installation of septic systems, underground injection wells, spray irrigation wastewater systems, and other systems associated with wastewater treatment.

Delaware’s Recreational Water Program has initiated a beach shoreline survey program to identify existing sources of pollution. Sanitary surveys of shorelines and marinas adjacent to recreational beaches are conducted in order to identify existing and potential sources of pollution.1

Regression analyses revealed no relationship between rainfall and total enterococcus levels at Atlantic Ocean and Delaware Bay beaches, with the exception of Rehoboth Beach.2 This finding triggered extensive monitoring of Rehoboth Beach’s stormwater and sanitary sewers in order to discover whether they were combined. The monitoring revealed that the sewers are uncombined,2 so there is another source of fecal indicator bacteria that is contaminating stormwater in this area.

Delaware has several programs that promote public participation in water quality improvements: Coast Day, Adopt-a-Beach, a Clean Marina Program, an annual coastal cleanup event, and Beach Grass Planting.2 In 2008, the recreational water program provided funding to the Inland Bays Citizens Monitoring Program in order to promote this volunteer-based organization.1 The program also supports the University of Delaware’s Citizen Monitoring program, which conducts and reports on investigations of fish kills, harmful algal blooms, and other water quality problems.1

The recreational water program is providing support for research into analysis of marine and inland bay waters for the presence of pathogenic and pathogen-like bacteria, including Helicobacter pylori and Campylobacter jejuni. The goal is to be able to quickly identify harmful bacteria and improve the safety of recreational waters.1 The program plans to provide support for research to test marine and inland bay waters for the presence of pathogenic and pathogen-like Epsilonproteobacteria, which are associated with human gastric disease and gastroenteritis. Results will be compared to standard methods for indicators of fecal contamination.2

The DNREC samples water and/or shellfish for harmful algal bloom species and toxins and issues swimming advisories at freshwater beaches because of harmful algal blooms. The state discovered its first known occurrence of a Karenia brevis bloom during routine beach observations in late August of 2007. The toxins produced by this species of harmful algae can aerosolize and cause respiratory symptoms. Because of the 2007 K. brevis bloom, Delaware enhanced its surveillance analyses, response, and public notification capability for marine toxins and harmful algal blooms in 2008.
The DNREC’s Comprehensive Algal Bloom Monitoring Program was implemented in cooperation with the University of Delaware Sea Grant Marine Advisory Service. This included follow-up monitoring of harmful algal blooms at the Indian River Inlet, a beach site that is used by surfers. The recreational water program also provided funding for university research into identifying harmful algal bloom species.\textsuperscript{1}

Delaware received a $207,730 federal BEACH Act grant in 2008 and was eligible for a $211,000 grant in 2009. The full cost of Delaware’s coastal beach monitoring and notification program is approximately double the amount of the BEACH Act grant.\textsuperscript{3}

**Standards**

**Indicator Organism:** Enterococcus

**Standards:** Delaware standards for beachwater quality are an enterococcus single-sample maximum of 104 cfu/100 ml and a geometric mean of 35 cfu/100 ml. Delaware also monitors its coastal waters for temperature, pH, dissolved oxygen, and salinity.

DNA analyses to track the source of bacteria at Slaughter Beach and Prime Hook Beach have shown that non-human sources contribute to indicator bacteria counts at these beaches. Monitoring results at these beaches are adjusted downwards to account for non-human sources at these beaches before the water quality standard is applied. (Monitoring data are reported before this adjustment is made.) For Slaughter Beach, the correction factor is 0.49 multiplied by the raw count. This was calculated based on a microbial source tracking study at this beach that found that 77% of fecal bacteria came from wildlife sources, with a 26% margin of error. At Prime Hook, microbial source tracking found that 70% of fecal bacteria came from wildlife, with a 24% margin of error, resulting in a correction factor of 0.54 for this beach.\textsuperscript{4}

Delaware issues preemptive rainfall advisories. For marine waters, the DNREC has determined that 3.5 inches of rainfall within 24 hours or three inches within 12 hours may trigger a closing.\textsuperscript{2} Preemptive closings would be issued in the case of a known sewage spill.\textsuperscript{2}

**Monitoring**

**Determination of Monitoring Locations and Frequency:** Marine beaches that are lifeguarded are monitored.

**Practice:** Samples are taken in knee-deep water, generally on Mondays and Tuesdays, with Wednesdays and Thursdays as backup days.\textsuperscript{2} Results are available 24 hours after sampling. Multiple samples are sometimes taken.\textsuperscript{1}

**Results:** In 2008, Delaware reported 24 coastal beaches, all in Sussex County and all monitored once a week. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 1 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Holts Landing Beach (15%) and Delaware Seashore State Park, Tower Road Bayside in Sussex County (14%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 18 beaches, the percent of samples exceeding the standard remained steady at 1 percent in 2008 from 2007 levels, a decrease from 3 percent in 2006. There were less than 1 percent exceedances in 2005.
### 2008 Delaware Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sussex</td>
<td>Holts Landing Beach</td>
<td>No data</td>
<td>1/wk</td>
<td>20</td>
<td>15%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Delaware Seashore State Park, Tower Road Bayside</td>
<td>2</td>
<td>1/wk</td>
<td>22</td>
<td>14%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Rehoboth-Delaware Ave</td>
<td>No data</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Delaware/Maryland Line Beach</td>
<td>2</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Cape Henlopen State Park - Herring Point</td>
<td>2</td>
<td>1/wk</td>
<td>32</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Fenwick Island State Park Beach</td>
<td>2</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Rehoboth-Rehoboth Ave Beach</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Prime Hook Beach</td>
<td>2</td>
<td>1/wk</td>
<td>22</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Broadkill Beach</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Delaware Seashore State Park, Tower Road Ocean Site</td>
<td>1</td>
<td>1/wk</td>
<td>31</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Slaughter Beach</td>
<td>1</td>
<td>1/wk</td>
<td>22</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Lewes Beach South</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Rehoboth-Queen St Beach</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Lewes Beach</td>
<td>No data</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>South Indian River Inlet Beach</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Bethany Beach</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Rehoboth-Virginia Ave Beach</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Lewes Beach North</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>South Bethany Beach</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>North Indian River Inlet Beach, Delaware Seashore State Park</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Cape Henlopen Beach</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Dewey Beach</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Atlantic Beach Near Gordons Pond</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Sussex</td>
<td>Fenwick Island - Town</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>

N/A: Not applicable

### Closings and Advisories

Because of concerns about water quality, there is a permanent caution regarding swimming in Rehoboth Bay, Indian River Bay, and Little Assawoman Bay. This permanent advisory includes Tower Road Bayside in Rehoboth Bay and Holts Landing Beach in Indian River Bay. Contaminants in these bays come from many sources in the watershed, including failing septic systems, farm and lawn fertilizers, and runoff from poultry operations. In addition, the sewage treatment plants in Lewes and Rehoboth discharge treated effluent into the Lewes and Rehoboth Canal, which feeds into the bays. Poor flushing of the shallow waters in these bays allows pollutants to linger; it takes 120 days for water to move out of the inland bays. Signs are posted at popular access points around Rehoboth Bay, Indian River Bay, and Little Assawoman Bay to warn potential swimmers of the risks associated with swimming in these bodies of water, particularly after a heavy rain.

**Closing/Advisory Issuance:** State policy is to issue advisories for indicator exceedances. However, circumstances that would trigger an imminent health threat result in a closing. An exceedance of either the single-sample maximum standard or the geometric mean standard triggers an advisory. There are limited overriding factors, such as leaking
sampling containers, excessive sediment in samples, etc., which can be taken into account before issuing an advisory when a sample exceeds standards, but these are rare exceptions. Along with issuing an advisory, resampling to confirm exceedances of bacteriological standards is conducted immediately following a report of elevated sample results. All ocean resamples taken to verify exceedances, without exception, have been below the single-sample maximum standard. The DNREC provides beach advisory information via a telephone hotline, signs, a website, and e-mail. Whether advisories are issued for an entire beach or for a section of beach is determined on a case-by-case basis.

**Reopening Procedures:** Once an advisory or closing is issued, the beach is monitored more frequently until the advisory can be lifted. States that monitor more frequently after an exceedance is found will tend to have higher percent exceedance rates and lower total closing/advisory days than they would have had if their sampling frequency did not increase after an exceedance was found.

**Number of Closings and Advisories:** Delaware had 2 closing/advisory events in 2008. Total closing/advisory days for two events lasting six consecutive weeks or less increased 10% to 11 days in 2008 from 10 days in 2007, 0 days in 2006, and 0 days in 2005. In addition, there were no extended or permanent events in 2008 or 2007. Extended events are those in effect more than six consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks.

**Causes of Closings and Advisories:** All closing and advisory days in 2008 were preemptive (i.e. without waiting for monitoring results) due to heavy rainfall.

The reported sources of beachwater contamination for 2008 are as follows: All closing and advisory days in 2008 were from stormwater runoff.

<table>
<thead>
<tr>
<th>2008 Delaware Beach Closings and Advisories</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>County</strong></td>
</tr>
<tr>
<td>Sussex</td>
</tr>
<tr>
<td>Sussex</td>
</tr>
</tbody>
</table>

**Notes**

1 Delaware Department of Natural Resources and Environmental Control, 2008 Recreational Water Year-End Report. Not dated.
2 Debbie Rouse, Delaware Department of Natural Resources and Environmental Control, personal communication, June 2009.
3 Jack Pingree, Environmental Program Manager, Delaware Department of Natural Resources and Environmental Control, personal communication, May 2007.
4 Michael Bott, Delaware Department of Natural Resources and Environmental Control, personal communication, July 2009.
FLORIDA
9th in beachwater quality (3% of samples exceeded national standards)

With its year-round swim season and more than one thousand miles of coastal beach, Florida has by far the most coastal swimmers in the nation. The state has 634 public coastal beaches stretching along its Atlantic and Gulf coastline.

The beachwater quality monitoring program is administered by the Florida Department of Health. Monitoring and advisory/warning issuance are conducted by Florida's county health departments, which are comprised of agents and employees of the Department of Health. Local health departments in 34 of the state's 35 coastal counties (Jefferson County has no accessible beaches) monitor an average of nine sites each. The administering agency for the beachwater monitoring program determines sampling practices, locations, standards, and notification protocols and practices throughout the state.

Monitoring occurs year-round, but the peak season is from April to mid-September. Tropical Storm Fay dropped heavy rains across the state last August, which resulted in many advisory days.

The beachwater monitoring program's data is shared with the Total Maximum Daily Loads Program administered by the Florida Department of Environmental Protection, where it is used to identify waters that are impaired by bacteria and inform plans for improving water quality.

Escambia County is working with residents to bring central sewer service to the area around Navy Point Beach on Bayou Grande and discontinue the usage of septic tanks, an effort that should improve water quality at this beach. An epidemiological study of rapid test methods took place in 2008 at Miami Beach and another is planned for Tampa Bay in 2009.

“Red tide” in Florida's coastal waters is caused by Karenia brevia. The Department of Health gets frequent harmful algal bloom bulletins from the NOAA, which uses satellite imagery techniques plus buoy data and field observations to detect potential algal blooms. The Department of Health also gets bulletins from the Florida Fish and Wildlife Conservation Commission, which samples for K. brevia weekly in certain locations. The Department of Health alerts local health departments to be prepared for cases of respiratory distress or shellfish poisoning when a bloom is detected, and some of the health departments post red tide warnings at beaches. The Department of Health also has a red tide hotline that gets thousands of calls a year. One use of the hotline is to take reports from people who have experienced red tide-related health effects. Even non-swimmers can get respiratory distress from K. brevia because its toxins can aerosolize and be brought to the beach in air when there is onshore flow.

The Florida Healthy Beaches Program received a $526,320 federal BEACH Act grant in 2008 and was eligible for a $528,000 BEACH Act grant in 2009. In addition to the BEACH Act funds, the program is allocated approximately $525,000 in recurring general revenue from the state.

Standards

Indicator Organisms: Enterococcus, fecal coliform

Standards: Florida applies the EPA standard for enterococcus of a single-sample maximum of 104 cfu/100 ml and a geometric mean of 35 cfu/100 ml, as well as a fecal coliform single-sample standard of 400 cfu/100 ml.

Pinellas County has a preemptive rainfall standard for two saltwater beaches: Maximo and North Shore. Maximo Beach's standard is 0.8 inch within a 24-hour period, while North Shore Beach's standard is one inch within a 24-hour period. Monroe County also issues pre-emptive rainfall advisories, and Martin County has a pre-emptive standard based...
on turbidity. Most counties will warn against swimming after a sewage spill until sampling results are satisfactory. After a hurricane or tropical storm comes ashore, precautionary advisories are issued.

**Monitoring**

**Determination of Monitoring Locations and Frequency:** Beaches are prioritized for monitoring on a county-by-county basis. Criteria are population served, pollution potential, and rainfall. While this ensures that the most critical beaches in each county are monitored, there are a wide variety of beach characteristics in Florida, and beaches chosen for monitoring in one county may not be as important as beaches left unmonitored in another county.

**Practice:** Samples are collected in water that is approximately 18 inches deep, usually in the morning. Lab analysis takes a minimum of 24 hours to complete, and with transport and reporting, county health departments usually receive results about 30 hours after samples are collected. Most sampling is conducted Monday through Thursday.

**Results:** In 2008, Florida reported 634 coastal beaches, 306 (48%) of which were monitored once a week, and 328 (52%) were not monitored. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 4 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Shired Island in Dixie County (90%), Dekle Beach in Taylor County (62%), Alligator Point (56%) and Carrabelle Beach in Franklin County (43%), Shell Point Beach in Wakulla County (43%), Keaton Beach (41%) and Hagen’s Cove in Taylor County (40%), Mash Island in Wakulla County (39%), Bayou Chico in Escambia County (30%), and Cedar Island in Taylor County (27%).

Dixie County had the highest percent exceedance rate in 2008 (90%) followed by Taylor (42%), Wakulla (41%), Franklin (27%), Citrus (19%), Levy (11%), Pasco (9%), Miami-Dade (8%), Hernando (6%), Escambia (6%), and Pinellas (6%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 299 beaches, the percent of samples exceeding the standard remained steady at 4 percent from 2007 to 2008, but decreased from 2006 and 2005 levels of 6 and 8 percent, respectively.
<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bay</td>
<td>Delwood Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Bay</td>
<td>Seltzer Park (Silver Sands Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Bay</td>
<td>East County Line (Mexico Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Bay</td>
<td>West County Line (Carrilon Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Bay</td>
<td>Suntime Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Santa Monica Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Magnolia Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Florida Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Hollywood Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Belaire Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Open Sands Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>El Centro Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Bahama Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Gulf Resort Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Bay County Public Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Gulf Lagoon Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Shell Island Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>8th Street, Mexico Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Tyndall Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Miramar Heights Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Long Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Sunnyside Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>St. Andrews State Park Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Lullwater Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Rivera Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Spessard Holland Beach Park (North)</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Brevard</td>
<td>Cocoa Beach Pier</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Brevard</td>
<td>Patrick Air Force Base (PAFB) North</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Brevard</td>
<td>Indialantic Boardwalk</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Brevard</td>
<td>Sebastian Inlet North</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Brevard</td>
<td>Paradise Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Brevard</td>
<td>Cocoa Beach Minuteman Causeway</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Brevard</td>
<td>Jetty Park (Cape Canaveral)</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Brevard</td>
<td>Pelican Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Brevard</td>
<td>Aquarina Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Ocean Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Coconut Point Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Hightower Beach Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Bonsteel Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Fischer Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Robert P. Murkshe Memorial Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Brevard</td>
<td>Lori Wilson Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Canova Beach Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Shepard Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Bicentennial Beach Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>North Area Beach (Pafb)</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Cherrie Down Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Seagull Park (Pafb)</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Main Entrance Beach (Pafb)</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>NCO Club Beach (Pafb)</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Canaveral National Seashore/Playalinda Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brevard</td>
<td>Officers Club Beach (PAFB)</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Broward</td>
<td>Commercial Blvd</td>
<td>1</td>
<td>1/wk</td>
<td>58</td>
<td>10%</td>
</tr>
<tr>
<td>Broward</td>
<td>Bahia Mar</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>7%</td>
</tr>
<tr>
<td>Broward</td>
<td>Sebastian Street</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>7%</td>
</tr>
<tr>
<td>Broward</td>
<td>Hallandale Beach Blvd</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>7%</td>
</tr>
<tr>
<td>Broward</td>
<td>NE 16 Street, Pompano</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>5%</td>
</tr>
<tr>
<td>Broward</td>
<td>Harrison Street</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>5%</td>
</tr>
<tr>
<td>Broward</td>
<td>Birch State Park</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>4%</td>
</tr>
<tr>
<td>Broward</td>
<td>Custer Street</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>4%</td>
</tr>
<tr>
<td>Broward</td>
<td>Minnesota Street</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>4%</td>
</tr>
<tr>
<td>Broward</td>
<td>John Lloyd State Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Broward</td>
<td>Dania Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Broward</td>
<td>Oakland Park Boulevard</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Broward</td>
<td>Pompano Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Broward</td>
<td>Deerfield Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Broward</td>
<td>Deerfield Beach SE 10th Street</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Broward</td>
<td>Van Buren Street</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Broward</td>
<td>Hillsboro Inlet</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Broward</td>
<td>George English Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Broward</td>
<td>North Beach Park Intercoastal</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Port Charlotte Beach East</td>
<td>1</td>
<td>1/wk</td>
<td>59</td>
<td>5%</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Port Charlotte Beach West</td>
<td>1</td>
<td>1/wk</td>
<td>62</td>
<td>5%</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Palm Island North</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Boca Grande</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Englewood North</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Palm Island South</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Englewood South</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Englewood Mid Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Ponce De Leon Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Dotzler Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Port Charlotte Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>---------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Citrus</td>
<td>Fort Island Gulf Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>19%</td>
</tr>
<tr>
<td>Collier</td>
<td>Residence Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Collier</td>
<td>Hideaway Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Collier</td>
<td>South Marco Beach (aka. SMB Access)</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Collier</td>
<td>Tigertail Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Collier</td>
<td>Pelican Bay Restaurant and Club</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Collier</td>
<td>Barefoot Beach State Reserve</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Collier</td>
<td>Denor-Wiggins State Recreation Area</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Collier</td>
<td>Lowdermilk Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Collier</td>
<td>Naples Pier</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Collier</td>
<td>Horizon Way Beach (aka Parkshore Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Collier</td>
<td>Doctor’s Pass</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Collier</td>
<td>Vanderbilt Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Collier</td>
<td>Central Avenue</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Collier</td>
<td>Clam Pass</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Collier</td>
<td>13th Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Pelican Bay Beach North</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>18th Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>7th Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>15th Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>17th Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Naples Lake Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>4th Avenue North Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Naples Beach Club</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>4th Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>10 Thousand Island</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>3rd Avenue North Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>2nd Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>10th Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Clam Pass Park North</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Admiralty &amp; Shores Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Shore Drive Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>14th Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>8th Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>32nd Avenue Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>1st Avenue North Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Gordon Pass Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>5th Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Vedado Way Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>2nd Avenue North Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Clam Pass Park South</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>----------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>---------------------</td>
</tr>
<tr>
<td>Collier</td>
<td>Port Royal Beach &amp; Club</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Cutlass Cove Beach &amp; Club</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Broad Avenue Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>16th Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Villa Mare Ln Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Wiggins Pass North</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>6th Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>The Moorings</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Pelican Bay Beach South</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Keewaydin Island</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>11th Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Caxambas Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Lely Barefoot Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>3rd Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>Wiggins Pass State Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Collier</td>
<td>1st Avenue South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Dixie</td>
<td>Shired Island</td>
<td>1</td>
<td>1/wk</td>
<td>29</td>
<td>90%</td>
</tr>
<tr>
<td>Duval</td>
<td>Huguenot Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Duval</td>
<td>Atlantic Blvd Access</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Duval</td>
<td>30th Avenue Access</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Duval</td>
<td>South Little Talbot Island</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Duval</td>
<td>15th Street Access</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Duval</td>
<td>Beach Blvd Access</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Duval</td>
<td>Hopkins Street Access</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Duval</td>
<td>19th Street Access</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Duval</td>
<td>Hanna Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Duval</td>
<td>North Little Talbot Island</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayou Chico</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>30%</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayview Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>9%</td>
</tr>
<tr>
<td>Escambia</td>
<td>Navy Point (Bayou Grande)</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>8%</td>
</tr>
<tr>
<td>Escambia</td>
<td>Quietwater Beach (Santa Rosa Sound)</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>7%</td>
</tr>
<tr>
<td>Escambia</td>
<td>Sanders Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>5%</td>
</tr>
<tr>
<td>Escambia</td>
<td>Big Lagoon State Park</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Escambia</td>
<td>Pensacola (Casino) Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Escambia</td>
<td>County Park West</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Escambia</td>
<td>Johnson Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Escambia</td>
<td>County Park East</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Escambia</td>
<td>Perdido Key State Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Escambia</td>
<td>Johnson Beach Sound Side</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Escambia</td>
<td>Opal Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Escambia</td>
<td>Fort Pickens</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>--------------------------------</td>
<td>-------------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Escambia</td>
<td>Navy Point South</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Escambia</td>
<td>Santa Rosa Island</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Escambia</td>
<td>Sabine Yacht and Racket</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Escambia</td>
<td>Fort Mcree Area</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bay Bluffs Park</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Escambia</td>
<td>Quietwater Beach Picnic Area</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Flagler</td>
<td>Varn Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Flagler</td>
<td>Gamble Rogers State Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Flagler</td>
<td>Washington Oaks State Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Flagler</td>
<td>North Flagler Pier</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Flagler</td>
<td>Picknickers (Beverly Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Flagler</td>
<td>South Flagler Pier</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Flagler</td>
<td>Hammock</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Flagler</td>
<td>South Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Flagler</td>
<td>Marineland</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Franklin</td>
<td>Alligator Point</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>56%</td>
</tr>
<tr>
<td>Franklin</td>
<td>Carrabelle Beach</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>43%</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island Franklin Street</td>
<td>1</td>
<td>1/wk</td>
<td>49</td>
<td>20%</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island 11th Street East</td>
<td>1</td>
<td>1/wk</td>
<td>98</td>
<td>18%</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island State Park</td>
<td>1</td>
<td>1/wk</td>
<td>49</td>
<td>10%</td>
</tr>
<tr>
<td>Franklin</td>
<td>Peninsular Point Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island 11th Street West</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Gulf</td>
<td>Monument Beach</td>
<td>1</td>
<td>1/wk</td>
<td>50</td>
<td>6%</td>
</tr>
<tr>
<td>Gulf</td>
<td>Lookout Beach</td>
<td>1</td>
<td>1/wk</td>
<td>50</td>
<td>4%</td>
</tr>
<tr>
<td>Gulf</td>
<td>Beacon Hill Beach</td>
<td>1</td>
<td>1/wk</td>
<td>50</td>
<td>0%</td>
</tr>
<tr>
<td>Gulf</td>
<td>Highway 98 Beach</td>
<td>1</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Gulf</td>
<td>Dixie Belle Beach</td>
<td>1</td>
<td>1/wk</td>
<td>49</td>
<td>0%</td>
</tr>
<tr>
<td>Gulf</td>
<td>St. Joe Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Gulf</td>
<td>Cape San Blas</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Hernando</td>
<td>Pine Island</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>6%</td>
</tr>
<tr>
<td>Hillsborough</td>
<td>Ben T. Davis North</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>7%</td>
</tr>
<tr>
<td>Hillsborough</td>
<td>Picnic Island South</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>5%</td>
</tr>
<tr>
<td>Hillsborough</td>
<td>Bahia Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>4%</td>
</tr>
<tr>
<td>Hillsborough</td>
<td>Ben T. Davis South</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>4%</td>
</tr>
<tr>
<td>Hillsborough</td>
<td>Davis Island</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>4%</td>
</tr>
<tr>
<td>Hillsborough</td>
<td>Simmons Park</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>4%</td>
</tr>
<tr>
<td>Hillsborough</td>
<td>Cypress Point South</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>2%</td>
</tr>
<tr>
<td>Hillsborough</td>
<td>Picnic Island North</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Hillsborough</td>
<td>Cypress Point North</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Hillsborough</td>
<td>Mcdl Air Force Base Beaches</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Hillsborough</td>
<td>Apollo Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------------</td>
<td>--------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Indian River</td>
<td>Humiston Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>4%</td>
</tr>
<tr>
<td>Indian River</td>
<td>Wabasso Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Indian River</td>
<td>South Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Indian River</td>
<td>Coconut Point Sebastian Inlet</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Indian River</td>
<td>Sexton Plaza</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Indian River</td>
<td>Round Island Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Indian River</td>
<td>Flame Vine Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Indian River</td>
<td>Golden Sands Beach Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Indian River</td>
<td>Amber Sands Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Indian River</td>
<td>Treasure Shores Beach Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Indian River</td>
<td>Seagrape Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Indian River</td>
<td>Conn Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Indian River</td>
<td>Turtle Trail Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Indian River</td>
<td>Riomar Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Indian River</td>
<td>Jaycee Beach Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Indian River</td>
<td>Sebastian Inlet South Side</td>
<td>None</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Indian River</td>
<td>Tracking Station Beach Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Indian River</td>
<td>Seahorse Beach</td>
<td>None</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lee</td>
<td>Turner Beach/Blind Pass Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>5%</td>
</tr>
<tr>
<td>Lee</td>
<td>Bowditch Point Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>5%</td>
</tr>
<tr>
<td>Lee</td>
<td>Lynn Hall Memorial Park</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>5%</td>
</tr>
<tr>
<td>Lee</td>
<td>Sanibel Lighthouse Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Lee</td>
<td>Bonita Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Lee</td>
<td>Lovers Key State Park</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Lee</td>
<td>Sanibel Causeway Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Lee</td>
<td>Little Hickory Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Lee</td>
<td>Boca Grande Light House/Seagrape Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Lee</td>
<td>Cape Coral Yacht Club</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Lee</td>
<td>TARP Bay Road Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Lee</td>
<td>Bowman’s Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Lee</td>
<td>South Seas Plantation Captiva-Redfish Pass</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Lee</td>
<td>Fulgar St Beach Access-Sanibel</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lee</td>
<td>Southern Tip Access Fort Myers Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lee</td>
<td>Cayo Costa State Park</td>
<td>None</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lee</td>
<td>Sanibel Beach Access #4</td>
<td>None</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lee</td>
<td>South Seas Captiva</td>
<td>None</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lee</td>
<td>Public Beach Access #23-Ft Myers Beach</td>
<td>None</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lee</td>
<td>Public Access #34-Ft Myers Beach</td>
<td>None</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lee</td>
<td>Public Beach Access #17-Ft Myers Beach</td>
<td>None</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lee</td>
<td>North Captiva Island</td>
<td>None</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lee</td>
<td>Holiday Inn Public Beach Access Ft Myers Beach</td>
<td>None</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>----------</td>
<td>-------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Levy</td>
<td>Cedar Key Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>11%</td>
</tr>
<tr>
<td>Levy</td>
<td>Yankeetown Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manatee</td>
<td>Palma Sola South</td>
<td>1</td>
<td>1/wk</td>
<td>57</td>
<td>9%</td>
</tr>
<tr>
<td>Manatee</td>
<td>Bradenton Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Manatee</td>
<td>Bay Front Park North</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Manatee</td>
<td>Palma Sola North</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Manatee</td>
<td>Coquina Beach North</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Manatee</td>
<td>Whitney Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Manatee</td>
<td>Manatee Public Beach South</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Manatee</td>
<td>Manatee Public Beach North</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Manatee</td>
<td>Bay Front Park South</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Manatee</td>
<td>Coquina Beach South</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Manatee</td>
<td>Longboat Key</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manatee</td>
<td>Emerson Point</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manatee</td>
<td>City of Anna Maria Access (Anna Maria Island)</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Martin</td>
<td>Stuart Causeway</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Martin</td>
<td>Roosevelt Bridge</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Martin</td>
<td>Hobe Sound Wildlife Refuge</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Martin</td>
<td>Bathtub Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Martin</td>
<td>Jensen Public Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Martin</td>
<td>Hobe Sound Public Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Martin</td>
<td>Stuart Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Martin</td>
<td>Bob Graham Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Martin</td>
<td>Jensen Beach Causeway East</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Martin</td>
<td>Chastain Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Martin</td>
<td>House of Refuge</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Martin</td>
<td>Sandsprint Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Martin</td>
<td>Bathtub Reef</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Martin</td>
<td>Fletcher Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Martin</td>
<td>Virginia Forest</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Martin</td>
<td>Alex's Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Martin</td>
<td>Stokes</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Martin</td>
<td>Bryan Mawr</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Martin</td>
<td>Glasscock</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Martin</td>
<td>Jensen Beach Causeway</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Martin</td>
<td>Tiger Shores Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Martin</td>
<td>Saint Lucie Inlet State Park</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Martin</td>
<td>Blowing Rocks</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Sunny Isles Beach-Pier Park</td>
<td>1</td>
<td>1/wk</td>
<td>61</td>
<td>13%</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Key Biscayne Beach</td>
<td>1</td>
<td>1/wk</td>
<td>58</td>
<td>10%</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Crandon Park-Key Biscayne</td>
<td>1</td>
<td>1/wk</td>
<td>58</td>
<td>10%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------------</td>
<td>----------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Virginia Beach</td>
<td>1</td>
<td>1/wk</td>
<td>59</td>
<td>10%</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Golden Beach</td>
<td>1</td>
<td>1/wk</td>
<td>59</td>
<td>10%</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Hobie Beach (aka. Dog Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>58</td>
<td>9%</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>South Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>58</td>
<td>9%</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Collins Park-21st Street</td>
<td>1</td>
<td>1/wk</td>
<td>61</td>
<td>8%</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>North Shore Ocean Terrace</td>
<td>1</td>
<td>1/wk</td>
<td>57</td>
<td>7%</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Surfside Beach-93rd Street</td>
<td>1</td>
<td>1/wk</td>
<td>57</td>
<td>7%</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Matheson Hammock</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>5%</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>53rd Street-Miami Beach</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>5%</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Haulover Beach</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>5%</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Cape Florida Park</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Oleta State Park</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Homestead Bay Front Park</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Windsurfer Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Higgs Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>14%</td>
</tr>
<tr>
<td>Monroe</td>
<td>South Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>12%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Coco Plum Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>6%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Founder’s Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>4%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Islamorada Public Library</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>4%</td>
</tr>
<tr>
<td>Monroe</td>
<td>John Pennekamp State Park Cannon Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>2%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Sombrero Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>2%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Bahia Honda Sandspur</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>2%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Simonton Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>2%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ft. Zachary Taylor</td>
<td>1</td>
<td>1/wk</td>
<td>50</td>
<td>0%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Harry Harris County Park</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Bahia Honda Bayside</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Anne’s Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Smathers Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Bahia Honda Oceanside</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Veteran’s Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Curry Hammock</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Long Key State Park</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Buccaneer</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Casa Clara</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>John Pennekamp State Park Far Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Smathers Beach East</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Rest Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Atlanta Shores</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Sea Oats Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Craig Key Roadside</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Hawks Cay Resort</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------</td>
<td>-----------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Monroe</td>
<td>Monroe County Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Westin Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>The Islander Beach Resort</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Reach Resort</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Cheeca Lodge Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Kennedy Dr &amp; N Roosevelt</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Valhalla Beach Resort</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>18 Mile Stretch</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Sunset Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Banana Bay Resort-Marathon</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>N Roosevelt/Cow Key</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Dog Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Dolphin Research Center</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>The Moorings</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Holiday Inn Beachside</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Casa Marina</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Key West Beach Club</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Fiesta Key Campground</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>South End</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>4%</td>
</tr>
<tr>
<td>Nassau</td>
<td>Ocean Street</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>2%</td>
</tr>
<tr>
<td>Nassau</td>
<td>Amelia Island Plantation (AIP) Beach Club</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>2%</td>
</tr>
<tr>
<td>Nassau</td>
<td>Piper Dunes (AIP Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>2%</td>
</tr>
<tr>
<td>Nassau</td>
<td>Sadler Road</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Nassau</td>
<td>Fort Clinch Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Nassau</td>
<td>Main Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Nassau</td>
<td>Jasmine Street</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Nassau</td>
<td>American Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Nassau</td>
<td>Simmons Road</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Nassau</td>
<td>Peter’s Point</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>0%</td>
</tr>
<tr>
<td>Nassau</td>
<td>Fort Clinch Riverside</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>Summer Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>Kissimmee Beach Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>Bill Melton Beach Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>Alachua Beach Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>N. Casino Beach Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>Burney Park Beach Front</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>Hutchins Beach Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>Allen Beach Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>Scott Road Beach Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>North Beach Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>John Robas Beach Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------------</td>
<td>--------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>-------------------</td>
</tr>
<tr>
<td>Nassau</td>
<td>Manatee Beach Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>S. Casino Beach Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>New York Beach Access</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>Mizell Beach Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>Suwannee Beach Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>Ozello Beach Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nassau</td>
<td>South End Bridge</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Brackin Wayside</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>6%</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Rocky Bayou (Fred Gannon State Park)</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>4%</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Lincoln Park</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>4%</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Liza Jackson Park</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>4%</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Gulf Island National Seashore</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>4%</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Garniers</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>4%</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Poquito Park</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>4%</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Henderson State Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>2%</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>East Pass</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>2%</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Marlers Park</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Camp Timpoochee</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>James Lee Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Okaloosa Island Beach Access #6</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Hurlburt Marina</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Norreigo Point</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Clement-Taylor</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Dana Point</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>U.S. Army Rec Center</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Joes Bayou</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Rickey Avenue</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Walk Edge</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Landing</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Beasley State Park</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Parrish Point</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Maxwell-Gunter</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>El Matador</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Okaloosa Island Beach Access #5</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Florida Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Lions Park</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Rocky Creek Campground</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Pocahantas Drive</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Seaview</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Holiday Isle Aegean</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Weekley Bayou</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>---------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Valparaiso Blvd</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Okaloosa Island Beach Access #7</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Okaloosa Island Beach Access #4</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Okaloosa Island Beach Access #1</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Okaloosa Island Beach Access #2</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>NCO Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Okaloosa Island Beach Access #3</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Bay Drive</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Cinco Food</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Eldridge Park</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Postal Point</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Bluewater Beach</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Laguana Park</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Seashore Beachwalk</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Star Drive</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Longwood Park</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Meigs Park</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Hurlburt Campground</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>White Point</td>
<td></td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Phil Foster Park</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>5%</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Dubois Park</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Riviera Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Palm Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Lake Worth (Aka Kreusler)</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Jupiter Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Peanut Island</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Delray Beach (aka Sandoway Park)</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Gulfstream Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Ocean Inlet Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Carlin Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>South Inlet Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Spanish River</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Boynton Beach Municipal</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Ocean Reef Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Loggerhead Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Phipps</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Palm Beach Shores</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Juno Beach Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>John D. Mcarthur</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Coral Cove</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>South Cove</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Red Reef Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Palm Beach</td>
<td>Lantana Municipal</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pasco</td>
<td>Robert J. Strickland</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>17%</td>
</tr>
<tr>
<td>Pasco</td>
<td>Robert K. Rees Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>50</td>
<td>12%</td>
</tr>
<tr>
<td>Pasco</td>
<td>Oelsner Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>11%</td>
</tr>
<tr>
<td>Pasco</td>
<td>Gulf Harbors Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>7%</td>
</tr>
<tr>
<td>Pasco</td>
<td>Energy And Marine Center</td>
<td>1</td>
<td>1/wk</td>
<td>49</td>
<td>6%</td>
</tr>
<tr>
<td>Pasco</td>
<td>Brasher Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>6%</td>
</tr>
<tr>
<td>Pasco</td>
<td>Anclote River Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>4%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>North Shore Beach</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>13%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Mobbly Bayou Preserve</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>10%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Gandy Boulevard</td>
<td>1</td>
<td>1/wk</td>
<td>58</td>
<td>9%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Courtney Campbell Causeway</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>8%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Honeymoon Island Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>5%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Fred Howard Beach</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>5%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Treasure Island Beach</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>5%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Pass-a-Grille Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Redington Shores-182nd Ave</td>
<td>1</td>
<td>None</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Fort Desoto North Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Sand Key</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Madeira Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Indian Rocks Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Indian Shores Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>2%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Sunset Beach-Tarpon Springs</td>
<td>1</td>
<td>None</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Fort Desoto-East Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Clearwater Beach-Carlouel Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Gulfport-West Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Ft Desoto Park-Pier/Fort</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>R.E. Olds Park</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Redington Beach-168th Ave</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Sunset Beach (Tl)-82nd Ave</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Treasure Island-103rd Ave</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Belleair Beach-Morgan Drive</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>North Redington Beach-169th Ave</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Bermuda Bay Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>St Pete Beach-34th Ave (The Don)</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Belleair Causeway-Intercoastal</td>
<td>1</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Honeymoon Island Causeway (South)</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Lassing Park-19th Ave SE</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Fort Desoto 1/2 Way B/N Fort &amp; N. Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Maximo Park-West Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------------</td>
<td>--------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>-------------------</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Maximo Park-East Beach</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Bay Vista Park</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Clearwater Beach-Rockaway</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Safety Harbor Pier</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Madeira Beach-129th Ave</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Indian Rocks Beach-Central Ave</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Clearwater Beach (3rd St)</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>North Shore-North Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Sunset Beach (TI)-89th Ave</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>St Pete Beach-46th Ave (Park)</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Gulfport-Osgood Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Crystal Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Pass-a-Grille-19th Ave</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Dunedin Marina Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Gulfport-East Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Redington-East 175th Ave</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Rosa</td>
<td>Shoreline Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>6%</td>
</tr>
<tr>
<td>Santa Rosa</td>
<td>Navarre Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Santa Rosa</td>
<td>Homeport</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Rosa</td>
<td>Navarre Beach Pier</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Rosa</td>
<td>Navarre Beach West</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Rosa</td>
<td>Woodlawn Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Rosa</td>
<td>Juana’s Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Santa Rosa</td>
<td>Garcon Point Location 3</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Rosa</td>
<td>Redfish Point</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Santa Rosa</td>
<td>Floridatown Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Venice Fishing Pier</td>
<td>1</td>
<td>1/wk</td>
<td>62</td>
<td>8%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Brohard Beach</td>
<td>1</td>
<td>1/wk</td>
<td>57</td>
<td>7%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Blind Pass Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>6%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Caspersen Public Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>5%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Venice Public Beach</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>5%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Siesta Key Public Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>4%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>North Lido Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>4%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Manasota Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>4%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Nokomis Public Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Ringling Causeway</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Turtle Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Service Club Park</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>North Jetty Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Longboat Key Access</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Lido Casino Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>---------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Sarasota</td>
<td>South Lido Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Longboat Access #2</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Plaza De Las Palmas #9</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Blackburn Point Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Palmer Point Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Longboat Access #1</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Ocean Blvd Access #5</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Avenida Navarra Access #14</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Avenida Messina Access #2</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>South Jetty Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Stickney Point Access #12</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Calle De La Siesta, Access #7</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Quick Point</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Avenida Del Mare Access #11</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Plaza De Las Palmas 1, Access #8</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Shell Road Access #1</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Calle Del Invero Access #10</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Longboat Access #3</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Point O’ Rocks</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Johns</td>
<td>Vilano Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>St Johns</td>
<td>Mickler’s Landing</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>St Johns</td>
<td>St. Augustine Beach Ocean Trace</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>St Johns</td>
<td>Anastasia State Park (St. Augustine Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>St Johns</td>
<td>Matanzas Inlet</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>St Johns</td>
<td>St. Augustine Beach A Street</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>St Johns</td>
<td>Crescent Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>St Johns</td>
<td>Solano (Ponte Vedra Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Fort Pierce Inlet/North Jetty Park</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>2%</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Pepper Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>St Lucie</td>
<td>F Douglass Memorial Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Walton Rocks Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>St Lucie</td>
<td>K Bergalis Memorial Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Inlet State Park @ Ocean</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Blue Heron Blvd Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Gulfstream Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Blind Creek Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Avalon Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Inlet State Park @ River</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Middle Cove</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>South Jetty Park Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Little Jim Bridge</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------</td>
<td>--------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Hermans Bay</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Normandy Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>John Brooks Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Coconut Drive Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>South Beach Boardwalk</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Waveland Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Jaycee Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Blind Creek</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Surfside Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>Porpoise Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Lucie</td>
<td>South Causeway at Boat Ramp</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Taylor</td>
<td>Dekle Beach</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>62%</td>
</tr>
<tr>
<td>Taylor</td>
<td>Keaton Beach</td>
<td>1</td>
<td>1/wk</td>
<td>22</td>
<td>41%</td>
</tr>
<tr>
<td>Taylor</td>
<td>Hagen's Cove</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>40%</td>
</tr>
<tr>
<td>Taylor</td>
<td>Cedar Island</td>
<td>1</td>
<td>1/wk</td>
<td>22</td>
<td>27%</td>
</tr>
<tr>
<td>Taylor</td>
<td>Dark Island</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Volusia</td>
<td>Main, Daytona Beach</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Volusia</td>
<td>Seabreeze, Daytona Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Volusia</td>
<td>Dunlawton, Daytona Beach Shores</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Volusia</td>
<td>Torinita, Wilbur by the Sea</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Volusia</td>
<td>Villa Way</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Volusia</td>
<td>Oceanview Way, Ponce Inlet</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Volusia</td>
<td>Bicentennial Park, Ormond Beach</td>
<td>1</td>
<td>1/wk</td>
<td>105</td>
<td>0%</td>
</tr>
<tr>
<td>Volusia</td>
<td>Flagler Avenue, New Smyrna Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Volusia</td>
<td>South Jetty, New Smyrna Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Volusia</td>
<td>International Speedway, Daytona Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Volusia</td>
<td>Silver Beach, Daytona Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Volusia</td>
<td>27th Street, New Smyrna Beach</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Volusia</td>
<td>Florida Shores Blvd</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Volusia</td>
<td>North Jetty, Ponce Inlet</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Volusia</td>
<td>Granada, Ormond Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Volusia</td>
<td>Beach Street</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Wakulla</td>
<td>Shell Point Beach</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>43%</td>
</tr>
<tr>
<td>Wakulla</td>
<td>Mash Island</td>
<td>1</td>
<td>1/wk</td>
<td>46</td>
<td>39%</td>
</tr>
<tr>
<td>Walton</td>
<td>Choctaw Beach County Park</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>5%</td>
</tr>
<tr>
<td>Walton</td>
<td>Wheeler Point</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Walton</td>
<td>Eastern Lake Beach Access</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Walton</td>
<td>Dune Allen Beach Access</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Walton</td>
<td>County Park</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Walton</td>
<td>Holly Street Beach Access</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Walton</td>
<td>Grayton Beach Access</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
</tbody>
</table>
County | Beach | Tier | Monitoring Frequency | Total Samples | Percent Exceedance
--- | --- | --- | --- | --- | ---
Walton | Inlet Beach Access (TDC Beach Access) | 1 | 1/wk | 52 | 0%
Walton | Cessna Park (Class II) | No data | None | 0 | N/A
Walton | Eastern Lake Outfall | 1 | None | 0 | N/A
Walton | Western Lake Outfall | No data | None | 0 | N/A
Walton | South Wall Street Beach | 1 | None | 0 | N/A
Walton | Grayton Beach State Recreation Area | 1 | None | 0 | N/A
Walton | Rosemary Beach | No data | None | 0 | N/A
Walton | Legion Park (Class II) | No data | None | 0 | N/A
Walton | Blue Mountain Beach Access | 1 | 1/wk | 0 | N/A
Walton | Santa Rosa Beach Access | No data | None | 0 | N/A

N/A: Not applicable

Advisories

Advisory Issuance: The Department of Health does not have the authority to close Florida beaches; instead, advisories (for enterococcus exceedances) and warnings (for fecal coliform exceedances) are issued. All advisories and warnings are referred to in this report as advisories. In most coastal counties, officials issue an advisory if any one of the three standards is exceeded. However, if a sample exceeds a standard and the county can conduct a followup sample within the same week, the beach may be resampled before an advisory is issued. If the resample confirms an exceedance, an advisory is issued. There is no protocol for delaying or foregoing an advisory if resampling confirms an exceedance.

The Florida Department of Health posts monitoring results on its website. Local media is alerted and signs are posted at the beach when an advisory is issued. Advisories apply to entire beaches, not to sections of beaches.

Reopening Procedures: Most sites in Florida are sampled weekly and the monitoring frequency does not increase if an advisory is issued.

Number of Advisories: Florida had 216 advisory events lasting six consecutive weeks or less in 2008. Total advisory days for events lasting six consecutive weeks or less decreased 34% to 2,067 days in 2008 from 3,139 days in 2007, 2,686 days in 2006, and 2,991 days in 2005. In addition, there were 13 extended events (845 days total) and 11 permanent events (2,470 days total) in 2008. Extended events are those in effect more than six consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. In 2007, there were 11 extended events (647 days total) and 10 permanent events (2,107 days total).

Causes of Advisories: For events lasting six consecutive weeks or less, 93% (1,912) of advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, and 7% (155) were preemptive (i.e. without waiting for monitoring results) due to other reasons.

The reported sources of beachwater contamination for 2008 are as follows: 60% (1,233) of advisory days were from unknown sources of contamination, 68% (1,411) were from stormwater runoff, 40% (834) were from sewage spills/leaks, and 73% (1,499) were from other sources of contamination. Totals exceed 100 percent because more than one source of contamination was reported for some events.

### 2008 Florida Beach Advisories

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bay</td>
<td>Beach Drive</td>
<td>2/25/08</td>
<td>3/3/08</td>
<td>Bacteria</td>
<td>Unknown; Stormwater; Wildlife; Boat</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------</td>
<td>-----------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------------------------</td>
<td>-------------------------------</td>
</tr>
<tr>
<td>Bay</td>
<td>Beach Drive</td>
<td>3/10/08</td>
<td>3/24/08</td>
<td>Bacteria</td>
<td>Unknown; Boat; Stormwater;</td>
</tr>
<tr>
<td>Bay</td>
<td>Beach Drive</td>
<td>8/18/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Unknown; Boat; Stormwater;</td>
</tr>
<tr>
<td>Bay</td>
<td>Beckrich Road (Edgewater Gulf Beach)</td>
<td>7/14/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Unknown; Boat; Stormwater;</td>
</tr>
<tr>
<td>Bay</td>
<td>Beckrich Road (Edgewater Gulf Beach)</td>
<td>8/25/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Unknown; Boat; Stormwater;</td>
</tr>
<tr>
<td>Bay</td>
<td>Bid-A-Wee Beach</td>
<td>8/18/08</td>
<td>8/25/08</td>
<td>Bacteria</td>
<td>Unknown; Wildlife; Stormwater;</td>
</tr>
<tr>
<td>Bay</td>
<td>Bid-A-Wee Beach</td>
<td>10/13/08</td>
<td>10/20/08</td>
<td>Bacteria</td>
<td>Unknown; Wildlife; Stormwater;</td>
</tr>
<tr>
<td>Bay</td>
<td>Carl Gray Park</td>
<td>1/7/08</td>
<td>3/3/08</td>
<td>Bacteria</td>
<td>Sanitary-sew-over; Unknown;</td>
</tr>
<tr>
<td>Bay</td>
<td>Carl Gray Park</td>
<td>6/30/08</td>
<td>7/7/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Boat;</td>
</tr>
<tr>
<td>Bay</td>
<td>Panama City Beach Pier (Edgewater Beach)</td>
<td>8/25/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater; Septic;</td>
</tr>
<tr>
<td>Bay</td>
<td>Sunset Park</td>
<td>10/13/08</td>
<td>10/20/08</td>
<td>Bacteria</td>
<td>Unknown; Stormwater; Wildlife;</td>
</tr>
<tr>
<td>Broward</td>
<td>Bahia Mar</td>
<td>2/6/08</td>
<td>2/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Broward</td>
<td>Bahia Mar</td>
<td>10/14/08</td>
<td>10/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Broward</td>
<td>Birch State Park</td>
<td>2/6/08</td>
<td>2/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Broward</td>
<td>Commercial Blvd</td>
<td>2/6/08</td>
<td>2/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Broward</td>
<td>Hallandale Beach Blvd</td>
<td>2/6/08</td>
<td>2/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Broward</td>
<td>NE 16 Street, Pompano</td>
<td>2/6/08</td>
<td>2/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Broward</td>
<td>Sebastian Street</td>
<td>2/6/08</td>
<td>2/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Palm Island North</td>
<td>1/14/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Septic</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Port Charlotte Beach East</td>
<td>6/4/08</td>
<td>7/7/08</td>
<td>Bacteria</td>
<td>Unknown; Septic; Wildlife;</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Port Charlotte Beach West</td>
<td>6/9/08</td>
<td>6/23/08</td>
<td>Bacteria</td>
<td>Stormwater; Boat; Stormwater;</td>
</tr>
<tr>
<td>Charlotte</td>
<td>Port Charlotte Beach West</td>
<td>9/29/08</td>
<td>11/12/08</td>
<td>Bacteria</td>
<td>Stormwater; Boat; Stormwater;</td>
</tr>
<tr>
<td>Citrus</td>
<td>Fort Island Gulf Beach</td>
<td>1/9/08</td>
<td>1/30/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater</td>
</tr>
<tr>
<td>Citrus</td>
<td>Fort Island Gulf Beach</td>
<td>2/6/08</td>
<td>4/9/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater</td>
</tr>
<tr>
<td>Citrus</td>
<td>Fort Island Gulf Beach</td>
<td>6/11/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater</td>
</tr>
<tr>
<td>Citrus</td>
<td>Fort Island Gulf Beach</td>
<td>6/25/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater</td>
</tr>
<tr>
<td>Citrus</td>
<td>Fort Island Gulf Beach</td>
<td>7/9/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater</td>
</tr>
<tr>
<td>Citrus</td>
<td>Fort Island Gulf Beach</td>
<td>8/13/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater</td>
</tr>
<tr>
<td>Citrus</td>
<td>Fort Island Gulf Beach</td>
<td>9/10/08</td>
<td>9/17/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater</td>
</tr>
<tr>
<td>Citrus</td>
<td>Fort Island Gulf Beach</td>
<td>10/9/08</td>
<td>10/15/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------------------------</td>
<td>----------------------------</td>
</tr>
<tr>
<td>Dixie</td>
<td>Shired Island</td>
<td>1/7/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayou Chico</td>
<td>1/2/08</td>
<td>1/22/08</td>
<td>Bacteria</td>
<td>Sew-break; Wildlife; Sanitary-sew-over; Stormwater; Septic; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayou Chico</td>
<td>2/18/08</td>
<td>2/25/08</td>
<td>Bacteria</td>
<td>Sew-break; Wildlife; Sanitary-sew-over; Stormwater; Septic; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayou Chico</td>
<td>3/17/08</td>
<td>4/21/08</td>
<td>Bacteria</td>
<td>Sew-break; Wildlife; Sanitary-sew-over; Stormwater; Septic; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayou Chico</td>
<td>4/28/08</td>
<td>5/12/08</td>
<td>Bacteria</td>
<td>Sew-break; Wildlife; Sanitary-sew-over; Stormwater; Septic; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayou Chico</td>
<td>5/19/08</td>
<td>5/27/08</td>
<td>Bacteria</td>
<td>Sew-break; Wildlife; Sanitary-sew-over; Stormwater; Septic; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayou Chico</td>
<td>6/16/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Sew-break; Wildlife; Sanitary-sew-over; Stormwater; Septic; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayou Chico</td>
<td>8/25/08</td>
<td>10/6/08</td>
<td>Bacteria</td>
<td>Sew-break; Wildlife; Sanitary-sew-over; Stormwater; Septic; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayou Chico</td>
<td>11/3/08</td>
<td>11/17/08</td>
<td>Bacteria</td>
<td>Sew-break; Wildlife; Sanitary-sew-over; Stormwater; Septic; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayou Chico</td>
<td>12/15/08</td>
<td>12/29/08</td>
<td>Bacteria</td>
<td>Sew-break; Wildlife; Sanitary-sew-over; Stormwater; Septic; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayview Park</td>
<td>4/28/08</td>
<td>5/5/08</td>
<td>Bacteria</td>
<td>Stormwater; Sew-break; Sanitary-sew-over; Wildlife</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayview Park</td>
<td>7/1/08</td>
<td>7/7/08</td>
<td>Bacteria</td>
<td>Stormwater; Sew-break; Sanitary-sew-over; Wildlife</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayview Park</td>
<td>7/14/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Stormwater; Sew-break; Sanitary-sew-over; Wildlife</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayview Park</td>
<td>8/11/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Stormwater; Sew-break; Sanitary-sew-over; Wildlife</td>
</tr>
<tr>
<td>Escambia</td>
<td>Bayview Park</td>
<td>9/2/08</td>
<td>9/15/08</td>
<td>Bacteria</td>
<td>Stormwater; Sew-break; Sanitary-sew-over; Wildlife</td>
</tr>
<tr>
<td>Escambia</td>
<td>Big Lagoon State Park</td>
<td>9/8/08</td>
<td>9/15/08</td>
<td>Preempt-other</td>
<td>Stormwater; Septic; Wildlife</td>
</tr>
<tr>
<td>Escambia</td>
<td>Johnson Beach Sound Side</td>
<td>9/8/08</td>
<td>9/15/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Escambia</td>
<td>Navy Point (Bayou Grande)</td>
<td>1/2/08</td>
<td>1/7/08</td>
<td>Bacteria</td>
<td>Stormwater; Septic; Wildlife; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Navy Point (Bayou Grande)</td>
<td>1/14/08</td>
<td>1/22/08</td>
<td>Bacteria</td>
<td>Stormwater; Septic; Wildlife; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Navy Point (Bayou Grande)</td>
<td>2/18/08</td>
<td>2/25/08</td>
<td>Bacteria</td>
<td>Stormwater; Septic; Wildlife; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Navy Point (Bayou Grande)</td>
<td>4/28/08</td>
<td>5/5/08</td>
<td>Bacteria</td>
<td>Stormwater; Septic; Wildlife; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Navy Point (Bayou Grande)</td>
<td>8/11/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Stormwater; Septic; Wildlife; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Navy Point (Bayou Grande)</td>
<td>8/25/08</td>
<td>9/29/08</td>
<td>Bacteria</td>
<td>Stormwater; Septic; Wildlife; Boat</td>
</tr>
<tr>
<td>Escambia</td>
<td>Quietwater Beach (Santa Rosa Sound)</td>
<td>8/14/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>POTW; Wildlife</td>
</tr>
<tr>
<td>Escambia</td>
<td>Quietwater Beach (Santa Rosa Sound)</td>
<td>9/9/08</td>
<td>9/16/08</td>
<td>Preempt-other</td>
<td>POTW; Wildlife</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------------------------</td>
<td>---------------------------------------------</td>
</tr>
<tr>
<td>Escambia</td>
<td>Sanders Beach</td>
<td>9/2/08</td>
<td>9/15/08</td>
<td>Bacteria</td>
<td>POTW; Wildlife; Stormwater; Sew-break</td>
</tr>
<tr>
<td>Franklin</td>
<td>Alligator Point</td>
<td>3/3/08</td>
<td>5/27/08</td>
<td>Bacteria</td>
<td>Wildlife; Stormwater; Septic</td>
</tr>
<tr>
<td>Franklin</td>
<td>Alligator Point</td>
<td>6/2/08</td>
<td>6/9/08</td>
<td>Bacteria</td>
<td>Wildlife; Stormwater; Septic</td>
</tr>
<tr>
<td>Franklin</td>
<td>Alligator Point</td>
<td>6/24/08</td>
<td>12/29/08</td>
<td>Bacteria</td>
<td>Wildlife; Stormwater; Septic</td>
</tr>
<tr>
<td>Franklin</td>
<td>Carrabelle Beach</td>
<td>1/7/08</td>
<td>2/11/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater; Septic; Wildlife</td>
</tr>
<tr>
<td>Franklin</td>
<td>Carrabelle Beach</td>
<td>4/7/08</td>
<td>4/14/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater; Septic; Wildlife</td>
</tr>
<tr>
<td>Franklin</td>
<td>Carrabelle Beach</td>
<td>4/21/08</td>
<td>6/2/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater; Septic; Wildlife</td>
</tr>
<tr>
<td>Franklin</td>
<td>Carrabelle Beach</td>
<td>6/16/08</td>
<td>12/15/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater; Septic; Wildlife</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island 11th Street East</td>
<td>3/24/08</td>
<td>3/31/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Septic</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island 11th Street East</td>
<td>4/21/08</td>
<td>5/5/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Septic</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island 11th Street East</td>
<td>6/16/08</td>
<td>6/24/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Septic</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island 11th Street East</td>
<td>6/30/08</td>
<td>9/29/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Septic</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island 11th Street East</td>
<td>11/3/08</td>
<td>11/12/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Septic</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island 11th Street East</td>
<td>4/14/08</td>
<td>4/21/08</td>
<td>Bacteria</td>
<td>Septic; Stormwater; Wildlife</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island 11th Street East</td>
<td>5/12/08</td>
<td>5/27/08</td>
<td>Bacteria</td>
<td>Septic; Stormwater; Wildlife</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island 11th Street East</td>
<td>6/2/08</td>
<td>6/9/08</td>
<td>Bacteria</td>
<td>Septic; Stormwater; Wildlife</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island 11th Street West</td>
<td>6/30/08</td>
<td>7/7/08</td>
<td>Bacteria</td>
<td>Septic; Stormwater; Wildlife</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island 11th Street West</td>
<td>7/14/08</td>
<td>9/23/08</td>
<td>Bacteria</td>
<td>Septic; Stormwater; Wildlife</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island 11th Street West</td>
<td>12/29/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Septic; Stormwater; Wildlife</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island Franklin Street</td>
<td>5/12/08</td>
<td>5/26/08</td>
<td>Bacteria</td>
<td>Septic; Wildlife; Stormwater</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island Franklin Street</td>
<td>6/24/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Septic; Wildlife; Stormwater</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island Franklin Street</td>
<td>9/9/08</td>
<td>10/6/08</td>
<td>Bacteria</td>
<td>Septic; Wildlife; Stormwater</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island State Park</td>
<td>6/16/08</td>
<td>8/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Franklin</td>
<td>St. George Island State Park</td>
<td>8/25/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Gulf</td>
<td>St. Joe Beach</td>
<td>6/30/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Gulf</td>
<td>St. Joe Beach</td>
<td>12/22/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Hernando</td>
<td>Pine Island</td>
<td>1/30/08</td>
<td>2/6/08</td>
<td>Bacteria</td>
<td>Septic; Stormwater; Wildlife</td>
</tr>
<tr>
<td>Hernando</td>
<td>Pine Island</td>
<td>2/13/08</td>
<td>4/2/08</td>
<td>Bacteria</td>
<td>Septic; Stormwater; Wildlife</td>
</tr>
<tr>
<td>Hillsborough</td>
<td>Ben T. Davis North</td>
<td>7/30/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Comb-sew-overflow; Stormwater; Wildlife; Sew-break; Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------------</td>
<td>---------------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------------------------------------------</td>
<td>--------------------------------------</td>
</tr>
<tr>
<td>Hillsborough</td>
<td>Ben T. Davis South</td>
<td>7/30/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Comb-sew-overflow; Stormwater; Unknown; Sew-break; Wildlife</td>
</tr>
<tr>
<td>Hillsborough</td>
<td>Davis Island</td>
<td>5/21/08</td>
<td>5/27/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater; Wildlife; Unknown; Sanitary-sew-over; Sew-break</td>
</tr>
<tr>
<td>Indian River</td>
<td>Humiston Beach</td>
<td>10/6/08</td>
<td>10/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Indian River</td>
<td>Humiston Beach</td>
<td>10/8/08</td>
<td>10/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lee</td>
<td>Bowditch Point Beach</td>
<td>3/12/08</td>
<td>3/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lee</td>
<td>Cape Coral Yacht Club</td>
<td>9/22/08</td>
<td>9/29/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater; Sew-break; Comb-sew-overflow; Other</td>
</tr>
<tr>
<td>Lee</td>
<td>Turner Beach/Blind Pass Beach</td>
<td>8/13/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Sanitary-sew-over; Stormwater; Wildlife; Sew-break</td>
</tr>
<tr>
<td>Levy</td>
<td>Cedar Key Beach</td>
<td>1/30/08</td>
<td>4/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Levy</td>
<td>Cedar Key Beach</td>
<td>9/24/08</td>
<td>10/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Manatee</td>
<td>Bradenton Beach</td>
<td>7/14/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Manatee</td>
<td>Palma Sola South</td>
<td>4/8/08</td>
<td>4/14/08</td>
<td>Bacteria</td>
<td>Sew-break; Stormwater; Wildlife; Other</td>
</tr>
<tr>
<td>Manatee</td>
<td>Palma Sola South</td>
<td>7/30/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Sew-break; Stormwater; Wildlife; Stormwater; Other</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>53rd Street-Miami Beach</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Collins Park-21st Street</td>
<td>1/23/08</td>
<td>1/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Collins Park-21st Street</td>
<td>2/12/08</td>
<td>2/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Collins Park-21st Street</td>
<td>3/3/08</td>
<td>3/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Collins Park-21st Street</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Crandon Park-Key Biscayne</td>
<td>6/24/08</td>
<td>6/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Crandon Park-Key Biscayne</td>
<td>10/14/08</td>
<td>10/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Golden Beach</td>
<td>4/8/08</td>
<td>4/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Golden Beach</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Haulover Beach</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Hobie Beach (aka. Dog Beach)</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Key Biscayne Beach</td>
<td>10/14/08</td>
<td>10/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>North Shore Ocean Terrace</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Oleta State Park</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>South Beach Park</td>
<td>2/26/08</td>
<td>3/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>South Beach Park</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Sunny Isles Beach-Pier Park</td>
<td>4/7/08</td>
<td>4/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>---------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------------</td>
<td>------------</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Sunny Isles Beach-Pier Park</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Miami-Dade</td>
<td>Surfside Beach-93rd Street</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Anne’s Beach</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Bahia Honda Bayside</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Bahia Honda Oceanside</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Bahia Honda Sandspur</td>
<td>2/12/08</td>
<td>2/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Bahia Honda Sandspur</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Coco Plum Beach</td>
<td>7/1/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Coco Plum Beach</td>
<td>7/15/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Coco Plum Beach</td>
<td>7/29/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Coco Plum Beach</td>
<td>8/12/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Curry Hammock</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Founder’s Park Beach</td>
<td>5/6/08</td>
<td>5/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Founder’s Park Beach</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Founder’s Park Beach</td>
<td>9/30/08</td>
<td>10/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ft. Zachary Taylor</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Harry Harris County Park</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Higgs Beach</td>
<td>2/12/08</td>
<td>2/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Higgs Beach</td>
<td>2/26/08</td>
<td>3/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Higgs Beach</td>
<td>3/11/08</td>
<td>4/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Higgs Beach</td>
<td>4/29/08</td>
<td>5/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Higgs Beach</td>
<td>7/8/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Higgs Beach</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Higgs Beach</td>
<td>10/14/08</td>
<td>10/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Islamorada Public Library</td>
<td>7/15/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Islamorada Public Library</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Islamorada Public Library</td>
<td>12/9/08</td>
<td>12/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>John Pennekamp State Park Cannon Beach</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>John Pennekamp State Park Cannon Beach</td>
<td>9/30/08</td>
<td>10/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Simonton Beach</td>
<td>7/15/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Simonton Beach</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Smathers Beach</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Sombrero Beach</td>
<td>7/15/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------------------------</td>
<td>--------------------------------------------------</td>
</tr>
<tr>
<td>Monroe</td>
<td>Sombrero Beach</td>
<td>8/12/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>South Beach</td>
<td>2/19/08</td>
<td>3/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>South Beach</td>
<td>3/25/08</td>
<td>4/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>South Beach</td>
<td>7/8/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>South Beach</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>South Beach</td>
<td>9/2/08</td>
<td>10/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>South Beach</td>
<td>10/14/08</td>
<td>10/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Veteran’s Beach</td>
<td>8/18/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Brackin Wayside</td>
<td>7/15/08</td>
<td>7/28/08</td>
<td>Bacteria; Boat; Stormwater</td>
<td>Unknown; Boat; Stormwater</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Brackin Wayside</td>
<td>8/4/08</td>
<td>8/11/08</td>
<td>Bacteria</td>
<td>Unknown; Boat; Stormwater</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Brackin Wayside</td>
<td>10/13/08</td>
<td>10/21/08</td>
<td>Bacteria</td>
<td>Unknown; Boat; Stormwater</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>East Pass</td>
<td>3/3/08</td>
<td>3/10/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Septic; Stormwater; Unknown; Comb-sew-overflow; Boat</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Garniers</td>
<td>4/28/08</td>
<td>5/5/08</td>
<td>Bacteria</td>
<td>Boat; Sew-break; Stormwater; Other; Comb-sew-overflow</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Garniers</td>
<td>7/15/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Boat; Sew-break; Stormwater; Other; Comb-sew-overflow</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Gulf Island National Seashore</td>
<td>3/17/08</td>
<td>3/24/08</td>
<td>Bacteria</td>
<td>Other; Boat; Wildlife; Stormwater</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Gulf Island National Seashore</td>
<td>7/28/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Other; Boat; Wildlife; Stormwater</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Gulf Island National Seashore</td>
<td>9/2/08</td>
<td>9/8/08</td>
<td>Bacteria</td>
<td>Other; Boat; Wildlife; Stormwater</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Henderson State Park Beach</td>
<td>3/3/08</td>
<td>3/10/08</td>
<td>Bacteria</td>
<td>Wildlife; Sew-break; Other; Stormwater</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Lincoln Park</td>
<td>8/25/08</td>
<td>9/8/08</td>
<td>Bacteria</td>
<td>Stormwater; Boat; Comb-sew-overflow; Wildlife; Sanitary-sew-over; Other</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Liza Jackson Park</td>
<td>3/3/08</td>
<td>3/10/08</td>
<td>Bacteria</td>
<td>Stormwater; Comb-sew-overflow; Other; Boat; Sanitary-sew-over; Wildlife</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Liza Jackson Park</td>
<td>3/17/08</td>
<td>3/24/08</td>
<td>Bacteria</td>
<td>Stormwater; Comb-sew-overflow; Other; Boat; Sanitary-sew-over; Wildlife</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Liza Jackson Park</td>
<td>9/2/08</td>
<td>9/8/08</td>
<td>Bacteria</td>
<td>Stormwater; Comb-sew-overflow; Other; Boat; Sanitary-sew-over; Wildlife</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Poquito Park</td>
<td>3/3/08</td>
<td>3/10/08</td>
<td>Bacteria</td>
<td>Wildlife; Other; Stormwater; Boat</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Poquito Park</td>
<td>4/28/08</td>
<td>5/5/08</td>
<td>Bacteria</td>
<td>Wildlife; Other; Stormwater; Boat</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Rocky Bayou (Fred Gannon State Park)</td>
<td>7/1/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Septic; Other; Stormwater; Comb-sew-overflow; Boat</td>
</tr>
<tr>
<td>Okaloosa</td>
<td>Rocky Bayou (Fred Gannon State Park)</td>
<td>12/1/08</td>
<td>12/8/08</td>
<td>Bacteria</td>
<td>Septic; Other; Stormwater; Comb-sew-overflow; Boat</td>
</tr>
<tr>
<td>Pasco</td>
<td>Anclote River Park Beach</td>
<td>1/14/08</td>
<td>1/22/08</td>
<td>Bacteria</td>
<td>Boat; Unknown; Stormwater; Sanitary-sew-over; Wildlife</td>
</tr>
<tr>
<td>Pasco</td>
<td>Brasher Park Beach</td>
<td>1/14/08</td>
<td>1/22/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Unknown</td>
</tr>
<tr>
<td>Pasco</td>
<td>Brasher Park Beach</td>
<td>2/18/08</td>
<td>3/24/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------</td>
<td>---------------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------------</td>
<td>-------------------------------</td>
</tr>
<tr>
<td>Pasco</td>
<td>Brasher Park Beach</td>
<td>4/7/08</td>
<td>4/14/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Unknown</td>
</tr>
<tr>
<td>Pasco</td>
<td>Brasher Park Beach</td>
<td>7/28/08</td>
<td>8/11/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Unknown</td>
</tr>
<tr>
<td>Pasco</td>
<td>Energy and Marine Center</td>
<td>2/5/08</td>
<td>3/10/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Unknown</td>
</tr>
<tr>
<td>Pasco</td>
<td>Energy and Marine Center</td>
<td>7/7/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Unknown</td>
</tr>
<tr>
<td>Pasco</td>
<td>Energy and Marine Center</td>
<td>8/4/08</td>
<td>8/11/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Unknown</td>
</tr>
<tr>
<td>Pasco</td>
<td>Energy and Marine Center</td>
<td>8/25/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Unknown</td>
</tr>
<tr>
<td>Pasco</td>
<td>Energy and Marine Center</td>
<td>12/1/08</td>
<td>12/8/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Unknown</td>
</tr>
<tr>
<td>Pasco</td>
<td>Energy and Marine Center</td>
<td>12/15/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Unknown</td>
</tr>
<tr>
<td>Pasco</td>
<td>Gulf Harbors Beach</td>
<td>4/7/08</td>
<td>4/14/08</td>
<td>Bacteria</td>
<td>Wildlife; Stormwater; Boat; Unknown</td>
</tr>
<tr>
<td>Pasco</td>
<td>Gulf Harbors Beach</td>
<td>6/2/08</td>
<td>6/9/08</td>
<td>Bacteria</td>
<td>Wildlife; Stormwater; Boat; Unknown</td>
</tr>
<tr>
<td>Pasco</td>
<td>Gulf Harbors Beach</td>
<td>7/16/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Wildlife; Stormwater; Boat; Unknown</td>
</tr>
<tr>
<td>Pasco</td>
<td>Gulf Harbors Beach</td>
<td>8/25/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Wildlife; Stormwater; Boat; Unknown</td>
</tr>
<tr>
<td>Pasco</td>
<td>Oelsner Park Beach</td>
<td>4/7/08</td>
<td>4/14/08</td>
<td>Bacteria</td>
<td>Boat; Unknown; Wildlife; Stormwater</td>
</tr>
<tr>
<td>Pasco</td>
<td>Oelsner Park Beach</td>
<td>4/28/08</td>
<td>5/12/08</td>
<td>Bacteria</td>
<td>Boat; Unknown; Wildlife; Stormwater</td>
</tr>
<tr>
<td>Pasco</td>
<td>Oelsner Park Beach</td>
<td>5/19/08</td>
<td>5/27/08</td>
<td>Bacteria</td>
<td>Boat; Unknown; Wildlife; Stormwater</td>
</tr>
<tr>
<td>Pasco</td>
<td>Oelsner Park Beach</td>
<td>6/24/08</td>
<td>6/30/08</td>
<td>Bacteria</td>
<td>Boat; Unknown; Wildlife; Stormwater</td>
</tr>
<tr>
<td>Pasco</td>
<td>Oelsner Park Beach</td>
<td>7/16/08</td>
<td>7/28/08</td>
<td>Bacteria</td>
<td>Boat; Unknown; Wildlife; Stormwater</td>
</tr>
<tr>
<td>Pasco</td>
<td>Oelsner Park Beach</td>
<td>8/25/08</td>
<td>9/22/08</td>
<td>Bacteria</td>
<td>Boat; Unknown; Wildlife; Stormwater</td>
</tr>
<tr>
<td>Pasco</td>
<td>Robert J. Strickland</td>
<td>1/2/08</td>
<td>2/5/08</td>
<td>Bacteria</td>
<td>Boat; Wildlife; Unknown; Stormwater</td>
</tr>
<tr>
<td>Pasco</td>
<td>Robert J. Strickland</td>
<td>2/11/08</td>
<td>2/18/08</td>
<td>Bacteria</td>
<td>Boat; Wildlife; Unknown; Stormwater</td>
</tr>
<tr>
<td>Pasco</td>
<td>Robert J. Strickland</td>
<td>3/10/08</td>
<td>3/17/08</td>
<td>Bacteria</td>
<td>Boat; Wildlife; Unknown; Stormwater</td>
</tr>
<tr>
<td>Pasco</td>
<td>Robert J. Strickland</td>
<td>4/7/08</td>
<td>4/21/08</td>
<td>Bacteria</td>
<td>Boat; Wildlife; Unknown; Stormwater</td>
</tr>
<tr>
<td>Pasco</td>
<td>Robert J. Strickland</td>
<td>7/7/08</td>
<td>9/15/08</td>
<td>Bacteria</td>
<td>Boat; Wildlife; Unknown; Stormwater</td>
</tr>
<tr>
<td>Pasco</td>
<td>Robert J. Strickland</td>
<td>12/1/08</td>
<td>12/8/08</td>
<td>Bacteria</td>
<td>Boat; Wildlife; Unknown; Stormwater</td>
</tr>
<tr>
<td>Pasco</td>
<td>Robert J. Strickland</td>
<td>12/29/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Boat; Wildlife; Unknown; Stormwater</td>
</tr>
<tr>
<td>Pasco</td>
<td>Robert K. Rees Park Beach</td>
<td>1/2/08</td>
<td>1/22/08</td>
<td>Bacteria</td>
<td>Stormwater; Unknown; Wildlife</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------</td>
<td>------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------------------------------</td>
<td>---------------------------------------------</td>
</tr>
<tr>
<td>Pasco</td>
<td>Robert K. Rees Park Beach</td>
<td>6/9/08</td>
<td>6/16/08</td>
<td>Bacteria</td>
<td>Stormwater; Unknown; Wildlife</td>
</tr>
<tr>
<td>Pasco</td>
<td>Robert K. Rees Park Beach</td>
<td>7/28/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Stormwater; Unknown; Wildlife</td>
</tr>
<tr>
<td>Pasco</td>
<td>Robert K. Rees Park Beach</td>
<td>10/6/08</td>
<td>10/13/08</td>
<td>Bacteria</td>
<td>Unknown; Boat; Stormwater; Unknown; Wildlife</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Courtney Campbell Causeway</td>
<td>2/21/08</td>
<td>3/24/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Comb-sew-overflow; POTW; Stormwater; Sew-break; Sanitary-sew-over; Wildlife</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Honeymoon Island Beach</td>
<td>7/31/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Stormwater; Unknown; Sew-break; Boat</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Mobbly Bayou Preserve</td>
<td>1/2/08</td>
<td>1/3/08</td>
<td>Bacteria</td>
<td>Wildlife; Sew-break; Stormwater; Unknown; Comb-sew-overflow; Sanitary-sew-over; Boat</td>
</tr>
<tr>
<td>Pinellas</td>
<td>Mobbly Bayou Preserve</td>
<td>3/20/08</td>
<td>3/25/08</td>
<td>Bacteria</td>
<td>Wildlife; Sew-break; Stormwater; Unknown; Comb-sew-overflow; Sanitary-sew-over; Boat</td>
</tr>
<tr>
<td>Pinellas</td>
<td>North Shore Beach</td>
<td>1/2/08</td>
<td>1/8/08</td>
<td>Bacteria</td>
<td>Comb-sew-overflow; Unknown; Stormwater; Sanitary-sew-over; Wildlife; Boat; Sew-break</td>
</tr>
<tr>
<td>Pinellas</td>
<td>North Shore Beach</td>
<td>4/3/08</td>
<td>4/17/08</td>
<td>Bacteria</td>
<td>Comb-sew-overflow; Unknown; Stormwater; Sanitary-sew-over; Wildlife; Boat; Sew-break</td>
</tr>
<tr>
<td>Pinellas</td>
<td>North Shore Beach</td>
<td>7/2/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Comb-sew-overflow; Unknown; Stormwater; Sanitary-sew-over; Wildlife; Boat; Sew-break</td>
</tr>
<tr>
<td>Pinellas</td>
<td>North Shore Beach</td>
<td>7/31/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Stormwater; Sanitary-sew-over; Boat; Wildlife; Sew-break; Comb-sew-overflow; Unknown</td>
</tr>
<tr>
<td>Santa Rosa</td>
<td>Navarre Park</td>
<td>12/15/08</td>
<td>12/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Rosa</td>
<td>Shoreline Park</td>
<td>9/3/08</td>
<td>9/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Santa Rosa</td>
<td>Shoreline Park</td>
<td>11/24/08</td>
<td>12/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Blind Pass Beach</td>
<td>7/17/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Septic; Stormwater; Wildlife</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Brohard Beach</td>
<td>6/18/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Septic</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Brohard Beach</td>
<td>7/15/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Stormwater; Wildlife; Septic</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Manasota Beach</td>
<td>6/18/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Boat; Stormwater; Septic; Wildlife</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Siesta Key Public Beach</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Boat; Sew-break; Stormwater; Wildeife</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Venice Fishing Pier</td>
<td>6/18/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Boat; Septic; Stormwater; Wildlife</td>
</tr>
<tr>
<td>Sarasota</td>
<td>Venice Public Beach</td>
<td>6/18/08</td>
<td>6/23/08</td>
<td>Bacteria</td>
<td>Sew-break; Wildeife; Stormwater</td>
</tr>
<tr>
<td>Taylor</td>
<td>Cedar Island</td>
<td>1/7/08</td>
<td>4/14/08</td>
<td>Bacteria</td>
<td>Stormwater; Unknown; Wildlife; Boat; Septic</td>
</tr>
<tr>
<td>Taylor</td>
<td>Cedar Island</td>
<td>5/5/08</td>
<td>12/9/08</td>
<td>Bacteria</td>
<td>Stormwater; Unknown; Wildlife; Boat</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>------------------------------</td>
<td>------------</td>
<td>-----------</td>
<td>-------------------</td>
<td>---------------------------------------------</td>
</tr>
<tr>
<td>Taylor</td>
<td>Dekle Beach</td>
<td>1/7/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Stormwater; Boat; Septic; Unknown; Wildlife</td>
</tr>
<tr>
<td>Taylor</td>
<td>Hagen’s Cove</td>
<td>1/7/08</td>
<td>12/9/08</td>
<td>Bacteria</td>
<td>Boat; Unknown; Stormwater; Wildlife</td>
</tr>
<tr>
<td>Taylor</td>
<td>Keaton Beach</td>
<td>1/7/08</td>
<td>4/14/08</td>
<td>Bacteria</td>
<td>Boat; Unknown; Stormwater; Wildlife</td>
</tr>
<tr>
<td>Taylor</td>
<td>Keaton Beach</td>
<td>5/5/08</td>
<td>5/19/08</td>
<td>Preempt-other</td>
<td>Stormwater; Unknown; Boat; Wildlife</td>
</tr>
<tr>
<td>Taylor</td>
<td>Keaton Beach</td>
<td>6/2/08</td>
<td>12/9/08</td>
<td></td>
<td>Boat; Unknown; Stormwater; Wildlife</td>
</tr>
<tr>
<td>Volusia</td>
<td>International Speedway, Daytona Beach</td>
<td>2/19/08</td>
<td>3/4/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Volusia</td>
<td>Main, Daytona Beach</td>
<td>2/19/08</td>
<td>3/18/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Volusia</td>
<td>Main, Daytona Beach</td>
<td>4/1/08</td>
<td>4/8/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Volusia</td>
<td>Silver Beach, Daytona Beach</td>
<td>1/30/08</td>
<td>2/5/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Volusia</td>
<td>Silver Beach, Daytona Beach</td>
<td>2/26/08</td>
<td>3/18/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Wakulla</td>
<td>Mash Island</td>
<td>3/3/08</td>
<td>12/8/08</td>
<td>Bacteria</td>
<td>Wildlife; Boat; Septic; Stormwater; Unknown</td>
</tr>
<tr>
<td>Wakulla</td>
<td>Shell Point Beach</td>
<td>3/3/08</td>
<td>3/10/08</td>
<td>Bacteria</td>
<td>Septic; Stormwater; Unknown; Boat; Wildlife</td>
</tr>
<tr>
<td>Wakulla</td>
<td>Shell Point Beach</td>
<td>3/17/08</td>
<td>5/27/08</td>
<td>Bacteria</td>
<td>Septic; Stormwater; Unknown; Boat; Wildlife</td>
</tr>
<tr>
<td>Wakulla</td>
<td>Shell Point Beach</td>
<td>6/2/08</td>
<td>6/9/08</td>
<td>Bacteria</td>
<td>Septic; Stormwater; Unknown; Boat; Wildlife</td>
</tr>
<tr>
<td>Wakulla</td>
<td>Shell Point Beach</td>
<td>6/16/08</td>
<td>11/24/08</td>
<td>Bacteria</td>
<td>Septic; Stormwater; Unknown; Boat; Wildlife</td>
</tr>
</tbody>
</table>

Explanation of Frequently Used Terms: Comb-sew-overflow, Combined sewer overflow; POTW: Publicly owned treatment works; Preempt-other, Preemptive due to reasons not listed here; Sanitary-sew-over, Sanitary sewer overflow; Sew-break, Sewer line blockage/break.

Notes

2 David Polk, Florida Department of Health, personal communication, June 2009.
4 Andrew Reich, Florida Department of Health, personal communication, May 2008.
GEORGIA
7th in beachwater quality (2% of samples exceeded national standards)

Georgia has 41 public beaches along 118 miles of Atlantic Coast and barrier islands in Camden, Glynn, McIntosh, Liberty, and Chatham Counties.

The Coastal Resources Division of the Georgia Department of Natural Resources administers Georgia’s beach monitoring and notification program. This agency determines sampling practices, locations, and standards, and notification protocols and practices at coastal beaches throughout the state.

Most of the monitored beaches are sampled year-round. Beaches that are not monitored year-round are sampled from April through November. Extreme drought conditions statewide probably resulted in better-than-normal beachwater quality in 2008.

The Department of Natural Resources’ Environmental Protection Division uses beach monitoring data to develop lists of beaches that support and do not support recreation as part of the state’s water quality report to the EPA.1

Georgia used to have huge oyster reefs, but they were overharvested and destroyed. Their loss is thought to have led to increased erosion and poorer water quality as well as the loss of a food source. Methods of restoring the oyster population are being tested, and water quality downstream of the pilot installations of oyster reefs is being monitored to determine if there has been any improvement thus far.

The Coastal Health District continues to conduct sanitary surveys begun in 2008 at the Jekyll, St. Simons, and Tybee Island beaches in order to determine the cause of beachwater contamination at these sites. To date, no major sources of contamination have been found.

In late 2007, the University of Georgia produced a brochure that informs the public about sources of bacterial contamination and how pet waste, wildlife waste, boat discharges, and septic tank failure can contribute to water quality problems at the beach.2 This brochure is distributed at coastal festivals and other outreach events.

No harmful algal blooms have occurred along the Georgia coast for several decades. However, the Coastal Health District has obtained a Coastal Incentive Grant through the NOAA to develop a harmful algal bloom response plan.

Georgia received a $282,700 federal BEACH Act grant in 2008, and was eligible for a grant of $286,000 in 2009. The BEACH Act grant fully funds Georgia’s monitoring and notification program.

Standards and Testing
Indicator Organism: Enterococcus

Standards: Georgia applies the EPA standard for enterococcus of a single-sample maximum of 104 cfu/100 ml and a geometric mean of 35 cfu/100 ml.

The state’s beachwater quality does not appear to correlate strongly with any measured parameters, including rainfall.1 Thus, Georgia has no preemptive rainfall advisory standards and does not make use of predictive models for issuing beach advisories. However, permanent advisories are issued for beaches that have ongoing water quality issues. For example, Kings Ferry has been under permanent advisory since 2006.1 The Health Department can issue a closing in the case of an immediate threat to public health, such as a sewage spill.

Monitoring
Determination of Monitoring Locations and Frequency: Beaches are ranked into three tiers, with Tier 1 beaches receiving the most monitoring and Tier 3 the least. Beaches that are assigned Tier 1 status have large populations nearby, have tourist accommodations, are easily accessible, and have the most amenities. They are monitored once a week. Tier 2
beaches are less accessible and have a smaller nearby population. Tier 3 beaches are the most remote beaches in uninhabited areas.

**Practice:** Samples are taken in about three feet of water (from wavetop) at a depth of 15-30 centimeters. Samples are generally taken in the morning so that they can reach the laboratory in time to be processed that day. Lab results for samples that are received by the laboratory by 2 pm are available the following day by 3 pm. For Tier 1 beaches, sampling took place on Tuesdays with resampling on Thursdays. For Tier 2 beaches, sampling took place Monday through Thursday, with most of the sampling occurring on Wednesdays.1

**Results:** In 2008, Georgia reported 41 coastal beaches, 17 (41%) of which were monitored once a week, 9 (22%) once a month, 1 (2%) less than once a month, and 14 (34%) were not monitored. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 2 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Kings Ferry (40%) and Skidaway Narrows in Chatham County (13%), and Jekyll Clam Creek (7%), 12 St. Goulds Inlet (SSI) (6%), St. Andrews Picnic Area (Jekyll) (4%), and Massengale (SSI) in Glynn County (4%).

Glynn County had the highest exceedance rate (3%) followed by Chatham (1%), and McIntosh (0%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 27 beaches, the percent of samples exceeding the standard decreased to 2 percent in 2008, the lowest level since 2005 (4, 4, and 10 percent in 2007, 2006, and 2005, respectively).

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Camden</td>
<td>Little Cumberland</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chatham</td>
<td>Kings Ferry</td>
<td>2</td>
<td>4/yr</td>
<td>5</td>
<td>40%</td>
</tr>
<tr>
<td>Chatham</td>
<td>Skidaway Narrows</td>
<td>2</td>
<td>1/mo</td>
<td>8</td>
<td>13%</td>
</tr>
<tr>
<td>Chatham</td>
<td>Tybee Island Polk St.</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Chatham</td>
<td>Tybee Island South</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Chatham</td>
<td>Tybee Island Middle</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Chatham</td>
<td>Tybee Island North</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Chatham</td>
<td>Tybee Island Strand</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Chatham</td>
<td>South Ossabaw</td>
<td>2</td>
<td>1/mo</td>
<td>8</td>
<td>0%</td>
</tr>
<tr>
<td>Chatham</td>
<td>Bradley (Ossabaw)</td>
<td>2</td>
<td>1/mo</td>
<td>8</td>
<td>0%</td>
</tr>
<tr>
<td>Chatham</td>
<td>Middle Ossabaw</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chatham</td>
<td>Little Tybee Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chatham</td>
<td>Williamson Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chatham</td>
<td>Wassaw Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Glynn</td>
<td>Jekyll Clam Creek</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>7%</td>
</tr>
</tbody>
</table>
### County Beach Tier Monitoring Frequency Total Samples Percent Exceedance

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Glynn</td>
<td>12 St. Goulds Inlet (Ssi)</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>6%</td>
</tr>
<tr>
<td>Glynn</td>
<td>St. Andrews Picnic Area (Jekyll)</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>4%</td>
</tr>
<tr>
<td>Glynn</td>
<td>Massengale (Ssi)</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>4%</td>
</tr>
<tr>
<td>Glynn</td>
<td>Jekyll North At Dexter Lane</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>2%</td>
</tr>
<tr>
<td>Glynn</td>
<td>Capt. Wylly (Jekyll) Near Beachview</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Glynn</td>
<td>Convention Center (Jekyll)</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Glynn</td>
<td>South Dunes (Jekyll)</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Glynn</td>
<td>5th St. Crossover (Ssi)</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Glynn</td>
<td>East Beach Old Coast Guard (Ssi)</td>
<td>1</td>
<td>1/wk</td>
<td>54</td>
<td>2%</td>
</tr>
<tr>
<td>Glynn</td>
<td>Sea Island South</td>
<td>2</td>
<td>1/mo</td>
<td>8</td>
<td>0%</td>
</tr>
<tr>
<td>Glynn</td>
<td>4h Camp (Jekyll)</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Glynn</td>
<td>Sea Island North</td>
<td>2</td>
<td>1/mo</td>
<td>8</td>
<td>0%</td>
</tr>
<tr>
<td>Glynn</td>
<td>St. Simons Island Lighthouse</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Glynn</td>
<td>Blythe Island Regional Park Sandbar</td>
<td>2</td>
<td>1/mo</td>
<td>8</td>
<td>0%</td>
</tr>
<tr>
<td>Glynn</td>
<td>Reimolds Pasture (Little Ssi)</td>
<td>2</td>
<td>1/mo</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Glynn</td>
<td>Little St. Simons</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Glynn</td>
<td>Pelican Spit (Off Sea Island)</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Glynn</td>
<td>Rainbow Bar (Little Ssi)</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Liberty</td>
<td>Cumberland</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Liberty</td>
<td>St. Catherines Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>McIntosh</td>
<td>Dallas Bluff Sandbar</td>
<td>2</td>
<td>1/mo</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>McIntosh</td>
<td>Contentment Bluff Sandbar</td>
<td>2</td>
<td>1/mo</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>McIntosh</td>
<td>Wolf Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>McIntosh</td>
<td>Blackbeard Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>McIntosh</td>
<td>Cabretta (Sapelo)</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>McIntosh</td>
<td>Nanny Goat (Sapelo)</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>

N/A: Not applicable

### Advisories

**Advisory Issuance:** Georgia’s beachwater monitoring program issues advisories only. When either the single-sample or geometric mean standard is exceeded, the Coastal Resources Division notifies the Georgia Division of Public Health (now the Georgia Department of Health) and the local beach management entity. This entity issues an advisory, sends e-mail alerts, and notifies the media. At Tier 1 beaches, which are all located on either Tybee Island, St. Simons, or Jekyll Island, the local beach management entity also activates permanent metal signs at the beach when an advisory is issued. Last fall, many Tybee Island signs were stolen or vandalized. When they were replaced, they were replaced with Spanish/English bilingual signs. New bilingual signs at Jekyll Island and St. Simons Island beaches will be installed this fall.

The public is notified within 24 hours. There is no protocol for foregoing an advisory when an exceedance is found, and resampling to confirm an exceedance is not done before an advisory is issued. Entire beaches, not sections, are placed under advisory. Monitoring results and advisories are posted on the department’s website.

**Reopening Procedures:** The monitoring frequency for a beach increases when an exceedance occurs: for a Tier 1 beach under advisory, the beach is resampled the following day (the day after the lab results are received) and then twice weekly until the bacteria levels drop below the threshold level. For Tier 2 beaches under advisory, the beach is resampled weekly.
until the bacteria levels drop. When both the geometric mean and the single-sample maximum are within the BEACH Act–required standards, the local beach management entity drops the advisory.¹ States that monitor more frequently after an exceedance is found will tend to have higher percent exceedance rates and lower closing/advisory days than they would have had if their sampling frequency did not increase after an exceedance was found.

**Number of Advisories:** Georgia had 19 advisory events lasting six consecutive weeks or less in 2008. Total advisory days for 19 events lasting six consecutive weeks or less decreased 60 percent to 72 days in 2008 from 181 days in 2007, 203 days in 2006, and 528 days in 2005. In addition, there were no extended events and one permanent event (365 days total) in 2008. Extended events are those in effect more than six consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. In 2007, there were no extended events and 1 permanent event (364 days total).

**Causes of Advisories:** All advisory days in 2008 were due to monitoring that revealed elevated bacteria levels from unknown sources of contamination.

### 2008 Georgia Beach Advisories

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Chatham</td>
<td>Kings Ferry</td>
<td>1/1/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Chatham</td>
<td>Skidaway Narrows</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>12 St. Goulds Inlet (SSI)</td>
<td>3/19/08</td>
<td>3/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>12 St. Goulds Inlet (SSI)</td>
<td>5/28/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>12 St. Goulds Inlet (SSI)</td>
<td>11/13/08</td>
<td>11/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>5th St. Crossover (SSI)</td>
<td>4/9/08</td>
<td>4/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>Capt. Wylly (Jekyll) Near Beachview</td>
<td>4/23/08</td>
<td>4/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>Convention Center (Jekyll)</td>
<td>11/5/08</td>
<td>11/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>East Beach Old Coast Guard (SSI)</td>
<td>4/9/08</td>
<td>4/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>East Beach Old Coast Guard (SSI)</td>
<td>10/15/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>Jekyll Clam Creek</td>
<td>2/20/08</td>
<td>2/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>Jekyll Clam Creek</td>
<td>3/5/08</td>
<td>3/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>Jekyll Clam Creek</td>
<td>11/13/08</td>
<td>11/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>Jekyll Clam Creek</td>
<td>12/10/08</td>
<td>12/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>Jekyll North At Dexter Lane</td>
<td>12/23/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>Massengale (SSI)</td>
<td>3/19/08</td>
<td>3/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>Massengale (SSI)</td>
<td>4/9/08</td>
<td>4/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>South Dunes (Jekyll)</td>
<td>1/23/08</td>
<td>1/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>St. Andrews Picnic Area (Jekyll)</td>
<td>12/10/08</td>
<td>12/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Glynn</td>
<td>St. Andrews Picnic Area (Jekyll)</td>
<td>12/23/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

**Notes**

1 Elizabeth Cheney, Beach Water Quality Manager, Georgia Department of Natural Resources, personal communication, June 2009.
2 University of Georgia. PAWS: Promoting Animal Stewardship (brochure). Nor dated.
HAWAII

6th in beachwater quality (2% of samples exceeded national standards)

Hawaii has more than 400 public beaches stretching along nearly 300 miles of Pacific Ocean coastline. Its beachwater monitoring program is administered by the Clean Water Branch of the Hawaii Department of Health. Sampling practices, locations, standards, and notification protocols and practices are uniform throughout the state. The monitoring season in this tropical state is year-round.

In February of 2009, the USS Port Royal was grounded on a reef off the Honolulu International Airport’s reef runway. Upon investigation, the beach program learned that the Port Royal had discharged sewage while grounded without notifying the state, and that Navy ships may be discharging sewage to Hawaiian waters on a regular basis without notification.

When beachwater samples are found to exceed standards, a sanitary survey is performed. If the sanitary survey does not reveal the source of the contamination, Hawaii’s beach program initiates what they call the Kualoa Procedure. They sample several locations along the beach to locate the area of highest bacterial contamination. If the source of contamination cannot be found after pinpointing the area of greatest contamination, they test for human health pharmaceuticals, wastewater compounds, and isotopes of nitrogen that are found in sewage sludge. These chemicals are not present if waterfowl are the source of elevated bacteria levels.1

Hawaii funded a study on Maui that is a continuation of “proof of concept” reconnaissance methods for wastewater and nutrient source tracking in recreational waters. Multiple wastewater tracers were detected in marine water-column and algae samples at Kihei and Lahaina.1 In a separate source-tracking research effort, monitoring data from 2008 were used to identify several possible sites for a Water Environment Research Foundation-funded study.1

Hawaii’s beach monitoring program participates in numerous elementary school environmental fairs and beach cleanup events, educating the public about actions they can take to reduce beachwater pollution.1 The state has an ongoing storm drain stenciling project that warns people not to throw trash into storm drains because it will end up in the ocean.1

Harmful algal blooms are rare in Hawaii, and there is no monitoring program for detecting them.1 However, program staff have noticed an increase in nontoxic algal blooms and this has sparked interest in identifying and monitoring them.

Hawaii received a $318,590 federal BEACH Act grant in 2008 and was eligible for a $323,000 grant in 2009. An estimated $580,000 in state funds was spent in 2008 to support nine of the staff members in the beach monitoring program.1

Standards and Testing

Indicator Organisms: Enterococcus and Clostridium perfringens

Standards: Hawaii’s standards for enterococcus in 2008 were stricter than the BEACH Act-mandated standards with a single-sample maximum of 100 cfu/100 ml and a geometric mean standard of 7 cfu/100 ml. Hawaii recently revised their water quality standards to match the national standard, and the current enterococcus standards are a single-sample maximum of 104 cfu/100ml and a geometric mean standard of 35 cfu/100ml.

Hawaii does not rely on enterococcus levels alone when determining whether to post a warning at a beach. Because enterococcus has been found to be ubiquitous, the Department of Health has concluded that when enterococcus is found in near shore waters, it may indicate contamination from sources not related to human sewage. They believe contamination from human sewage is more likely to cause illness. Therefore, the state also measures levels of Clostridium perfringens,
which is another bacteria found at high concentrations in human feces. Human fecal contamination is suspected only if levels of both indicators are elevated. In 2008, Hawaii’s “level of warning” for *C. perfringens* was 50 cfu/100 ml.1

As mentioned earlier, Hawaii tests for human health pharmaceuticals, wastewater compounds, and isotopes of nitrogen that are found in sewage sludge if the source of elevated bacteria levels cannot be found. The pharmaceuticals cotinine (a metabolite of nicotine), carbamazepine (an anticonvulsant and mood stabilizing drug used primarily in the treatment of epilepsy and bipolar disorder), and sulfamethoxazole (an antibiotic) have been detected in Hawaii’s ocean waters. Wastewater chemicals that have been detected are 4-nonylphenol, 5-methyl-1H-benzotriazole, bisphenol, triphenyl phosphate, and tri(nichloroisopropyl) phosphate. Nitrogen isotopes associated with sewage have also been detected.1

Pre-emptive rainfall advisories are issued when a flood warning issued by the National Weather Service indicates that there will be a discharge of significant quantities of turbid storm waters into coastal areas. When there is a storm event that does not generate a flood warning but that creates turbid waters with debris and possible dead animals in the near shore waters, a preemptive rainfall advisory may be issued. These pre-emptive rainfall advisories, called “Brown Water Advisories,” can be issued statewide, island-wide, or to specific areas of one island. If a sewage spill is suspected or if there are indications of human fecal contamination, the beach is posted immediately and a sample is taken.1

## Monitoring

**Determination of Monitoring Locations and Frequency:** Hawaii’s beach monitoring program prioritizes sampling efforts based on the risk of illness to swimmers and the frequency of use. The most heavily used and potentially polluted beaches on Oahu are monitored three times a week, while less frequently used beaches that do not have a history of bacterial contamination are monitored once to twice a week. Another group of beaches that are not frequented as often, are somewhat inaccessible, and are characterized by low bacteria counts are monitored at least once a year.1

**Practice:** Samples are taken in the morning one foot below the surface in water that is knee to waist deep. Sampling results are known 24 hours after sampling. Samples are generally taken on Mondays, Wednesdays, or Thursdays.1

**Results:** In 2008, Hawaii reported 444 coastal beaches, 48 (11%) of which were monitored more than once a week, 57 (13%) once a week, 19 (4%) every other week, 13 (3%) once a month, 105 (24%) less than once a month, 192 (43%) were not monitored, and there was no monitoring information for 8 (2%) beaches. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 2 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance in 2008 were Waimea Rec. Pier St. Pk. on the Island of Kauai (23%), Ka’alawai Beach on Oahu (10%), Pohoiki Beach on the Big Island of Hawaii (10%), and Kuhio Beach Park (7%), Poka’i Bay Beach Co. Pk. (6%), and Queen’s Surf Beach Park on Oahu (6%).

The island of Kauai had the highest exceedance rate (4%) followed by Oahu (2%), The Big Island of Hawaii (2%), and Maui (1%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 37 beaches, which is a very small portion of the total number of beaches in Hawaii, the percent of samples exceeding the standard decreased to 2 percent in 2008 – the lowest level since 2005 (9, 3, and 4 percent in 2007, 2006, and 2005, respectively); there was less rain in Hawaii in 2008.

Hawaii reports that although beaches are set to be sampled at a specified frequency, circumstances such as the area being inaccessible at the time, sampler illness or vacation, or lab closure may prevent those frequencies from being maintained.
## 2008 Hawaii Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Big Island</td>
<td>Pohoiki Beach</td>
<td>2</td>
<td>2/mo</td>
<td>10</td>
<td>10%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kauna'oa Beach</td>
<td>3</td>
<td>2/mo</td>
<td>20</td>
<td>5%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Honoli'i Beach Co. Park</td>
<td>1</td>
<td>No data</td>
<td>106</td>
<td>5%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kawaihale Harbor</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>5%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kamakaokahonu</td>
<td>2</td>
<td>6/mo</td>
<td>141</td>
<td>4%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Keaukaha Beach Park</td>
<td>5</td>
<td>2/mo</td>
<td>23</td>
<td>4%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Leleiwi Beach Co. Pk.</td>
<td>1</td>
<td>2/mo</td>
<td>157</td>
<td>3%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Wawaloli Beach</td>
<td>2</td>
<td>No data</td>
<td>36</td>
<td>3%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Puako</td>
<td>3</td>
<td>6/mo</td>
<td>76</td>
<td>3%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Anaeho’omalu Bay</td>
<td>1</td>
<td>6/mo</td>
<td>80</td>
<td>3%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Hilo Bayfront</td>
<td>1</td>
<td>2/wk</td>
<td>118</td>
<td>3%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Hapuna Beach St. Rec. Area</td>
<td>3</td>
<td>3/wk</td>
<td>33</td>
<td>3%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kahaluu’u Beach Co. Pk.</td>
<td>3</td>
<td>6/mo</td>
<td>75</td>
<td>1%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Onekahakaha Beach Co. Pk.</td>
<td>1</td>
<td>2/wk</td>
<td>145</td>
<td>1%</td>
</tr>
<tr>
<td>Big Island</td>
<td>James Kealoha Park</td>
<td>1</td>
<td>2/wk</td>
<td>106</td>
<td>1%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Laupahoehoe Beach Co. Park</td>
<td>3</td>
<td>6/yr</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Coconut Island Park</td>
<td>2</td>
<td>No data</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Pine Trees</td>
<td>2</td>
<td>2/wk</td>
<td>22</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Analani Pond (Pual’a)</td>
<td>1</td>
<td>2/wk</td>
<td>105</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Whittington Beach Co. Pk.</td>
<td>3</td>
<td>2/mo</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Keahou Bay (Kona)</td>
<td>3</td>
<td>2/mo</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>2nd Beach (Next to Mahaiula)</td>
<td>3</td>
<td>2/mo</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Punalu’u</td>
<td>3</td>
<td>2/mo</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Manini’owali</td>
<td>2</td>
<td>2/mo</td>
<td>27</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Ice Pond (single point)</td>
<td>2</td>
<td>2/mo</td>
<td>22</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Ohai’ula Beach</td>
<td>2</td>
<td>2/mo</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Ka’upulehu</td>
<td>3</td>
<td>2/mo</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Ka Lae (South Point)</td>
<td>3</td>
<td>2/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Radio Bay</td>
<td>3</td>
<td>2/yr</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kehena</td>
<td>3</td>
<td>2/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Waipi’o Bay</td>
<td>3</td>
<td>2/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kawa Bay</td>
<td>3</td>
<td>2/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kalapana Beach (new) (Harry K. Brown Beach Co. Pk.)</td>
<td>3</td>
<td>2/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kapoho Tidepools (Vacationland)</td>
<td>2</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Lehia Beach Co. Pk.</td>
<td>3</td>
<td>2/yr</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Ninole</td>
<td>3</td>
<td>2/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kolekole Beach Co. Park</td>
<td>3</td>
<td>2/yr</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Hakalau Co. Pk.</td>
<td>3</td>
<td>2/yr</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Big Island</td>
<td>Mahukona Beach Co. Pk.</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Old Kona Airport (Pawai)</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Big Island</td>
<td>Nanawale Co. Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Spencer Beach Co. Pk.</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kea’au</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Honopue</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kaluhiaka’a Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kiholo Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Honolulu Landing</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kalahiki Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Lapakahi St. Hist. Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Napo‘apo’o Beach Co. Pk.</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kahuwai Bay</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Manini Point Co. Pk.</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Ho’okena</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Mau’umaе Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Cape Kumukahi</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Papa’i (King’s Landing)</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Pololu Valley</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Makole’a Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Pohue Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Reeds Bay Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Green Sand Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kulu’e Pt.</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Miloli’i Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Pu’uhonua Pt. (Pu’u o Honaunau)</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Ka’iliki’i</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Old Kona Airport St. Rec. Area</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Honokohau Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Waialea Bay</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kapoho Bay</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>White Sands Beach Co. Pk. (Magic Sands)</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Isaac Hale Beach Co. Pk.</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Ka’alu’alu Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Banyan’s Surfing Area</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Honokea</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Road to the Sea</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Manuka Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Apua</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Honokane Nui</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Mahai’ula Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kamehame Hill</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Honokane Iki</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kealia Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Wai’ahukini</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>MacKenzie State Rec. Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Keokea Beach Co. Pk.</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Waimanu Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Halape Shelter</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Hawaiian Beaches Co. Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Onomea</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Ke’ei</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Paiahaa</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kapa’a Beach Co. Pk.</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Pu’u Hou</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kuki’o</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Mauna Lani (Kalahuipua’a)</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Makalavena</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Heeia</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Keawaiki</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Pueo Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Pahoehoe Beach Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Hawaiian Paradise Co. Pk.</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Honomalino Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kamoa Pt.</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Big Island</td>
<td>Kapu’a Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Lumaha’i Beach</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>100%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Wainiha Bay</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>100%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Black Pot Beach Park</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>100%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Kekaha Beach Co. Pk.</td>
<td>2</td>
<td>1/yr</td>
<td>3</td>
<td>67%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Waimea Rec. Pier St. Pk.</td>
<td>2</td>
<td>2/mo</td>
<td>26</td>
<td>23%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Kalapaki Beach</td>
<td>1</td>
<td>2/wk</td>
<td>99</td>
<td>4%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Po’ipu Beach Co. Park</td>
<td>1</td>
<td>2/wk</td>
<td>98</td>
<td>4%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Hanalei Beach Co. Park</td>
<td>1</td>
<td>2/wk</td>
<td>50</td>
<td>2%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Salt Pond Beach Co. Park</td>
<td>1</td>
<td>1/yr</td>
<td>98</td>
<td>2%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Lydgate State Park</td>
<td>1</td>
<td>2/wk</td>
<td>99</td>
<td>1%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Tunnels Beach</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Glass Beach</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Waikoko Bay</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Spouting Horn Beach Co. Park</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Lucy Wright Beach Co. Park</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Kapa’a Beach Co. Park</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Kukui’ula Bay</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Prince Kuhio Park</td>
<td>2</td>
<td>No data</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>--------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Kauai</td>
<td>Princeville</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Pakala (Makaweli)</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Wai’ohai Beach</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Anini Beach Park</td>
<td>2</td>
<td>No data</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Sheraton Beach</td>
<td>2</td>
<td>2/wk</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Kepuhi Beach</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Anini Beach</td>
<td>2</td>
<td>1/yr</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Kawailoa Beach</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Anahola Beach</td>
<td>2</td>
<td>2/mo</td>
<td>25</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Barking Sands</td>
<td>2</td>
<td>2/mo</td>
<td>25</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Kikiaola Beach</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Wahiawa Bay</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Haula Beach</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Koloa Landing</td>
<td>2</td>
<td>2/mo</td>
<td>23</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Lawa’i Kai</td>
<td>3</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Brennecke Beach</td>
<td>2</td>
<td>2/mo</td>
<td>26</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Gilin’s Beach</td>
<td>2</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Palama Beach (Nomilu)</td>
<td>3</td>
<td>1/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Kauai</td>
<td>Port Allen</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Waialua Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Ha’ena Beach Co. Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Moloa’a Bay</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Maha’ulepu Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Larsens Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Kaupea Beach (Secret Beach)</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Waipouli</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Aliomanu Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Ke’e Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Ninini Pt.</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Na Pali Coast State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>(Honopuwaiaku) Honopu Valley</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Wai’oli Beach Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Donkey Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Kalalau Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Anahola Beach Co. Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Nu’alolo</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Niualu Beach Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Hanakapi’i Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Kalihiwai Bay</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Beach House Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Pacific Missile Range Facility</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>--------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Kauai</td>
<td>Polihale State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Waiakalua Iki Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Mili Mili</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Nukoli’il Beach Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Kealia</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Hanama’ulu Beach Co. Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Kilauea Pt. Nat. Wildlife Ref.</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Papa’a Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Kipu Kai</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Kahii Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Pila’a Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Waiakalua Nui Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Shipwreck Beach</td>
<td>2</td>
<td>1/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kauai</td>
<td>Ahukini Rec. Pier St.Pk.</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lanai</td>
<td>Kaunolu Bay</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lanai</td>
<td>Keomuku Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lanai</td>
<td>Polihua Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lanai</td>
<td>Kahemano Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lanai</td>
<td>Lopa Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lanai</td>
<td>Manele Bay</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lanai</td>
<td>Pu’u Pehe Cove</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lanai</td>
<td>Shipwreck Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lanai</td>
<td>Halepalaaoa Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lanai</td>
<td>Hulopoe Beach Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lanai</td>
<td>Naha Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Pu’unoa Beach</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>50%</td>
</tr>
<tr>
<td>Maui</td>
<td>H.P. Baldwin Beach Co. Pk.</td>
<td>2</td>
<td>2/yr</td>
<td>3</td>
<td>33%</td>
</tr>
<tr>
<td>Maui</td>
<td>Maliko Bay</td>
<td>2</td>
<td>2/yr</td>
<td>6</td>
<td>17%</td>
</tr>
<tr>
<td>Maui</td>
<td>Kanaha Beach Co. Park</td>
<td>1</td>
<td>2/wk</td>
<td>109</td>
<td>4%</td>
</tr>
<tr>
<td>Maui</td>
<td>Mai Poina Oe lau Beach Co. Pk.</td>
<td>2</td>
<td>2/mo</td>
<td>30</td>
<td>3%</td>
</tr>
<tr>
<td>Maui</td>
<td>Hanaka’o o Beach Co. Pk.</td>
<td>1</td>
<td>2/wk</td>
<td>103</td>
<td>3%</td>
</tr>
<tr>
<td>Maui</td>
<td>Kama’ole Beach 1</td>
<td>1</td>
<td>2/wk</td>
<td>103</td>
<td>2%</td>
</tr>
<tr>
<td>Maui</td>
<td>Launiupoko St. Wayside</td>
<td>1</td>
<td>2/wk</td>
<td>102</td>
<td>1%</td>
</tr>
<tr>
<td>Maui</td>
<td>Kahului Harbor</td>
<td>2</td>
<td>2/wk</td>
<td>103</td>
<td>1%</td>
</tr>
<tr>
<td>Maui</td>
<td>Wailea Beach Park</td>
<td>1</td>
<td>2/wk</td>
<td>101</td>
<td>1%</td>
</tr>
<tr>
<td>Maui</td>
<td>Ka’anapali</td>
<td>2</td>
<td>2/yr</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Papalaua</td>
<td>2</td>
<td>No data</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Polo Beach Park</td>
<td>2</td>
<td>2/yr</td>
<td>25</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Waihe’e Beach Co. Pk.</td>
<td>2</td>
<td>2/yr</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Honokowai Beach Co. Pk.</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Olowalu</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>----------------</td>
<td>-------------------</td>
</tr>
<tr>
<td>Maui</td>
<td>Waiehu Beach Co. Park</td>
<td>2</td>
<td>No data</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Keawakapu Beach</td>
<td>2</td>
<td>2/yr</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Fleming Beach North</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Kalepolepo Beach</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Po’olenalena Beach</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Ulu Beach Park</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Honolulu Bay</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Kalama Beach Co. Park</td>
<td>2</td>
<td>2/yr</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Ku’au Bay</td>
<td>2</td>
<td>2/yr</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Makena Landing Beach</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Wahikuli State Wayside Park</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Puamana Beach Co. Park</td>
<td>2</td>
<td>2/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Pu’u ola’i (Small Beach)</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Kama’ole Beach 2 (Ililiholo Beach)</td>
<td>2</td>
<td>2/yr</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Spreckelsville</td>
<td>1</td>
<td>2/wk</td>
<td>103</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Kama’ole Beach 3</td>
<td>1</td>
<td>2/wk</td>
<td>101</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Kapalua (Fleming’s) Beach</td>
<td>2</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Oneloa Beach (Big Beach)</td>
<td>2</td>
<td>2/yr</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Ukumehame Beach Co. Pk.</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Ma’alaea Beach</td>
<td>1</td>
<td>2/yr</td>
<td>105</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Kahana</td>
<td>2</td>
<td>3/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Palukoa Beach</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Ho’okipa Beach Co. Pk.</td>
<td>2</td>
<td>2/yr</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Mokule’ia Beach</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Lower Pa’ia</td>
<td>2</td>
<td>2/yr</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Mokapu Beach Park</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Malu’aka Beach</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Napili Bay</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Oneuli Beach</td>
<td>2</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Maui</td>
<td>Mokulau</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Koki Beach Park (VFW)</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Ahihi-kina’u Natural Area Reserve</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Honomanu Bay</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Ka’ili’ili Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Punalau</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Leho’ula Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Kea’a Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Kuiaha Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Mantokuji Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Paukukalo Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Kaihalulu Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------</td>
<td>---------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Maui</td>
<td>Kanaio Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Huakini Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>McGregor Pt.</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Hana Bay</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Kapoli Beach Co. Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Ke‘anae</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Hamoa</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Father Jules Papa</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Waimahā‘ihai Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Po‘olenalena Beach Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Honokeana Bay</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Keonenui Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Awalua Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Maka‘ala‘e Pt.</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Waikoloa Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>H-Poko Papa</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Pepeiaolepo Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Nu‘u Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Aina Keekai Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Wai‘anapanapa State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Maui</td>
<td>Nahiku</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Kamaka‘ipo Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Kanalukaha Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Halena Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Kapukuwahine Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Fagans Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Wailau</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>iliopī’i Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Puko‘o</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Awahua Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Kaunala Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Honouli Malo’o</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Kapukahehu Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Kakahai’a Beach Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Papohaku Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Oneaili‘i Beach Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Kaupoa Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Kolo Wharf</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Kawakiu Bay (Nui)</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>-------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Molokai</td>
<td>Murphy Beach Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Kahalepohaku Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Mo‘omomi Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Kiowea Park (Kamehameha Coconut Grove)</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Pohaku Maululi Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Kepuhi Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Papaloa Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Sandy Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Honouli Wai</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Kawa'aloa Bay</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Lighthouse Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Po'olau Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Pelekunu</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Molokai</td>
<td>Halawa Beach Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Wailupe Beach Park</td>
<td>2</td>
<td>1/mo</td>
<td>2</td>
<td>100%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Niu</td>
<td>2</td>
<td>1/wk</td>
<td>1</td>
<td>100%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kane‘ohe Bay</td>
<td>2</td>
<td>1/wk</td>
<td>3</td>
<td>67%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kahana Bay</td>
<td>2</td>
<td>4/wk</td>
<td>2</td>
<td>50%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Mokule‘ia Beach</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>50%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Punalu’u Beach Co. Park</td>
<td>2</td>
<td>4/wk</td>
<td>3</td>
<td>33%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kuli‘ou’ou</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>25%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ke‘ehi Lagoon</td>
<td>2</td>
<td>1/wk</td>
<td>6</td>
<td>17%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ka‘alawai Beach</td>
<td>2</td>
<td>1/wk</td>
<td>21</td>
<td>10%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kuhio Beach Park</td>
<td>1</td>
<td>3/wk</td>
<td>119</td>
<td>7%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Queen’s Surf Beach Park</td>
<td>1</td>
<td>2/wk</td>
<td>84</td>
<td>6%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Poka’i Bay Beach Co. Pk.</td>
<td>1</td>
<td>3/wk</td>
<td>106</td>
<td>6%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kahala Hilton Beach</td>
<td>2</td>
<td>1/mo</td>
<td>19</td>
<td>5%</td>
</tr>
<tr>
<td>Oahu</td>
<td>One‘ula Beach Co. Park</td>
<td>3</td>
<td>4/wk</td>
<td>19</td>
<td>5%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Point Panic Beach Park</td>
<td>3</td>
<td>1/wk</td>
<td>19</td>
<td>5%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Wai‘alae Beach Co. Park</td>
<td>1</td>
<td>3/wk</td>
<td>19</td>
<td>5%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Makaha Beach Co. Park</td>
<td>1</td>
<td>3/wk</td>
<td>106</td>
<td>4%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kailua Beach Pk.</td>
<td>2</td>
<td>3/wk</td>
<td>126</td>
<td>3%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kualoa Co. Regional Park</td>
<td>1</td>
<td>3/wk</td>
<td>106</td>
<td>3%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Nanakuli Beach Co. Pk.</td>
<td>1</td>
<td>3/wk</td>
<td>106</td>
<td>3%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Royal-Moana Beach</td>
<td>1</td>
<td>3/wk</td>
<td>51</td>
<td>2%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kahanamoku Beach</td>
<td>1</td>
<td>3/wk</td>
<td>136</td>
<td>2%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ala Moana Beach Co. Park</td>
<td>1</td>
<td>3/wk</td>
<td>225</td>
<td>2%</td>
</tr>
<tr>
<td>Oahu</td>
<td>White Plains Beach</td>
<td>1</td>
<td>2/wk</td>
<td>71</td>
<td>1%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Magic Island Beach</td>
<td>1</td>
<td>3/wk</td>
<td>121</td>
<td>1%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Sand Island</td>
<td>1</td>
<td>3/wk</td>
<td>86</td>
<td>1%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Waimanalo Beach Co. Park</td>
<td>1</td>
<td>3/wk</td>
<td>110</td>
<td>1%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>--------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Oahu</td>
<td>Hanauma Bay</td>
<td>1</td>
<td>3/wk</td>
<td>110</td>
<td>1%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Sans Souci St. Rec. Area</td>
<td>1</td>
<td>3/wk</td>
<td>102</td>
<td>1%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kaipapa’u Beach</td>
<td>2</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kualoa Sugar Mill Beach</td>
<td>3</td>
<td>1/wk</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Turtle Bay</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Aukai Beach Co. Park</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Makao Beach</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Swanzy Beach Co. Park</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Pupukea Beach Co. Pk.</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Laniloa Peninsula (Beach)</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Waikiki Beach Center</td>
<td>3</td>
<td>1/wk</td>
<td>9</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kawaiola Beach</td>
<td>3</td>
<td>1/wk</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Wawamalu Beach Park</td>
<td>3</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kaluahole Beach</td>
<td>3</td>
<td>1/wk</td>
<td>23</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>He’eia</td>
<td>2</td>
<td>1/wk</td>
<td>22</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kulei Cliffs Beach Park</td>
<td>3</td>
<td>1/wk</td>
<td>23</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kawela Bay</td>
<td>2</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ehukai Beach Co. Pk.</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Makaau Beach Co. Park</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ihilani Ulua</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Pounders Beach</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kaunala Beach</td>
<td>3</td>
<td>1/wk</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ka’ena Pt.</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Manner’s Beach</td>
<td>3</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kea’au Beach Co. Park</td>
<td>3</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Laukinui Beach</td>
<td>3</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ewa Beach</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kuliima Cove</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Halona Blowhole</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kahoma Beach</td>
<td>2</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kaiona Beach Co. Park</td>
<td>2</td>
<td>1/mo</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Tongg’s Beach</td>
<td>2</td>
<td>1/mo</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kawaiku’i Beach Park</td>
<td>2</td>
<td>1/mo</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Diamond Head</td>
<td>2</td>
<td>1/mo</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Oneawa Beach</td>
<td>2</td>
<td>1/mo</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kakaako Waterfront</td>
<td>3</td>
<td>1/mo</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kaloko (Queens) Beach</td>
<td>3</td>
<td>1/mo</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Maunalua Bay</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kaupo Beach Co. Park</td>
<td>3</td>
<td>1/mo</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Waimanalo Beach</td>
<td>3</td>
<td>1/wk</td>
<td>23</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Fort DeRussy Beach</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------</td>
<td>-------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>--------------</td>
<td>-------------------</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kealia Beach</td>
<td>2</td>
<td>1/wk</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Koke‘e Beach Park</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>&quot;Pipeline, The&quot;</td>
<td>2</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Waimanalo Bay St. Rec. Area</td>
<td>2</td>
<td>1/wk</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Camp Harold Erdman</td>
<td>2</td>
<td>1/wk</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Maunalua Bay Beach Park</td>
<td>2</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Koko Kai Beach Park</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kahala</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Laenani Beach Co. Park</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Paiko Lagoon</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Magic Island East</td>
<td>3</td>
<td>No data</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Bellows Field Beach Co. Pk.</td>
<td>3</td>
<td>1/mo</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Banzai</td>
<td>3</td>
<td>4/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Makua Beach</td>
<td>3</td>
<td>6/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kapaeloa Beach</td>
<td>2</td>
<td>4/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Waiahole Beach Co. Park</td>
<td>2</td>
<td>4/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Lanikai</td>
<td>2</td>
<td>1/wk</td>
<td>22</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ihilani Honu</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kanenehu Beach</td>
<td>3</td>
<td>4/yr</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Iroquois Pt.</td>
<td>3</td>
<td>4/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Laie Beach Co. Park</td>
<td>3</td>
<td>4/yr</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ihilani Kohola</td>
<td>3</td>
<td>4/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Hau‘ula Beach Co. Park</td>
<td>2</td>
<td>4/yr</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ihilani Naia</td>
<td>3</td>
<td>4/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kokololio Beach</td>
<td>2</td>
<td>4/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Wai‘anae Kai Military Reservation Beach</td>
<td>3</td>
<td>6/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kahe Pt. Beach Co. Pk.</td>
<td>2</td>
<td>6/yr</td>
<td>22</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ulehawa Beach Co. Park</td>
<td>2</td>
<td>6/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Yokohama Bay</td>
<td>3</td>
<td>6/yr</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Nanaikapono Beach</td>
<td>3</td>
<td>6/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Hawaiian Electric Beach Park</td>
<td>3</td>
<td>6/yr</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Mauna Lahihi Beach Co. Pk.</td>
<td>3</td>
<td>6/yr</td>
<td>22</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Wai‘anae Regional Park</td>
<td>3</td>
<td>6/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ohikiololo Beach (Barking Sands)</td>
<td>3</td>
<td>6/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Lualualei Beach Co. Park</td>
<td>3</td>
<td>6/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Barbers Point Beach Co. Pk.</td>
<td>3</td>
<td>4/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kapi‘olani Park</td>
<td>2</td>
<td>3/wk</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Gray’s Beach</td>
<td>3</td>
<td>1/wk</td>
<td>22</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Outrigger Canoe Club Beach</td>
<td>3</td>
<td>1/wk</td>
<td>23</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Pu‘uohulu Beach</td>
<td>3</td>
<td>1/wk</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Papaoneone Beach</td>
<td>3</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
</tbody>
</table>
## Warnings and Advisories

Warning/Advisory Issuance: Hawaii’s Department of Health does not have the authority to close beaches; instead, they post warnings that are associated with high bacterial indicator counts, known sewage spills, or flood debris with possible dead animals. During heavy rainfall, a Brown Water Advisory is issued, but the beach is not posted.

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Oahu</td>
<td>Sandy Beach Co. Park</td>
<td>1</td>
<td>2/wk</td>
<td>74</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ewa Beach Co. Park</td>
<td>2</td>
<td>2/wk</td>
<td>71</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Malaekahana Bay</td>
<td>1</td>
<td>3/wk</td>
<td>75</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Waimea Bay Beach Co. Pk.</td>
<td>1</td>
<td>3/wk</td>
<td>105</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Makapu’u Beach Co. Park</td>
<td>1</td>
<td>3/wk</td>
<td>74</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Sunset Beach</td>
<td>1</td>
<td>3/wk</td>
<td>106</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kala‘e’o’io Beach Co. Park</td>
<td>2</td>
<td>4/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Chun’s Reef</td>
<td>1</td>
<td>3/wk</td>
<td>75</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ma’ili Beach Co. Park</td>
<td>3</td>
<td>3/wk</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Waiale’e</td>
<td>2</td>
<td>4/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Laniakea Beach</td>
<td>2</td>
<td>4/yr</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kaluanui Beach</td>
<td>2</td>
<td>4/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Papa’iloa Beach</td>
<td>2</td>
<td>4/yr</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ka’a’awa Beach Co. Park</td>
<td>2</td>
<td>4/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Oahu</td>
<td>Ewa Plantation Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Pearl Harbor - Middle Loch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>North Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Hanaka’ilio Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kahuku Golf Course</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Nimitz Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kalaniana’ole Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Fort Hase Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Fort Kamehameha Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Pahipahi’alua Beach</td>
<td>2</td>
<td>4/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Maipalaoa Beach</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>War Memorial Natatorium</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kaihalulu Beach</td>
<td>3</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Hale’iwa Ali’i Beach Co. Pk.</td>
<td>3</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Pu’u’iki</td>
<td>2</td>
<td>4/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kaaaka</td>
<td>2</td>
<td>4/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Hale’iwa Beach Co. Pk.</td>
<td>2</td>
<td>4/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Hickam Harbor Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Fort DeRussy Beach Park</td>
<td>2</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Kailua Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oahu</td>
<td>Mokule’ia Beach Park</td>
<td>2</td>
<td>4/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>

N/A: Not applicable
For determining whether to post a beach for high bacteria indicator counts, the geometric mean standard is applied in most cases. The single-sample maximum standard is applied by beach managers in cases when they are able to sample only a few times a month. A warning is posted when the enterococcus geometric mean is exceeded and the clostridium count exceeds its level of action. There is no protocol for foregoing a warning when these standards are exceeded. Resampling is not conducted to confirm an exceedance of standards before a warning is posted. Warnings are also posted if there is a confirmed sewage spill or other evidence of human fecal contamination.

Information about warnings and advisories is disseminated via the Internet; a telephone hotline; an email notification list that includes various federal, state, and county agencies, major water recreational groups, the Surfrider Foundation, canoe organizations, television and radio stations, newspapers, tourist organizations, elected officials, environmental groups, and individuals; and press releases. Signs are posted at the beach when there is a known sewage spill.

Warnings and advisories may be issued for a section of a beach rather than the whole beach, depending on the size of the beach.

**Reopening Procedures:** If a warning is posted, daily monitoring is performed until bacterial levels no longer exceed action levels and the beach is reopened. States that monitor more frequently after an exceedance is found will tend to have higher percent exceedance rates and lower total warning/advisory days than they would have had if their sampling frequency did not increase after an exceedance was found. Sampling frequency is not increased after storm events.

**Number of Warnings and Advisories:** Total warning/advisory days for 487 events lasting six consecutive weeks or less decreased 33 percent to 2,766 days in 2008 from 4,134 days in 2007, 6,507 days in 2006, and 2,228 days in 2005. In addition, there was one extended event (44 days total) and no permanent events in 2008. Extended events are those in effect between 7 and 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. In 2007, there were two extended events (142 days total) and no permanent events.

**Causes of Warnings and Advisories:** For events lasting six consecutive weeks or less, 99% (2,741) of warning/advisory days in 2008 were preemptive (i.e. without waiting for monitoring results) due to heavy rainfall, and 1% (25) were preemptive due to known sewage spills/leaks.

The reported sources of beachwater contamination for 2008 are as follows: 99% (2,738) of warning/advisory days were from stormwater runoff, and 1% (28) were from sewage spills/leaks.

<table>
<thead>
<tr>
<th>2008 Hawaii Beach Warnings and Advisories</th>
</tr>
</thead>
<tbody>
<tr>
<td>County</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>-------------</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Big Island</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>------------</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>--------</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>------------</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Kauai</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>--------</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>Maui</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>--------</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>----------</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>----------</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>------------</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>---------</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>---------</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>------------</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
<tr>
<td>Oahu</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** POTW: Publicly owned treatment works; Preempt-rain, Preemptive due to rainfall; Preempt-sew, Preemptive due to sewage discharge or spill; Sanitary-sew-over, Sanitary sewer overflow.

**Notes**

ILLINOIS
27th in beachwater quality (15% of samples exceeded national standards)

Illinois has 52 public Great Lakes swimming beaches along approximately 60 miles of Lake Michigan shoreline. All of the Great Lakes beaches in Illinois are in Cook or Lake County. The Illinois Department of Public Health (IDPH) administers the state’s coastal beach monitoring program. The IDPH and the Lake County Health Department issue closings at state-run beaches, while the Chicago Park District monitors 23 beaches within the Chicago city limits. The remaining Cook County beaches are monitored by their respective municipalities. It is up to the managing entity for each beach to issue closings and advisories, depending upon EPA guidance and their own policies.1 The IDPH reviews the beach operators’ practices annually.2 Inland lakes are also monitored in Illinois, but this summary includes information about monitoring along the Lake Michigan coastline only.

The monitoring season extends from Memorial Day to Labor Day. Heavy rainfalls during isolated periods during the 2008 swim season affected sections of the lakefront.

Beach monitoring data is used to inform a number of efforts in Illinois. It is used to identify trends and to focus efforts such as beach sanitary surveys. It is also used for initiatives such as gull dispersion, improved garbage collection, changes in beach grooming techniques, and placement of automated monitoring equipment.

Source-tracking studies indicate that an abundance of seagulls at North Point Marina is responsible for elevated bacteria levels at this location.2 However, there are limited opportunities to control gull populations and nesting areas in Illinois because they are protected. As part of its efforts to educate the public, the beach program has posted “Don’t feed the waterfowl” signs at several beaches to discourage people who want to feed the birds. Individual beach operators have campaigns relating to garbage, public education, and pollution prevention as well.2

Lake Michigan waters that border Illinois do not support harmful algal blooms.2 Illinois received a $240,290 federal BEACH Act grant in 2008 and was eligible for a $243,000 grant in 2009. BEACH Act grants fully fund the Great Lakes beach monitoring program.

Standards
Indicator Organism: E. coli

Standards: The water quality standard in Illinois is an E. coli single-sample maximum of 235 cfu/100 ml, which matches the BEACH Act-required single-sample maximum for freshwater beaches.

Beach managers may preemptively close beaches because of rain or other factors.

Several beach managers use predictive models to make closing and advisory decisions. The motivation to use predictive models is that health warnings are not issued until at least 24 hours after samples are taken due to the time it takes sampling results to be known. A study of the reliability of one predictive model, SwimCast, indicates that it correctly predicts whether E. coli concentrations are above or below the 235 cfu/100 ml standard 85 and 86 percent of the time, respectively.2 SwimCast predictions can be made on a real-time basis. At a minimum, predictions are generally made at 9 am and 1 pm and whenever hydrometeorological conditions change at beaches where SwimCast is used. For each beach where the SwimCast system exists, similar but slightly different predictive models are utilized.

For beach managers in Lake County that use the Swimcast predictive model, the determination of swim bans and risk advisories is the same at all locations and is as follows: 1) A swim ban occurs when the lower 99% confidence interval prediction is above 235 cfu/100 ml and is posted as a red flag. This is the highest-risk condition. 2) When the average
and upper 99% confidence interval prediction is above, but the lower 99% confidence interval prediction is below 235 cfu/100 ml, this is considered to be a moderate- to high-risk condition and is posted as an advisory at the beach.  
3) When the upper 99% confidence interval prediction is above, but the average and the lower 99% confidence interval prediction are below 235 cfu/100 ml, this is considered to be a moderate-risk condition and is posted at the beach.  
4) When the upper 99% confidence interval prediction is below 235 cfu/100 ml, this is considered to be a low-risk condition and posted as a green flag condition. Chicago is in the proofing stage of using a predictive model to issue advisories at 63rd Street. They are not yet relying on this model for decision-making.

Monitoring

Determination of Monitoring Locations and Frequency: Most swimming beaches in Illinois are sampled seven days a week, as Illinois believes that daily monitoring is most protective of public health. Areas of shoreline that are not used for swimming because they are rocky or otherwise unsuitable are not monitored.  

Practice: Samples are taken in water that is knee to waist deep, usually in the morning. Generally, 24 hours pass before sampling results are known.

Results: In 2008, Illinois reported 67 coastal beaches, 23 (34%) of which were monitored daily, 23 (34%) more than once a week, 6 (9%) once a week, and 15 (22%) not monitored. The unmonitored locations are unsuitable for swimming.  

For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 15 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were North Point Marina North Beach in Lake County (61%), Winnetka Elder Park Beach (33%), Evanston South Beach (32%), and Northwestern University Beach in Cook County (31%), Waukegan South Beach in Lake County (26%), Montrose Beach in Cook County (25%), Waukegan North Beach in Lake County (25%), and Rainbow Beach (19%), Evanston Greenwood Beach (19%), Winnetka Centennial Dog Beach (19%), and Illinois Beach State Park South Beach in Cook County (19%). Lake County had the highest exceedance rate (20%) followed by Cook (13%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 45 beaches, the percent of samples exceeding the standard decreased to 15 percent in 2008 after three consecutive years of increases (24, 15, and 14 percent in 2007, 2006, and 2005, respectively).

<table>
<thead>
<tr>
<th>2008 Illinois Monitoring Frequency and Results by Beach</th>
</tr>
</thead>
<tbody>
<tr>
<td>County</td>
</tr>
<tr>
<td>--------</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>--------</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
<tr>
<td>Cook</td>
</tr>
</tbody>
</table>
Testing the Waters 2009

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cook</td>
<td>Chase Ave Park and Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cook</td>
<td>Devon Ave. Park &amp; Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cook</td>
<td>Wilmette Langdon Beach</td>
<td>1</td>
<td>Daily</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>North Point Marina North Beach</td>
<td>1</td>
<td>Daily</td>
<td>126</td>
<td>61%</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>1</td>
<td>Daily</td>
<td>102</td>
<td>26%</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>1</td>
<td>Daily</td>
<td>65</td>
<td>25%</td>
</tr>
<tr>
<td>Lake</td>
<td>IL Beach State Park South Beach</td>
<td>1</td>
<td>Daily</td>
<td>134</td>
<td>19%</td>
</tr>
<tr>
<td>Lake</td>
<td>Lakeforest Forest Park Beach</td>
<td>1</td>
<td>Daily</td>
<td>60</td>
<td>17%</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Rosewood Beach</td>
<td>1</td>
<td>Daily</td>
<td>106</td>
<td>15%</td>
</tr>
<tr>
<td>Lake</td>
<td>IL State Park Resort Beach</td>
<td>1</td>
<td>Daily</td>
<td>126</td>
<td>11%</td>
</tr>
<tr>
<td>Lake</td>
<td>IL Beach State Park North Beach</td>
<td>1</td>
<td>Daily</td>
<td>128</td>
<td>11%</td>
</tr>
<tr>
<td>Lake</td>
<td>Great Lakes Naval Nunn Beach</td>
<td>1</td>
<td>Daily</td>
<td>33</td>
<td>9%</td>
</tr>
<tr>
<td>Lake</td>
<td>Lake Bluff Sunrise Beach</td>
<td>1</td>
<td>Daily</td>
<td>59</td>
<td>8%</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Moraine Park Dog Beach</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Lake</td>
<td>Lake Bluff Dog Beach</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Avenue Boating Beach</td>
<td>1</td>
<td>Daily</td>
<td>82</td>
<td>4%</td>
</tr>
<tr>
<td>Lake</td>
<td>Fort Sheridan South Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>North Chicago Foss Park Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Zion Hosah Park Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>IL Beach State Park Camp Logan Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Fort Sheridan North Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>IL Beach State Park Sailing Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>

N/A: Not applicable

Closings and Advisories

Closing and Advisory Issuance: Depending on the managing authority for a beach, both advisories and closings are issued. Non-swimming activities are allowed at beaches that are closed.

If a sample exceeds the single-sample standard, action is taken in all jurisdictions. Two samples are taken daily by the Wilmette Health Department and the Winnetka Park District, both in Cook County. If one sample exceeds the standard, they resample before closing, but if both exceed they close the beach. There is no protocol for delaying or foregoing an advisory when these conditions are met. The BEACH Act’s freshwater beach E. coli standard for the geometric mean of five samples taken over a 30-day period of 126 cfu/100 ml is not applied when making closing and advisory decisions.

Each jurisdiction is responsible for posting notifications, in accordance with their agreement with the IDPH. The public is notified of beach actions via websites and signs or flags at the beach. The Chicago Park District in Cook County flies green flags when a beach meets standards, yellow flags when the reading is between 235 and 1000 cfu/100 ml, and red flags when levels exceed 1000 cfu/100 ml. Closing and advisory actions affect entire beaches rather than sections of beaches in Illinois.

Reopening Procedures: Monitoring on a daily basis continues when a beach is closed. Beaches are reopened only when daily samples are within the health standard. For beaches under the Wilmette Health Department and the Winnetka Park District, both samples taken in a day have to meet standards for the beach to reopen.
Number of Closings and Advisories: Illinois had 396 closing/advisory events in 2008. Total closing/advisory days for 396 events lasting six consecutive weeks or less decreased 33 percent to 534 days in 2008 from 793 days in 2007, 591 days in 2006, and 585 days in 2005. In addition, there were no extended or permanent events in 2008. Extended events are those in effect more than six consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. In 2007, there was one extended event (53 days total) and no permanent events.

Causes of Closings and Advisories: For events lasting six consecutive weeks or less, 93% (496) of closing/advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, and 7% (38) were preemptive (i.e. without waiting for monitoring results) based on the results of computer modeling.

The reported sources of beachwater contamination for 2008 are as follows: 99% (530) of closing/advisory days were from unknown sources of contamination, 1% (3) was from stormwater runoff, and <1% (1) were from other sources of contamination.

### 2008 Illinois Beach Closings and Advisories

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cook</td>
<td>12th Street</td>
<td>5/27/08</td>
<td>5/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>12th Street</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>12th Street</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>12th Street</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>12th Street</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>31st Street Beach</td>
<td>5/27/08</td>
<td>5/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>31st Street Beach</td>
<td>6/3/08</td>
<td>6/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>31st Street Beach</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>31st Street Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>31st Street Beach</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>31st Street Beach</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>31st Street Beach</td>
<td>7/29/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>31st Street Beach</td>
<td>8/4/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>31st Street Beach</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>31st Street Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>31st Street Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Albion</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Albion</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Albion</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Albion</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Calumet South Beach</td>
<td>5/27/08</td>
<td>5/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Calumet South Beach</td>
<td>6/3/08</td>
<td>6/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Calumet South Beach</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Calumet South Beach</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Calumet South Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Calumet South Beach</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Calumet South Beach</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Calumet South Beach</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Calumet South Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>----------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>--------</td>
</tr>
<tr>
<td>Cook</td>
<td>Calumet South Beach</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Calumet South Beach</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Calumet South Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>6/17/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>7/18/08</td>
<td>7/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>7/22/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>7/29/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>7/31/08</td>
<td>8/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>8/14/08</td>
<td>8/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>6/14/08</td>
<td>6/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>6/27/08</td>
<td>6/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>7/19/08</td>
<td>7/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>7/30/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>8/1/08</td>
<td>8/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>8/4/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>8/14/08</td>
<td>8/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Church Dog Beach</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>6/22/08</td>
<td>6/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>6/26/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>7/16/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>8/1/08</td>
<td>8/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>8/7/08</td>
<td>8/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>8/14/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>8/16/08</td>
<td>8/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>--------</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>8/23/08</td>
<td>8/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Greenwood Beach</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lee Beach</td>
<td>6/21/08</td>
<td>6/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lee Beach</td>
<td>6/26/08</td>
<td>6/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lee Beach</td>
<td>6/29/08</td>
<td>6/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lee Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lee Beach</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lee Beach</td>
<td>7/11/08</td>
<td>7/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lee Beach</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lee Beach</td>
<td>7/17/08</td>
<td>7/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lee Beach</td>
<td>7/21/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lee Beach</td>
<td>7/28/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lee Beach</td>
<td>7/31/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lee Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lighthouse Beach</td>
<td>6/22/08</td>
<td>6/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lighthouse Beach</td>
<td>6/27/08</td>
<td>6/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lighthouse Beach</td>
<td>6/29/08</td>
<td>6/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lighthouse Beach</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lighthouse Beach</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lighthouse Beach</td>
<td>7/19/08</td>
<td>7/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lighthouse Beach</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lighthouse Beach</td>
<td>8/2/08</td>
<td>8/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lighthouse Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lighthouse Beach</td>
<td>8/10/08</td>
<td>8/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lighthouse Beach</td>
<td>8/17/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston Lighthouse Beach</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston South Beach</td>
<td>6/14/08</td>
<td>6/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston South Beach</td>
<td>6/16/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston South Beach</td>
<td>6/22/08</td>
<td>6/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston South Beach</td>
<td>6/27/08</td>
<td>6/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston South Beach</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston South Beach</td>
<td>7/3/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston South Beach</td>
<td>7/7/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston South Beach</td>
<td>7/10/08</td>
<td>7/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston South Beach</td>
<td>7/15/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston South Beach</td>
<td>7/18/08</td>
<td>7/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston South Beach</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston South Beach</td>
<td>7/26/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston South Beach</td>
<td>7/28/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Evanston South Beach</td>
<td>7/31/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>----------</td>
<td>-------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------</td>
<td>---------</td>
</tr>
<tr>
<td>Cook</td>
<td>EvanstonSouth Beach</td>
<td>8/6/08</td>
<td>8/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>EvanstonSouth Beach</td>
<td>8/13/08</td>
<td>8/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>EvanstonSouth Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>EvanstonSouth Beach</td>
<td>8/22/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>EvanstonSouth Beach</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Foster Avenue Beach</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Foster Avenue Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Foster Avenue Beach</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Foster Avenue Beach</td>
<td>8/4/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Foster Avenue Beach</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Foster Avenue Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Foster Avenue Beach</td>
<td>8/25/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Glencoe Park Beach</td>
<td>6/10/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Cook</td>
<td>Glencoe Park Beach</td>
<td>6/27/08</td>
<td>6/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Glencoe Park Beach</td>
<td>7/4/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Glencoe Park Beach</td>
<td>7/20/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Cook</td>
<td>Glencoe Park Beach</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Cook</td>
<td>Howard Street Park Beach</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Howard Street Park Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Howard Street Park Beach</td>
<td>7/22/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Howard Street Park Beach</td>
<td>8/5/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Howard Street Park Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Howard Street Park Beach</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Howard Street Park Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Jackson Park Beach (63rd Street Beach)</td>
<td>5/27/08</td>
<td>5/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Jackson Park Beach (63rd Street Beach)</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Jackson Park Beach (63rd Street Beach)</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Jackson Park Beach (63rd Street Beach)</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Jarvis Avenue Park Beach</td>
<td>6/27/08</td>
<td>6/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Jarvis Avenue Park Beach</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Jarvis Avenue Park Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Jarvis Avenue Park Beach</td>
<td>7/10/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Jarvis Avenue Park Beach</td>
<td>7/22/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Juneway Terrace Park Beach</td>
<td>6/3/08</td>
<td>6/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Juneway Terrace Park Beach</td>
<td>6/23/08</td>
<td>6/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Juneway Terrace Park Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Juneway Terrace Park Beach</td>
<td>7/22/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Juneway Terrace Park Beach</td>
<td>7/29/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Juneway Terrace Park Beach</td>
<td>8/5/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Juneway Terrace Park Beach</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Juneway Terrace Park Beach</td>
<td>8/21/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>---------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>--------</td>
</tr>
<tr>
<td>Cook</td>
<td>Kathy Osterman Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Kathy Osterman Beach</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Kathy Osterman Beach</td>
<td>8/4/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Kathy Osterman Beach</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Kathy Osterman Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Kathy Osterman Beach</td>
<td>8/18/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Kathy Osterman Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Kenilworth Beach</td>
<td>6/12/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Kenilworth Beach</td>
<td>6/23/08</td>
<td>6/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Kenilworth Beach</td>
<td>7/3/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Kenilworth Beach</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Loyola Beach</td>
<td>6/12/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Loyola Beach</td>
<td>6/27/08</td>
<td>6/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Loyola Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Loyola Beach</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Loyola Beach</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>5/27/08</td>
<td>5/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>5/30/08</td>
<td>5/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>6/12/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>6/23/08</td>
<td>6/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>7/4/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>7/12/08</td>
<td>7/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>8/4/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Montrose Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>North Shore Avenue Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>North Shore Avenue Beach</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>North Shore Avenue Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Northwestern University Beach</td>
<td>6/21/08</td>
<td>6/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Northwestern University Beach</td>
<td>6/23/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Northwestern University Beach</td>
<td>6/29/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Northwestern University Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Northwestern University Beach</td>
<td>7/11/08</td>
<td>7/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>----------</td>
<td>-------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>--------</td>
</tr>
<tr>
<td>Cook</td>
<td>Northwestern University Beach</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Northwestern University Beach</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Northwestern University Beach</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Northwestern University Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Northwestern University Beach</td>
<td>7/26/08</td>
<td>7/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Northwestern University Beach</td>
<td>8/2/08</td>
<td>8/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Northwestern University Beach</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Northwestern University Beach</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Oak Street Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Oak Street Beach</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Oak Street Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Ohio Street Beach</td>
<td>5/27/08</td>
<td>5/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Ohio Street Beach</td>
<td>5/30/08</td>
<td>5/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Ohio Street Beach</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Ohio Street Beach</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Ohio Street Beach</td>
<td>8/21/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Pratt Blvd and Park Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Pratt Blvd and Park Beach</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Pratt Blvd and Park Beach</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Pratt Blvd and Park Beach</td>
<td>8/4/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Pratt Blvd and Park Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rainbow Beach</td>
<td>5/27/08</td>
<td>5/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rainbow Beach</td>
<td>5/30/08</td>
<td>5/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rainbow Beach</td>
<td>6/3/08</td>
<td>6/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rainbow Beach</td>
<td>6/23/08</td>
<td>6/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rainbow Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rainbow Beach</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rainbow Beach</td>
<td>7/11/08</td>
<td>7/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rainbow Beach</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rainbow Beach</td>
<td>7/29/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rainbow Beach</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rainbow Beach</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rainbow Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rogers Avenue Park Beach</td>
<td>6/3/08</td>
<td>6/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rogers Avenue Park Beach</td>
<td>8/30/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rogers Avenue Park Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rogers Avenue Park Beach</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rogers Avenue Park Beach</td>
<td>7/22/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rogers Avenue Park Beach</td>
<td>7/29/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Rogers Avenue Park Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>South Shore</td>
<td>5/27/08</td>
<td>5/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------------</td>
<td>-----------------</td>
</tr>
<tr>
<td>Cook</td>
<td>South Shore</td>
<td>6/3/08</td>
<td>6/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>South Shore</td>
<td>6/12/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>South Shore</td>
<td>6/13/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>South Shore</td>
<td>6/23/08</td>
<td>6/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>South Shore</td>
<td>7/8/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>South Shore</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>South Shore</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>South Shore</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>South Shore</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>South Shore</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Thorndale</td>
<td>5/27/08</td>
<td>5/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Thorndale</td>
<td>6/12/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Thorndale</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Thorndale</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Thorndale</td>
<td>7/11/08</td>
<td>7/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Thorndale</td>
<td>8/4/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Thorndale</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Thorndale</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Thorndale</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Wilmette Gillson Park Beach</td>
<td>6/9/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Wilmette Gillson Park Beach</td>
<td>7/4/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Wilmette Gillson Park Beach</td>
<td>7/12/08</td>
<td>7/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Wilmette Gillson Park Beach</td>
<td>8/1/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Wilmette Gillson Park Beach</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Wilmette Gillson Park Dog Beach</td>
<td>7/19/08</td>
<td>7/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Wilmette Langdon Beach</td>
<td>7/4/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Wilmette Langdon Beach</td>
<td>7/20/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Wilmette Langdon Beach</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Wilmette Langdon Beach</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Centennial Dog Beach</td>
<td>6/19/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Centennial Dog Beach</td>
<td>6/28/08</td>
<td>6/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Centennial Dog Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Centennial Dog Beach</td>
<td>7/19/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Centennial Dog Beach</td>
<td>8/3/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Centennial Dog Beach</td>
<td>8/13/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Elder Park Beach</td>
<td>6/13/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Agricultural runoff</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Elder Park Beach</td>
<td>6/19/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Elder Park Beach</td>
<td>6/29/08</td>
<td>6/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Elder Park Beach</td>
<td>7/3/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Elder Park Beach</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Elder Park Beach</td>
<td>7/19/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>----------</td>
<td>-------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------</td>
<td>--------</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Elder Park Beach</td>
<td>7/22/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Elder Park Beach</td>
<td>7/29/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Elder Park Beach</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Elder Park Beach</td>
<td>8/3/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Elder Park Beach</td>
<td>8/9/08</td>
<td>8/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Elder Park Beach</td>
<td>8/12/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Elder Park Beach</td>
<td>8/16/08</td>
<td>8/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Maple Park Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Maple Park Beach</td>
<td>7/19/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Maple Park Beach</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Maple Park Beach</td>
<td>8/9/08</td>
<td>8/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Tower Beach</td>
<td>6/13/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Tower Beach</td>
<td>6/27/08</td>
<td>6/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Tower Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Tower Beach</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Tower Beach</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Winnetka Tower Beach</td>
<td>7/19/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Great Lakes Naval Nunn Beach</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Great Lakes Naval Nunn Beach</td>
<td>7/13/08</td>
<td>7/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Great Lakes Naval Nunn Beach</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Avenue Boating Beach</td>
<td>5/28/08</td>
<td>5/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Avenue Boating Beach</td>
<td>6/10/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Avenue Boating Beach</td>
<td>7/12/08</td>
<td>7/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Moraine Park Dog Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Rosewood Beach</td>
<td>6/5/08</td>
<td>6/7/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Rosewood Beach</td>
<td>6/10/08</td>
<td>6/12/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Rosewood Beach</td>
<td>6/13/08</td>
<td>6/14/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Rosewood Beach</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Rosewood Beach</td>
<td>7/12/08</td>
<td>7/13/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Rosewood Beach</td>
<td>7/23/08</td>
<td>7/25/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Rosewood Beach</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Rosewood Beach</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Highland Park Rosewood Beach</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>IL Beach State Park North Beach</td>
<td>5/28/08</td>
<td>5/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>IL Beach State Park North Beach</td>
<td>6/10/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>IL Beach State Park North Beach</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>IL Beach State Park North Beach</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>IL Beach State Park North Beach</td>
<td>8/8/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>IL Beach State Park North Beach</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>IL Beach State Park North Beach</td>
<td>8/14/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>IL Beach State Park North Beach</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>--------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>--------</td>
</tr>
<tr>
<td>Lake IL</td>
<td>Beach State Park South Beach</td>
<td>5/28/08</td>
<td>5/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>Beach State Park South Beach</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>Beach State Park South Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>Beach State Park South Beach</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>Beach State Park South Beach</td>
<td>8/7/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>Beach State Park South Beach</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>Beach State Park South Beach</td>
<td>8/13/08</td>
<td>8/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>Beach State Park South Beach</td>
<td>8/20/08</td>
<td>8/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>Beach State Park South Beach</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>State Park Resort Beach</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>State Park Resort Beach</td>
<td>7/30/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>State Park Resort Beach</td>
<td>8/8/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>State Park Resort Beach</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>State Park Resort Beach</td>
<td>8/14/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>State Park Resort Beach</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>State Park Resort Beach</td>
<td>8/22/08</td>
<td>8/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake IL</td>
<td>State Park Resort Beach</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Bluff Dog Beach</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Bluff Sunrise Beach</td>
<td>6/6/08</td>
<td>6/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Bluff Sunrise Beach</td>
<td>6/10/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Bluff Sunrise Beach</td>
<td>7/12/08</td>
<td>7/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Bluff Sunrise Beach</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Bluff Sunrise Beach</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Bluff Sunrise Beach</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Forest Park Beach</td>
<td>6/9/08</td>
<td>6/11/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Forest Park Beach</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Forest Park Beach</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Forest Park Beach</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Forest Park Beach</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Forest Park Beach</td>
<td>8/10/08</td>
<td>8/11/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Forest Park Beach</td>
<td>8/14/08</td>
<td>8/15/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Forest Park Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake Lake</td>
<td>Forest Park Beach</td>
<td>8/21/08</td>
<td>8/22/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake North</td>
<td>Point Marina North Beach</td>
<td>5/28/08</td>
<td>5/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake North</td>
<td>Point Marina North Beach</td>
<td>6/4/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake North</td>
<td>Point Marina North Beach</td>
<td>6/6/08</td>
<td>6/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake North</td>
<td>Point Marina North Beach</td>
<td>6/10/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake North</td>
<td>Point Marina North Beach</td>
<td>6/13/08</td>
<td>6/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake North</td>
<td>Point Marina North Beach</td>
<td>6/16/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake North</td>
<td>Point Marina North Beach</td>
<td>6/18/08</td>
<td>6/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake North</td>
<td>Point Marina North Beach</td>
<td>6/24/08</td>
<td>6/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------</td>
<td>-----------</td>
</tr>
<tr>
<td>Lake</td>
<td>North Point Marina North Beach</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>North Point Marina North Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>North Point Marina North Beach</td>
<td>7/8/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>North Point Marina North Beach</td>
<td>7/11/08</td>
<td>7/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>North Point Marina North Beach</td>
<td>7/16/08</td>
<td>7/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>North Point Marina North Beach</td>
<td>7/22/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>North Point Marina North Beach</td>
<td>7/29/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>North Point Marina North Beach</td>
<td>8/5/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>North Point Marina North Beach</td>
<td>8/11/08</td>
<td>8/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>North Point Marina North Beach</td>
<td>8/19/08</td>
<td>8/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>North Point Marina North Beach</td>
<td>8/26/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>5/28/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>6/10/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>6/19/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>7/12/08</td>
<td>7/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>7/19/08</td>
<td>7/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>8/14/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan North Beach</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>6/4/08</td>
<td>6/7/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>6/10/08</td>
<td>6/11/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>6/14/08</td>
<td>6/15/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>6/16/08</td>
<td>6/17/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>6/20/08</td>
<td>6/21/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>7/13/08</td>
<td>7/14/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>7/18/08</td>
<td>7/19/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Waukegan South Beach</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** Preempt-model, Preemptive due to the results of computer models that use easily measurable physical parameters like wind direction and wave height to predict bacterial levels in real time.
Notes
Indiana has 30 Great Lakes beaches stretching along 64 miles in three counties that have Lake Michigan shoreline.

The Indiana Department of Environmental Management (IDEM) administers the state’s beach monitoring and notification program. Sampling practices, locations, standards and notification protocols are set by the state or in consultation with the state. Seven Indiana Dunes National Lakeshore beach sites (Kemil, Lake View, Mount Baldy, Dunbar, West, Central, and Porter) are monitored and voluntarily post monitoring and notification data to the Indiana BeachGuard website, even though they are not eligible for BEACH Act funding.2

Generally, the monitoring season is from late May through the first week of September, but at some beaches sampling may begin and end a week earlier or later.

Indiana saw heavy rainfall in 2008 and many beaches were affected.

The IDEM participates in various outreach events throughout the year including school presentations, Earth Day events, and other environmentally focused events. During these events, the public is informed about things they can do to protect beachwater quality, such as picking up trash and refraining from feeding gulls. The importance of watching for posted water quality advisories and good beach hygiene practices, such as washing hands before eating after water contact are also explained. In 2009, sanitary survey procedures developed by the US EPA will be conducted at some Indiana Lake Michigan beaches.

Indiana’s beach program does not currently monitor for harmful algal blooms, which are not yet a concern.1 Indiana received a $205,800 federal BEACH Act grant in 2008 and was eligible for a $206,000 grant in 2009. No state funds are used to support the program, but local jurisdictions sometimes support more monitoring than the program requires.1

**Standards**

**Indicator Organism:** *E. coli*

**Standards:** Indiana has an *E. coli* single-sample maximum standard of 235 cfu/100 ml.

Local health departments have a statutory obligation to notify the public of a condition that may cause, transmit, or generate disease. Under Indiana’s Lake Michigan Beaches Program, beach managers must either issue an advisory or closing if monitoring results indicate the presence of *E. coli* in concentrations greater than 235 cfu/100ml.2 Beach managers also have the discretion to preemptively issue advisories or closings if conditions that may result in elevated *E. coli* levels exist, such as heavy rainfall or combined sewer overflow events.2 La Porte County issues an advisory if excessive debris, such as oil globules or algae, are found in the lake or on the beach. Beach managers can also close a beach for weather and current conditions, such as a rip current.

BEACH Act grants have been used to partially fund the development of models that predict beachwater quality. These models make predictions based on current conditions, turbidity, chlorophyll content, and color. A model called Project SAFE was used in 2008 for Ogden Dunes, Wells Street, Marquette, and Lake Street Beaches. Each morning, Monday through Friday, beach managers were given the model’s predicted likelihood that the *E. coli* count would exceed safe limits. On that basis, the beach manager chose whether to issue an advisory or closing. Physical bacterial monitoring continued at these beaches to complement the predictive modeling information.
Monitoring

**Determination of Monitoring Locations and Frequency:** Specific monitoring locations are used each year to ensure consistency and representativeness of data. Monitoring frequencies are based on a prioritized ranking of the beaches, with higher priority beaches receiving more frequent sampling. The rankings are based on many variables, which include, but are not limited to, bather use, the proximity to known point and non-point sources, and likely effects from heavy rainfall events.\(^1\)

**Practice:** Samples are taken in knee-deep water per an established monitoring schedule, usually between 8 and 10 am.\(^1\) Results are available 16 to 24 hours after samples are delivered to the lab.

**Results:** In 2008, Indiana reported information for 28 Great Lakes beaches, 6 (21%) of which were monitored daily, 12 (43%) more than once a week, and 10 (36%) once a week. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state's daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 19 percent of all reported beach monitoring samples exceeded the state's daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Jeorse Park Beach I (67%), Jeorse Park Beach II (53%), Buffington Harbor Beach (50%), Lake Street Beach (23%), and Hammond Marina East Beach in Lake County (23%), Indiana Dunes State Park East Beach in Porter County (22%), Whihala Beach West in Lake County (19%), Washington Park Beach in La Porte County (18%), Marquette Park Beach in Lake County (17%), and Indiana Dunes National Lakeshore-Porter Beach in Porter County (17%).

Lake County had the highest percent exceedance rate in 2008 (28%) followed by Porter (12%), and La Porte (9%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 14 beaches, the percent of samples exceeding the standard decreased in 2008 to 13 percent after three consecutive years of increases (10, 14, and 16 percent exceedances in 2005, 2006, and 2007, respectively).

### 2008 Indiana Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>La Porte</td>
<td>Washington Park Beach</td>
<td>1</td>
<td>3/wk</td>
<td>120</td>
<td>18%</td>
</tr>
<tr>
<td>La Porte</td>
<td>Mount Baldy</td>
<td>1</td>
<td>1/wk</td>
<td>12</td>
<td>8%</td>
</tr>
<tr>
<td>La Porte</td>
<td>Indiana Dunes National Lakeshore-Central Avenue Beach</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>8%</td>
</tr>
<tr>
<td>La Porte</td>
<td>Sheridan Beach Stop 2</td>
<td>3</td>
<td>3/wk</td>
<td>124</td>
<td>8%</td>
</tr>
<tr>
<td>La Porte</td>
<td>Duneland Beach Stop 34</td>
<td>3</td>
<td>3/wk</td>
<td>42</td>
<td>7%</td>
</tr>
<tr>
<td>La Porte</td>
<td>Michiana Shores Stop 37</td>
<td>2</td>
<td>3/wk</td>
<td>42</td>
<td>7%</td>
</tr>
<tr>
<td>La Porte</td>
<td>Sheridan Beach Stop 7</td>
<td>3</td>
<td>3/wk</td>
<td>39</td>
<td>5%</td>
</tr>
<tr>
<td>La Porte</td>
<td>Duneland Beach Stop 31</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>5%</td>
</tr>
<tr>
<td>La Porte</td>
<td>Long Beach Stop 20</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>5%</td>
</tr>
<tr>
<td>La Porte</td>
<td>Long Beach Stop 24</td>
<td>3</td>
<td>3/wk</td>
<td>39</td>
<td>0%</td>
</tr>
<tr>
<td>La Porte</td>
<td>Dunbar Beach</td>
<td>3</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
</tbody>
</table>
## County Beach Tier Monitoring Frequency Total Samples Percent Exceedance

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>La Porte</td>
<td>Indiana Dunes National Lakeshore-State Park Road/Kemil Avenue Beach</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>2</td>
<td>5/wk</td>
<td>73</td>
<td>67%</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>2</td>
<td>5/wk</td>
<td>75</td>
<td>53%</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>2</td>
<td>5/wk</td>
<td>72</td>
<td>50%</td>
</tr>
<tr>
<td>Lake</td>
<td>Lake Street Beach</td>
<td>2</td>
<td>1/wk</td>
<td>35</td>
<td>23%</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>2</td>
<td>Daily</td>
<td>92</td>
<td>23%</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>1</td>
<td>Daily</td>
<td>113</td>
<td>19%</td>
</tr>
<tr>
<td>Lake</td>
<td>Marquette Park Beach</td>
<td>2</td>
<td>1/wk</td>
<td>66</td>
<td>17%</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>1</td>
<td>Daily</td>
<td>113</td>
<td>13%</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina West Beach</td>
<td>2</td>
<td>Daily</td>
<td>92</td>
<td>10%</td>
</tr>
<tr>
<td>Lake</td>
<td>Wells Street Beach</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>1</td>
<td>Daily</td>
<td>105</td>
<td>22%</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes National Lakeshore-Porter Beach</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>17%</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>1</td>
<td>Daily</td>
<td>105</td>
<td>15%</td>
</tr>
<tr>
<td>Porter</td>
<td>Ogden Dunes Beach</td>
<td>3</td>
<td>3/wk</td>
<td>144</td>
<td>5%</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes National Lakeshore - West Beach</td>
<td>1</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Porter</td>
<td>Lakeview Beach</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
</tbody>
</table>

N/A: Not applicable

## Closings and Advisories

**Closing and Advisory Issuance:** Both advisories and closings are issued. All beach managers operating under the IDEM BEACH program must take action by posting either an advisory or closing in response to an exceedance of the single sample maximum standard. There are no overriding factors that can be taken into account before issuing either a closing or an advisory. The 30-day 5-sample geometric mean standard of 126 cfu/100 ml is not applied when making daily notification decisions. Local beach managers have discretion over whether they issue an advisory or closing once the single sample standard is exceeded. Managers at beaches that use predictive models may also issue a closing or advisory if the model predicts more than a chosen probability of exceeding safe E. coli levels. The public is notified of advisories and closings via the BeachGuard website and state-approved signs are posted at beaches managed under the BEACH Act program. At the discretion of local beach managers, sections of a beach instead of an entire beach can be closed or placed under advisory.

**Reopening Procedures:** Advisories are lifted and beaches are reopened when sampling confirms that bacterial levels have fallen to safe levels. Some beaches are routinely sampled seven days a week and their monitoring schedules do not change when they are closed or under advisory. At some of the beaches that are not sampled seven days a week, additional samples may be collected during a closing or advisory; at other beaches, the monitoring frequency is not changed. Lake Michigan beaches participating in Indiana’s Monitoring and Notification Program may seek BEACH Act funding for additional sampling conducted during periods of advisory or closing.

**Number of Closings and Advisories:** Indiana had 185 closing/advisory events in 2008. Total closing/advisory days for 185 events lasting six consecutive weeks or less increased 56 percent to 333 days in 2008 from 213 days in 2007, 111 days in 2006, and 131 days in 2005. There were no extended or permanent events in 2008 or 2007. Extended events are those in effect more than six consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks.
Causes of Closings and Advisories: For events lasting six consecutive weeks or less, 97% (322) of closing/advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, <1% (1) was preemptive (i.e. without waiting for monitoring results) due to heavy rainfall, <1% (1) was preemptive based on the results of computer modeling, and 3% (9) were preemptive due to other reasons. Sources of beachwater contamination: 99% (329) of closing/advisory days were attributed by beach managers as being caused by unknown sources of contamination and 1% (4) were reported by beach managers as being caused by stormwater runoff.

### 2008 Indiana Beach Closings and Advisories

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>La Porte</td>
<td>Duneland Beach Stop 31</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Duneland Beach Stop 31</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Duneland Beach Stop 31</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Duneland Beach Stop 34</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Duneland Beach Stop 34</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Duneland Beach Stop 34</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Indiana Dunes National Lakeshore-Central Avenue Beach</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>La Porte</td>
<td>Long Beach Stop 20</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Long Beach Stop 20</td>
<td>8/31/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Long Beach Stop 24</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Long Beach Stop 24</td>
<td>7/12/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Michiana Shores Stop 37</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Michiana Shores Stop 37</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Michiana Shores Stop 37</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Mount Baldy</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Sheridan Beach Stop 2</td>
<td>6/14/08</td>
<td>6/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Sheridan Beach Stop 2</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Sheridan Beach Stop 2</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Sheridan Beach Stop 2</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Sheridan Beach Stop 7</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Sheridan Beach Stop 7</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Washington Park Beach</td>
<td>6/7/08</td>
<td>6/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Washington Park Beach</td>
<td>6/14/08</td>
<td>6/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Washington Park Beach</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Washington Park Beach</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Washington Park Beach</td>
<td>7/22/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Washington Park Beach</td>
<td>7/21/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>La Porte</td>
<td>Washington Park Beach</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>5/28/08</td>
<td>5/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>6/5/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>6/12/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>6/17/08</td>
<td>6/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>--------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>--------</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>6/27/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>7/3/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>7/23/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>7/29/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>7/30/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>8/1/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>8/7/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>8/14/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>8/30/08</td>
<td>9/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Buffington Harbor Beach</td>
<td>9/4/08</td>
<td>9/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>6/14/08</td>
<td>6/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>6/22/08</td>
<td>6/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>7/4/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>7/5/08</td>
<td>7/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>7/12/08</td>
<td>7/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>7/17/08</td>
<td>7/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>7/23/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>7/29/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>8/5/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina East Beach</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina West Beach</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina West Beach</td>
<td>6/14/08</td>
<td>6/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina West Beach</td>
<td>7/4/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina West Beach</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina West Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina West Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina West Beach</td>
<td>8/10/08</td>
<td>8/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina West Beach</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Hammond Marina West Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>5/28/08</td>
<td>5/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>6/3/08</td>
<td>6/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>6/10/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>6/12/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>6/28/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>------------------------</td>
<td>------------</td>
<td>-----------</td>
<td>------------</td>
<td>-----------</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>7/9/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>7/18/08</td>
<td>7/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>7/23/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>8/1/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>8/5/08</td>
<td>8/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>8/14/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>8/30/08</td>
<td>9/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach I</td>
<td>9/4/08</td>
<td>9/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>5/28/08</td>
<td>5/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>5/30/08</td>
<td>5/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>6/3/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>6/10/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>6/20/08</td>
<td>6/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>6/26/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>7/4/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>7/9/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>7/16/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>7/18/08</td>
<td>7/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>7/22/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>7/29/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>8/5/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>8/14/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>8/18/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>8/30/08</td>
<td>9/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Jeorse Park Beach II</td>
<td>9/4/08</td>
<td>9/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Lake Street Beach</td>
<td>6/5/08</td>
<td>6/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Lake Street Beach</td>
<td>6/12/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Lake Street Beach</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Lake Street Beach</td>
<td>7/22/08</td>
<td>7/24/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Lake Street Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Marquette Park Beach</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Marquette Park Beach</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Marquette Park Beach</td>
<td>7/22/08</td>
<td>7/25/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Marquette Park Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Wells Street Beach</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Wells Street Beach</td>
<td>7/22/08</td>
<td>7/24/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------</td>
<td>--------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------</td>
<td>--------</td>
</tr>
<tr>
<td>Lake</td>
<td>Wells Street Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>6/16/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>6/29/08</td>
<td>6/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>7/4/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>7/12/08</td>
<td>7/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>7/20/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>7/27/08</td>
<td>7/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>8/18/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>9/4/08</td>
<td>9/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach East</td>
<td>9/6/08</td>
<td>9/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>6/4/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>6/16/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>6/20/08</td>
<td>6/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>7/4/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>7/6/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>7/12/08</td>
<td>7/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>7/18/08</td>
<td>7/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>7/20/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>7/23/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>8/25/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>9/4/08</td>
<td>9/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Whihala Beach West</td>
<td>9/6/08</td>
<td>9/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes National Lakeshore-Porter Beach</td>
<td>8/14/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes National Lakeshore-Porter Beach</td>
<td>8/14/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>5/26/08</td>
<td>5/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>6/6/08</td>
<td>6/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>6/10/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>6/26/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>6/29/08</td>
<td>6/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>--------</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>7/4/08</td>
<td>7/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>7/7/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>7/18/08</td>
<td>7/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>7/22/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>8/14/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park East Beach</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>5/29/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>6/13/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>6/26/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>6/29/08</td>
<td>6/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>7/4/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>7/10/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>7/13/08</td>
<td>7/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>7/22/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>7/31/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>8/22/08</td>
<td>8/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Indiana Dunes State Park West Beach</td>
<td>8/25/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Ogden Dunes Beach</td>
<td>6/10/08</td>
<td>6/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Ogden Dunes Beach</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Porter</td>
<td>Ogden Dunes Beach</td>
<td>7/21/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Porter</td>
<td>Ogden Dunes Beach</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

Explanation of Frequently Used Terms: Preempt-model, Preemptive due to the results of computer models that use easily measurable physical parameters like wind direction and wave height to predict bacterial levels in real time; Preempt-other, Preemptive due to reasons not listed here; Preempt-rain, Preemptive due to rainfall.

Notes
LOUISIANA
30th in beachwater quality (29% of samples exceeded national standards)

Because of the Mississippi Delta, Louisiana's coastline is primarily wetlands. There are at least 19 coastal beaches along nearly 30 miles of Gulf and estuarine shoreline, including the barrier island Grand Isle, as well as some beaches on the Texas border and on the shore of Lake Pontchartrain, which is actually an estuary rather than a lake.

The state's coastal monitoring program is administered by the Louisiana Department of Health and Hospitals (LDHH). This agency determines sampling practices, locations, standards, and notification protocols and practices at Louisiana beaches monitored through the BEACH Act. Since 2000, the Lake Pontchartrain Basin Foundation, a nonprofit, membership-based citizens' organization, has monitored additional beaches and sites around Lake Pontchartrain, but since NRDC was unable to retrieve this monitoring information from the U.S. EPA, those beaches are not included in this summary.

Monitoring is conducted from April 1 through October 31.

Due to the lingering impacts of Hurricane Rita, use of Cameron Parish beaches during the 2008 swimming season remained low relative to historic levels. Hurricane Ike further impacted Cameron Parish beaches in 2008, reducing use from mid-September through the balance of the 2008 swimming season, and eliminating access to Hackberry Beach. Grand Isle State Park beaches were also closed for the majority of 2008 due to construction activities associated with beach restoration along the Park's shoreline to repair lingering damages from Hurricane Katrina. In early September 2008, Hurricane Gustav resulted in closing of the access road to Fourchon, which resulted in closing of the beach for the balance of the swimming season.1

Enterococcus densities have changed from year-to-year at all nearly all beaches in the state. During 2008, the improvements in water quality that were seen in 2007 at Cypremort Point State Park and Fontainebleau State Park were reversed by unknown causes. Water quality at Grand Isle beach also declined slightly in 2008 relative to previous years, but the decline is attributable in part to changes in water quality following Hurricane Gustav, and may have also been influenced by beach restoration activities at Grand Isle State Park to the east. At the three Cameron Parish beach segments, the decline in water quality that was observed in 2007 continued in 2008 with no apparent cause of the decline or source of contamination.1

Researchers plan to use remote sensing at a Cameron Parish beach site for source tracking of bacterial contamination.2 In spite of considerable effort, no source for the high enterococcus densities at these beaches has been found. Sanitary surveys indicate that local sources of contamination are not likely. Samples taken around the mouth of the Calcasieu River in 2008 indicate that major discharges are not responsible. Discharges from offshore oil platforms are believed unlikely to be the cause. There is speculation that high-nutrient water flowing from the marsh area behind a levee at the Cameron Parish beaches is contributing to the persistence of fecal indicator bacteria in the sand at these beaches.1

Two new sites will be added to the monitoring program in 20091: North Beach and South Beach in Calcasieu Parish. These beaches are inland but meet the salinity requirement for marine water.3

Louisiana received a $320,270 federal BEACH Act grant in 2008 and was eligible for a $322,000 grant in 2009. The Louisiana Beach Monitoring Program is fully supported by BEACH Act grant monies.

Standards
Indicator Organisms: Fecal coliform, Enterococcus

Standards: Water quality standards are not met if any of the following are exceeded: 1) an enterococcus single-sample maximum standard of 104 cfu/100 ml, 2) an enterococcus geometric mean of 35 cfu/100 ml for five samples taken over
a 30-day period, or 3) a fecal coliform geometric mean of 200 cfu/100 ml based on a minimum of five samples taken over no more than a 30-day period.1 Multiple samples are sometimes taken, and when they are, the results are averaged to determine whether standards are being exceeded.1

Preemptive rainfall advisories are not issued. Louisiana’s BEACH Program has examined many years’ worth of data to assess the relationship between indicator organism densities and environmental conditions (including water temperature, salinity, tide conditions, weather conditions, and wind direction and speed) at its beaches. The models that have been developed for each beach explain only a small fraction of the total variability in indicator organism density, so the models cannot be used to issue precautionary advisories.

Monitoring

Determination of Monitoring Locations and Frequency: Levels of beach use and perceptions of water quality determine monitoring priorities.

Practice: Samples are collected 12 inches below the surface in water that is approximately three feet deep. Routine samples are most often collected on Monday morning, and results of sampling are generally known 24 hours after the sample is delivered to the lab for analysis.

Results: In 2008, Louisiana reported 29 coastal beaches, 8 (28%) of which were monitored once a week, 14 (48%) every other week, and 7 (24%) were not monitored. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 29 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Holly Beach 5 (50%) and Hackberry Beach in Cameron Parish (50%), Cypremort Point State Park in St Mary’s Parish (50%), and Holly Beach 6 (45%), Long Beach (45%), Little Florida (45%), Holly Beach 4 (44%), Holly Beach 3 (43%), Constance Beach (42%), and Gulf Breeze in Cameron Parish (41%).

St Mary’s Parish had the highest exceedance rate (50%) followed by Cameron (41%), St Tammany (16%), Lafourche (12%), Jefferson (5%), and Orleans (0%). Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 20 beaches, the percent of samples exceeding the standard increased to 31 percent in 2008, the highest level since 2005 (16, 7, and 14 percent in 2007, 2006, and 2005, respectively).

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calcasieu</td>
<td>South Beach &amp; Rabbit Island</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calcasieu</td>
<td>North Beach-Lake Charles</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 5</td>
<td>3</td>
<td>2/mo</td>
<td>30</td>
<td>50%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Hackberry Beach</td>
<td>2/mo</td>
<td>26</td>
<td></td>
<td>50%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Long Beach</td>
<td>2/mo</td>
<td>31</td>
<td></td>
<td>45%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 6</td>
<td>3</td>
<td>2/mo</td>
<td>31</td>
<td>45%</td>
</tr>
</tbody>
</table>
### County Beach Tier Monitoring

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cameron</td>
<td>Little Florida</td>
<td>No data</td>
<td>2/mo</td>
<td>29</td>
<td>45%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 4</td>
<td>3</td>
<td>2/mo</td>
<td>32</td>
<td>44%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 3</td>
<td>3</td>
<td>2/mo</td>
<td>32</td>
<td>43%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Constance Beach</td>
<td>No data</td>
<td>2/mo</td>
<td>30</td>
<td>42%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Gulf Breeze</td>
<td>No data</td>
<td>2/mo</td>
<td>32</td>
<td>41%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Martin Beach</td>
<td>No data</td>
<td>2/mo</td>
<td>32</td>
<td>41%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 1</td>
<td>3</td>
<td>2/mo</td>
<td>30</td>
<td>42%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 2</td>
<td>3</td>
<td>2/mo</td>
<td>31</td>
<td>32%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Rutherford Beach</td>
<td>No data</td>
<td>2/mo</td>
<td>29</td>
<td>31%</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle Beach 1</td>
<td>2</td>
<td>1/wk</td>
<td>28</td>
<td>11%</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle State Park1</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle State Park 2</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle Beach 3</td>
<td>2</td>
<td>1/wk</td>
<td>29</td>
<td>3%</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle Beach 2</td>
<td>2</td>
<td>1/wk</td>
<td>31</td>
<td>3%</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle State Park 4</td>
<td>1</td>
<td>1/wk</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle State Park 3</td>
<td>1</td>
<td>1/wk</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Lafourche</td>
<td>Fourchon 1</td>
<td>3</td>
<td>None</td>
<td>24</td>
<td>17%</td>
</tr>
<tr>
<td>Lafourche</td>
<td>Fourchon 3</td>
<td>3</td>
<td>None</td>
<td>24</td>
<td>13%</td>
</tr>
<tr>
<td>Lafourche</td>
<td>Fourchon 2</td>
<td>3</td>
<td>None</td>
<td>22</td>
<td>9%</td>
</tr>
<tr>
<td>Lafourche</td>
<td>Fourchon 4</td>
<td>3</td>
<td>None</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Orleans</td>
<td>Pontchartrain Beach</td>
<td>No data</td>
<td>None</td>
<td>28</td>
<td>0%</td>
</tr>
<tr>
<td>St Mary</td>
<td>Cypremort Point State Park</td>
<td>1</td>
<td>1/wk</td>
<td>30</td>
<td>50%</td>
</tr>
<tr>
<td>St Tammany</td>
<td>Fontainebleau State Park</td>
<td>3</td>
<td>2/mo</td>
<td>32</td>
<td>16%</td>
</tr>
</tbody>
</table>

N/A: Not applicable

### Advisories

**Advisory Issuance:** Louisiana issues beach advisories, but it is state policy to not issue closings. An exceedance of the geometric mean or the single-sample maximum standard for enterococcus can trigger an advisory. Louisiana also has a fecal coliform standard; however, this standard was never exceeded in 2008. It is noteworthy that if Louisiana issued beach advisories based only on the enterococcus single-sample maximum criterion, as many states do, 49 percent of the observed exceedances during 2008 would not have resulted in an advisory. No resamples were collected to confirm single-sample exceedances in 2008. Other than taking a resample to verify exceedances when the results are in doubt, there is no protocol for foregoing an advisory when an exceedance is found.

The LDHH notifies local government officials and partner agencies prior to or concurrent with issuing an advisory. The public is notified of advisories via permanent signs located at the sampling location that are opened to post the swimming advisory notice at that location. Press releases to local newspapers are issued to communicate the advisory to the general public and to inform potential swimmers of adverse water quality conditions prior to their arrival at the beach. Additionally, the LDHH provides weekly beach classification results on the web. The Lake Pontchartrain Basin Foundation posts current monitoring results on its website and issues press releases. Advisories can be issued for sections of a beach rather than a whole beach if the beach is long.

**Reopening Procedures:** Advisories are removed through the same process as they are issued once bacterial levels are found to be in compliance with bacteriological water quality criteria.
Number of Advisories: Louisiana had 22 advisory events lasting six consecutive weeks or less in 2008. Total advisory days for 22 events lasting six consecutive weeks or less decreased 52 percent to 221 days in 2008 from 459 days in 2007, 5 days in 2006, and 406 days in 2005. In addition, there were 11 extended events (672 days total) and 17 permanent events (2,282 days total) in 2008. Extended events are in effect more than six consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. In 2007, there were 13 extended events (813 days total) and 4 permanent events (456 days total).

Causes of Advisories: All closing and advisory days in 2008 were due to monitoring that revealed elevated bacteria levels from unknown sources of contamination.

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cameron</td>
<td>Constance Beach</td>
<td>5/8/08</td>
<td>9/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Constance Beach</td>
<td>10/16/08</td>
<td>10/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Gulf Breeze</td>
<td>5/8/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Hackberry Beach</td>
<td>5/8/08</td>
<td>9/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Hackberry Beach</td>
<td>9/13/08</td>
<td>10/31/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 1</td>
<td>5/8/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 2</td>
<td>5/8/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 3</td>
<td>5/8/08</td>
<td>9/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 3</td>
<td>9/24/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 3</td>
<td>10/16/08</td>
<td>10/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 4</td>
<td>5/8/08</td>
<td>9/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 4</td>
<td>9/24/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 4</td>
<td>10/16/08</td>
<td>10/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 5</td>
<td>5/8/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 5</td>
<td>10/16/08</td>
<td>10/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 6</td>
<td>5/8/08</td>
<td>9/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Holly Beach 6</td>
<td>9/24/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Little Florida</td>
<td>5/8/08</td>
<td>9/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Little Florida</td>
<td>9/24/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Little Florida</td>
<td>10/16/08</td>
<td>10/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Long Beach</td>
<td>5/8/08</td>
<td>9/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Long Beach</td>
<td>9/24/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Martin Beach</td>
<td>5/8/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Martin Beach</td>
<td>8/28/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Rutherford Beach</td>
<td>5/8/08</td>
<td>9/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cameron</td>
<td>Rutherford Beach</td>
<td>10/16/08</td>
<td>10/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle Beach 1</td>
<td>7/24/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle Beach 2</td>
<td>9/11/08</td>
<td>9/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle Beach 3</td>
<td>6/6/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle State Park</td>
<td>5/15/08</td>
<td>8/15/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle State Park</td>
<td>8/15/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------</td>
<td>--------</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle State Park 1</td>
<td>9/1/08</td>
<td>10/31/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle State Park 2</td>
<td>5/15/08</td>
<td>8/15/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle State Park 2</td>
<td>8/15/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle State Park 2</td>
<td>9/1/08</td>
<td>10/31/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle State Park 3</td>
<td>5/15/08</td>
<td>10/31/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Grand Isle State Park 4</td>
<td>5/15/08</td>
<td>10/31/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lafourche</td>
<td>Fourchon 1</td>
<td>7/17/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lafourche</td>
<td>Fourchon 1</td>
<td>9/1/08</td>
<td>10/31/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lafourche</td>
<td>Fourchon 2</td>
<td>7/31/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lafourche</td>
<td>Fourchon 2</td>
<td>8/13/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lafourche</td>
<td>Fourchon 2</td>
<td>9/1/08</td>
<td>10/31/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lafourche</td>
<td>Fourchon 3</td>
<td>7/24/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lafourche</td>
<td>Fourchon 3</td>
<td>8/13/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lafourche</td>
<td>Fourchon 3</td>
<td>9/1/08</td>
<td>10/31/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lafourche</td>
<td>Fourchon 4</td>
<td>9/1/08</td>
<td>10/31/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Mary</td>
<td>Cypremort Point State Park</td>
<td>5/22/08</td>
<td>10/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Tammany</td>
<td>Fontainebleau State Park</td>
<td>7/9/08</td>
<td>9/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Tammany</td>
<td>Fontainebleau State Park</td>
<td>9/18/08</td>
<td>9/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Tammany</td>
<td>Fontainebleau State Park</td>
<td>10/10/08</td>
<td>10/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** Preempt-other, Preemptive due to reasons not listed here.

**Notes**

Maine has beautiful coastal beaches with public access stretching along more than 30 miles of Atlantic waters, including bays, sounds, and estuaries. Maine is currently in the process of preparing an inventory of beaches. All counties with coastline have beaches that are accessible to the public. Relatively little swimming takes place in the cold waters of the easternmost part of the state, but beaches in the mid-coast and southern regions have intense recreational usage during the beach season.

The Maine Healthy Beaches program, which was managed by the Maine State Planning Office Coastal Program in 2008 and coordinated by the University of Maine Cooperative Extension/Sea Grant, implements the state’s coastal beachwater quality monitoring program. As of January 1, 2009, management of the program was transferred from the State Planning Office to the Maine Department of Environmental Protection. Monitoring coastal water quality for swimming and other water contact usage is the responsibility of local jurisdictions, municipalities, or state parks, and is not mandated by state law.

The monitoring season lasts three months, from Memorial Day through Labor Day. Monitoring is extended to include spring wet weather monitoring and special studies for targeted areas. In some cases during 2008, local beach managers physically posted the beach with a sign, but had difficulty entering the beach status online in a timely manner. In 2008, Maine added the Ducktrap River beach management area at the mouth of the Ducktrap River to its program. This area has a history of elevated bacteria levels with special study monitoring and sanitary survey work planned for the area. Also, Kinney Shores and Bay View beaches in Saco historically have good water quality, but posted week-long advisories following heavy rainfall in August. The cause of the contamination is most likely from the neighboring Goosefare Brook.

Maine Healthy Beaches is involved in several source-tracking efforts. For areas experiencing chronic bacterial pollution, additional monitoring sites are added throughout the watershed to help determine the source(s) of pollution. Remediation and monitoring efforts at Lincolnville Beach and Ogunquit are ongoing. The program collected additional water samples in the Spurwink and Saco Rivers and Goosefare Brook to help assess their impact on beachwater quality. Intensive bacteria monitoring was conducted in the Ducktrap, Kennebunk, Ogunquit and Cape Nedick Rivers and Short Sands Brook throughout the 2008 monitoring season. The program partnered with EPA staff to conduct discrete and flow-through fluorometry analysis and monitoring of additional parameters in the Kennebunk, Ogunquit and Cape Nedick Rivers and Short Sands Brook. Optical brightener results from the Kennebunk River watershed indicate a number of “hot-spots” in the river (optical brighteners are a common ingredient in laundry detergents and their presence suggests sewage contamination). The results of optical brightener analyses in Ducktrap River were inconclusive. When source tracking reveals a general source of contamination, it is followed up with property surveys that usually focus on finding malfunctioning septic systems.

Goose Rocks Beach in Kennebunkport, a beach with historically poor water quality, experienced fewer problems in 2008 compared to previous years. There were only nine beach action days in 2008 compared to 39 days in 2007. Similarly, Goochs Beach in Kennebunk experienced only six notification days in 2008 compared to 18 days in 2007. Maine Healthy Beaches has been working on pollution source identification and remediation in both of these watersheds for several years. Many Maine beaches are experiencing improved water quality due to efforts including special studies and sanitary surveys conducted by the Maine Healthy Beaches program, actions taken at the local level, and the assistance of state agency partners. In addition to Goose Rocks Beach and Goochs Beach, these beaches include Lincolnville Beach in Waldo County, Higgins, East End, and Willard Beaches in Cumberland County, and Riverside (Ogunquit) Beach in York County. In general, the biggest improvements resulted from addressing malfunctioning subsurface wastewater disposal systems (usually septic systems) and improvements to stormwater systems.
The Maine Healthy Beaches program routinely cooperates with a number of agencies. Beach location data developed through the Maine Healthy Beaches program is available through the Maine State Planning Office Coastal Program. The Maine Department of Marine Resources uses Maine Healthy Beaches data to inform the monitoring of their shellfish growing areas, and vice versa, and shares results of sanitary surveys. Monitoring results are also used by the public health agencies who track swimming-related illnesses. Other data users include Surfrider Foundation and various watershed associations. The data are also used to determine what areas need special studies and sanitary surveys. The data have been used by the Maine Geological Survey in conjunction with Acoustic Doppler Profiling to determine the fate and transport of contaminants in priority areas. In 2008, the program participated in the Maine coastal TMDL process by sharing special study monitoring data, reports, and success stories with program partners.

Maine Healthy Beaches conducts outreach to inform the public about actions it can take to protect beachwater quality. Maine Healthy Beaches participates in the meetings of other agencies and local groups as requested to coordinate and encourage pollution prevention activities that improve beachwater quality. A line of materials called “Think Healthy and Swim Healthy – Best Practices at the Beach” and “Healthy Boating Equals Healthy Beaches” are also distributed to the public. In addition, the Maine Healthy Beaches website has pet waste fact sheets and other educational information.

Maine considers its monitoring program for harmful algal blooms to be one of the most rigorous and effective biotoxin monitoring programs in the world. An observer network of volunteers monitors for algae cells in the water column as an early warning indication system. Also, the Marine Biotoxin Monitoring Program collects data and makes closing decisions. This program is for sites affecting marine resources and in particular shellfish, and the Department of Marine Resources maintains a database for both the voluntary and the regulatory programs. Beach advisories in Maine are not issued based on harmful algal bloom data.

Maine received a $252,220 federal BEACH Act grant in 2008 and was eligible for a $255,000 grant in 2009. The state supports portions of staff salaries, and the University of Maine Cooperative Extension provides a matching contribution for nine months of the program coordinator’s salary.

### Standards

**Indicator Organism:** Enterococcus

**Standards:** When determining whether to recommend issuing a beach advisory, the Maine Healthy Beaches Program applies a single-sample standard for enterococcus of 10^4 cfu/100 ml and a geometric mean standard of 35 cfu/100 ml.

There are a few communities in Maine that, depending on conditions, may post an advisory after a specified amount of rainfall. Local officials are notified when there is a known sewage spill.

### Monitoring

**Determination of Monitoring Locations and Frequency:** Monitoring sites for each beach are selected where swimmers are found, at sources of freshwater inputs to the beach including storm drains, and at sites dependent on local knowledge of any conditions affecting water quality at that beach. For small beach management areas, the monitoring site is located in the center of the beach. The frequency is increased for targeted areas and in response to emerging bacteria issues. For example, wet weather monitoring was conducted for priority areas with chronic bacteria issues.

**Practice:** Samples are taken in approximately three feet of water. Routine monitoring occurs in the morning, typically before 10 am. Resampling efforts may occur morning or afternoon. In addition to sampling for indicator bacteria, information about air and water temperature, salinity, tidal stage, rainfall and weather conditions, plus field observations of conditions that might affect beachwater quality are collected. Between 26 and 30 hours generally go by before monitoring results are known. Routine monitoring occurs Monday through Thursday, but resampling and special study monitoring may extend into Friday and the weekend.
Results: In 2008, Maine reported 60 coastal beaches, 3 (5%) of which were monitored more than once a week, 54 (90%) once a week, 1 (2%) every other week, and 2 (3%) once a month. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state's daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 6 percent of all reported beach monitoring samples exceeded the state's daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Laite Beach in Knox County (42%), Ducktrap River in Waldo County (32%), Camden Yacht Club in Knox County (24%), Lincolnville Beach Area in Waldo County (24%), Cape Neddick Beach (21%), Bay View (20%), Kinney Shores (20%), Laudholm Beach (19%), and Wells Harbor (19%) in York County, Ferry Beach (Scarborough) in Cumberland County (14%), and Crescent Beach (Kittery) (14%) in York County.

Waldo County had the highest exceedance rate (29%) followed by Knox (26%), Lincoln (6%), Cumberland (6%), and York (5%). There were no exceedances at beaches in Hancock and Sagadahoc Counties.

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 35 beaches, the percent of samples exceeding the standard remained steady at 7 percent in 2008 and 2007—a decrease from 10 and 14 percent in 2006 and 2005, respectively.
<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sagadahoc</td>
<td>Lagoon Beach</td>
<td>1</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Sagadahoc</td>
<td>Popham-East Beach</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>0%</td>
</tr>
<tr>
<td>Sagadahoc</td>
<td>Popham-Center Beach</td>
<td>1</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Sagadahoc</td>
<td>Popham-West Beach/Morse River</td>
<td>1</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Sagadahoc</td>
<td>Half Mile Beach</td>
<td>2</td>
<td>1/mo</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Waldo</td>
<td>Ducktrap River</td>
<td>1</td>
<td>2/wk</td>
<td>31</td>
<td>32%</td>
</tr>
<tr>
<td>Waldo</td>
<td>Lincolnville Beach Area</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>24%</td>
</tr>
<tr>
<td>York</td>
<td>Cape Nedwick Beach</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>21%</td>
</tr>
<tr>
<td>York</td>
<td>Kinney Shores</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>20%</td>
</tr>
<tr>
<td>York</td>
<td>Bay View</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>20%</td>
</tr>
<tr>
<td>York</td>
<td>Laudholm Beach</td>
<td>1</td>
<td>1/wk</td>
<td>31</td>
<td>19%</td>
</tr>
<tr>
<td>York</td>
<td>Wells Harbor</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>19%</td>
</tr>
<tr>
<td>York</td>
<td>Crescent Beach (Kittery)</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>14%</td>
</tr>
<tr>
<td>York</td>
<td>Libby Cove Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>13%</td>
</tr>
<tr>
<td>York</td>
<td>Short Sands Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>13%</td>
</tr>
<tr>
<td>York</td>
<td>Little Beach</td>
<td>1</td>
<td>1/wk</td>
<td>9</td>
<td>11%</td>
</tr>
<tr>
<td>York</td>
<td>Gooches Beach</td>
<td>1</td>
<td>1/wk</td>
<td>30</td>
<td>10%</td>
</tr>
<tr>
<td>York</td>
<td>Goose Rocks</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>9%</td>
</tr>
<tr>
<td>York</td>
<td>Crescent Beach (Wells)</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>York</td>
<td>Moody (Ogunquit)</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>York</td>
<td>Riverside (Ogunquit)</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>York</td>
<td>Hills Beach</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>4%</td>
</tr>
<tr>
<td>York</td>
<td>Ferry Beach (Saco)</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>3%</td>
</tr>
<tr>
<td>York</td>
<td>Long Sands Beach</td>
<td>1</td>
<td>1/wk</td>
<td>78</td>
<td>3%</td>
</tr>
<tr>
<td>York</td>
<td>Sea Point Beach</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>Old Orchard Beach-Central</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>Middle Beach</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>York Harbor Beach</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>Drakes Isl. Beach</td>
<td>1</td>
<td>1/wk</td>
<td>28</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>Wells Beach</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>Kennebunk Beach</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>Main (Ogunquit)</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>Fort Foster</td>
<td>1</td>
<td>1/wk</td>
<td>39</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>Casino Square</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>Fortunes Rocks Beach</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>Middle Beach</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>Old Orchard Beach-Ocean Park</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>Colony Beach</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>Old Orchard Beach-North End</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>0%</td>
</tr>
<tr>
<td>York</td>
<td>Footbridge (Ogunquit)</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
</tbody>
</table>

N/A: Not applicable
Closings and Advisories

Closing and Advisory Issuance: Both closings and advisories are issued in Maine, but closings are rare and occur only in municipalities where closing ordinances are in place. Both the geometric mean standard and the single sample standard are considered when making advisory decisions. Results of all monitoring samples are transmitted to the Maine Health Beaches database, and automatic e-mail alerts are issued to beach managers, local officials and other entities as soon as an exceedance is found. However, advisories are not issued based solely on monitoring results; other factors that are taken into account include the number of bathers, time of last rainfall, area characteristics, environmental conditions, and history of known problems. Each decision is made on a case-by-case basis. Depending on the conditions, the Maine Healthy Beaches program will recommend an advisory or closing when the standards are exceeded, and the decision to post a beach is the responsibility of the town or state park. The only beach managers that automatically post an advisory or closing after one sample exceeds standards are the state park beach managers (state park beaches are Scarborough, Popham, Ferry-Saco, Kettle Cove, Crescent State Park, Reid-East, Lagoon, and Half Mile Beaches). For areas with historically good water quality and a low risk of pollution, an advisory may not be posted until resample results are available. This also depends on the magnitude of the exceedance and if there is a known pollution event. Program staff follow up with each exceedance to ensure that state protocols were followed correctly and in a timely manner. Resampling to confirm an exceedance may be conducted if a sample exceeds 100 cfu/100 ml, but resampling before issuing an advisory is not conducted in every situation, particularly at beaches with chronic bacteria problems.

The public is notified of closings and advisories via signs at beach access points and a website. All exceedances and notifications are accessible via the public interface of the website. Signs are green for monitored beaches that are not closed or under advisory, orange for beaches under advisory, and red for closed beaches. Several communities have a beach hotline and/or post closing and advisory information on the town website as well. For some larger beaches, sections of a beach instead of a whole beach can be closed or placed under advisory.

Reopening Procedures: Once a beach is closed or placed under advisory, Maine Healthy Beaches recommends that the monitoring frequency increase until the beach is reopened. However, not all localities have the ability to conduct increased monitoring, and as a result the beaches in these towns cannot be reopened until the next routine sample is analyzed. Collection of a sample after a precautionary rainfall advisory to determine water quality conditions is also recommended.

Number of Closings and Advisories: Maine had 34 closing/advisory events in 2008. Total closing/advisory days for 34 events lasting six consecutive weeks or less decreased 3 percent to 170 days in 2008 from 176 days in 2007, 134 days in 2006, and 92 days in 2005. In addition, there were no extended or permanent events in 2008 or 2007. Extended events are those in effect more than 6 consecutive weeks but less than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks.

Causes of Closings and Advisories: All closing and advisory days in 2008 were due to monitoring that revealed elevated bacteria levels from unknown sources of contamination.

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cumberland</td>
<td>Crescent Beach State Park</td>
<td>7/2/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cumberland</td>
<td>East End Beach</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cumberland</td>
<td>East End Beach</td>
<td>8/9/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cumberland</td>
<td>East End Beach</td>
<td>8/12/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cumberland</td>
<td>Ferry Beach (Scarborough)</td>
<td>8/8/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cumberland</td>
<td>Kettle Cove Beach</td>
<td>7/2/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cumberland</td>
<td>Kettle Cove Beach</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>--------</td>
</tr>
<tr>
<td>Cumberland</td>
<td>Pine Point</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cumberland</td>
<td>Willard Beach</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cumberland</td>
<td>Willard Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Knox</td>
<td>Camden Yacht Club</td>
<td>6/18/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Knox</td>
<td>Camden Yacht Club</td>
<td>8/13/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Knox</td>
<td>Laite Beach</td>
<td>6/18/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Knox</td>
<td>Laite Beach</td>
<td>7/2/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Knox</td>
<td>Laite Beach</td>
<td>8/1/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Knox</td>
<td>Laite Beach</td>
<td>8/13/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Waldo</td>
<td>Ducktrap River</td>
<td>6/18/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Waldo</td>
<td>Ducktrap River</td>
<td>7/9/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Waldo</td>
<td>Lincolnville Beach Area</td>
<td>6/18/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Bay View</td>
<td>8/6/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Cape Neddick Beach</td>
<td>6/7/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Cape Neddick Beach</td>
<td>6/27/08</td>
<td>6/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Crescent Beach (Kittery)</td>
<td>7/3/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Gooches Beach</td>
<td>8/6/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Goose Rocks</td>
<td>7/2/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Goose Rocks</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Kinney Shores</td>
<td>8/6/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Laudholm Beach</td>
<td>8/6/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Libby Cove Beach</td>
<td>8/6/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Little Beach</td>
<td>7/3/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Riverside (Ogunquit)</td>
<td>6/26/08</td>
<td>6/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Short Sands Beach</td>
<td>6/7/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Wells Harbor</td>
<td>8/6/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>York</td>
<td>Wells Harbor</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

**Notes**

Maryland
8th in beachwater quality (2% of samples exceeded national standards)

There are 71 coastal beaches in Maryland lining 20 miles of the Atlantic Ocean, Chesapeake Bay, and other bays and sounds. Counties with coastal beaches are Anne Arundel, Baltimore, Cecil, Calvert, Kent, Queen Anne’s, St. Mary’s, Somerset, and Worcester. Other Maryland counties along the coast, including Harford, Talbot, Dorchester, and Wicomico, have no coastal beaches.

Beachwater quality is monitored in a program administered by the Maryland Department of the Environment (MDE). Sampling and notification activities are delegated to nine local health departments. Individual counties have had their own beach monitoring programs since the 1980s, and Maryland has worked closely with the counties to standardize the programs across the state. Current guidance and regulation at this time is consistent across the board and applies to all beaches in Maryland. The monitoring season runs from Memorial Day to Labor Day. Maryland also monitors inland beachwater quality; this summary includes only information on the coastal beach monitoring program.

Maryland requires a sanitary survey to be conducted at all beaches prior to each season to assure that conditions have not changed and to identify problems that may adversely impact beachwater quality. By law, any problems observed must be addressed immediately. At this time, the MDE is in the process of analyzing information collected during a sanitary survey at Bay Country Campground and Beach. When complete, the MDE will share this information with Kent County so that the state, county and owners of the beach can work together to improve beachwater quality at this location.

Beaches with elevated bacteria concentrations are targeted for pollution source surveys using GIS-based software. Maryland’s beach monitoring program maintains a website that provides tips for beachgoers to help keep beaches clean, and counties conduct their own outreach activities.

The MDE works closely with the Maryland Department of Natural Resources (DNR) and the Maryland Department of Health and Mental Hygiene to monitor, track, report, and advise the public about harmful algal blooms. The DNR maintains a website with harmful algal bloom monitoring data. A hotline is available for the public to report algae blooms, and the public is notified swiftly through local health departments via signs, press releases, and national, state and local websites anytime an algae bloom poses a risk to swimmers or beachgoers.

Maryland received a $266,900 federal BEACH Act grant in 2008 and was eligible for a $269,000 grant in 2009. The federal grant fully funds Maryland’s beach monitoring and notification program.

Standards

Indicator Organism: Enterococcus

Standards: At marine beaches, Maryland applies a geometric mean standard of 35 cfu/100 ml plus a single-sample maximum standard for enterococcus of 104 cfu/100 ml at Tier 1 and Tier 2 beaches and 158 cfu/100 ml at Tier 3 beaches. Three samples are taken per sampling event and the average of the sampling results is used to determine whether the standard is being met.

Maryland does not have preemptive rainfall advisory standards, but the MDE is working with local health departments to develop a tool to document precipitation at beaches so that they can analyze water quality data versus precipitation at their beaches. A predictive model is being developed for a high-use beach at Sandy Point State Park. If a known pollution source exists (e.g., a combined sewer overflow, failing sewer infrastructure, or wastewater treatment discharge), the county must close the beach. Also, if there is any dangerous contaminant or condition, the local health department or the MDE may issue an immediate closing.
Monitoring

Determination of Monitoring Locations and Frequency: Priority for monitoring Maryland’s coastal beaches is based on bather use level, historical water quality, proximity of potential or actual pollution sources, human and animal fecal contamination sources, beach structure, ecological factors, and any other factors that may contribute to beachwater quality.¹

Practice: Samples are taken in knee-deep water, 12 inches below the water’s surface. Three samples are taken per sampling event. Generally, 30 hours pass before sampling results are known.

Results: In 2008, Maryland reported 71 coastal beaches, 6 (8%) of which were monitored more than once a week, 20 (28%) of which were monitored once a week, 24 (34%) every other week, and 21 (30%) once a month. (Maryland also monitors one beach at Assateague Island National Seashore in Accomack County, Virginia. The monitoring results for that beach are included in the Virginia State Summary.) For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Kurtz Beach in Anne Arundel County (18%), Red Point Beach in Cecil County (17%), YMCA Camp Tockwogh (Youth Camp) in Kent County (15%), Elk Neck State Park North East River in Cecil County (14%), Bay Country Campground and Beach in Kent County (11%), Grove Point Camp in Cecil County (11%), Tolchester Estates Beach in Kent County (10%), Elm’s Beach—Public Beach in St Mary’s County (8%), and Cedarhurst in Anne Arundel County (8%).

Cecil County had the highest percent exceedance rate in 2008 (10%) followed by Kent (8%), St Mary’s (4%), Anne Arundel (2%), Baltimore (2%), and Calvert (1%). There were no exceedances reported for Worcester, Queen Anne’s, and Somerset Counties.

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 58 beaches, the percent of samples exceeding the standard decreased to 2 percent in 2008, its lowest level since 2005 (4, 10, and 7 percent in 2007, 2006, and 2005 respectively).

### 2008 Maryland Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Anne Arundel</td>
<td>Kurtz Beach</td>
<td>3</td>
<td>1/mo</td>
<td>17</td>
<td>18%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Cedarhurst</td>
<td>2</td>
<td>2/mo</td>
<td>24</td>
<td>8%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Franklin Manor</td>
<td>2</td>
<td>2/mo</td>
<td>27</td>
<td>7%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Beverly Beach</td>
<td>2</td>
<td>2/mo</td>
<td>24</td>
<td>4%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Cape St. Claire at Persimmon Point</td>
<td>2</td>
<td>2/mo</td>
<td>24</td>
<td>4%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Sandy Point State Park South Beach</td>
<td>1</td>
<td>1/wk</td>
<td>189</td>
<td>3%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Bay Ridge at River Dr.</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>2%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Bay Ridge Beach at Bay Dr.</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>2%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Annapolis Sailing</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Bayside Beach</td>
<td>2</td>
<td>2/mo</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>----------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Sandy Point State Park East Beach</td>
<td>1</td>
<td>1/wk</td>
<td>185</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Saunders Point</td>
<td>2</td>
<td>2/mo</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Mayo Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Fairhaven</td>
<td>2</td>
<td>2/mo</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Mountain Point at Gibson Island</td>
<td>2</td>
<td>2/mo</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Atlantic Marina Resort</td>
<td>2</td>
<td>2/mo</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Arundel on the Bay</td>
<td>2</td>
<td>2/mo</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Oyster Harbor</td>
<td>2</td>
<td>2/mo</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Highland Beach</td>
<td>2</td>
<td>2/mo</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Rosehaven</td>
<td>2</td>
<td>2/mo</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Turkey Point at Cloud Beach</td>
<td>2</td>
<td>2/mo</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Venice on the Bay</td>
<td>2</td>
<td>2/mo</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Mason's Beach</td>
<td>3</td>
<td>1/mo</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Idlewilde on the Bay</td>
<td>3</td>
<td>1/mo</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Fort Smallwood at Pond Drive</td>
<td>3</td>
<td>1/mo</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Cape Anne</td>
<td>3</td>
<td>1/mo</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Town Point at Arkhaven</td>
<td>3</td>
<td>1/mo</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Fort Smallwood Park</td>
<td>3</td>
<td>1/mo</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Anne Arundel</td>
<td>Deale Beach</td>
<td>3</td>
<td>1/mo</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Baltimore</td>
<td>GunPowderSPHammerman</td>
<td>2</td>
<td>2/mo</td>
<td>45</td>
<td>4%</td>
</tr>
<tr>
<td>Baltimore</td>
<td>Miami Beach</td>
<td>2</td>
<td>2/mo</td>
<td>50</td>
<td>2%</td>
</tr>
<tr>
<td>Baltimore</td>
<td>Hart Miller Island</td>
<td>2</td>
<td>2/mo</td>
<td>55</td>
<td>0%</td>
</tr>
<tr>
<td>Baltimore</td>
<td>Rocky Point Park</td>
<td>2</td>
<td>2/mo</td>
<td>50</td>
<td>0%</td>
</tr>
<tr>
<td>Calvert</td>
<td>Brownie's Beach</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>3%</td>
</tr>
<tr>
<td>Calvert</td>
<td>North Beach</td>
<td>1</td>
<td>1/wk</td>
<td>64</td>
<td>3%</td>
</tr>
<tr>
<td>Calvert</td>
<td>Chesapeake Station</td>
<td>3</td>
<td>1/mo</td>
<td>35</td>
<td>0%</td>
</tr>
<tr>
<td>Calvert</td>
<td>Driftwood</td>
<td>3</td>
<td>1/mo</td>
<td>35</td>
<td>0%</td>
</tr>
<tr>
<td>Calvert</td>
<td>Seahorse</td>
<td>3</td>
<td>1/mo</td>
<td>40</td>
<td>0%</td>
</tr>
<tr>
<td>Calvert</td>
<td>Flag Harbor</td>
<td>3</td>
<td>1/mo</td>
<td>40</td>
<td>0%</td>
</tr>
<tr>
<td>Calvert</td>
<td>Breezy Point</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>0%</td>
</tr>
<tr>
<td>Calvert</td>
<td>Flag Ponds</td>
<td>2</td>
<td>2/mo</td>
<td>30</td>
<td>0%</td>
</tr>
<tr>
<td>Calvert</td>
<td>Scientists Cliffs</td>
<td>3</td>
<td>1/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Cecil</td>
<td>Red Point Beach</td>
<td>3</td>
<td>1/mo</td>
<td>18</td>
<td>17%</td>
</tr>
<tr>
<td>Cecil</td>
<td>Elk Neck State Park North East River</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>14%</td>
</tr>
<tr>
<td>Cecil</td>
<td>Grove Point Camp</td>
<td>3</td>
<td>1/mo</td>
<td>18</td>
<td>11%</td>
</tr>
<tr>
<td>Cecil</td>
<td>West View Shores</td>
<td>3</td>
<td>1/mo</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Cecil</td>
<td>Crystal Beach Manor</td>
<td>2</td>
<td>2/mo</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Kent</td>
<td>YMCA Camp Tockwogh (Youth Camp)</td>
<td>1</td>
<td>1/wk</td>
<td>120</td>
<td>15%</td>
</tr>
<tr>
<td>Kent</td>
<td>Bay Country Campground and Beach</td>
<td>1</td>
<td>1/wk</td>
<td>36</td>
<td>11%</td>
</tr>
<tr>
<td>Kent</td>
<td>Tolchester Estates Beach</td>
<td>2</td>
<td>2/mo</td>
<td>42</td>
<td>10%</td>
</tr>
<tr>
<td>Kent</td>
<td>Boy Scout Beach (Eliason)</td>
<td>3</td>
<td>1/mo</td>
<td>15</td>
<td>7%</td>
</tr>
</tbody>
</table>
## Closings and Advisories

**Closing/Advisory Issuance:** In Maryland, both closings and advisories are issued. If the mean of three simultaneous samples exceeds the single-sample maximum standard or if the 30-day geometric mean standard is exceeded, consideration for advisory issuance is triggered. Beach advisories are issued when bacteria standards are exceeded and no known pollution source is present; closings are issued for known pollution events or other unsafe conditions.

If the local health department determines that sampling results indicating an exceedance of standards are valid, a notification can be issued without resampling. If the validity of the sample is in doubt, local health departments may resample before issuing an advisory.

All counties notify the public when a beach is closed or an advisory issued by posting signs at the beach, providing phone hotlines, sending press releases, and e-mailing interested parties. The MDE is in the process of developing a notification website to replace Earth911’s website. In some cases, sections of a beach may be placed under advisory or closed, rather than the entire beach.

**Reopening Procedures:** Closings and advisories remain in effect until monitoring data indicates that water quality meets standards. Maryland’s beach monitoring program recommends that local health departments sample the following day when a beach is closed or placed under advisory. In 2007, most beaches did not have follow-up monitoring, and the duration of the closing and advisory events in 2007 generally reflected the length of time between routine sample collections rather than ongoing monitoring exceedances. For the 2008 swim season, Maryland encouraged beach managers to conduct more frequent follow-up monitoring.

**Number of Closings and Advisories:** Maryland had 11 closing/advisory events in 2008. Total closing/advisory days for 11 events lasting six consecutive weeks or less increased decreased 75 percent to 61 days in 2008 from 243 days in 2007.
317 days in 2006, and 209 days in 2005. In addition, there were no extended or permanent events in 2008 or 2007. Extended events are those in effect more than six consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks.

**Causes of Closings and Advisories:** All closing and advisory days in 2008 were due to monitoring that revealed elevated bacteria levels from unknown sources of contamination.

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calvert</td>
<td>Brownie’s Beach</td>
<td>7/17/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Calvert</td>
<td>Chesapeake Station</td>
<td>7/17/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Calvert</td>
<td>North Beach</td>
<td>8/13/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cecil</td>
<td>Elk Neck State Park North East River</td>
<td>6/18/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cecil</td>
<td>Grove Point Camp</td>
<td>8/5/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cecil</td>
<td>West View Shores</td>
<td>8/5/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kent</td>
<td>Boy Scout Beach (Elison)</td>
<td>7/2/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kent</td>
<td>Tolchester Estates Beach</td>
<td>7/2/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kent</td>
<td>YMCA Camp Tockwog (Youth Camp)</td>
<td>6/4/08</td>
<td>6/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kent</td>
<td>YMCA Camp Tockwog (Youth Camp)</td>
<td>8/27/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Mary’s</td>
<td>Elm’s Beach-Public Beach</td>
<td>5/29/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

**Notes**

1. Heather Morehead, Maryland Department of the Environment, personal communication, April 2009.
MASSACHUSETTS
15th in beachwater quality (6% of samples exceeded national standards)

Massachusetts has 525 public and semipublic marine beaches along 204 miles of sandy beach that line Atlantic waters. State water quality regulations require that all public and semipublic freshwater and marine bathing beaches in Massachusetts be monitored during the bathing season for bacterial contamination.1 Beaches must also be tested for oil, hazardous materials, and heavy metals if there is information indicating possible contamination.1 All of the coastal counties (Suffolk, Plymouth, Norfolk, Nantucket, Essex, Dukes, Bristol, and Barnstable) have beaches.

The monitoring program is administered by the Massachusetts Department of Public Health (MDPH), which coordinates the efforts of a range of collaborators including local boards of health, the Barnstable County Department of Health and the Environment, and the Department of Conservation and Recreation. The administering agency for the beachwater monitoring program determines sampling practices, locations, standards, and notification protocols and practices throughout the state. Most of the sampling is conducted by the collaborating entities.2 Massachusetts has a program for water quality sampling at freshwater beaches in addition to coastal beaches; this summary includes only information about the coastal monitoring program.

The monitoring season starts as early as Memorial Day at some beaches and lasts through Labor Day for most beaches.

The number of bacterial exceedances at many Massachusetts beaches was higher during the 2008 season compared to 2007 in large part due to rainfall. In the summer of 2008, the Boston area experienced higher than normal rainfall. Rainfall was below average for all three months in Chatham, but not as low as it was in 2007.

Massachusetts is conducting several projects designed to reduce sources of beachwater pollution. These projects include several large-scale construction projects, such as a 17-foot diameter tunnel in South Boston for storage of combined-sewer overflow. The construction of the pipe is ongoing, but is scheduled to be operational prior to the 2010 beach season. Sewage-contaminated water that would previously have been released to Boston Harbor during large rain events will be diverted into the storage tunnel, where it will be held until it can be treated before being released. A new wastewater treatment plant for the coastal community of Chatham is in the proposal stage and a new wastewater treatment plant is under construction in Falmouth.2

Beachwater quality monitoring data is analyzed on an annual basis to determine trends at certain beaches. These beaches may be targeted by the MDPH for sanitary surveys or increased monitoring. Data are also shared with the Massachusetts Department of Environmental Protection and other agencies for their own environmental assessment programs.2 Beachwater quality monitoring data is being used to assess the effectiveness of projects implemented as a result of the sanitary survey recommendations made during the Flagship Beach Project that was completed in 2007.2

In August 2008, the MDPH released its sanitary surveys of five beaches within Barnstable County. Each had a history of enterococcus counts in excess of state health standards. The beaches chosen for the surveys were: Colonial Acres in Yarmouth, Rock Harbor in Orleans, Cooks Brook in Eastham, and Town Landing West of Coast Guard Station and Adkins Lane in Provincetown. The communities used the surveys to assist in identifying potential sources of pollution and make recommendations for reducing the number of closings at these highly visible and popular beaches. This was accomplished through additional monitoring, analysis of weather and tidal conditions, and review of environmental data. While each beach was characterized by its unique set of environmental factors, similar sources of pollution were found to increase the potential for high enterococcus counts. Identifying these transport mechanisms for bacteria at local beaches and recommending remedial actions allows towns to be better equipped to reduce the number of beach closing days they encounter in future seasons.2
The MDPH conducts public outreach and works with local boards of health and other interested groups wishing to alert the public to actions that can reduce beach closings. For example, the MDPH designed and distributed an educational brochure about the effects of pet waste on beachwater quality. This information is also available on the MDPH Beaches Website.²

The MDPH Bureau of Environmental Health Environmental Toxicology Program works with other state agencies in responding to harmful algal blooms in fresh water. For marine harmful algal blooms, the primary concern is red tide, which in Massachusetts is caused primarily by phytoplanktons in the genus *Alexandrium*. These phytoplanktons produce a neurotoxin that causes paralytic shellfish poisoning in humans. The Bureau’s Food Protection Program works in collaboration with the Massachusetts Department of Marine Fisheries to monitor state coastal waters for marine harmful algal blooms. Beach closings may be issued if harmful algal blooms occur at coastal beaches.²

Massachusetts received a $251,930 federal BEACH Act grant in 2008 and was eligible for a $254,000 grant in 2009. In addition to federal funding, the MDPH contributes staff and administrative resources amounting to approximately $125,000 annually.²

**Standards**
**Indicator Organism:** Enterococcus

**Standards:** For marine beaches, the standard is a single-sample maximum of enterococcus of 104 cfu/100 ml or a 5-sample geometric mean of 35 cfu/100 ml.

Preemptive rainfall standards are in use at several beaches in Boston Harbor, and preemptive rainfall closings are issued after any significant rainstorm at a bathing beach where there has been a history of violations of water quality standards. In addition to preemptive rainfall closings and closings due to bacterial exceedances, the local board of health and/or the MDPH can close a beach if they determine there is a threat to human health for any other reason, such as an oil spill.² Local boards of health can preemptively close beaches that have consistently elevated bacterial indicator levels, as well.

**Monitoring**

Determination of Monitoring Locations and Frequency: The sampling frequency for Massachusetts’ beaches is based on use and the potential for pollution problems. Sanitary surveys of beaches in Massachusetts are sometimes conducted not to identify sources of contamination, but to verify that there are no sources of contamination at a beach in order to obtain a variance that allows less frequent monitoring.¹ Beachwater quality samples are required to be taken at the areas of greatest bather load. However, beach operators are encouraged to sample where outfalls and other sources of contamination are present as well as the area of greatest bather load.²

**Practice:** Samples are taken from the area of greatest bather density, usually before noon. Samples are collected in three feet of water, one foot below the surface of the water.² Sample results must be reported to the MDPH within 24 hours of receipt by a laboratory. Communities choose a day of the week to sample all of their beaches and generally sample that day throughout the beach season.²

**Results:** In 2008, Massachusetts reported 600 monitoring locations at 525 coastal beaches, 12 (2%) of which were monitored daily, 535 (89%) once a week, 8 (1%) every other week, and 45 (8%) once a month. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken
outside the official beach season, if any). In 2008, 6 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance in rate 2008 were Kings at Stacy Brook in Essex County (72%), Cockle Cove Creek in Barnstable County (62%), Rhoda in Norfolk County (44%), Kings At Kimball (40%) and Kings (DCR - DUPR) in Essex County (38%), Town Landing—Snail Road in Barnstable County (29%), Plum Cove in Essex County (29%), and 593 Commercial Street (28%), Kendal Lane (28%), Bikepath Beach (Trunk River) East (25%), and Keyes Beach in Barnstable County (25%).

Norfolk County had the highest exceedance rate (11%) followed by Suffolk (10%), Bristol (6%), Essex (5%), Barnstable (5%), Plymouth (4%), Nantucket (3%), and Dukes (2%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 424 beaches, the percent of samples exceeding the standard increased to 5 percent in 2008, the highest level since 2005 (3, 4, and 4 percent in 2007, 2006, and 2005, respectively).

### 2008 Massachusetts Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Barnstable</td>
<td>Cockle Cove Creek-Parking Lot</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>62%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Landing-Snail Road</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>29%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Kendal Lane</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>28%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>593 Commercial Street</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>28%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bikepath Beach (Trunk River) East</td>
<td>2</td>
<td>1/wk</td>
<td>8</td>
<td>25%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Keyes Beach</td>
<td>2</td>
<td>1/wk</td>
<td>20</td>
<td>25%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wood Neck River</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>24%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Saconessett Hills Association</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>20%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Meeting House Pond</td>
<td>3</td>
<td>1/wk</td>
<td>5</td>
<td>20%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>637 Commercial Street</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>19%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ropes</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>19%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>West Dennis-Residential</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>19%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Court Street</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>19%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Landing-Breakwater</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>19%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>29 Commercial Street</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>19%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Atkins Lane</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>19%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Atlantic Avenue</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>19%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>West End Lot</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>19%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Colonial Acres-West</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>17%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>The Belmont</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>14%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Old Silver Beach Estates Assoc.</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>14%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Old Mill Point Association-Right of Jetty</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>14%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wild Harbour Estates</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>14%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Pamet Harbor</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>13%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bucks Creek</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>13%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Landing West of Coast Guard</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>13%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Seacrest Resort</td>
<td>2</td>
<td>1/wk</td>
<td>8</td>
<td>13%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Red River-Middle</td>
<td>3</td>
<td>1/wk</td>
<td>11</td>
<td>9%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ellis Landing</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>9%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Barnstable</td>
<td>New Seabury Inn</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Seacoast Shores Associates, Inc.</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Skaket Beach Condominiums</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Torrey Beach Community Association</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cape Cod Sea Camps (Bay)</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Sunset Beach Association</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Popponesset Spit</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ellis Landing Park Condominiums</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Sippewissett Highlands Trust</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Popponesset</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Maushup Village</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cockle Cove Creek-Ridgevale</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Falmouth Yacht Club</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Shrewood Beach Association</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Oyster Harbors Club</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cataumet Harbor</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Kalmus Yacht</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Neck-Mill Creek</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Gray Gables</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Little River Road</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Oregon</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Noon’s Landing</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ryder Street - Middle</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bikepath Beach (Trunk River) West</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Estey Avenue</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Stoney Beach (MBL)</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bayview</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>451 Commercial Street</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bristol-East</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>333 Commercial Street</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Old Silver 2-North</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ryder Street-Left</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Paines Creek</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Landing Beach Point</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Seaview Ave. Beach</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Chapoquoit</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Provincetown Inn Rotary</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Crosby Landing</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Neck (Horizons)</td>
<td>3</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cordwood Road</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>East (Town) Beach</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Sunset Village (379 Shore Rd)</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ryder Street-Right</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Old Silver 2-South</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Inman Road</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Howes Street</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cotuit Bay Shores Association</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cold Storage/Pond Village</td>
<td>3</td>
<td>1/mo</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Red River-West</td>
<td>3</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Dune’s Colony (648 Shore Rd)</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Campground</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bay Road</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Scusset (DCR-DSPR)</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Parkers River West</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Veterans</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Covell’s</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Mayflower</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bayview Street</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Corporation</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Chapin Memorial</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Kalmus Ocean</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Craigville</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Colonial Acres-East</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Coast Guard Town</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bass River-West</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Falmouth Heights-East</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Winslow Landing Road</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Callies Beach</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Seaside Park Improvement Association</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Head of the Meadow (Town)</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Saints Landing</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Powers Landing</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Mayo</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Baxter Avenue</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Kellers Corner</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Longnook</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Neck</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ryder</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>West Dennis-West</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Race Point-Sampling Point 2</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ridgevale</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Sea Street (Dennisport)</td>
<td>3</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Menauhant - East</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Seabreeze</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Hawthorne</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>South Cape Beach (DCR - DSPR)</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cockle Cove</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Dowses</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Obsolete-Allen Harbor</td>
<td>3</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Breakwater Landing</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Red River-East</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Maguires Landing</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Megansett</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Head of the Meadow (National)</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Windmill</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Glendon Road</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bank Street-Bayview Rd</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Robbins Hill</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>South Middle</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Pilgrim Pine Acres</td>
<td>2</td>
<td>1/wk</td>
<td>8</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>First Encounter-Beach</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Hideaway Village Association</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Kennedy Memorial</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Atlantic Avenue</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Duck Harbor</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cahoon Hollow</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Chequesset Yacht and Country Club</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Oyster Pond</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Columbus Avenue</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Burton Baker</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Seagull (Right)</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Quanset Harbor Club Association</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>White Crest</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Linnell Landing</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Boat Meadow</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ballston</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Fifth Ave (boat launch)</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Dyer Prince</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Corn Hill</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Great Hollow</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ocean Club at Smuggler’s Beach</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Fisher</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Race Point-Sampling Point 1</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Nauset</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Skaket Beach</td>
<td>3</td>
<td>1/wk</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Neel Road</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Paw Wah Pond</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Herring Cove (National)</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Thumpertown</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Coast Guard-2</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Newcomb Hollow</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Old Mill Point Association-left of Jetty</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Falmouth Associates-564 Surf Drive</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Brooks</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Patiusset Beach</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Raycroft</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wings Neck Trust Association (South Beach)</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Johnson Street</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Brewster Dunes</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Omaha Road</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Tahanto Associates, Inc.</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Marconi-Sampling Point 3</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Haigis</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Crow's Nest (496 Shore Rd)</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Quisset Beach Association</td>
<td>2</td>
<td>1/wk</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Nauset Light-2</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Thatcher Town Park</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Indian Neck</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Rock Harbor</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bristol-West</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Sagamore</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Kingsbury</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Harborview</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Hardings-East</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bone Hill</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Chapoquoit Associates-Little Beach</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Nauset Light-3</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Nauset Light-1</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Follins Pond</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Old Silver 1-Central</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Parkers River East</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Racing Beach Association</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Hardings-West</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Surf Drive-Pool</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>----------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Andrew Harding Lane Beach</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wilbur Park</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wianno Avenue</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Trotting Park</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Pleasant Bay</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bridge Street</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Marconi-Sampling Point 1</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>First Encounter-Spit River</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Pocasset Beach Improvement Association</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Sea Pines</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Crocker’s Neck</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Millway</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>South Village</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Electric Avenue</td>
<td>2</td>
<td>1/wk</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Gray’s Beach</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Jetty Lane</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Chatham Bars Inn</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Little Inn at Pleasant Bay</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>East Sandwich</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wings Neck Trust Association (North Beach)</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Jacknife Harbor</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>New Silver (Silver Beach Improvement Assoc)</td>
<td>2</td>
<td>1/wk</td>
<td>9</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Monument</td>
<td>2</td>
<td>1/wk</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Forest Street Beach</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wood Neck Beach</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Briarwood Marine and Science</td>
<td>2</td>
<td>1/wk</td>
<td>9</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Race Point-Sampling Point 3</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Seagull (Center)</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Cove</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Point of Rocks</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Cove</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>S. Sunken Meadow</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Acapesket Improvement Association</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Englewood</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bass River-East</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Surf Drive-1</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wah Wah Taysee Road</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Merkel Beach (Snow Inn Road)</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Scraggy Neck Recreation Association</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ocean Edge-1</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wianno Club (Salt-107 Seaview)</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cook’s Brook</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Pleasant Bay</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Sandy Neck</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cross Street</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Little Island Beach Preserve</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wequasset Inn Resort</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Seconsett Island Causeway</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Mill Road</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Loops</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Silver Springs Association</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Priscilla’s Landing</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Sea Street (East Dennis)</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Zylpha</td>
<td>3</td>
<td>1/wk</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Follins Pond</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Kent’s Point</td>
<td>3</td>
<td>1/wk</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Indian Trail</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Surf Drive-East</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Scudder Lane</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Seagull (Left)</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Pinelands Park</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Barlows Landing</td>
<td>2</td>
<td>1/wk</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Pleasant Street</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Falmouth Heights-West</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cole Road</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Craigville Beach Club</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cold Storage</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Nobska Beach Association</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Pleasant Road</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Grey Neck</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Coast Guard-1</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Menauhant - West</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Marconi - Sampling Point 2</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Sullivan (Depot St.)</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Lighthouse</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Mashpee Neck Road (Town Landing)</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Scatteree Town Landing</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cedar Point Association</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Oyster Place</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>West Dennis-Snack Bar</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Chapoquoit Associates-Front Beach</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Earle Road</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>-------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Popponesset Beach Association</td>
<td>2</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Mink Meadows</td>
<td></td>
<td>No data</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Pearse</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>24%</td>
</tr>
<tr>
<td>Bristol</td>
<td>C &amp; K Club</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>23%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Hidden Bay</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>17%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Seaview</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>15%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Bayview</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>14%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Moses Smith Creek</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>8%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Oak Hill Shores</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>8%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Apponagansett Town Beach</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Spindle Rock</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Anthony's</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Fort Phoenix (DCR-DSPR)</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Demarest Lloyd (DCR-DSPR)</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Raymond Street</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Jones Town Beach</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Cedar Cove</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Leeside</td>
<td>3</td>
<td>2/mo</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Round Hill</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Elephant Rock</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Nonquitt</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>East Beach</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>West Island Causeway</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Horseneck (DCR-DSPR)</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Cherry &amp; Webb</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Salter’s Point East</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Salter’s Point South</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Baker’s Beach</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Town Beach</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Sandy Beach</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>West Island Town Beach</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Manhattan Avenue</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Coles River Club off Harbor Rd</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Town Beach</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Pond at Lucy Vincent Beach</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>15%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Owen Little Way</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>14%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Philbin Beach</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Lobsterville</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Red Beach</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Great Rock Bight</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Pay Beach</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Dukes</td>
<td>Tashmoo Beach</td>
<td>2</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Lambert’s Cove Beach-South</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Ramble Trail Preserve Beach</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Ocean at Chilmark Pond Preserve</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Ocean at Lucy Vincent Beach</td>
<td>3</td>
<td>1/wk</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Bend in the Road</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Menemsha</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>South Beach State Park-Middle</td>
<td>3</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>South Beach State Park-East</td>
<td>3</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>South Beach State Park-West</td>
<td>3</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Ocean at Edgartown Great Pond</td>
<td>3</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>East Beach (Chappy)</td>
<td>3</td>
<td>1/wk</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Chappy Point Beach</td>
<td>3</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Joseph Sylvia State Beach</td>
<td>3</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Marinelli (Jetty) Beach</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Peco Point Preserve Beach</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Ocean at Long Point-West</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Great Pond at Long Point</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Joseph Sylvia State Beach-Sound</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Ocean at Long Point-East</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Eastville Town Beach-Harbor</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Norton Point Beach</td>
<td>2</td>
<td>1/wk</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Pay Beach</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Moshup Beach</td>
<td>3</td>
<td>1/mo</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Tashmoo Cut</td>
<td>2</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Owen Park</td>
<td>2</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Lambert’s Cove Beach-North</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Sepiessa Point</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Fuller Street</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Vineyard Harbor Motel</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Ocean at Squibnocket Beach</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Hilman’s Point</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Chappy Beach Club</td>
<td>2</td>
<td>1/wk</td>
<td>8</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Sailing Camp Park</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Sound at Wilfred’s Pond Reserve</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Wasque Swim Beach</td>
<td>2</td>
<td>1/wk</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Eastville Town Beach-Drawbridge</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Joseph Sylvia State Beach-Little Bridge</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Dukes</td>
<td>Quail Acres</td>
<td>No data</td>
<td>0</td>
<td>N/A</td>
<td></td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Stacy Brook</td>
<td>2</td>
<td>1/wk</td>
<td>25</td>
<td>72%</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Kimball</td>
<td>2</td>
<td>1/wk</td>
<td>25</td>
<td>40%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------------</td>
<td>--------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings (DCR-DUPR)</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>38%</td>
</tr>
<tr>
<td>Essex</td>
<td>Plum Cove</td>
<td>2</td>
<td>1/wk</td>
<td>7</td>
<td>29%</td>
</tr>
<tr>
<td>Essex</td>
<td>Donovans</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>18%</td>
</tr>
<tr>
<td>Essex</td>
<td>Goat Hill</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>15%</td>
</tr>
<tr>
<td>Essex</td>
<td>Brackenbury</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>14%</td>
</tr>
<tr>
<td>Essex</td>
<td>Dane Street</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>14%</td>
</tr>
<tr>
<td>Essex</td>
<td>Tuck’s Point</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>13%</td>
</tr>
<tr>
<td>Essex</td>
<td>Nahant Beach-South</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>13%</td>
</tr>
<tr>
<td>Essex</td>
<td>West Manchester</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>13%</td>
</tr>
<tr>
<td>Essex</td>
<td>Children’s Island-Back</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>10%</td>
</tr>
<tr>
<td>Essex</td>
<td>Grandview</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>9%</td>
</tr>
<tr>
<td>Essex</td>
<td>Pico</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>9%</td>
</tr>
<tr>
<td>Essex</td>
<td>Fisherman’s</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>8%</td>
</tr>
<tr>
<td>Essex</td>
<td>Black Rock</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>8%</td>
</tr>
<tr>
<td>Essex</td>
<td>Preston</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>8%</td>
</tr>
<tr>
<td>Essex</td>
<td>Gas House</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Essex</td>
<td>Mingo</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Essex</td>
<td>Tudor</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Essex</td>
<td>Lynch Park</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Essex</td>
<td>Winter Island (Waikiki)</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Essex</td>
<td>Sandy Point</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Essex</td>
<td>Sandy Beach</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Essex</td>
<td>Steps</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Essex</td>
<td>Obear Park</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Essex</td>
<td>Revere at State Police</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Essex</td>
<td>Nahant Beach-Flagpole</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Essex</td>
<td>Magnolia-1</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Essex</td>
<td>Osgood</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Clammer’s Beach</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Canoe</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Ocean Avenue</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Pavillion Beach</td>
<td>2</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Sunset Road</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Half Moon</td>
<td>2</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Pavillion</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Woodbury</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Plum Island at Point</td>
<td>3</td>
<td>2/mo</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Plum Island-End of Island 2</td>
<td>3</td>
<td>2/mo</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Plum Island-End of Island 1</td>
<td>3</td>
<td>2/mo</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Plum Island at 55th St</td>
<td>3</td>
<td>2/mo</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Short</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Essex</td>
<td>Phillips</td>
<td>3</td>
<td>2/mo</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Salisbury (DCR-DSPR)</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Magnolia-Right of Bath &amp; Tennis</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Front Beach</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Revere-Shirley St.</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Long-North</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Back</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Cape Hedge</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Pebble</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Long-Gloucester</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Crane</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Plum Island</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Salisbury-North Beach</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Revere-Oak Island</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Nahant Beach-N. of Bathhouse</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Good Harbor Creek</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Nahant Beach-Parking Section 9</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Independence Park</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Revere-Point of Pines</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Rice</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Good Harbor</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Little Neck</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Pioneer</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Old Garden</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Black</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Wingearsheek</td>
<td>2</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Mackey</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>West</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Village Street</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Willow Avenue</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Cressy’s</td>
<td>2</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>White</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Children’s Island-Wally</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Steep Hill</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Yerrill</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Stramski</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Niles</td>
<td>2</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Dead Horse</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Crocker Park</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Devereux</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>---------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Essex</td>
<td>Singing-1</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Singing-Right of Parking</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Winthrop (DCR-DUPR)</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Whales</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Juniper Point</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Eisman’s</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Children’s Island-Dock</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Willows Pier</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Grace Oliver</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Short (DCR-DUPR)</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Forest River Point</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Clark</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Collins Cove</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Halford</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Essex</td>
<td>Front Beach</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Nantucket</td>
<td>Washington Street</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>8%</td>
</tr>
<tr>
<td>Nantucket</td>
<td>40th Pole 1</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>8%</td>
</tr>
<tr>
<td>Nantucket</td>
<td>Surfside 2</td>
<td>3</td>
<td>1/mo</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Nantucket</td>
<td>Jetties</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Nantucket</td>
<td>Cliffside</td>
<td>3</td>
<td>1/mo</td>
<td>8</td>
<td>0%</td>
</tr>
<tr>
<td>Nantucket</td>
<td>Sewerbeds</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Nantucket</td>
<td>Miacomet</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Nantucket</td>
<td>Washing Pond</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Nantucket</td>
<td>Warren’s Landing</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Nantucket</td>
<td>Dionis</td>
<td>2</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Nantucket</td>
<td>Sconset 1</td>
<td>2</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Nantucket</td>
<td>Madaket</td>
<td>3</td>
<td>1/mo</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Nantucket</td>
<td>Cisco</td>
<td>3</td>
<td>1/wk</td>
<td>3</td>
<td>0%</td>
</tr>
<tr>
<td>Nantucket</td>
<td>Children’s</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Rhoda</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>44%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Parkhurst</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>20%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>George E. Lane</td>
<td>3</td>
<td>2/mo</td>
<td>11</td>
<td>18%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>1</td>
<td>Daily</td>
<td>77</td>
<td>18%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>1</td>
<td>Daily</td>
<td>77</td>
<td>14%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Bassing’s (Sailing Club)</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>14%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>1</td>
<td>Daily</td>
<td>77</td>
<td>13%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>1</td>
<td>Daily</td>
<td>76</td>
<td>12%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Edgewater</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Nickerson</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Orchard Street</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Avalon</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
</tbody>
</table>
## County | Beach | Tier | Monitoring Frequency | Total Samples | Percent Exceedance
--- | --- | --- | --- | --- | ---
Norfolk | Delano Ave. | 2 | 1/wk | 14 | 7%
Norfolk | Chikatawbot | 2 | 1/wk | 14 | 7%
Norfolk | Broady (Baker) | 2 | 1/wk | 14 | 7%
Norfolk | Heron | 2 | 1/wk | 14 | 7%
Norfolk | Merrymount | 2 | 1/wk | 13 | 0%
Norfolk | Sandy | 2 | 1/wk | 12 | 0%
Norfolk | Sandy Cove | 2 | 1/wk | 11 | 0%
Norfolk | Wessagussett (Old Wessagusset) | 3 | 2/mo | 6 | 0%
Norfolk | Germantown Firestation | 2 | 1/wk | 13 | 0%
Norfolk | Yacht Club | 2 | 1/wk | 12 | 0%
Norfolk | Mound | 2 | 1/wk | 13 | 0%
Norfolk | Little Harbor | 2 | 1/wk | 1 | 0%
Norfolk | Black Rock | 2 | 1/wk | 12 | 0%
Norfolk | Smith Beach | 2 | 1/wk | 13 | 0%
Plymouth | Harbor 1 | 2 | 1/wk | 13 | 23%
Plymouth | A Street Bay Side | 2 | 1/wk | 15 | 20%
Plymouth | Landing Road | 2 | 1/wk | 16 | 19%
Plymouth | O’Tools | 2 | 1/wk | 17 | 18%
Plymouth | Town Beach | 2 | 1/wk | 12 | 17%
Plymouth | Aucoot | 2 | 1/wk | 12 | 17%
Plymouth | Tower 4 | 2 | 1/wk | 13 | 15%
Plymouth | Little Harbor | 2 | 1/wk | 14 | 14%
Plymouth | Green Harbor | 2 | 1/wk | 14 | 14%
Plymouth | West End | 2 | 1/wk | 16 | 13%
Plymouth | Brant Beach | 2 | 1/wk | 10 | 10%
Plymouth | Leisure Shores | 2 | 1/wk | 11 | 9%
Plymouth | North | 2 | 1/wk | 11 | 9%
Plymouth | 400 South | 2 | 1/wk | 12 | 8%
Plymouth | Tower 1 | 2 | 1/wk | 12 | 8%
Plymouth | Plymouth-Sampling Point 3 | 2 | 1/wk | 12 | 8%
Plymouth | White Horse-Hill Top | 2 | 1/wk | 12 | 8%
Plymouth | Squid | 2 | 1/wk | 12 | 8%
Plymouth | Davy’s Locker | 2 | 1/wk | 12 | 8%
Plymouth | Tabor Park South | 2 | 1/wk | 12 | 8%
Plymouth | Briarwood | 2 | 1/wk | 13 | 8%
Plymouth | Edgewater | 2 | 1/wk | 13 | 8%
Plymouth | Gunrock | 2 | 1/wk | 13 | 8%
Plymouth | Silver Shell-North Jetty | 2 | 1/wk | 13 | 8%
Plymouth | North Boulevard | 2 | 1/wk | 13 | 8%
Plymouth | Nantasket at Bathhouse | 2 | 1/wk | 16 | 6%
Plymouth | Nantasket at North Site | 2 | 1/wk | 16 | 6%
<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Plymouth</td>
<td>Nantasket at Water St.</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Beverly Yacht</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Peases Yacht</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Brant Rock</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Dexter Lane</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Converse Point</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Hampton Circle</td>
<td>2</td>
<td>1/wk</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Point Independence</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Antasawomak-1</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Peggotty</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Silver Shell-South Jetty</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Town Beach</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Harbor 2</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>A Street Ocean</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Humarock</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Nelson Street</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Island Wharf</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Swift’s</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Hollywoods-1</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Antasawomak-2</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Minot</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Otis</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Shipyard Lane</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Belair</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>XYZ</td>
<td>2</td>
<td>1/wk</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Hollywoods-2</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Ned’s Point, Mattapoisett</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Rexhame</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Kenburma</td>
<td>2</td>
<td>1/wk</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Seal Cove</td>
<td>2</td>
<td>1/wk</td>
<td>9</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Shell Point</td>
<td>3</td>
<td>1/wk</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>East Boulevard</td>
<td>3</td>
<td>1/wk</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Riverside Avenue</td>
<td>3</td>
<td>1/wk</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Rocky Nook</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Crescent</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>J. Beach</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Fieldston</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Pinehurst</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Kimball</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Kids Beach</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>400 North</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Swift’s Neck</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Oakdale Avenue</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Scituate Lighthouse</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Fieldston at 9th Road</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Point Connett</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Plymouth-Sampling Point 1</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Piney Point</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Yacht Club</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Sand Hills</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Nantasket at Park St.</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Plymouth-Sampling Point 5</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Gray’s</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Planting Island</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Land Trust Reservation</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Tabor Academy-1</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Newport</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Tabor Academy-2</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Egypt</td>
<td>2</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Residents Beach (Duxbury Beach)</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Parkwood</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Onset</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Wampatuck</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Mattapoisett Shores Association</td>
<td>2</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Darcy’s</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>White Horse-Full Sail</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>James Ave.</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Duxbury Beach at Bath House</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Pico</td>
<td>2</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>1</td>
<td>Daily</td>
<td>78</td>
<td>23%</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at I St.</td>
<td>1</td>
<td>Daily</td>
<td>77</td>
<td>13%</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>1</td>
<td>Daily</td>
<td>75</td>
<td>12%</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Savin Hill (DCR-DUPR)</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>12%</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Malibu (DCR-DUPR)</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>12%</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Middle</td>
<td>1</td>
<td>Daily</td>
<td>77</td>
<td>12%</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>1</td>
<td>Daily</td>
<td>77</td>
<td>10%</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Rec. Center</td>
<td>1</td>
<td>Daily</td>
<td>77</td>
<td>9%</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-North</td>
<td>1</td>
<td>Daily</td>
<td>77</td>
<td>8%</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Pleasure Bay at Broadway (DCR-DUPR)</td>
<td>2</td>
<td>1/wk</td>
<td>30</td>
<td>3%</td>
</tr>
<tr>
<td>Suffolk</td>
<td>City Point Beach at Farragut Road &amp; Day Blvd. (DCR)</td>
<td>1</td>
<td>Daily</td>
<td>77</td>
<td>1%</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Lovell’s Island (DCR-DUPR)</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
</tbody>
</table>
Closings

Closing Issuance: Beaches are closed to swimming when standards are exceeded. Whether beach action days are reported to the EPA as closings or advisories, restrictions and notifications are the same. An exceedance of either the single-sample maximum or the geometric mean standard triggers a closing. There is no protocol for allowing a beach to remain open after an exceedance is found. Within 24 hours of being notified that there is an exceedance, local boards of health are required to post signs at access points to the beach announcing the beach’s closing. Resampling to confirm results is not conducted before closing the beach. Sampling results are displayed on the web within six hours of being validated.

At some of the larger beaches in Massachusetts where multiple samples are taken, the local board of health and/or the MDPH determines the appropriate portion of the beach to close when only one sample exceeds. At a minimum, the section of the beach where the sample exceeded the standard must be posted.

Reopening Procedures: When an exceedance is found, sampling is generally conducted every day until the standards are met and the beach is reopened. States that monitor more frequently after an exceedance is found will tend to have higher percent exceedance rates and lower total closing/advisory days than they would have had if their sampling frequency did not increase after an exceedance was found.

Number of Closings: Massachusetts had 461 closing events lasting six consecutive weeks or less in 2008. Total closing days for 461 events lasting six consecutive weeks or less increased 94 percent to 1,102 days in 2008 from 567 days in 2007, 1,092 days in 2006, and 680 days in 2005. In addition, there were two extended events (117 days total) and two permanent events (188 days total) in 2008. Extended events are those in effect more than six but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. In 2007, there were three extended events (224 days total) and no permanent events.

Causes of Closings: For events lasting six consecutive weeks or less, 85% (942) of closing/advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, and 15% (160) were preemptive (i.e. without waiting for monitoring results) due to heavy rainfall.

The reported sources of beachwater contamination for 2008 are as follows: 85% (942) of closing/advisory days were from unknown sources of contamination, and 15% (160) were from stormwater.
<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Barnstable</td>
<td>637 Commercial Street</td>
<td>7/1/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Atkins Lane</td>
<td>6/17/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Atkins Lane</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Atkins Lane</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Atlantic Avenue</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Atlantic Avenue</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Atlantic Avenue</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bay Road</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bayview</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bayview Street</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bikepath Beach (Trunk River) East</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bikepath Beach (Trunk River) West</td>
<td>7/9/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bristol - East</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Bucks Creek</td>
<td>6/19/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Campground</td>
<td>6/19/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cataumet Harbor</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Chapin Memorial</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Chapoquoit</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cockle Cove Creek-Parking Lot</td>
<td>5/31/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cockle Cove Creek-Ridgevale</td>
<td>5/31/08</td>
<td>9/2/08</td>
<td>Preempt-other</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cold Storage</td>
<td>6/30/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cold Storage/Pond Village</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cordwood Road</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Corporation</td>
<td>7/16/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Cotuit Bay Shores Association</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Court Street</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Court Street</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Court Street</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Covell’s</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Craigville</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Crosby Landing</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Dune’s Colony (648 Shore Rd)</td>
<td>7/3/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>East (Town) Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ellis Landing</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Estey Avenue</td>
<td>6/17/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Falmouth Yacht Club</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Gray Gables</td>
<td>6/13/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Howes Street</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Inman Road</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Kalmus Ocean</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Kalmus Yacht</td>
<td>5/31/08</td>
<td>6/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------------</td>
<td>---------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------</td>
<td>--------</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Kendal Lane</td>
<td>6/17/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Kendal Lane</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Kendal Lane</td>
<td>7/1/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Keyes Beach</td>
<td>5/23/08</td>
<td>5/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Keyes Beach</td>
<td>6/17/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Keyes Beach</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Keyes Beach</td>
<td>7/29/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Keyes Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Little River Road</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Maushup Village</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Mayflower</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Meeting House Pond</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Mink Meadows</td>
<td>7/2/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>New Seabury Inn</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Noon’s Landing</td>
<td>7/3/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Old Mill Point Association-Right of Jetty</td>
<td>6/20/08</td>
<td>6/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Old Mill Point Association-Right of Jetty</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Old Silver 2-North</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Old Silver 2-South</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Old Silver Beach Estates Assoc.</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Old Silver Beach Estates Assoc.</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Oregon</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Oyster Harbors Club</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Paines Creek</td>
<td>6/11/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Pamet Harbor</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Pamet Harbor</td>
<td>7/3/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Parkers River West</td>
<td>6/2/08</td>
<td>6/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Popponesset Beach Association</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Popponesset Spit</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Provincetown Inn Rotary</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Red River-Middle</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Red River-West</td>
<td>6/6/08</td>
<td>6/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ropes</td>
<td>6/17/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ropes</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ropes</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ryder Street-Left</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ryder Street-Middle</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Ryder Street-Right</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Saconessett Hills Association</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Saconessett Hills Association</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Scusset (DCR - DSPR)</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-------------</td>
<td>-------------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------------</td>
<td>--------</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Sea Street (East Dennis)</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Seacoast Shores Associates, Inc.</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Seaview Ave. Beach</td>
<td>6/2/08</td>
<td>6/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Shorewood Beach Association</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Sippewissett Highlands Trust</td>
<td>7/9/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Skaket Beach Condominiums</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Stoney Beach (MBL)</td>
<td>7/30/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Sunset Beach Association</td>
<td>8/15/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Sunset Village (379 Shore Rd)</td>
<td>7/3/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>The Belmont</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Landing-Breakwater</td>
<td>7/1/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Landing-Snail Road</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Landing-Snail Road</td>
<td>7/1/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Landing Beach Point</td>
<td>7/3/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Landing West of Coast Guard</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Neck (Horizons)</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Town Neck-Mill Creek</td>
<td>6/26/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Veterans</td>
<td>5/31/08</td>
<td>6/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>West Dennis-Residential</td>
<td>7/2/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>West Dennis-Residential</td>
<td>7/16/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>West Dennis-Residential</td>
<td>7/30/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>West End Lot</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>West End Lot</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>West End Lot</td>
<td>7/29/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wild Harbour Estates</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wild Harbour Estates</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wood Neck River</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wood Neck River</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Barnstable</td>
<td>Wood Neck River</td>
<td>8/27/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Anthony's</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Apponagansett Town Beach</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Bayview</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Bayview</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Bayview</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Demarest Lloyd (DCR-DSPR)</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Fort Phoenix (DCR-DSPR)</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Hidden Bay</td>
<td>6/18/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Hidden Bay</td>
<td>8/13/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Jones Town Beach</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Moses Smith Creek</td>
<td>8/13/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>----------------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------</td>
<td>--------</td>
</tr>
<tr>
<td>Bristol</td>
<td>Oak Hill Shores</td>
<td>8/13/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Pearse</td>
<td>6/17/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Pearse</td>
<td>7/1/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Pearse</td>
<td>7/29/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Pearse</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Seaview</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Seaview</td>
<td>8/12/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Dukes</td>
<td>Owen Little Way</td>
<td>7/16/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Dukes</td>
<td>Owen Little Way</td>
<td>8/22/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Dukes</td>
<td>Pond at Lucy Vincent Beach</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Dukes</td>
<td>Pond at Lucy Vincent Beach</td>
<td>8/15/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Dukes</td>
<td>Quail Acres</td>
<td>7/9/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Brackenbury</td>
<td>6/19/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Brackenbury</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Dane Street</td>
<td>6/19/08</td>
<td>6/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Donovan's</td>
<td>6/27/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Donovan's</td>
<td>7/18/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Donovan's</td>
<td>7/24/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Donovan's</td>
<td>8/8/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Fisherman's</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Gas House</td>
<td>6/26/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Goat Hill</td>
<td>6/19/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Grandview</td>
<td>6/27/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings (DCR-DUPR)</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings (DCR-DUPR)</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings (DCR-DUPR)</td>
<td>8/8/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings (DCR-DUPR)</td>
<td>8/15/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Kimball</td>
<td>6/5/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Kimball</td>
<td>6/27/08</td>
<td>6/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Kimball</td>
<td>6/29/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Kimball</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Kimball</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Kimball</td>
<td>8/8/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Kimball</td>
<td>8/15/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Stacy Brook</td>
<td>6/5/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Stacy Brook</td>
<td>6/27/08</td>
<td>6/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Stacy Brook</td>
<td>6/29/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Stacy Brook</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Stacy Brook</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Stacy Brook</td>
<td>8/8/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Kings at Stacy Brook</td>
<td>8/15/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>-------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>------------</td>
<td>--------</td>
</tr>
<tr>
<td>Essex</td>
<td>Lynch Park</td>
<td>6/19/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Mingo</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Nahant Beach-Flagpole</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Nahant Beach-N. of Bathhouse</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Nahant Beach-Parking Section 9</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Nahant Beach-South</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Obear Park</td>
<td>6/19/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Plum Cove</td>
<td>8/14/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Plum Cove</td>
<td>8/21/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Preston</td>
<td>7/4/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Sandy Beach</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Sandy Point</td>
<td>6/19/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Steps</td>
<td>8/7/08</td>
<td>8/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Tuck's Point</td>
<td>7/2/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Tudor</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>West Manchester</td>
<td>7/2/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>West Manchester</td>
<td>7/10/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Essex</td>
<td>Winter Island (Waikiki)</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nantucket</td>
<td>40th Pole 1</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nantucket</td>
<td>Washington Street</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Avalon</td>
<td>6/26/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Bassing's (Sailing Club)</td>
<td>6/18/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Bassing's (Sailing Club)</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Black Rock</td>
<td>7/31/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Broady (Baker)</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Chikatawbot</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Delano Ave.</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Edgewater</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>George E. Lane</td>
<td>7/22/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>George E. Lane</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Heron</td>
<td>6/26/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Nickerson</td>
<td>6/26/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Orchard Street</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Parkhurst</td>
<td>6/26/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Parkhurst</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Parkhurst</td>
<td>7/18/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Rhoda</td>
<td>6/12/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Rhoda</td>
<td>6/26/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Rhoda</td>
<td>6/27/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Rhoda</td>
<td>7/10/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Rhoda</td>
<td>7/31/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>-------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------------</td>
<td>--------------</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>5/29/08</td>
<td>5/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>6/5/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>6/16/08</td>
<td>6/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>6/29/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>7/5/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>7/22/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>8/8/08</td>
<td>8/10/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>8/16/08</td>
<td>8/18/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Channing</td>
<td>8/31/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>5/29/08</td>
<td>5/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>6/5/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>6/16/08</td>
<td>6/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>6/29/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>7/5/08</td>
<td>7/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>7/23/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>8/8/08</td>
<td>8/10/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>8/31/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Milton</td>
<td>5/29/08</td>
<td>5/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>6/5/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>6/16/08</td>
<td>6/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>------------------------</td>
<td>------------</td>
<td>-----------</td>
<td>-----------------</td>
<td>---------------</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>6/29/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>7/5/08</td>
<td>7/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>7/23/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>8/8/08</td>
<td>8/10/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>8/16/08</td>
<td>8/18/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Rice</td>
<td>8/31/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>5/29/08</td>
<td>5/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>6/5/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>6/16/08</td>
<td>6/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>6/29/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>7/5/08</td>
<td>7/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>7/23/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>8/8/08</td>
<td>8/10/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>8/16/08</td>
<td>8/18/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Wollaston at Sachem</td>
<td>8/31/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>400 South</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>A Street Bay Side</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>A Street Bay Side</td>
<td>7/30/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>A Street Bay Side</td>
<td>8/1/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>A Street Bay Side</td>
<td>8/13/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>----------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------</td>
<td>---------</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Briarwood</td>
<td>6/27/08</td>
<td>6/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Davy’s Locker</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Edgewater</td>
<td>8/13/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Forbes</td>
<td>6/20/08</td>
<td>6/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Forbes</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Forbes</td>
<td>7/4/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Forbes</td>
<td>7/10/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Forbes</td>
<td>8/1/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Forbes</td>
<td>8/15/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Forbes</td>
<td>8/22/08</td>
<td>9/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Green Harbor</td>
<td>7/3/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Gunrock</td>
<td>8/13/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Harbor 1</td>
<td>8/12/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Landing Road</td>
<td>6/18/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Landing Road</td>
<td>7/23/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Little Harbor</td>
<td>6/20/08</td>
<td>6/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Little Harbor</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Nantasket at bathhouse</td>
<td>7/25/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Nantasket at North Site</td>
<td>7/25/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Nantasket at Park St.</td>
<td>7/25/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Nantasket at Water St.</td>
<td>7/25/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>North</td>
<td>8/21/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>North Boulevard</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>O’Tools</td>
<td>8/13/08</td>
<td>8/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>O’Tools</td>
<td>8/16/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Pico</td>
<td>6/27/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Plymouth-Sampling Point 3</td>
<td>7/30/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Silver Shell-South Jetty</td>
<td>6/17/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Squid</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Tabor Park South</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Tower 1</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>Tower 4</td>
<td>8/13/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>West End</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>West End</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Plymouth</td>
<td>White Horse-Hill Top</td>
<td>7/16/08</td>
<td>7/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>6/5/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>6/16/08</td>
<td>6/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>6/29/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>----------</td>
<td>--------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------</td>
<td>------------</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>7/6/08</td>
<td>7/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>7/22/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>7/26/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>6/5/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>6/16/08</td>
<td>6/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>6/29/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>7/6/08</td>
<td>7/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>7/22/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>7/26/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Carson Beach at Bathhouse</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>City Point Beach at Farragut Road &amp; Day Blvd. (DCR)</td>
<td>6/5/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>City Point Beach at Farragut Road &amp; Day Blvd. (DCR)</td>
<td>6/16/08</td>
<td>6/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>City Point Beach at Farragut Road &amp; Day Blvd. (DCR)</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>City Point Beach at Farragut Road &amp; Day Blvd. (DCR)</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>City Point Beach at Farragut Road &amp; Day Blvd. (DCR)</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>City Point Beach at Farragut Road &amp; Day Blvd. (DCR)</td>
<td>7/6/08</td>
<td>7/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>City Point Beach at Farragut Road &amp; Day Blvd. (DCR)</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>City Point Beach at Farragut Road &amp; Day Blvd. (DCR)</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>City Point Beach at Farragut Road &amp; Day Blvd. (DCR)</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>-----------------------------------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>------------</td>
<td>--------------</td>
</tr>
<tr>
<td>Suffolk</td>
<td>City Point Beach at Farragut Road &amp; Day Blvd. (DCR)</td>
<td>8/8/08</td>
<td>8/10/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>City Point Beach at Farragut Road &amp; Day Blvd. (DCR)</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Middle</td>
<td>6/5/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Middle</td>
<td>6/16/08</td>
<td>6/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Middle</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Middle</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Middle</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Middle</td>
<td>7/5/08</td>
<td>7/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Middle</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Middle</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Middle</td>
<td>7/25/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Middle</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Middle</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Middle</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Middle</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-North</td>
<td>6/5/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-North</td>
<td>6/16/08</td>
<td>6/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-North</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-North</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-North</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-North</td>
<td>7/5/08</td>
<td>7/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-North</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-North</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-North</td>
<td>7/25/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-North</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-North</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-North</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-North</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Rec. Center</td>
<td>6/5/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Rec. Center</td>
<td>6/16/08</td>
<td>6/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Rec. Center</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Rec. Center</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Rec. Center</td>
<td>7/5/08</td>
<td>7/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Rec. Center</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Rec. Center</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Rec. Center</td>
<td>7/25/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Rec. Center</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Rec. Center</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Rec. Center</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Constitution-Rec. Center</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>-----------</td>
<td>--------------</td>
<td>--------------</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>6/5/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>6/16/08</td>
<td>6/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>6/21/08</td>
<td>6/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>8/13/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>8/25/08</td>
<td>8/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>8/29/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>M Street Beach at M Street (DCR-DUPR)</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>5/29/08</td>
<td>5/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>6/5/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>6/16/08</td>
<td>6/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>6/29/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>7/2/08</td>
<td>7/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>7/5/08</td>
<td>7/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>7/26/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>7/30/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>7/31/08</td>
<td>8/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>8/4/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>8/9/08</td>
<td>8/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>8/13/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>----------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>--------</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>8/15/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>8/18/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>8/22/08</td>
<td>8/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tenean (DCR-DUPR)</td>
<td>9/1/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** Preempt-other, Preemptive due to reasons not listed here; Preempt-rain, Preemptive due to rainfall.

**Notes**

2. Chris Huskey, Massachusetts Department of Public Health, personal communication, June 2009.
Michigan has more than 600 public beaches stretching along 542 miles of Great Lakes coastline. Iron, Dickinson, and Tuscola Counties are the only counties with Great Lakes coastline that do not report public beaches.

The Michigan Department of Environmental Quality (MDEQ) administers the BEACH Act grant, contracting with all local health departments that have jurisdiction over at least one Great Lakes beach to support local beach monitoring and notification programs. Sampling practices, locations, standards, and notification protocols and practices are uniform throughout the state. Michigan conducts monitoring activities at inland lakes as well, but only Great Lakes beaches are covered in this summary. The monitoring season runs from April to October.

Health departments conduct relatively basic sanitary surveys for their beaches at the beginning of each year. This allows beach managers to inspect and maintain safe and healthy conditions at their beach. Data from the monitoring program are used to help locate and eliminate sources of \textit{E. coli} bacteria and predict the occurrence of beachwater quality problems. For example, the Macomb County Health Department monitors water quality at numerous sites along the Clinton River Watershed.

In 2008, researchers from Michigan State University monitored for several indicators and source tracking markers at four public beaches along Saginaw Bay: Whites Beach, Bay City Recreation Area, Caseville County Park, and Port Crescent State Park. As part of another university study, researchers took samples in the summer of 2008 to assess the ability of \textit{Cladophora} mats to sequester \textit{E. coli} and microcystin (a toxin produced by cyanobacteria, a type of harmful algae) in near-shore waters of Grand Traverse Bay, Little Traverse Bay, and Saginaw Bay. \textit{Cladophora} is a naturally occurring filamentous algae that can form huge mats that wash ashore. These decomposing mats are not only an odor nuisance and a visual blight, but also harbor \textit{E. coli}. Shorebirds that are attracted to the washed-up \textit{Cladophora} mats may be the source of the additional \textit{E. coli}. \textit{Cladophora} mats also provide an environment that is conducive to \textit{E. coli} survival outside a host. The shoreline of Saginaw Bay is experiencing an increase in the extent and duration of decomposing \textit{Cladophora} mats. Zebra mussel infestation in the Great Lakes is suspected of causing an increase in near-shore nutrients, which cause greater \textit{Cladophora} growth.

Water quality monitoring, visually and via sampling, occurs at some beaches when algal blooms are present or decaying. Beaches on inland lakes are monitored for algae as well. Algal blooms are reported and signs are posted to alert beach visitors. Some of the signs provide a warning to stay out of areas where algal growth is visible.

Michigan received a $276,210 federal BEACH Act grant in 2008 and was eligible for a $278,000 grant in 2009. The state contributes $100,000 in grants for inland lake beach monitoring. Local funding requirements for the beach monitoring and notification program is at least $33,000 (matching funds are required for state grant monies) and the total amount of local funding is estimated to be between $200,000 and $300,000 each year. The MDEQ supplemented the BEACH Act funds to increase monitoring duration for summer 2009, providing and additional $163,824 of mostly state funds to extend the monitoring to a total of 16 weeks.

**Standards**

**Indicator Organism:** \textit{E. coli}

**Standards:** Coastal beachwater quality standards in Michigan are less stringent than EPA standards for full-body water contact recreation in fresh water. The EPA’s recommended standards for such circumstances are an \textit{E. coli} concentration of 126 cfu/100 ml for the geometric mean of five samples collected over 30 days, and 235 cfu/100 ml for a single sample.
The standards in use in Michigan are a geometric mean of $E.\ coli$ of 130 cfu/100 ml for five sampling events over 30 days and a single-sample maximum for one sampling event of 300 cfu/100 ml. Compliance with the single-sample maximum standard is based on the geometric mean of three or more samples taken during the same sampling event at representative locations within a defined sampling area. These standards are viewed by Michigan and the EPA as consistent with the requirements of the BEACH Act.1

Some health departments issue preemptive rainfall advisories, with standards based on rainfall amount.2 Known sewage spills trigger a preemptive advisory, as do riptides and strong winds.

Work continues on developing predictive models that will be used to issue advisories and closings. The importance of predictive models in protecting public health was illustrated by one local beach manager who demonstrated that at his or her beach, advisories and closings based on monitoring results were issued inaccurately 100 percent of the time.2 In other words, samples taken when the beach was under advisory or closing due to the previous day’s monitoring results showed that the beachwater quality met standards on the days that the beach was under advisory or closing in every case. Most health departments acknowledge this problem and are using routine beach sanitary surveys to develop predictive models to improve the accuracy and usefulness of a beach advisory or closing.2

**Monitoring**

**Determination of Monitoring Locations and Frequency:** Beaches are ranked for monitoring based on the period of recreational use, the nature and extent of use during certain periods, the proximity to known sources of contamination, and any effect of storm events on the water. Tier 1 beaches have public access with high bather densities, and may have known or potential sources of contamination. Tier 2 beaches have public access and may have known or potential sources of contamination, and Tier 3 beaches have public access but no other factors.

**Practice:** Samples are taken in the morning, one foot below the surface in water that is three to six feet deep. At least three simultaneous samples are taken during each sampling event and the geometric mean of these three samples is used to determine whether the water meets standards.1 Results are known 18 to 24 hours after samples are delivered to a lab. Regularly scheduled samples are collected any day from Monday through Thursday.

**Results:** In 2008, Michigan reported 922 Great Lakes beaches, 7 (1%) of which were monitored more than once a week, 203 (22%) once a week, 711 (77%) not monitored, and 1 for which there was no monitoring information. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 5 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance in 2008 were Crescent Sail Yacht Club in Wayne County (45%), Singing Bridge Beach in Arenac County (30%), St. Clair Shores Memorial Park Beach in Macomb County (26%), Pier Park in Wayne County (20%), Silver Creek Channel (20%) and Lighthouse Beach At Silver Lake State Park in Oceana County (19%), Caseville County Park (17%), Bird Creek County Park (17%), and Lighthouse County Park (17%), and Lighthouse County Park in Huron County (17%), and Norwood Park in Charlevoix County (17%).

Wayne County had the highest percent exceedance rate in 2008 (14%) followed by Macomb (12%), Schoolcraft (12%), Oceana (9%), Huron (8%), Arenac (6%), Allegan (5%), Grand Traverse (5%), Bay (4%), Manistee (3%), Antrim (2%), Muskegon (2%), Marquette (2%), Charlevoix (2%), Ottawa (1%), Menominee (1%), Emmet (1%), and Chippewa (1%). There were no exceedances at beaches in St Clair, Alpena, Baraga, Benzie, Berrien, Cheboygan, Houghton, Iosco, Keweenaw, Leelanau, Mackinac, Mason, Monroe, Ontonagon, Presque Isle, Sanilac, and Van Buren Counties.
Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 186 beaches, the percent of samples exceeding the standard increased to 5 percent in 2008 from 4 percent in 2006 and 2007 and 3 percent in 2005.

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Alcona</td>
<td>Harrisville State Park</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Alcona</td>
<td>Private Shoreline Beach-North of Harrisville</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alcona</td>
<td>Private Shoreline Beach-South of Alcona</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alcona</td>
<td>Greenbush Township</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alcona</td>
<td>Trask Lake Road Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alcona</td>
<td>Private Shoreline Beach-South of Sturgeon Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alcona</td>
<td>Negwegon State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alcona</td>
<td>Private Shoreline Beach-Harrisville</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alcona</td>
<td>Private Shoreline Beach-North of Black River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alcona</td>
<td>Private Shoreline Beach-North of Alcona</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alcona</td>
<td>Black River Public Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alcona</td>
<td>Harrisville Public Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alcona</td>
<td>Private Shoreline Beach-Village of Greenbush</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alcona</td>
<td>Private Shoreline Beach-Southern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alcona</td>
<td>Sturgeon Point State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Sullivans Landing</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Grand Marais Harbor Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Private Shoreline Beach-West and East Bay area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Roadside Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Grand Marais Township Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Public Shoreline Beach-Au Train to Five Mile Pts</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Bay Furnace Recreation Area Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Private Shoreline Beach-Powell Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Christmas Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Private Shoreline Beach-W Co. Border-Au Train Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Public Shoreline Beach-Grand Sable Dunes</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Rathfoot Park Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Private Shoreline Beach-South of Five Mile Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Private Shoreline Beach-Au Train Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Public Shoreline Beach-Au Train Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Au Train Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Munising Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Public Shoreline Beach-East County Border area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alger</td>
<td>Private Shoreline Beach-North of Roadside Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Allegan</td>
<td>Douglas Beach</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Allegan</td>
<td>Pier Cove Beach</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------------</td>
<td>------------------------------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Allegan</td>
<td>West Side County Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>6%</td>
</tr>
<tr>
<td>Allegan</td>
<td>Oval Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Allegan</td>
<td>Saugatuck Dunes State Park Shoreline Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Allegan</td>
<td>Private Shoreline Beach-South of Douglas</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Allegan</td>
<td>Private Shoreline Beach-South of Castle Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Allegan</td>
<td>Private Shoreline Beach-Southern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Allegan</td>
<td>Private Shoreline Beach-North County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Allegan</td>
<td>Castle Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Allegan</td>
<td>Private Shoreline Beach-Saugatuck</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Starlite Beach</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Alpena</td>
<td>Blair Street Park</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Alpena</td>
<td>Ossineke Beach</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Alpena</td>
<td>Thompson Park</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Alpena</td>
<td>Michekewis Beach</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Alpena</td>
<td>Rock Port Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Private Shoreline Beach-North of Ossineke Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Elcajon Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Negwegon State Park-Ossineke South Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Private Shoreline Beach-Gilchrist Wharf</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Issineke Hardwood Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Bay View Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Ossineke State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Private Shoreline Beach-South of Rockport</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Ossineke Campground</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Private Stretch Thunder Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Private Shoreline Beach-Rockport</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Private Shoreline Beach-Bare Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Partridge Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Whitefish Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Alpena</td>
<td>Private Shoreline Beach-Thunder Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Barnes Park</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>10%</td>
</tr>
<tr>
<td>Antrim</td>
<td>Antrim County Day Park South</td>
<td>1</td>
<td>1/wk</td>
<td>9</td>
<td>0%</td>
</tr>
<tr>
<td>Antrim</td>
<td>Banks Township. Park</td>
<td>1</td>
<td>1/wk</td>
<td>9</td>
<td>0%</td>
</tr>
<tr>
<td>Antrim</td>
<td>Elk Rapids</td>
<td>1</td>
<td>1/wk</td>
<td>9</td>
<td>0%</td>
</tr>
<tr>
<td>Antrim</td>
<td>Veterans Memorial Park</td>
<td>1</td>
<td>1/wk</td>
<td>9</td>
<td>0%</td>
</tr>
<tr>
<td>Antrim</td>
<td>Private Shoreline Beach-South of Elk Rapids Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>North Bay Shore (Conservancy)</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Road Crossing near Winters Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>O’Dell Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Erickson Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Nature Preserve</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------</td>
<td>-------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Antrim</td>
<td>Michigan Trail</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Antrim Creek Natural Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Lore Road End Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Private Shoreline Beach-South of Barns Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Elk Rapids Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Private Shoreline Beach-Northern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Petobego Pond Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Private Shoreline Beach-North of Erickson Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Private Shoreline Beach-Pagel Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Antrim County Day Park North</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Private Shoreline Beach-N. of Antrim Cnty Park N.</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Private Shoreline Beach-South of O’Dell Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Private Shoreline Beach-Wood Creek</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Private Shoreline Beach-North of Lore Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Private Shoreline Beach-South of Nature Preserve</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Private Shoreline Beach-North of Barnes Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Antrim</td>
<td>Private Shoreline Beach-Birch Lake Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Singing Bridge Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>30%</td>
</tr>
<tr>
<td>Arenac</td>
<td>Bessinger Road Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>10%</td>
</tr>
<tr>
<td>Arenac</td>
<td>Foster Road Beach</td>
<td>1</td>
<td>1/wk</td>
<td>11</td>
<td>9%</td>
</tr>
<tr>
<td>Arenac</td>
<td>Twining Road Beach</td>
<td>1</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Arenac</td>
<td>Arenac County Park</td>
<td>1</td>
<td>1/wk</td>
<td>9</td>
<td>0%</td>
</tr>
<tr>
<td>Arenac</td>
<td>Hammel Beach Road Access</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Arenac</td>
<td>Dyer Road Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Arenac</td>
<td>Whites Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Arenac</td>
<td>Augres Township Park Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Private Shoreline Beach-Harmon City Heights</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Private Shoreline Beach-North of Au Gres</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Private Shoreline Beach-Point Au Gres</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Private Shoreline Beach-Mouth of Saginaw River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Private Shoreline Beach-North of Whites Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>City of Augres Public Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Gordon Road Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Booth Road Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Pump Station</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Au Sable State Forest- Greens Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Private Shoreline Beach-West of Point Lookout</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Private Shoreline Beach-White Stone Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Private Shoreline Beach-South of the Pump Station</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Private Shoreline Beach-North of Gordan Road Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Private Shoreline Beach-Point Lookout</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>----------</td>
<td>------------------------------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Arenac</td>
<td>Private Shoreline Beach-N. of Singing Bridge Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Private Shoreline Beach-South of Gordon Rd Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Terrace Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Arenac</td>
<td>Private Shoreline Beach-Silver Drain</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>L’Anse Waterfront Park</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Baraga</td>
<td>Private Shoreline Beach-DeHass Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Private Shoreline Beach-South West of Point Abbaye</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Public Shoreline Beach-Northwest Abbaye Peninsula</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Public Shoreline Beach-Sand Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Private Shoreline Beach-Slate River Falls Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Private Shoreline Beach-Pequaming Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Private Shoreline Beach-North of Sand Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Private Shoreline Beach-South End of Keweenaw Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Keweenaw Bay Village Public Roadside Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>First Sand Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>L’Anse Township Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Public Shoreline Beach-Coooper Country Huron Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Private Shoreline Beach-Northern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Public Shoreline Beach-SE End of Huron Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Private Shoreline Beach-Finlander Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Private Shoreline Beach-Rock Beach to Pequaming Pt</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Second Sands Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Arvon Township Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Public Shoreline Beach-Point Abbaye</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Mouth of the Huron River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Private Shoreline Beach-Bendry Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Baraga State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Baraga</td>
<td>Private Shoreline Beach-Assinins Village</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Bay City State Recreation Area</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>7%</td>
</tr>
<tr>
<td>Bay</td>
<td>South Linwood Beach Township Park</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Bay</td>
<td>Brissette Beach Township Park</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Bay</td>
<td>Wenona Beach</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Bay</td>
<td>Pinconning Park</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Bay</td>
<td>Nayanquing Point Wildlife Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>North Pinconning Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>North Linwood Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>Private Shoreline Beach-Southern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bay</td>
<td>South Pinconning Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Benzie</td>
<td>Frankfort: Anchor Road Beach</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>0%</td>
</tr>
<tr>
<td>Benzie</td>
<td>Esch Road/Otter Creek</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>-------------------</td>
</tr>
<tr>
<td>Benzie</td>
<td>Platte River Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Benzie</td>
<td>County Road # 669</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Benzie</td>
<td>Zettenberg Preserve</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Benzie</td>
<td>Alberta Village Beach &amp; Bluffs</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Benzie</td>
<td>Point Betsie Lighthouse Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Benzie</td>
<td>Private Shoreline Beach-Herring Lake Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Benzie</td>
<td>Private Shoreline Beach-North of Point Betsie</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Benzie</td>
<td>Private Shoreline Beach-Crystallia</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Warren Dunes Beach</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Berrien</td>
<td>Harbert Beach</td>
<td>1</td>
<td>None</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>Berrien</td>
<td>Rocky Gap</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Berrien</td>
<td>Tiscornia Park</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Berrien</td>
<td>Silver Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Berrien</td>
<td>Grand Beach</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Berrien</td>
<td>Michiana Village</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Berrien</td>
<td>Lincoln Township Park</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Berrien</td>
<td>Lions Park</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Berrien</td>
<td>Hagar Township Park</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Berrien</td>
<td>Weko Beach</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Berrien</td>
<td>New Buffalo City</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Berrien</td>
<td>Jean Klock Park</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Berrien</td>
<td>Cherry Beach</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Berrien</td>
<td>Private Shoreline Beach-South of Grand Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Mizpah Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Private Shoreline Beach-South of Mizpah Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Private Shoreline Beach-Shoreham Village Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Grand Mere State Park- Waverland Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Private Shoreline Beach-South of Harbert Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Private Shoreline Beach-North of New Buffalo City</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Private Shoreline Beach-South of Rosemary Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Private Shoreline Beach-Northern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Bethany Beach area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Private Shoreline Beach-Grand Mere</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Warren Dunes State Park North</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Grand Mere State Park- Shoreline Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Private Shoreline Beach-Southern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Gordon Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Private Shoreline Beach-South of New Buffalo City</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Grand Mere State Park- Rosemary Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Private Shoreline Beach-South of Cherry Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Berrien</td>
<td>Galien River Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>---------------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Norwood Park</td>
<td>1</td>
<td>1/wk</td>
<td>12</td>
<td>17%</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Ferry Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Fisherman’s Island State Park</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Whiting Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Tannery Park</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Young State Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Hayes Township Park</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Depot Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Lake Michigan Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Peninsula Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>East Jordan Tourist Park</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Glenwood Beach</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Washington Street Beach</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Elm Point Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Donegal Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Bill Wagner Memorial Campground Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Mt. McSauba Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Beaver Island Public Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Iron Ore Bay Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charlevoix</td>
<td>Harbor Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Wawatam City Park</td>
<td>1</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Mackinaw City Lighthouse Park</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Cheboygan City Park</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Cheboygan State Park Duncan Bay</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Roadside Park MDOT, US-23</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Private Shoreline Beach-Cheboygan Nat. Conservancy</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Private Shoreline Beach-Point Nipigon area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Pinewood Circle Road End Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Private Shoreline Beach-Cheboygan Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Private Shoreline Beach-Cordwood Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Huron Street Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Private Shoreline Beach-Cheboygan Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Mackinaw City Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Private Shoreline Beach-Southern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Alexander Henry Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Private Shoreline Beach-Mackinaw City</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Private Shoreline Beach-Freedom</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Private Shoreline Beach-Little Black River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Private Shoreline Beach-Dynamite Creek</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Cheboygen State Park- Lighthouse Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Ditta Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Stoney Point Road End Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cheboygan</td>
<td>Mill Creek Public Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Brimley State Park</td>
<td>1</td>
<td>1/wk</td>
<td>22</td>
<td>5%</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Sherman Park</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Bayview Campground</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Big Pines Beach</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Sugar Island Township Park</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Four Mile Beach</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Public Shoreline Beach-Marsh Lake Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Betsey Seaman Memorial Park-Drummond Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Public Shoreline Beach-Point Aux Frenes</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Public Shoreline Beach-Raber Bay stretch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Drummond Island Township Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Big Shoal Cove Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Public Shoreline Beach-Northwest of Two Mile Lake</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Whitefish Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Bass Cove Beach-Drummond Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Public Shoreline Beach-West of Whitefish Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>De Tour State Park Shoreline Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Detour Albany Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Tahquamenon Falls State Park-River Mouth Unit</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Public Shoreline Beach-Weatherhog Lake East Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Dunbar Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Public Shoreline Beach-Browns Creek Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Wilderness Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Sand Bay Beach-Drummond Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Lake Superior State Forest-Munuscong Lake</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Public Shoreline Beach-Brush Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Public Shoreline Beach-Weatherhog Lake West</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-Jacks Bluff</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-St. Vital's Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-Portage Peninsula</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-North of Stonington</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-West Wilsey Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-West Side of Kregg Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-West Kregg Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Little Bay De Noc</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Garden Corners</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Gladstone/Escanaba</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Poplar &amp; Porcupine Pts</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Point Detour</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Big River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Snake Is. to Valentine Pt</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-Martin Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-Nahma</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-County Road 481</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-East of Indian Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Escanaba Bathing Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Fuller Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Fayette State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Gladstone Bathing Beach/Van Cleve Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Twin Springs Campground and Bathing Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-Fishdam River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Chippewa Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-Indian Town Lake USFS</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-Gilnet Haven</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Sac Bay County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-Peninsula Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-East Side of Ogontz Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-Charboneau Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Gilnet Haven</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-North Kregg Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Portage Bay Forest Campground</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-St. Vital's Island area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Deepwater Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Sand Bay/ Martin Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Kregg Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-East County Line</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-Indian Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-North End of Kregg Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Camp Harstad</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Skaug Subdivision</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Fairport</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-East Wilsey Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-USFS West Wilsey Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-South Border- Portage Pt.</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-Point Detour</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Little Bay De Noc Public Beach Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Sac Bay County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-Ogontz Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Big Bay De Noc/ Fishdam River Public Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>-----------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Delta</td>
<td>Public Shoreline Beach-Portage Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Idlewood Subdivision Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Delta</td>
<td>Private Shoreline Beach-Sand Bay to Burnt Bluff</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Zoll Street Beach</td>
<td>1</td>
<td>1/wk</td>
<td>11</td>
<td>9%</td>
</tr>
<tr>
<td>Emmet</td>
<td>Sturgeon Bay Township Beach</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Emmet</td>
<td>Readmond Township Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Emmet</td>
<td>Cross Village Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Emmet</td>
<td>Mackinaw City Beach #2</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Emmet</td>
<td>Magnus Park</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Emmet</td>
<td>Middle Village Park</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Emmet</td>
<td>Zorn Park-Harbor Springs</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Emmet</td>
<td>Mackinaw City Beach #1</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Emmet</td>
<td>Wilderness State Park</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Emmet</td>
<td>Petoskey State Park</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Emmet</td>
<td>Private Shoreline Beach-Goodhart Village</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>The Headlands County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Private Shoreline Beach-Petoskey City</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Private Shoreline Beach-E of Wilderness State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Wilderness State Park-East of the Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Petoskey Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Private Shoreline Beach-Between Mackinaw Beach 1&amp;2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Church Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Wilderness State Park-Sturgeon Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Bliss Township Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Thorne Swift Preserve</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Private Shoreline Beach-North of Middle Village</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Private Shoreline Beach-Long Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Private Shoreline Beach-South of Middle Village</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Colonial Michilimamackinac State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Private Shoreline Beach-Bay View area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Private Shoreline Beach-Harbor Springs</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Private Shoreline Beach-Mackinaw City</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Private Shoreline Beach-Sturgeon Bay Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Private Shoreline Beach-7 mile Pt. to Harbor Springs</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Forest Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Private Shoreline Beach-Little Traverse Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Wilderness State Park-West of Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Emmet</td>
<td>Private Shoreline Beach-North of Readmond Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Gogebic</td>
<td>Presque Isle Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Gogebic</td>
<td>Little Girls Point Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>-----------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Gogebic</td>
<td>Black River Harbor Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Gogebic</td>
<td>Private Shoreline Beach-N. of Little Girls Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Gogebic</td>
<td>Private Shoreline Beach-North of Black River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Gogebic</td>
<td>Public Shoreline Beach-West of Black River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Gogebic</td>
<td>Porque Isle State Park-North</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Gogebic</td>
<td>Presque Isle State Campground</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Gogebic</td>
<td>Private Shoreline Beach-SW of Little Girls Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Gogebic</td>
<td>Mouth of the Montreal River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Bryant Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>9%</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Traverse City State Park</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>7%</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Clinch Park</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>5%</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>West End Beach</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>2%</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>East Bay Park (Milliken Park)</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>0%</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Mouth of Boardman</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Bayside Acme Township Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Old Mission - MDOT Right of Way-South of M-37</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Kroupa Road Access M-22 South of Crain Hill Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Sunset Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Rose Street Access at Peninsula Drive</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Haserot Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>DNR Launch/Beach Center Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Peninsula Volunteer Fire Station Point #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Acme Roadside Park (DNR)</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Acme Roadside Park &amp; Beach MDOT</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-East Arm S/W Corner</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-South of Swaney Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-South of Old Mission Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-East Arm South Stretch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Old Mission-Old Mission Point State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-Acme</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Old Mission Peninsula Twp Park-East of Light House</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Archie Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-Leffingwell Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-Merri Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-Mt. Holiday Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-Old Mission Pen.-SE Shore</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Sayler Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Leffingwell Point Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Old Mission-Center Road Natural Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-South of Kroupa Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------------------</td>
<td>-------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-Old Mission Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Old Mission Peninsula Twp Park-West of Light</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-Old Mission Penn East Side</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-N/E County Line</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Bowers Harbor Public Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-Deep Water Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Senior Center</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Private Shoreline Beach-South of Bower Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Power Island Bay Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Old Mission Lighthouse</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>East Bay Township Four Mile Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Deep Water Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Old Mission Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grand Traverse</td>
<td>Yuba Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Agate Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Houghton</td>
<td>Houghton City Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Houghton</td>
<td>Hancock City Beach</td>
<td>1</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Houghton</td>
<td>Lake Linden Campground Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Houghton</td>
<td>Sandy Bottom Beach/ Dollar Bay</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Houghton</td>
<td>McLain State Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Houghton</td>
<td>Chassell Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Houghton</td>
<td>Private Shoreline Beach-S. Border on Keweenaw Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Private Shoreline Beach-North East County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>White City</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Private Shoreline Beach-Jacobsville Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Private Shoreline Beach-North of Redridge Village</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Private Shoreline Beach-Little Traverse Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Public Shoreline Beach-S. of Portage Entry</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Private Shoreline Beach-N. of Mc Lain State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Public Shoreline Beach-Southwest County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Mink Farm</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Hubbell Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Private Shoreline Beach-Westside of Portage Entry</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Private Shoreline Beach-Northwest County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Public Shoreline Beach-Mc Lain State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Calument Waterworks Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Private Shoreline Beach-South of Redridge Village</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Houghton</td>
<td>Public Shoreline Beach-Le Chance Creek</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Caseville County Park</td>
<td>1</td>
<td>1/wk</td>
<td>63</td>
<td>17%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>----------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>---------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Huron</td>
<td>Lighthouse County Park</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>17%</td>
</tr>
<tr>
<td>Huron</td>
<td>Bird Creek County Park</td>
<td>1</td>
<td>1/wk</td>
<td>66</td>
<td>17%</td>
</tr>
<tr>
<td>Huron</td>
<td>Harbor Beach City Park</td>
<td>1</td>
<td>1/wk</td>
<td>63</td>
<td>14%</td>
</tr>
<tr>
<td>Huron</td>
<td>Oak Beach County Park</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>10%</td>
</tr>
<tr>
<td>Huron</td>
<td>Thompson Park</td>
<td>1</td>
<td>1/wk</td>
<td>63</td>
<td>10%</td>
</tr>
<tr>
<td>Huron</td>
<td>McGraw County Park</td>
<td>1</td>
<td>1/wk</td>
<td>61</td>
<td>3%</td>
</tr>
<tr>
<td>Huron</td>
<td>Port Crescent State Park-Day Use</td>
<td>1</td>
<td>1/wk</td>
<td>57</td>
<td>2%</td>
</tr>
<tr>
<td>Huron</td>
<td>Jenks County Park</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>2%</td>
</tr>
<tr>
<td>Huron</td>
<td>Philp County Park</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>2%</td>
</tr>
<tr>
<td>Huron</td>
<td>Port Crescent State Park - Camping Area</td>
<td>1</td>
<td>1/wk</td>
<td>63</td>
<td>0%</td>
</tr>
<tr>
<td>Huron</td>
<td>Sleeper State Park</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>0%</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Port Austin</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Mud Creek Public Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Grindstone City South</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Harbor Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Sand Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Caseville</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Hat Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Veterans Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Little Oak Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Hardwood Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Lighthouse County Park-South</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Whiskey Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Alaska Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Grindstone City North</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>County Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Huron City</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Flat Rock Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-North of Rush Lake</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Oak Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-Southern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Private Shoreline Beach-South of Harbor Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Larned Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Grindstone Public Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Kinch Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Harbor Beach Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Helena Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Stafford County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Wagener County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Huron</td>
<td>Geiger Road Public Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Iosco</td>
<td>Alabaster Township</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------</td>
<td>-------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>losco</td>
<td>Tawas Point State Park Campground</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>losco</td>
<td>East Tawas City Park</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>losco</td>
<td>Oscoda Township Beach</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>losco</td>
<td>Tawas City Park</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>losco</td>
<td>Tawas Point State Park-Day Use area</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>losco</td>
<td>Au Sable Township Park</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>losco</td>
<td>MDOT Roadside Park</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>losco</td>
<td>Private Shoreline Beach-Lake Solitude Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>Tawas Point State Park-North</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>County Road End.</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>Private Shoreline Beach-South of Gateway Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>Lake To Lake Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>Private Shoreline Beach-North of Tawas Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>Private Shoreline Beach-North of Oscoda Twp Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>Tawas Point State Park-Central</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>Private Shoreline Beach-South of Lake to Lake Rd</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>Private Shoreline Beach-Northern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>Private Shoreline Beach-Alabaster</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>Au Sable Point Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>Private Shoreline Beach-North of Au Sable River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>Private Shoreline Beach-Tawas City</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>Gateway Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>losco</td>
<td>Private Shoreline Beach-Dead Au Sable River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Eagle Harbor Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Private Shoreline Beach-Hermit Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Private Shoreline-Great Sand Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Brunette Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Point Isabelle Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Mouth of the Gratiot River Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Public Shoreline Beach-Big Traverse Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Eagle River Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Private Shoreline-Agate Harbor to Eagle Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Private Shoreline-West of Cat Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Private Shoreline Beach-Southern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Cooper Harbor Lighthouse Complex</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Public Shoreline Beach-Gay Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Private Shoreline-Copper Harbor to Agate Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Private Shoreline Beach-Mendota Ship Canal</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Private Shoreline-West of Eagle Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Private Shoreline Beach-Oliver Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------------</td>
<td>-------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Private Shoreline Beach-East Cooper Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Private Shoreline-Eastern edge of Keweenaw Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Cat Harbor Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Private Shoreline Beach-Gay Village</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Fort Wilkins State Park-East</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Fort Wilkins State Park-West</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Bete de Gris Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Fort Wilkins State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Private Shoreline-Five Mile Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Keweenaw</td>
<td>Great Sands Bay Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Empire Municipal Beach</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>0%</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Suttons Bay Park</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>0%</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Northport Bay Marina</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>0%</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-Peshawbestown</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-S. of Peterson Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-Village of Empire</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-SW of Lighthouse Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Stoney Point County Roadside Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>North Street Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-Bay Shore Dr &amp; Apple Ridge</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-Cherry Cove</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-Ingalls Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Hendryx County Roadside Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Reynolds Street Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-Duck Lake Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-Shady Lane Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-Northport Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-Cathead Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-Lee Point to Stoney Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Cedar Street Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-East of Glen Arbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>G. Marsten Dame Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-S. of Gills Pier</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Thompson Stree Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-Crain Hill Road Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-Cedar Lake Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-S. of Christmas Cove</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-Greilickville</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Northport 5th Street Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Private Shoreline Beach-Omena Bay Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>North Bar</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>------------------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Suttons Bay South Shore Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>M-22 at M-72 Public Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Boughy Park &amp; Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>MDOT Roadside Park &amp; Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>MDOT Roadside Park &amp; Beach M-22 N of Cherry Bend D</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Elmwood/Greilikville Park &amp; Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Omena Beach &amp; Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Graham Green Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Smith Street Beach Northport</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Suttons Bay Marina Park &amp; Beach South</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Leland Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Northport 7th Street Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Glen Arbor/Manitou Boulevard Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Lake Street Beach, Glen Arbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Bay Front Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Northport Haserot Beach, Rose Street</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Northport 4th Street Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Peterson Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Christmas Cove</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Gils Pier</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Leelanau State Park, Lighthouse</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Suttons Bay Public Launch and Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Leelanau</td>
<td>Cathead Bay, Leelanau State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Public Shoreline Beach-Blind Sucker Flooding Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Unnamed Road End #3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Muskallonge Lake State Park Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Blind Sucker River # 1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Public Shoreline Beach-County Rd 407</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Public Shoreline Beach-County Rd 412 and Crisp Pt</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Unnamed Road End #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Blind Sucker River # 2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Public Shoreline Beach-Three Mile Creek Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Crisp Point Light House</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Public Shoreline Beach-Coast Guard Line Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Lake Superior Campground Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Public Shoreline Beach-West County Border Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Unnamed Road End #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Public Shoreline Beach-Little Sucker/Two Hearted R</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Mouth of the Two Hearted River Campground</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Luce</td>
<td>Private Shoreline Beach-Randolph Lake</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>-------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Kiwanis Beach</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Mackinac</td>
<td>US 2 Roadside East of Brevort</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Public Shoreline Beach-Little Hog Island area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-Pontchartrain Shores</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Public Shoreline Beach-MDNR Matrix Point Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-South of Antoine Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Epoufette Bay Campground</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Public Shoreline Beach-Naubinway Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Public Shoreline Beach-Morean Township, Section 25</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Public Shoreline Beach-Fox Point Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Black River State Forest Campground</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Hazelton Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Public Shoreline Beach-Seiners Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Coast Guard Pier Boat Launch and City Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>US 2 Roadside/Campground</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Kewadin Inn</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-Pointe Aux Chenes Bay Ascc</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Hog Island Campground</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Miller’s Hog Island Subdivision Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-Bleck River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>State Street Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-East Moran Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-Brevort Village area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-Birch Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-Poupard Bay Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Horseshoe Bay Wilderness-North</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Wetland Shoreline-St. Martin Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Sand Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>MDOT Overlook</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>K Royale</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-Matrix Point Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-Epoufette Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>State Roadside Park Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Best Western Lakefront</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-Pointe Aux Chenes</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-Naubinway Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-Norton Oglebay Limestone</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Antoine Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-West Moran Bay Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>------------------------------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Public Shoreline Beach-Pointe Aux Chenes Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Boot Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Naubinway Bay Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Public Shoreline Beach-Manitou Paymen Highbanks</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Public Shoreline Beach-South of Brevort River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Foley Creek Campground</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>MDOT Roadside Park on US 2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Public Shoreline Beach-Epoufette Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Harbour Light</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-Kenyon Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Horseshoe Bay Wilderness-South</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Straits State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>American Legion Memorial Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Big Knob State Forest Campground</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Mouth of Cut River Roadside Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Private Shoreline Beach-West of Mackinac Bridge</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mackinac</td>
<td>Public Shoreline Beach-State Forest Matrix Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Macomb</td>
<td>St. Clair Shores Memorial Park Beach</td>
<td>1</td>
<td>2/wk</td>
<td>144</td>
<td>26%</td>
</tr>
<tr>
<td>Macomb</td>
<td>St. Clair Shores Blossom Heath Beach</td>
<td>1</td>
<td>2/wk</td>
<td>144</td>
<td>16%</td>
</tr>
<tr>
<td>Macomb</td>
<td>New Baltimore Park Beach</td>
<td>1</td>
<td>2/wk</td>
<td>144</td>
<td>8%</td>
</tr>
<tr>
<td>Macomb</td>
<td>H.C.M.A.-Metropolitan Beach Metropark</td>
<td>1</td>
<td>2/wk</td>
<td>289</td>
<td>6%</td>
</tr>
<tr>
<td>Macomb</td>
<td>Private Shoreline Beach-St. Clair Shores</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Macomb</td>
<td>Private Shoreline-Belvidere Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Macomb</td>
<td>Private Shoreline Beach-L'Anse Creuse Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Macomb</td>
<td>Private Shoreline Beach-South of New Baltimore</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Macomb</td>
<td>H.C.M.A.-Huron Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Macomb</td>
<td>Private Shoreline-New Baltimore</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Macomb</td>
<td>Private Shoreline-Southern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Macomb</td>
<td>Private Shoreline-West of Salt River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Macomb</td>
<td>Private Shoreline Beach-Cotton Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Macomb</td>
<td>Private Shoreline Beach-Northern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manistee</td>
<td>Magoon Creek</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>11%</td>
</tr>
<tr>
<td>Manistee</td>
<td>Sundling Park</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>8%</td>
</tr>
<tr>
<td>Manistee</td>
<td>First Street Beach</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>8%</td>
</tr>
<tr>
<td>Manistee</td>
<td>Orchard Beach State Park</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Manistee</td>
<td>Onekama Township Beach</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Manistee</td>
<td>Pierport Township Beach</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Manistee</td>
<td>Arcadia Park</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Manistee</td>
<td>Fifth Avenue Beach</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Manistee</td>
<td>Bar Lake Outlet</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Manistee</td>
<td>Private Shoreline Beach-North County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------------------</td>
<td>------------------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Manistee</td>
<td>Portage Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manistee</td>
<td>Private Shoreline Beach-Southern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manistee</td>
<td>Private Shoreline Beach-Arcadia Lake area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manistee</td>
<td>Private Shoreline Beach-South of Orchard Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manistee</td>
<td>Private Shoreline Beach-Kott Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manistee</td>
<td>Private Shoreline Beach-Bar Lake Swamp Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manistee</td>
<td>Private Shoreline Beach-North of Portage Lake</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manistee</td>
<td>Private Shoreline Beach-Red Apple Road Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Marquette</td>
<td>Picnic Rocks</td>
<td>1</td>
<td>1/wk</td>
<td>11</td>
<td>9%</td>
</tr>
<tr>
<td>Marquette</td>
<td>North Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Marquette</td>
<td>North of Picnic Rocks</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Marquette</td>
<td>Marquette South Beach</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Marquette</td>
<td>McCarty's Cove</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Marquette</td>
<td>Public Shoreline Beach-Little Presque Isle</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Marquette</td>
<td>Public Shoreline Beach-Big Huron River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Marquette</td>
<td>Private Shoreline Beach-Shot Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Marquette</td>
<td>Private Shoreline Beach-North West County</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Sterns Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Mason</td>
<td>Ludington State Park Campground Beach</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Mason</td>
<td>South Summit Beach - Sunset Boulevard Beach</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Mason</td>
<td>Bass Lake Outlet Beach</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Mason</td>
<td>Summit Township Beach</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Mason</td>
<td>Buttersville Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Mason</td>
<td>South Pier Beach</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Mason</td>
<td>Private Shoreline Beach-S of Summit Township Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Private Shoreline Beach-Lincoln River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Ludington State Park Public Shoreline Beach South</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Pere Marquette Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Private Shoreline Beach-Gurney Creek</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Private Shoreline Beach-S. County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Ludington State Park Public Shoreline Beach North</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Private Shoreline Beach-Ludington Storage Plant</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Private Shoreline Beach-Cooper Creek</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Menominee</td>
<td>Henes Park</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>2%</td>
</tr>
<tr>
<td>Menominee</td>
<td>Memorial Beach</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>0%</td>
</tr>
<tr>
<td>Menominee</td>
<td>Public Shoreline Beach-Fox village</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Menominee</td>
<td>Fox Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Menominee</td>
<td>Wells State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Menominee</td>
<td>Kienke Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Menominee</td>
<td>Private Shoreline Beach-County Border N/E End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------------------</td>
<td>-------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Menominee</td>
<td>Public Shoreline Beach-Cedar River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Menominee</td>
<td>Airport Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Menominee</td>
<td>Private Shoreline Beach-Deadmans Point Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Menominee</td>
<td>Private Shoreline Beach-Cedar River to Menominee</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Luna Pier City Beach</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Estral Beach</td>
<td>No data</td>
<td>No data</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Woodland Beach</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Monroe</td>
<td>North Cape Yacht Club</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Sterling State Park</td>
<td>2</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Monroe</td>
<td>Detroit Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Avalon Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Lost Peninsula</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Point Aux Peaux</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>LaSalle Township-Toledo Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Stoney Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monroe</td>
<td>Bolles Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Montmorency</td>
<td>East Twin Beach/Albert Township Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Meinert County Park</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Duck Lake Channel Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Muskegon State Park</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Lighthouse/Sylvan Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Medbury Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Muskegon</td>
<td>P.J. Hoffmaster State Park-Campground</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Old Channel Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Pere Marquette Park</td>
<td>1</td>
<td>1/wk</td>
<td>30</td>
<td>0%</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Lake Harbor Park</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Pioneer County Park</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Muskegon</td>
<td>P.J. Hoffmaster State Park-Public Beach Area</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Bronson/Kruse Park</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Muskegon State Park-Shoreline Beach North</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Private Shoreline Beach-S. of Bronson/Kruse Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Private Shoreline Beach-S. of Lake Harbor Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Private Shoreline Beach-S. of Meineert County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Private Shoreline Beach-South of Duck Lake</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Private Shoreline Beach-Lake Wabaningo area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Muskegon</td>
<td>Private Shoreline Beach-S. of Pioneer County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oceana</td>
<td>Silver Creek Channel</td>
<td>1</td>
<td>1/wk</td>
<td>30</td>
<td>20%</td>
</tr>
<tr>
<td>Oceana</td>
<td>Lighthouse Beach at Silver Lake State Park</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>19%</td>
</tr>
<tr>
<td>Oceana</td>
<td>Mears State Park</td>
<td>1</td>
<td>1/wk</td>
<td>27</td>
<td>11%</td>
</tr>
<tr>
<td>Oceana</td>
<td>Whiskey Creek</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Oceana</td>
<td>Claybanks Township Park</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>-----------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Oceana</td>
<td>Stony Lake Channel</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Oceana</td>
<td>Cedar Point County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oceana</td>
<td>Private Shoreline Beach-S. of Cedar Pt. Twn. Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oceana</td>
<td>Private Shoreline Beach-South of Stony Lake</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oceana</td>
<td>Private Shoreline Beach-S. of Claybanks Twp Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oceana</td>
<td>Private Shoreline Beach-S. of Pentwater</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oceana</td>
<td>Private Shoreline Beach-Little Point Sable</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oceana</td>
<td>Private Shoreline Beach-South County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oceana</td>
<td>Silver Lake State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oceana</td>
<td>Private Shoreline Beach-South of Whiskey Creek</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Porcupine Mountains State Park- Union Bay</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Ontonagon Township Park and Campground</td>
<td>1</td>
<td>1/wk</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Public Shoreline Beach-Misery Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Private Shoreline Beach-Misery Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Private Shoreline Beach-West of Green Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Mouth of the Big Iron River Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Private Shoreline Beach-North County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Union Bay Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Porcupine Mountains Wilderness State Park-West</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Private Shoreline Beach-City of Ontonagon</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Public Shoreline Beach-Wolf Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Green Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Private Shoreline Beach-West of Silver City</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Private Shoreline Beach-Sleeping Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Private Shoreline Beach-Ten Mile Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Gulf Point Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Private Shoreline Beach-East of Silver City</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ontonagon</td>
<td>Porcupine Mountain State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Kouw Park</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>2%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Rosy Mound Recreation Area</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>2%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Kirk Park</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>2%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>North Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>2%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Grand Haven City Beach</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>2%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Holland State Park</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>0%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Grand Haven State Park</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>0%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Windsnest Park</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>0%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Tunnel Park</td>
<td>1</td>
<td>1/wk</td>
<td>42</td>
<td>0%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Private Shoreline Beach-North of the Grand River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Private Shoreline Beach-North of Rosy Mound</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Private Shoreline Beach-South of Rosy Mound</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------------</td>
<td>-----------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Mountain Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ottawa</td>
<td>P.J. Hoffmaster State Park-Shoreline Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Private Shoreline Beach-North of North Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Presque Isle Harbor</td>
<td>2</td>
<td>1/wk</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Lakeside Park Beach</td>
<td>2</td>
<td>1/wk</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Presque Isle Harbor Beach</td>
<td>1</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Lakeside Park in Rogers City</td>
<td>1</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Hoeff State Park-South</td>
<td>1</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Shoreline Beach-Three Creek</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Lakeview Park Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Shoreline Beach-North Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Shoreline Beach-West of Evergreen Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Evergreen Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Shoreline Beach-Ferron Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Shoreline Beach-North Rogers City</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Shoreline Beach-East of Manitou Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Hoeff State Park-North</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Hammond Bay Access Site</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Shoreline Beach-Rogers City Central</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>US 23 Roger City</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Shoreline Beach-South of Grace</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Stretch of Mixed Shoreline</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Shoreline Beach-Adams Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>40 Mile Point Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Public Shoreline Beach-False Presque Isle Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>New Lighthouse Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Shoreline Beach-North of Hoeff State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Shoreline Beach-East of Evergreen Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Thompson’s Harbor State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Golden Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Ball Diamond Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Shoreline Beach-North of Grace Village</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Shoreline Beach-Ocqueoc River</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Seagull Point Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Manitou Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>US 23 Hammond Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Hammond Bay Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Bell Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Grace Access Site</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Presque Isle</td>
<td>Private Shoreline Beach-N. of Presque Isle Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Forester County Park</td>
<td>1</td>
<td>1/wk</td>
<td>8</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>--------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Port Sanilac Park</td>
<td>1</td>
<td>1/wk</td>
<td>8</td>
<td>0%</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Lexington Beach</td>
<td>1</td>
<td>1/wk</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Lexington County Park</td>
<td>1</td>
<td>1/wk</td>
<td>8</td>
<td>0%</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Birch Beach North #3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Private Shoreline Beach-Northern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Private Shoreline Beach-South of Port Sanilac Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Great Lakes Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Private Shoreline Beach-N of Lexington County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Sanilac County Roadside Park #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Private Shoreline Beach-Forester Shore</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Private Shoreline Beach-South of Great Lakes Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Private Shoreline Beach-Richmondville</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Private Shoreline Beach-South of Forestville</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Forestville Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Birch Beach Middle #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Birch Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Sanilac County Park #4</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Delaware Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Private Shoreline Beach-South of Delaware Park</td>
<td>3</td>
<td>1/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Private Shoreline Beach-N. of Lexington City</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sanilac</td>
<td>Private Shoreline Beach-Southern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Roadside Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>15%</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Rogers Beach</td>
<td>1</td>
<td>1/wk</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Public Shoreline Beach-S. of McDonald Lake</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Private Shoreline Beach-Dutch Johns Pt-Gulliver Lk</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Private Shoreline Beach-East of Doyle Twp Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Public Shoreline Beach-Goudreou's Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Private Shoreline Beach-Manistique-Dutch Johns Pt</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Lakeview Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Private Shoreline Beach-Stoney Point-Manistique</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Manistique Township Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Public Shoreline Beach-Thompson Village</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Private Shoreline Beach-S. County Border-Thompson</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Doyle Township Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Private Shoreline Beach-Goudreous Harbor-Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Schoolcraft</td>
<td>Public Shoreline Beach-Thompson</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Clair</td>
<td>Keewadin Road Beach</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>St Clair</td>
<td>Fort Gratiot County Park</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>St Clair</td>
<td>Washington Street Park</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>St Clair</td>
<td>Krafft Road Beach</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>-----------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>St Clair</td>
<td>Marine City Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>St Clair</td>
<td>Metcalf Road Beach</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>St Clair</td>
<td>Lakeport State Campground</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>St Clair</td>
<td>Conger-Lighthouse Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>St Clair</td>
<td>Marine City Diving Area</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>St Clair</td>
<td>Chrysler Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>St Clair</td>
<td>Jeddo Road Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>St Clair</td>
<td>Burtchville Township Park</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>St Clair</td>
<td>Lakeside Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>St Clair</td>
<td>Holland Road Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>St Clair</td>
<td>Lakeport State Park</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>St Clair</td>
<td>Private Shoreline Beach-Southern North Lakeport</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Clair</td>
<td>Private Shoreline Beach-S. of Lakeport State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Clair</td>
<td>Private Shoreline Beach-Carrigan Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Clair</td>
<td>Private Shoreline Beach-North of Port Huron</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Clair</td>
<td>Private Shoreline Beach-Northern North Lakeport</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Clair</td>
<td>Private Shoreline Beach-County Border North</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Clair</td>
<td>Private Shoreline Beach-Port Huron</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Clair</td>
<td>Private Shoreline Beach-Lakeport Village</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Clair</td>
<td>Private Shoreline Beach-Marysville</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Van Buren</td>
<td>South Haven South Beach</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Van Buren</td>
<td>South Haven North Beach</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Van Buren</td>
<td>Van Buren State Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Van Buren</td>
<td>Covert Township Park Beach</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Van Buren</td>
<td>Private Shoreline Beach-Southern County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Van Buren</td>
<td>Private Shoreline Beach-South of South Haven</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Van Buren</td>
<td>Private Shoreline Beach-North County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Van Buren</td>
<td>Private Shoreline Beach-S. of Van Buren State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Wayne</td>
<td>Crescent Sail Yacht Club</td>
<td>1</td>
<td>2/wk</td>
<td>31</td>
<td>45%</td>
</tr>
<tr>
<td>Wayne</td>
<td>Pier Park</td>
<td>1</td>
<td>2/wk</td>
<td>35</td>
<td>20%</td>
</tr>
<tr>
<td>Wayne</td>
<td>Belle Isle Beach</td>
<td>1</td>
<td>2/wk</td>
<td>121</td>
<td>4%</td>
</tr>
<tr>
<td>Wayne</td>
<td>Southern Wayne County Border</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Wayne</td>
<td>Private Shoreline Beach-City of Trenton</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Wayne</td>
<td>Private Shoreline-Village of Gibraltar</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Wayne</td>
<td>Elizabeth Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>

N/A: Not applicable

**Closings and Advisories**

**Closing/Advisory Issuance:** Both advisories and closings are issued. Exceedance of either the single-sample or geometric mean standard triggers an advisory or closing. There is no protocol for delaying or foregoing an advisory or closing when an exceedance is found.
In Michigan, signs that state whether or not the water quality has been tested are posted at the main entrance to bathing beaches or in another visible location. If the water has been tested, the sign tells where test results may be viewed. Open stretches of beach or beaches at road ends that are not advertised or posted as public bathing beaches do not need to have signs posted. Additional signs and, at state park beaches, flags are also posted to inform beach visitors when the beach is closed. A website is maintained with water quality information.

Closings and advisories are sometimes issued for a section of a beach instead of a whole beach.

Reopening Procedures: Depending on the local health department, the monitoring frequency of a beach that has been closed or placed under advisory can be increased. In most cases, resampling is conducted the day a beach is closed or placed under advisory. States that monitor more frequently after an advisory is issued will tend to have higher percent exceedance rates and lower total closing/advisory days than they would have had if their sampling frequency did not change after an advisory or closing was issued. Beaches are reopened when standards are met.

Number of Closings and Advisories: Total closing/advisory days for 51 events lasting six consecutive weeks or less increased 34% to 265 days in 2008 from 198 days in 2007, 124 days in 2006, and 234 days in 2005. In addition, there were 2 extended events (122 days total) and no permanent events in 2008. Extended events are those in effect between 7 and 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. In 2007, there were two extended events (111 days total) and one permanent event (97 days total).

Causes of Closings and Advisories: All closing and advisory days in 2008 were due to monitoring that revealed elevated bacteria levels.

The reported sources of beachwater contamination for 2008 are as follows: 74% (197) of closing/advisory days were from unknown sources of contamination, 4% (11) were from stormwater runoff, <1% (1) were from sewage spills/leaks, and 13% (35) were from agricultural runoff.

### 2008 Michigan Beach Closings and Advisories

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Allegan</td>
<td>Douglas Beach</td>
<td>6/10/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Allegan</td>
<td>Pier Cove Beach</td>
<td>6/9/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Allegan</td>
<td>West Side County Park Beach</td>
<td>6/9/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Arenac</td>
<td>Bessinger Road Beach</td>
<td>7/22/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Agricultural runoff</td>
</tr>
<tr>
<td>Arenac</td>
<td>Foster Road Beach</td>
<td>7/16/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Agricultural runoff</td>
</tr>
<tr>
<td>Arenac</td>
<td>Singing Bridge Beach</td>
<td>6/4/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Arenac</td>
<td>Singing Bridge Beach</td>
<td>6/18/08</td>
<td>6/30/08</td>
<td>Bacteria</td>
<td>Agricultural runoff</td>
</tr>
<tr>
<td>Arenac</td>
<td>Singing Bridge Beach</td>
<td>7/1/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Arenac</td>
<td>Singing Bridge Beach</td>
<td>7/22/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Agricultural runoff</td>
</tr>
<tr>
<td>Bay</td>
<td>Bay City State Recreation Area</td>
<td>8/21/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bay</td>
<td>Brissette Beach Township Park</td>
<td>8/21/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bay</td>
<td>South Linwood Beach Township Park</td>
<td>8/21/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Chippewa</td>
<td>Brimley State Park</td>
<td>8/5/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Huron</td>
<td>Bird Creek County Park</td>
<td>7/8/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Huron</td>
<td>Bird Creek County Park</td>
<td>7/22/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Huron</td>
<td>Bird Creek County Park</td>
<td>8/12/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Huron</td>
<td>Caseville County Park</td>
<td>7/1/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Huron</td>
<td>Caseville County Park</td>
<td>7/23/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------</td>
<td>--------</td>
</tr>
<tr>
<td>Huron</td>
<td>Caseville County Park</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Huron</td>
<td>Harbor Beach City Park</td>
<td>7/29/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Huron</td>
<td>Harbor Beach City Park</td>
<td>8/12/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Huron</td>
<td>Lighthouse County Park</td>
<td>7/2/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Huron</td>
<td>Lighthouse County Park</td>
<td>7/22/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Huron</td>
<td>Oak Beach County Park</td>
<td>8/12/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Huron</td>
<td>Oak Beach County Park</td>
<td>7/1/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Huron</td>
<td>Thompson Park</td>
<td>8/20/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Huron</td>
<td>Thompson Park</td>
<td>7/23/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Macomb</td>
<td>H.C.M.A.-Metropolitan Beach Metropark</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Macomb</td>
<td>St. Clair Shores Blossom Heath Beach</td>
<td>5/22/08</td>
<td>5/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Macomb</td>
<td>St. Clair Shores Blossom Heath Beach</td>
<td>6/5/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Macomb</td>
<td>St. Clair Shores Blossom Heath Beach</td>
<td>6/17/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Macomb</td>
<td>St. Clair Shores Blossom Heath Beach</td>
<td>7/3/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Macomb</td>
<td>St. Clair Shores Blossom Heath Beach</td>
<td>7/10/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Macomb</td>
<td>St. Clair Shores Blossom Heath Beach</td>
<td>9/16/08</td>
<td>9/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Macomb</td>
<td>St. Clair Shores Memorial Park Beach</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Macomb</td>
<td>St. Clair Shores Memorial Park Beach</td>
<td>6/10/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Macomb</td>
<td>St. Clair Shores Memorial Park Beach</td>
<td>9/16/08</td>
<td>9/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Manistee</td>
<td>Magoon Creek</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Oceana</td>
<td>Lighthouse Beach at Silver Lake State Park</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Oceana</td>
<td>Mears State Park</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Oceana</td>
<td>Silver Creek Channel</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Oceana</td>
<td>Silver Creek Channel</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Clair</td>
<td>Keewadhin Road Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Wayne</td>
<td>Crescent Sail Yacht Club</td>
<td>8/4/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Wayne</td>
<td>Pier Park</td>
<td>7/26/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Wayne</td>
<td>Pier Park</td>
<td>8/4/08</td>
<td>8/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** Sanitary-sew-over, Sanitary sewer overflow.

**Notes**


MINNESOTA
14th in beachwater quality (5% of samples exceeded national standards)

Minnesota has approximately 58 public beach miles in a total of 79 public beaches along the Lake Superior coastline. Only three counties in Minnesota border Lake Superior: St. Louis, Lake, and Cook counties.

The Minnesota Lake Superior Beach Monitoring Program is administered by the Minnesota Pollution Control Agency (MPCA). The MPCA partners with the Minnesota Department of Health, the county health departments, the Department of Natural Resources, and private and public organizations in the region to achieve the objectives of the program. The administering agency determines sampling practices, locations, standards, and notification protocols and practices at the beaches monitored under the program. Grand Portage Reservation, located on the north shore of Lake Superior near the Canadian border, has swimming beaches on Lake Superior. The water at these beaches is monitored in a program separate from the MPCA. This summary describes the MPCA’s standards and practices, but beaches in the Grand Portage Reservation are included in the monitoring and notification data.

Beaches are monitored from the week before Memorial Day to the week after Labor Day, with some beaches monitored in May and October as well because of use by kayakers, surfers, and sailboarders.

Minnesota’s Lake Superior Beach Monitoring Program believes that a change from one culture method to another for analyzing beachwater samples, instituted in 2008, delivers higher bacterial counts than the culture method used for the first five years of the beach program. Minnesota’s beachwater quality program suspects that advisory days in 2008 would have been lower using the previous analytical procedures.1

Installation of large holding tanks to slow and/or stop storm-related sewage overflows, thereby improving beachwater quality, continues in the city of Duluth.1 In 2008, the beach program continued participation in DNA fingerprinting of the water, sediment, and periphyton (a mixture of algae, other microorganisms, and detritus that attaches to submerged surfaces). They are also utilizing qPCR (a rapid test method) at two Duluth area beaches. In several projects spanning the last seven years, researchers have collected samples from Lake Superior streams and problem beaches in the Duluth-Superior harbor. Using a method called rep-PCR DNA fingerprinting, these researchers can determine potential sources of E. coli in the environment. They have discovered that human waste pollution often accounts for only a small fraction of the E. coli contamination in Lake Superior streams and Duluth-Superior beaches. In contrast, waterfowl and wildlife can sometimes account for up to 100 percent of the total E. coli whose sources can be identified in water. For example, it is believed that the primary source of contamination at Park Point Beach (20th and Hearing) as well as Park Point Beach (14th St./New Duluth Boat Club) and Park Point Southworth Marsh Beach in St. Louis County, is the large goose and duck population. All three beaches are located in a large industrial harbor within an urban area along a five-mile sand spit so it is difficult to control the population. Surprisingly, even though ring-billed gulls are more abundant, Canada geese are usually the dominant source of the waterfowl E. coli.

Researchers have also found that E. coli can survive, reproduce, and form natural populations in riverine soils within Lake Superior’s watershed, in algae washed up on beaches, and on periphyton-covered rocks in the lake. The latest discovery is that fish in the Duluth-Superior harbor are E. coli carriers. Ongoing research is being conducted into the speed at which fecal bacteria levels from waterfowl and humans change at beaches and whether these changes correlate with events like large rainfalls, high winds, wave action, changes in water temperature, or recent sewage overflows. It is hoped that this will lead to improved strategies to control contamination at beaches and possibly fewer beach advisories.2

Staff work with local and statewide media to provide information about beachwater quality to the public. In 2008, beach team members and MPCA staff participated in the Beach Sweep trash pick-up event at a beach in the Duluth
Testing the Waters 2009

area. Minnesota’s beachwater quality program educates the public about what they can do to protect their health and improve water quality. This outreach has resulted in more consistent pet cleanup and has heightened awareness of sewer overflows among members of the public. In addition, the public is advised to shower after swimming or recreating at the beach, not to swallow beachwater, to try to keep their faces and heads out of the water while swimming, to wear ear plugs and goggles while swimming, and not to swim if sick or immune-depressed.3

Harmful algal blooms have not been an issue to date at any Minnesota Lake Superior beaches.

Minnesota received a $201,190 federal BEACH Act grant in 2008 and was eligible for a $204,000 grant in 2009. The federal grants fully fund the Minnesota beach monitoring and notification program.

Standards

Indicator Organism: E. coli

Standards: Minnesota applies a single-sample maximum E. coli standard of 235 cfu/100ml and a geometric mean E. coli standard of 126 cfu/100ml for a minimum of five samples collected during a 30-day period. Minnesota has no preemptive standards, but does post advisories after known sewage overflows or other events that are considered likely to result in high bacteria levels. In addition, the public is advised to wait 24 hours before going swimming after rainfall in urban areas.3 The three most popular Lake Superior swimming beaches in Minnesota have had one or no advisories since the program’s inception, so efforts to develop predictive models have not been made.1

Monitoring

Determination of Monitoring Locations and Frequency: In Minnesota, beaches are assigned high (Tier 1), medium (Tier 2), and low priority (Tier 3) based on the potential for impacts from stormwater runoff, bather and waterfowl loads, and the location of wastewater treatment outfalls and farms.

Practice: The sampling method is to collect the samples at a depth of 6 to 12 inches in water that is knee deep. Tier 1 beaches are routinely sampled on Mondays and Thursdays; Tier 2 beaches are sampled on Monday. Samples are received by the lab within six hours of being taken and results are available 20–24 hours after that.

Results: In 2008, Minnesota reported 89 Great Lakes beaches, 8 (9%) of which were monitored more than once a week, 42 (47%) once a week, and 39 (44%) were not monitored. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 5 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Park Point Southworth Marsh Beach (31%), Park Point New Duluth Boat Club / 14th Street Beach (15%), Park Point 20th Street/Hearding Island Canal Beach (9%), Lakewalk Beach (8%), and Brighton Beach in St. Louis County (7%).

St. Louis County had the highest percent exceedance rate in 2008 (9%), followed by Lake and Cook (both 1%).

When comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 38 beaches, the percent of samples exceeding the standard decreased to 4 percent from 9 percent in 2007 and 2005 and 4 percent in 2006.
### 2008 Minnesota Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cook</td>
<td>Grand Portage Bay Monitoring Location 3</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Cook</td>
<td>Grand Portage Bay Monitoring Location 4</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>6%</td>
</tr>
<tr>
<td>Cook</td>
<td>Grand Portage Bay Monitoring Location 1</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>6%</td>
</tr>
<tr>
<td>Cook</td>
<td>Grand Portage Bay Monitoring Location 2</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Cook</td>
<td>Grand Marais Downtown Beach</td>
<td>2</td>
<td>1/wk</td>
<td>32</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Paradise Beach</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Durfee Creek Area Beach</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Temperance River State Park Beach</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Old Shore Road Beach Area</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Cutface Creek Wayside Rest Beach</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Schroeder Town Park Beach</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Chicago Bay Boat Launch Beach</td>
<td>2</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Grand Portage Bay Monitoring Location 8</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Grand Marais Campground Beach</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Hollow Rock Resort Beach</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Sugarloaf Cove Beach</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Grand Portage Bay Monitoring Location 6</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Red Rock Beach</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Grand Portage Bay Monitoring Location 7</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Grand Portage Bay Monitoring Location 5</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Kadunce Creek Beach</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Cook</td>
<td>Croftville Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cook</td>
<td>Temperance River State Park East Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cook</td>
<td>Cascade State Park West Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cook</td>
<td>Butterwort Cliffs Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cook</td>
<td>Coville Creek Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cook</td>
<td>Judge C.R. Magney State Park East Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cook</td>
<td>Horseshoe Bay Boat Launch Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cook</td>
<td>Red Cliff Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cook</td>
<td>Cascade State Park Campground Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cook</td>
<td>Ray Berglund Wayside Rest Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cook</td>
<td>Judge C.R. Magney State Park West Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Agate Bay Beach</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Lake</td>
<td>Twin Points Public Access Beach</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Lake</td>
<td>Burlington Bay Beach</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Lake</td>
<td>Split Rock River Beach</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Lake</td>
<td>Silver Bay Marina Beach</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Lake</td>
<td>Split Rock Lighthouse State Park Beach</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Lake</td>
<td>Flood Bay Beach</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Lake</td>
<td>Gooseberry Falls State Park Beach</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>---------------------</td>
<td>---------------</td>
<td>-------------------</td>
</tr>
<tr>
<td>Lake</td>
<td>Knife River Marina Beach</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Lake</td>
<td>Stewart River Beach</td>
<td>2</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Lake</td>
<td>Tettegouche State Park Beach</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Lake</td>
<td>Split Rock Lighthouse State Park / Crazy Bay Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Manitou River Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Palisade Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Two Harbors City Park Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Split Rock Lighthouse State Park / Corundum Point Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Silver Cliff Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Tettegouche State Park / Baptism River Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Split Rock Lighthouse State Park / Split Rock Point Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Silver Creek Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Tettegouche State Park/Crystal Bay Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Split Rock Lighthouse State Park/Gold Rock Point Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Blueberry Hill Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point Southworth Marsh Beach</td>
<td>1</td>
<td>2/wk</td>
<td>61</td>
<td>31%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point New Duluth Boat Club/14th Street Beach</td>
<td>1</td>
<td>2/wk</td>
<td>95</td>
<td>15%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point 20th Street/Hearding Island Canal Beach</td>
<td>1</td>
<td>2/wk</td>
<td>47</td>
<td>9%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Lakewalk Beach</td>
<td>1</td>
<td>2/wk</td>
<td>65</td>
<td>8%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Brighton Beach</td>
<td>1</td>
<td>2/wk</td>
<td>42</td>
<td>7%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point Sky Harbor Parking Lot Beach</td>
<td>2</td>
<td>1/wk</td>
<td>44</td>
<td>7%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Leif Erikson Park Beach</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>St Louis</td>
<td>French River Beach</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Lester River Beach</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Lakewalk East / 16th Avenue East Beach</td>
<td>2</td>
<td>1/wk</td>
<td>19</td>
<td>5%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point Franklin Park/13th Street South Beach</td>
<td>1</td>
<td>2/wk</td>
<td>43</td>
<td>5%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point Beach House</td>
<td>1</td>
<td>2/wk</td>
<td>41</td>
<td>0%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point Lafayette Community Club Beach</td>
<td>1</td>
<td>2/wk</td>
<td>41</td>
<td>0%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Bluebird Landing Beach</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Boy Scout Landing Beach</td>
<td>2</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Stony Point Beach</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>St Louis</td>
<td>42nd Avenue East Beach</td>
<td>2</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>St Louis</td>
<td>Clyde Avenue Boat Landing Beach</td>
<td>2</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>St Louis</td>
<td>McQuade Road Safe Harbor Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>Morgan Park Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>North Shore Drive Wayside Rest/Cant Road Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>Blatnik Fishing Pier Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>Waterfront Trail/Radio Towers Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>Stony Point Wayside Rest Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>Glensheen Cemetary Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>Smithville Park Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>
Closings and Advisories

Closing and Advisory Issuance: The MPCA does not issue beach closings; its policy is to issue advisories only.1 (the Grand Portage Tribe, however, does issue closings) When a sample exceeds either the single-sample or geometric mean bacteria standard, the public is immediately notified with press releases, webpage updates, emails, telephone calls, and a hotline. Large portable orange and white hazard signs with reflective material are posted at beaches that are under advisory.2 No resampling is done before an advisory is issued, and there is no protocol for delaying or foregoing an advisory when a sample exceeds standards. Advisories are issued for an entire beach, rather than sections of a beach.1

Reopening Procedures: The MPCA sites are resampled as soon as possible, and daily (Monday through Thursday) sampling continues until the site meets the water quality standards. The “all clear” is issued through the same steps as the advisory (signs are removed, a news release goes out, and appropriate phone calls are made). States that monitor more frequently after an exceedance is found will tend to have higher percent exceedance rates and lower total closing/advisory days than they would have had if their sampling schedule did not alter after an exceedance was found.

Number of Closings and Advisories: Minnesota had 38 closing/advisory events in 2008. Total advisory days for 38 events lasting six consecutive weeks or less increased 32 percent to 257 days in 2008 from 195 days in 2007, 73 days in 2006, and 143 days in 2005. In addition, there were no extended or permanent events in 2008 or 2007. Extended events are those in effect more than 6 but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. About half of the increase is due 35 closing days at five beaches managed by the Grand Portage Reservation. NRDC did not include Grand Portage Reservation beach closings for the 2007 beach season.

Causes of Closings and Advisories: All closing and advisory days in 2008 were due to monitoring that revealed elevated bacteria levels.

The reported sources of beachwater contamination for 2008 are as follows: 80% (205) of closing/advisory days were from unknown sources of contamination, and 20% (52) were from stormwater runoff.

---

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>St Louis</td>
<td>North Shore Drive Wayside Rest/72nd Avenue East Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>Waterfront Trail/Riverside Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>Bayfront Park Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>Minnesota Point Harbor Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>Waterfront Trail/Interlake Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>Lakewood Pump Station Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>Indian Point Campground Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>St Louis</td>
<td>Lakewalk East/26th Avenue East Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>

N/A: Not applicable

---

### 2008 Minnesota Beach Closings and Advisories

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cook</td>
<td>Grand Portage Bay Monitoring Location 1</td>
<td>8/28/08</td>
<td>9/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Grand Portage Bay Monitoring Location 2</td>
<td>6/12/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Grand Portage Bay Monitoring Location 3</td>
<td>6/12/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Grand Portage Bay Monitoring Location 4</td>
<td>8/28/08</td>
<td>9/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cook</td>
<td>Hollow Rock Resort Beach</td>
<td>8/17/08</td>
<td>8/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>------------</td>
</tr>
<tr>
<td>Lake</td>
<td>Agate Bay Beach</td>
<td>6/10/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Twin Points Public Access Beach</td>
<td>9/3/08</td>
<td>9/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Brighton Beach</td>
<td>6/13/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Brighton Beach</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Brighton Beach</td>
<td>8/22/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>French River Beach</td>
<td>9/3/08</td>
<td>9/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Lakewalk Beach</td>
<td>6/13/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Lakewalk Beach</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Lakewalk Beach</td>
<td>8/29/08</td>
<td>9/3/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>St Louis</td>
<td>Lakewalk Beach</td>
<td>9/12/08</td>
<td>9/13/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>St Louis</td>
<td>Lakewalk Beach</td>
<td>10/7/08</td>
<td>10/8/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>St Louis</td>
<td>Lakewalk East/16th Avenue East Beach</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Leif Erikson Park Beach</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Lester River Beach</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point 20th Street/Hearding Island Canal Beach</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point 20th Street/Hearding Island Canal Beach</td>
<td>7/11/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point Franklin Park/13th Street South Beach</td>
<td>7/18/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point New Duluth Boat Club/14th Street Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point New Duluth Boat Club/14th Street Beach</td>
<td>5/6/08</td>
<td>5/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point New Duluth Boat Club/14th Street Beach</td>
<td>6/10/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point New Duluth Boat Club/14th Street Beach</td>
<td>7/18/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point New Duluth Boat Club/14th Street Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point New Duluth Boat Club/14th Street Beach</td>
<td>8/15/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point New Duluth Boat Club/14th Street Beach</td>
<td>8/22/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point New Duluth Boat Club/14th Street Beach</td>
<td>9/23/08</td>
<td>9/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point Sky Harbor Parking Lot Beach</td>
<td>7/25/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point Sky Harbor Parking Lot Beach</td>
<td>8/1/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point Sky Harbor Parking Lot Beach</td>
<td>8/29/08</td>
<td>9/3/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point Southworth Marsh Beach</td>
<td>6/6/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point Southworth Marsh Beach</td>
<td>6/13/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point Southworth Marsh Beach</td>
<td>6/20/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point Southworth Marsh Beach</td>
<td>7/25/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>St Louis</td>
<td>Park Point Southworth Marsh Beach</td>
<td>8/29/08</td>
<td>10/8/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
</tbody>
</table>

**Notes**

MISSISSIPPI

24th in beachwater quality (14% of samples exceeded national standards)

Mississippi has 22 beaches stretching along 43 miles of Gulf coastline. Counties with beaches are Hancock, Harrison, and Jackson. The Mississippi Department of Environmental Quality (MDEQ), in conjunction with the State Beach Monitoring Task Force, conducts Mississippi’s beachwater quality monitoring program. The MDEQ determines sampling practices, locations, standards, and notification protocols and practices throughout the state.

Mississippi’s beaches are monitored year-round but more frequent monitoring is conducted during the peak recreational season, which extends from May to October.

The number of beach closings in Mississippi in 2008 was impacted by beach renourishment projects conducted by the U.S. Army Corps of Engineers in Harrison County during the first half of the year. Renourishment involves adding dredged material (sand) to the beach to make the beach wider and extend farther into the ocean. These activities can release bacteria trapped in the sediment, causing unsafe swimming conditions, and beach closings were issued when bacteria levels exceeded standards during the dredging operation. In addition, Hurricane Gustav hit the Mississippi Gulf Coast on September 1, 2008, prompting closings due to storm debris from September 2 to December 17, 2008.1

The Mississippi Department of Marine Resources (DMR) monitors inshore and offshore harmful algal blooms. Harmful algal bloom activity was lower in 2008 than in 2007, according to the DMR.1

Mississippi received a $253,680 federal BEACH Act grant in 2008 and was eligible for a $257,000 grant in 2009. In addition to the BEACH Act grant monies, Mississippi’s Beach Monitoring Program is supported by approximately $40,000 of in-kind services provided by the state.1

Standards

Indicator Organism: Enterococcus

Standards: Mississippi applies a marine and estuarine enterococcus single-sample maximum standard of 104 cfu/100 ml. Mississippi also has a standing preemptive rainfall advisory that warns against swimming at beaches for 24 hours following significant rainfall (characterized by noticeable runoff). Swimmers are particularly advised to avoid swimming near storm drains, which are present at nearly all of Mississippi’s Gulf Coast beaches. Beaches are preemptively closed if there is a known sewage spill or when events such as hurricanes or beach recovery projects make conditions unsafe for swimming.

In addition to bacteria samples, the MDEQ collects monthly nutrient and chlorophyll data. This additional information is not used to inform issuance of beach advisories or closings, but it is used along with the bacteria data to assess the quality of coastal waters along the Mississippi Gulf Coast.1

Monitoring

Determination of Monitoring Locations and Frequency: Monitoring frequency is based on the period of recreational use, the nature and extent of use during each period, and the water quality history for the beach.

Practice: Samples are taken mid-water column at wading depth (approximately 0.5 m) between the hours of 8 am and 2 pm. Sampling is conducted Monday through Thursday. Lab results are usually available 24 hours after samples are received.

Mississippi Sources of Contamination

- Stormwater 0%
- Sewage 0%
- Other 18%
- Unknown 82%
Results: In 2008, Mississippi reported 22 coastal beaches, all of which were monitored once a week. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 14 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards.

The beaches with the highest percent exceedance rate in 2008 were Gulfport Central Beach (40%) and Gulfport Harbor Beach (25%) in Harrison County, Buccaneer State Park Beach in Hancock County (22%), Pass Christian East Beach in Harrison County (19%), Waveland Beach in Hancock County (19%), Courthouse Road Beach (19%) and Edgewater Beach (18%) in Harrison County, Bay St. Louis Beach in Hancock County (16%), and Gulfport East Beach (16%) and Biloxi West Central Beach (15%) in Harrison County.

Hancock County had the highest exceedances rate (18%) followed by Harrison (16%), and Jackson (8%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 21 beaches, the percent of samples exceeding the standard increased to 14 in 2008 from 11 percent in 2007 and 9 percent in 2006, but was still less than the four-year peak of 22 percent in 2005.

### 2008 Mississippi Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hancock</td>
<td>Buccaneer State Park Beach</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>22%</td>
</tr>
<tr>
<td>Hancock</td>
<td>Waveland Beach</td>
<td>2</td>
<td>1/wk</td>
<td>57</td>
<td>19%</td>
</tr>
<tr>
<td>Hancock</td>
<td>Bay St. Louis Beach</td>
<td>1</td>
<td>1/wk</td>
<td>64</td>
<td>16%</td>
</tr>
<tr>
<td>Harrison</td>
<td>Gulfport Central Beach</td>
<td>1</td>
<td>1/wk</td>
<td>84</td>
<td>40%</td>
</tr>
<tr>
<td>Harrison</td>
<td>Gulfport Harbor Beach</td>
<td>1</td>
<td>1/wk</td>
<td>67</td>
<td>25%</td>
</tr>
<tr>
<td>Harrison</td>
<td>Pass Christian East Beach</td>
<td>1</td>
<td>1/wk</td>
<td>67</td>
<td>19%</td>
</tr>
<tr>
<td>Harrison</td>
<td>Courthouse Road Beach</td>
<td>1</td>
<td>1/wk</td>
<td>63</td>
<td>19%</td>
</tr>
<tr>
<td>Harrison</td>
<td>Edgewater Beach</td>
<td>1</td>
<td>1/wk</td>
<td>61</td>
<td>18%</td>
</tr>
<tr>
<td>Harrison</td>
<td>Gulfport East Beach</td>
<td>1</td>
<td>1/wk</td>
<td>58</td>
<td>16%</td>
</tr>
<tr>
<td>Harrison</td>
<td>Biloxi West Central Beach</td>
<td>1</td>
<td>1/wk</td>
<td>61</td>
<td>15%</td>
</tr>
<tr>
<td>Harrison</td>
<td>Gulfport West Beach</td>
<td>1</td>
<td>1/wk</td>
<td>61</td>
<td>13%</td>
</tr>
<tr>
<td>Harrison</td>
<td>Biloxi East Central Beach</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>10%</td>
</tr>
<tr>
<td>Harrison</td>
<td>Long Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>5%</td>
</tr>
<tr>
<td>Harrison</td>
<td>Pass Christian Central Beach</td>
<td>2</td>
<td>1/wk</td>
<td>50</td>
<td>4%</td>
</tr>
<tr>
<td>Harrison</td>
<td>Pass Christian West Beach</td>
<td>2</td>
<td>1/wk</td>
<td>48</td>
<td>2%</td>
</tr>
<tr>
<td>Harrison</td>
<td>Biloxi East Beach</td>
<td>1</td>
<td>1/wk</td>
<td>55</td>
<td>0%</td>
</tr>
<tr>
<td>Jackson</td>
<td>Shearwater Beach</td>
<td>1</td>
<td>1/wk</td>
<td>62</td>
<td>11%</td>
</tr>
<tr>
<td>Jackson</td>
<td>Pascagoula Beach West</td>
<td>1</td>
<td>1/wk</td>
<td>59</td>
<td>10%</td>
</tr>
<tr>
<td>Jackson</td>
<td>Front Beach</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>10%</td>
</tr>
<tr>
<td>Jackson</td>
<td>St. Andrews Beach</td>
<td>2</td>
<td>1/wk</td>
<td>52</td>
<td>8%</td>
</tr>
</tbody>
</table>
Closings and Advisories

Closing and Advisory Issuance: Mississippi issues both advisories and closings at its beaches. Advisories are issued due to bacterial exceedances or anticipated bacterial exceedances due to rainfall; all other notifications are called closings. No geometric mean standard is applied when determining whether a beachwater sample exceeds bacterial standards.

When a sample exceedance is discovered, Mississippi issues an advisory and posts signs at the beach. There is no protocol for allowing a beach to remain open when an exceedance is found. When an advisory is issued, it is immediately announced on the beach monitoring website and a press release is issued from the Mississippi Department of Environmental Quality. Advisories are sometimes issued for a section of beach rather than the entire beach when an exceedance is found.1

Reopening Procedures: Once a beach is placed under advisory, the monitoring frequency is increased until standards are met and the beach is reopened.1 States that monitor more frequently after an exceedance is found will tend to have higher percent exceedance rates and lower total closing/advisory days than they would have had if their sampling schedule did not alter after an exceedance was found. Standing rainfall advisories are based on time and sampling is not conducted before these advisories are lifted.

Number of Closings and Advisories: Mississippi had 30 closing/advisory events in 2008. Total closing/advisory days for 30 events lasting six consecutive weeks or less decreased 25 percent to 187 days in 2008 from 249 days in 2007, 0 days in 2006 (all closing and advisory events in 2006, which were issued due to debris in the water from Hurricane Katrina, lasted more than six consecutive weeks), and 41 days in 2005. In addition, there were no extended or permanent events in 2008 or 2007. Extended events are those in effect more than 6 but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks.

Causes of Closings and Advisories: For events lasting six consecutive weeks or less, 82% (153) of closing/advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, and 18% (34) were preemptive due to other unspecified reasons.

The reported sources of beachwater contamination for 2008 are as follows: 82% (153) of closing/advisory days were from unknown sources of contamination, and 18% (34) were from other unspecified sources of contamination.

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hancock</td>
<td>Bay St. Louis Beach</td>
<td>4/10/08</td>
<td>4/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Hancock</td>
<td>Bay St. Louis Beach</td>
<td>5/7/08</td>
<td>5/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Hancock</td>
<td>Bay St. Louis Beach</td>
<td>7/3/08</td>
<td>7/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Hancock</td>
<td>Buccaneer State Park Beach</td>
<td>4/10/08</td>
<td>4/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Hancock</td>
<td>Waveland Beach</td>
<td>4/3/08</td>
<td>4/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Hancock</td>
<td>Waveland Beach</td>
<td>4/10/08</td>
<td>4/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Biloxi East Central Beach</td>
<td>4/12/08</td>
<td>4/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Biloxi East Central Beach</td>
<td>5/23/08</td>
<td>5/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------</td>
<td>--------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------</td>
<td>-----------</td>
</tr>
<tr>
<td>Harrison</td>
<td>Biloxi West Central Beach</td>
<td>4/11/08</td>
<td>4/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Biloxi West Central Beach</td>
<td>5/8/08</td>
<td>5/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Courthouse Road Beach</td>
<td>3/19/08</td>
<td>3/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Courthouse Road Beach</td>
<td>4/10/08</td>
<td>4/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Edgewater Beach</td>
<td>4/11/08</td>
<td>4/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Edgewater Beach</td>
<td>5/8/08</td>
<td>5/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Gulfport Central Beach</td>
<td>1/24/08</td>
<td>2/21/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Harrison</td>
<td>Gulfport Central Beach</td>
<td>3/19/08</td>
<td>3/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Gulfport Central Beach</td>
<td>4/10/08</td>
<td>4/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Gulfport Central Beach</td>
<td>5/14/08</td>
<td>5/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Gulfport East Beach</td>
<td>4/11/08</td>
<td>4/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Gulfport Harbor Beach</td>
<td>3/19/08</td>
<td>3/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Gulfport Harbor Beach</td>
<td>4/10/08</td>
<td>4/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Gulfport Harbor Beach</td>
<td>5/7/08</td>
<td>5/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Long Beach</td>
<td>4/10/08</td>
<td>4/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Long Beach</td>
<td>6/5/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Pass Christian Central Beach</td>
<td>6/5/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Pass Christian East Beach</td>
<td>5/21/08</td>
<td>5/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Harrison</td>
<td>Pass Christian East Beach</td>
<td>8/16/08</td>
<td>8/22/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Harrison</td>
<td>Pass Christian East Beach</td>
<td>12/10/08</td>
<td>12/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jackson</td>
<td>Pascagoula Beach West</td>
<td>4/11/08</td>
<td>4/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jackson</td>
<td>Shearwater Beach</td>
<td>5/23/08</td>
<td>5/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

Explanation of Frequently Used Terms: Preempt-other, Preemptive due to reasons not listed here.

Notes
1 Emily Cotton, Regional Biologist, Mississippi Department of Environmental Quality, personal communication, May 2009.
New Hampshire has 16 coastal and estuarine beaches lining 18 miles of Atlantic waters, all in Rockingham County. The state’s beachwater quality monitoring program is administered by the New Hampshire Department of Environmental Services (DES). The administering agency determines sampling practices, locations, standards, and notification protocols and practices at coastal beaches throughout the state. New Hampshire also monitors water quality at its inland freshwater beaches; this summary only includes information about the bacterial monitoring program for coastal beaches.

The monitoring season extends from May through Labor Day. In 2008, the program continued to partner with a local Surfrider Foundation chapter to monitor two beaches (North Beach in Hampton and Jenness State Beach in Rye) during the off-season as well. Increased rainfall for the summer of 2008 is the most likely cause of increased enterococcus bacteria levels and resulting beach advisories.

The program’s monitoring data are used to identify and prioritize beach cleanup and prevention activities. Risk-based evaluations to determine sources of beachwater contamination were conducted at all 16 coastal beaches in 2008. The DES Beach Program continues to monitor sources discharging to the beach areas at Pirate’s Cove, State Beach, Sawyer Beach and New Castle town beach. Little River is the suspected source at State Beach, Eel Pond is the suspected source at Sawyer Beach, Parson’s Creek is a suspected source to Pirates Cove, and the pipe west of the beach is a possible source to New Castle Town Beach. In May of 2009, the DES and the EPA conducted a dye study on Little River. The dye’s dilution and transport patterns were tracked by DES and EPA staff by periodic water sampling throughout the day. The final report for an earlier study of bacteria levels in sand and interstitial water at four New Hampshire coastal beaches should be released by spring 2009.

Two important Beach Program goals are to determine watershed contribution of bacteria to coastal beaches and to predict bacterial concentrations during and after a rain event. The program is funding development of a detailed watershed model to predict stormwater transport of bacteria to the state’s beaches. This model will be able to inform future build-out planning, remediation, and construction. In addition to coastal bacteria data, the model will incorporate land use categories, hydrology, topography, historical precipitation records, historical tide data, and waste management.

New Hampshire performs outreach to encourage the public to take actions to improve water quality. Beach users are encouraged to remove any trash they bring onto the beach. At the Wild New Hampshire Day in 2008, the Beach Program encouraged people to pick up after their pets and distributed educational materials regarding pet waste disposal. Nineteen pet waste stations and six cigarette snuffers were installed at beach entrances by volunteers in 2008. The DES assists with the Adopt-A-Beach program, which is run by the Blue Ocean Society, and the Hampton Beach Adopt-a-Beach Program continues to be a success. Volunteers participated in 31 cleanups during 2008, resulting in 1,600 pounds of trash collected. The most numerous items found were cigarette butts, plastic bottles, metal cans, and straws. Ten other beaches receive volunteer cleanups roughly once a month as part of the Adopt-a-Beach program. In addition to monthly clean-ups, the Blue Ocean Society, the Ocean Conservancy and the DES Coastal Program sponsor a one-day event where volunteers pick up trash along the coast.

Red tide, a harmful marine algal bloom, is monitored by the DES Coastal Program. Shellfish beds are off limits when red tide occurs. Freshwater beaches in the state are monitored for blooms of cyanobacteria (blue-green algae), and swim advisories are posted when a visible cyanobacteria scum is present and cyanobacteria cell dominance is more than 50 percent of the sample cell count. Fourteen swim advisories at freshwater lakes were issued due to cyanobacteria in 2008 compared to 11 in 2007. A new procedure was developed for the summer of 2008 to alert users of lakes without designated beaches and areas of lakes away from designated beaches about cyanobacteria blooms. DES now issues a lake-wide cyanobacteria warning if the total cell count contains greater than 50 percent cyanobacteria.
New Hampshire received a $201,450 federal BEACH Act grant in 2008 and was eligible for a $205,000 grant in 2009. Approximately $20,000 per year is allocated from state funds for accounting, supervisory, and additional beach work performed by state employees not directly paid by the federal BEACH Act funds.\(^2\)

**Standards**

**Indicator Organism:** Enterococcus

**Standards:** New Hampshire applies an enterococcus single-sample maximum of 104 cfu/100 ml and a geometric mean of 35 cfu/100 ml. The geometric mean is calculated from at least three samples collected over a 60-day period.

Preemptive advisories are issued due to known sewage spills at some beaches. Other beaches, which are far from and upcurrent of sewage outfalls, have never been impacted by a sewage spill. They are sampled when a spill is reported, but a preemptive advisory is not issued. Preemptive rain advisories are not issued. The DES hopes the watershed model whose development they are funding will provide a useful tool for town officials and lawmakers to improve public notification and protect public health when water quality may be poor. With the ability to predict public beach bacterial concentrations, the DES could immediately post an advisory based on predicted values and conduct follow up sampling for verification.

**Monitoring**

**Determination of Sampling Locations and Frequency:** Sampling frequencies at beaches in New Hampshire are based on beach history, microbial pathogen sources, and beach use. Beaches less than 100 feet in length are sampled at left and right locations one-third of the distance from either end of the beach. Beaches greater than 100 feet in length are bracketed into thirds and sampled at left, center and right locations.\(^1\) The DES Beach Inspection Program monitors all known and suspected discharge sources to designated coastal beaches.\(^2\)

**Practice:** Samples are taken in knee-deep water on weekdays. The number of samples collected at each beach is a function of beach length. During the 2008 swim season, sampling results were known 24 hours after samples were delivered to the lab.

**Results:** In 2008, New Hampshire reported 16 coastal beaches, all in Rockingham County. Ten (63\%) were monitored more than once a week, five (31\%) once a week, and one (6\%) every other week. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 1 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance in 2008 were Pirates Cove Beach (5\%), New Castle TB (4\%), Hampton Harbor Beach (4\%), State Beach (4\%), Foss Beach (3\%), Jenness Beach SP (1\%), Bass Beach (1\%), and Cable Beach (1\%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 15 beaches, the percent of samples exceeding the standard remained steady at 1 percent in 2008. During the past four years, only in 2006 did the percent exceedance increase to 3 percent.

### 2008 New Hampshire Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rockingham</td>
<td>Pirates Cove Beach</td>
<td>2</td>
<td>1/wk</td>
<td>110</td>
<td>5%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------</td>
<td>--------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Rockingham</td>
<td>New Castle TB</td>
<td>1</td>
<td>2/wk</td>
<td>113</td>
<td>4%</td>
</tr>
<tr>
<td>Rockingham</td>
<td>Hampton Harbor Beach</td>
<td>3</td>
<td>2/yr</td>
<td>27</td>
<td>4%</td>
</tr>
<tr>
<td>Rockingham</td>
<td>State Beach</td>
<td>1</td>
<td>2/wk</td>
<td>112</td>
<td>4%</td>
</tr>
<tr>
<td>Rockingham</td>
<td>Foss Beach</td>
<td>3</td>
<td>2/mo</td>
<td>70</td>
<td>3%</td>
</tr>
<tr>
<td>Rockingham</td>
<td>Jenness Beach SP</td>
<td>2</td>
<td>1/wk</td>
<td>176</td>
<td>1%</td>
</tr>
<tr>
<td>Rockingham</td>
<td>Bass Beach</td>
<td>1</td>
<td>2/wk</td>
<td>94</td>
<td>1%</td>
</tr>
<tr>
<td>Rockingham</td>
<td>Cable Beach</td>
<td>1</td>
<td>2/wk</td>
<td>105</td>
<td>1%</td>
</tr>
<tr>
<td>Rockingham</td>
<td>Northside Park</td>
<td>2</td>
<td>1/wk</td>
<td>52</td>
<td>0%</td>
</tr>
<tr>
<td>Rockingham</td>
<td>Sun Valley Beach</td>
<td>2</td>
<td>1/wk</td>
<td>37</td>
<td>0%</td>
</tr>
<tr>
<td>Rockingham</td>
<td>North Beach</td>
<td>2</td>
<td>1/wk</td>
<td>187</td>
<td>0%</td>
</tr>
<tr>
<td>Rockingham</td>
<td>Sawyer Beach</td>
<td>1</td>
<td>2/wk</td>
<td>95</td>
<td>0%</td>
</tr>
<tr>
<td>Rockingham</td>
<td>Wallis Sands SP</td>
<td>2</td>
<td>1/wk</td>
<td>54</td>
<td>0%</td>
</tr>
<tr>
<td>Rockingham</td>
<td>Hampton Beach SP</td>
<td>1</td>
<td>2/wk</td>
<td>165</td>
<td>0%</td>
</tr>
<tr>
<td>Rockingham</td>
<td>Seabrook Harbor Beach</td>
<td>1</td>
<td>2/wk</td>
<td>100</td>
<td>0%</td>
</tr>
<tr>
<td>Rockingham</td>
<td>Seabrook TB</td>
<td>2</td>
<td>1/wk</td>
<td>106</td>
<td>0%</td>
</tr>
</tbody>
</table>

**Advisories**

**Advisory Issuance:** New Hampshire’s policy is to issue advisories and not closings at its beaches. Exceedance of either the single-sample maximum or the geometric mean standard triggers an advisory. When a sample exceeds the standard, officials notify other state and local government agencies immediately, without resampling to confirm the exceedance. There is no protocol for foregoing or delaying an advisory when an exceedance is found. The public is generally notified within 24 hours of sample collection. In New Hampshire, beaches that are sampled at least as frequently as the state requires and that are meeting water quality standards have a sign saying they are open. Beaches that do not meet the minimum sampling frequency requirements have a sign saying they are not monitored, and beaches that do not meet the state standards for acceptable bacteria levels and/or have a toxic cyanobacterial scum (freshwater only; there is at present no standard for marine algae) have a sign saying that the beach is under advisory. The public may also be notified via the DES website, DES e-news, twitter and/or a press release to local media. In addition to monitoring results, the state is guided in its advisory issuance by illness complaints, which are solicited on its website. Advisories are usually issued for whole beaches rather than sections of a beach, but the beach coordinator is authorized to place a section of a beach under advisory if conditions warrant.

**Reopening Procedures:** When a sample exceeds water quality standards, the DES resamples water daily from the beach to determine when bacteria levels have decreased below state standards. It is only at this point that the beach advisory may be removed. Extra storm event sampling may be conducted at beaches where watershed runoff resulting from rainfall is expected to impact beach water quality. States that monitor more frequently after an exceedance is found or after rainfall events will tend to have higher percent exceedance rates and lower total closing/advisory days than they would have had if their sampling frequency did not increase after an exceedance was found.

**Number of Advisories:** New Hampshire had six advisory events in 2008. Total advisory days for six events lasting six consecutive weeks or less increased to 13 days in 2008 from two days in 2007. There were 23 advisory days in 2006 and one day in 2005. In addition, there were no extended or permanent events in 2008 or 2007. Extended events are those in effect more than 6 consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks.
Causes of Advisories: All advisory days in 2008 were due to monitoring that revealed elevated bacteria levels. The reported sources of beachwater contamination for 2008 are as follows: 85% (11) of advisory days were from unknown sources of contamination, and 15% (2) were from other unspecified sources of contamination.

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rockingham</td>
<td>Jenness Beach Sp</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Rockingham</td>
<td>New Castle Tb</td>
<td>7/2/08</td>
<td>7/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Rockingham</td>
<td>New Castle Tb</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Rockingham</td>
<td>New Castle Tb</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Rockingham</td>
<td>Pirates Cove Beach</td>
<td>6/25/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Rockingham</td>
<td>State Beach</td>
<td>7/25/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

Explanation of Frequently Used Terms: Other, Strong waves or wind, chemical spills, no lifeguard, jellyfish, etc.

Notes
2 Jody Connor, New Hampshire Department of Environmental Services, personal communication, June 2009.
New Jersey has 700 public coastal beaches lining 127 miles of Atlantic waters. Coastal water quality monitoring is conducted through the Cooperative Coastal Monitoring Program (CCMP), which is administered by the New Jersey Department of Environmental Protection (NJDEP). Other agencies participating in the CCMP are the county health departments of all four coastal counties (Atlantic, Cape May, Monmouth, and Ocean Counties), the New Jersey Department of Health and Senior Services, four municipal health departments, and the Monmouth County Regional Health Commission. New Jersey also has a program for freshwater recreational beach monitoring; this summary only includes information about coastal monitoring. The sampling season runs from mid-May to mid-September.

In August 2008, a criminal medical waste dumping event caused 117 closing days at ocean beaches in Cape May County. Beaches were closed while medical waste was collected and beaches were cleaned and assessed. On June 28, 2009, medical waste washed up along eight miles of Long Beach Island, from Barnegat Light to Surf City. No beaches were closed and no information about the debris was released from the Long Beach Island Health Department until July 1.

In 2008, Hancock Avenue Beach in Seaside Heights had improved water quality following stormwater system improvements where stormwater pipes were replaced and the system was upgraded. At Beachwood West Beach in Ocean County, storm drains are vacuumed out at the beginning of each beach season in an effort to improve beachwater quality. In 2009, a wet weather study will be conducted at this beach and several other beaches in Ocean County to help local health officials find sources of bacteria at these beaches and to determine whether it would be appropriate for these beaches to have preemptive rainfall closings.

In addition to regular beachwater monitoring for bacteria concentrations, the DEP conducts aerial surveillance of near-shore coastal waters six days a week during the summer and routinely inspects the 17 wastewater treatment facilities that discharge to the ocean. The DEP’s aerial surveillance plane includes remote sensing capability for estimating chlorophyll levels in coastal waters. This information allows the DEP to track the intensity of algae along the coast and enables the DEP to target boat sampling at locations where algal blooms might be occurring. The remote sensing results are posted daily on the CCMP website. Information on harmful algal blooms is maintained by the DEP’s Bureau of Marine Water Monitoring. There was no increase in reported algal blooms in 2008. In 2009, flights will be extended to cover the area of Barnegat Bay and up into Delaware Bay to monitor chlorophyll levels in these areas. The extended flights will provide a better measure of the ecosystem health of New Jersey’s ocean and bays.

In New Jersey, sanitary surveys are conducted when a bacterial exceedance is found. In addition to these routine efforts, wet-weather monitoring and source identification is currently being conducted in the Wreck Pond area to determine the sources of bacteria to the pond and the outfall that discharges near four ocean beaches: Brown Avenue and York Avenue in Spring Lake and Terrace and Beacon Street in Sea Girt.

Monitoring information collected under the CCMP assists the DEP in developing coastal zone management strategies, such as land use planning to control pollution from nonpoint sources. Beach monitoring data is also used to identify areas in need of additional source tracking studies. The DEP and local municipalities provide outreach to the public about actions they can take to keep coastal beaches clean.

Sewer systems in and around the New York/New Jersey Harbor are designed so that during periods of wet weather, excess flows are discharged to the Harbor waters. These excess flows contain floating debris made up of litter and toilet-generated waste such as hygiene products. When discharged to the New York/New Jersey Harbor Complex, the floating debris tends to collect into slicks that can exit the Harbor and wash up on beaches.
Plan, which has been in place for eighteen years,\(^1\) involves several means of controlling floating debris, such as helicopter surveillance to locate slicks, skimmer vessels fitted with nets that collect floating debris, floating booms that trap debris near sewer-system discharge points for later collection, and sewer-system improvements intended to maximize the ability to retain floating debris. These methods have prevented tons of floating debris from reaching the Harbor and New Jersey beaches. The DEP's Clean Shores Program, in which state inmates remove floatable debris from the shorelines of the Hudson, Raritan, and Delaware estuaries and barrier island bays, removes approximately five million pounds of trash and debris from New Jersey shorelines each year as part of the Floatables Action Plan.\(^1\) The DEP is working with Stephens Institute of Technology to develop a floatables model that will predict where observed floatable slicks will travel. That information will aid Army Corps of Engineers (ACOE) skimmer boat operators to locate slicks and if the slicks cannot be intercepted it will allow the DEP to notify beach managers that debris may wash onto local beaches. The coordination between DEP, EPA and ACOE resources provides for better surveillance and interception of floatable debris in coastal waterways.

In 2007, twenty beaches in New Jersey were monitored using a rapid test method as part of an ongoing study on the comparison of rapid methods to existing methods. The study continued at two beaches in 2008 (Myron and Wilson Ave. Beach in Monmouth County and Central Ave. Beach in Ocean County). In 2009, ten beaches in Monmouth and Ocean Counties are being sampled. New Jersey received a $275,480 federal BEACH Act grant in 2008 and was eligible for a $278,000 grant in 2009. Federal funding supports only a portion of New Jersey's beach monitoring and notification program. The state contributes an additional $200,000 to the Cooperative Coastal Monitoring Program through the sale of the Shore Protection license plates.\(^1\)

**Standards**

**Indicator Organism:** Enterococcus

**Standards:** New Jersey's standard for marine beach water quality is a single-sample maximum for enterococcus of 104 cfu/100 ml.

Four ocean beaches around the Wreck Pond outfall (Brown Avenue and York Avenue in Spring Lake and the Terrace and Beacon Boulevard in Sea Girt) are automatically closed for 24 hours after the end of all rainfall events greater than 0.1 inch or that cause an increased flow in storm drains and for 48 hours from the end of all rainfalls greater than 2.8 inches within a 24-hour period. Lifeguards prohibit swimming near any parts of these beaches where the stormwater plume is observed to be mixing within the swimming area.\(^1\) L Street Bay Beach in Belmar also has preemptive rainfall standards. Beaches in New Jersey are closed if there is a known sewage spill. Health and enforcement agencies in New Jersey can close a beach to protect public health at any time.

Algae samples are collected when remote sensing data indicated an increase in chlorophyll levels in a specific area. If a harmful algal bloom is identified, county and local health officials are notified and closing information is posted on the DEP web page and phone line, and local beach managers close beaches as necessary.

**Monitoring**

**Determination of Monitoring Locations and Frequency:** Locations for monitoring stations are selected by local or county health departments. Ocean beach sampling stations are chosen based on proximity to a potential pollution source. If there is no pollution source nearby, ocean sampling locations are chosen to represent water quality at several nearby beaches. Every recreational bay beach has its own sampling location because unlike the ocean beaches, each of the bay beaches is a distinct geographic feature.\(^1\)

**Practice:** Ocean and bay beaches are monitored according to the requirements of the New Jersey State Sanitary Code. Samples are taken 12 to 18 inches below the surface in water that is between knee and chest deep. Routine sampling is conducted on Monday mornings. At least 24 hours pass before sampling results are known. Additional sampling after rainfall events at beaches without preemptive rainfall closing policies is not conducted.
Results: In 2008, there were 700 lifeguarded, recreational ocean and bay beaches in New Jersey. Currently, the EPA’s beach data system contains all 221 monitored recreational beach sites, but not the remaining unmonitored beaches. The lifeguarded recreational beaches that are not monitored do not have sources of pollution, such as storm drains, so the nearest monitoring station is considered representative of the water quality at these beaches. New Jersey is in the process of entering all unmonitored recreational beaches into the EPA’s beach data system.

For the 2008 beach season, New Jersey provided NRDC with information on 269 coastal recreational beaches, 221 (82%) of which were monitored once a week, and 48 (18%) were not monitored. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 3 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were all in Ocean County: Beachwood Beach West in Beachwood (38%), Maxon (32%) and River in Pt Pleasant (31%), Money Island in Dover (27%), Windward Beach in Brick (27%), West Beach (22%) and East Beach in Pine Beach (19%), New Jersey in Beach Haven Terrace (18%), 14th in Ship Bottom (17%), Wildwood in Ocean Gate (16%), and 5th in Seaside Park (16%).

Ocean County had the highest exceedance rate (6%) followed by Monmouth (3%), Cape May (1%), and Atlantic (0%). Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 208 beaches, the percent of samples exceeding the standard decreased to 3 percent in 2008 after 3 years of increases (5, 3, and 1 percent in 2007, 2006, and 2005, respectively).

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Atlantic</td>
<td>33rd St. South (Brigantine)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>26th St. South (Brigantine)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>North Carolina (Atlantic City)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Bartram (Atlantic City)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>19th St. (Longport)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>33rd St. (Longport)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>New Haven (Ventnor)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Michigan (Atlantic City)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>4th St. South (Brigantine)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>26th St. (Longport)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Osborne (Margate)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Washington (Ventnor)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Seaside (Brigantine)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Washington (Margate)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Texas (Atlantic City)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Dorset (Ventnor)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>----------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Atlantic</td>
<td>New Hampshire (Atlantic City)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Lincoln (Atlantic City)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Bay (Somers Point)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Adriatic (Atlantic City)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>South Beach (Brigantine)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Arkansas (Atlantic City)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Chelsea (Atlantic City)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Oakland (Ventnor)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>43rd St. South (Brigantine)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Illinois (Atlantic City)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>15th St South (Brigantine)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Missouri (Atlantic City)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Granville (Margate)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>South Carolina (Atlantic City)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>States (Atlantic City)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Kentucky (Atlantic City)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>10th St. South (Brigantine)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Atlantic</td>
<td>Public Dock (Brigantine)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>90th (Yacht Club) (Stone Harbor)</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>11%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Sic Yacht Club (Sea Isle City)</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>11%</td>
</tr>
<tr>
<td>Cape May</td>
<td>30th (Avalon)</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>11%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Surf (Ocean City)</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Park (Ocean City)</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Cape May</td>
<td>65th (Sea Isle City)</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Cape May</td>
<td>90th (Stone Harbor)</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Cape May</td>
<td>108th (Stone Harbor)</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Cape May</td>
<td>28th (Ocean City)</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Cape May</td>
<td>24th (Ocean City)</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Ocean City Yacht Club (Ocean City)</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Cape May</td>
<td>9th St (Ocean City)</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Cape May</td>
<td>24th (North Wildwood)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>18th (North Wildwood)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>10th &amp; JFK (North Wildwood)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>9th (Avalon)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Hollywood (Wildwood Crest)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Orchid (Wildwood Crest)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>119th (Stone Harbor)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Poverty (Cape May City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Whildin (Cape May Point)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Ocean (Cape May Point)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Philadelphia (Cape May City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------------</td>
<td>--------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Cape May</td>
<td>76th (Avalon)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>103rd (Stone Harbor)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>North (Ocean City)</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>16th (Ocean City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>96th (Stone Harbor)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>48th (Ocean City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>29th (Sea Isle City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>49th (Sea Isle City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Lavendar (Wildwood Crest)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>77th (Sea Isle City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>15th (Avalon)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>50th (Avalon)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>57th (Avalon)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>59th (Sea Isle City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>65th (Avalon)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>40th St (Avalon)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>2nd &amp; JFK (North Wildwood)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>83rd St (Stone Harbor)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>21st St (Avalon)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>40th St (Sea Isle City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>34th St (Sea Isle City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Maple (Wildwood)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>55th (Ocean City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>34th St (Ocean City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>WW Gables Yacht Club (Wildwood Crest)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>WW Crest Yacht Club (Wildwood Crest)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Beesley’s Point (Upper Twp)</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Yacht Club (Avalon)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Webster (Upper Twp)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>85th (Sea Isle City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Willard (Upper Twp)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Congress (Cape May City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Richmond Ave (Lower Township)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Brainard (Cape May Point)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Corinthian YC (Cape May City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Schellenger (Wildwood)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>2nd (Cape May City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Grant (Cape May City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Ocean Ave. (Cape May City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Miami (Wildwood Crest)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Queen North (Cape May City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------------</td>
<td>-------------------------------------</td>
<td>-----</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Cape May</td>
<td>Montgomery (Wildwood)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Bennett (Wildwood)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Jefferson (Wildwood Crest)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Forgetmenot (Wildwood Crest)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>Broadway (Cape May City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Cape May</td>
<td>26th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>26th (Avalon)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>28th (Avalon)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>32nd St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>36th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>24th (Avalon)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>38th (Avalon)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>14th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>32nd (Avalon)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>35th (Avalon)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>30th St (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>22nd St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>20th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>18th (Avalon)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>18th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>15th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>13th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>39th St (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>Seaspray Rd (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>11th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>12th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>17th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>69th (Avalon)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>Atlantic Blvd. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>10th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>Waverly Blvd (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>Stockton (Cape May City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>Stenton Pl. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>St. Charles Pl. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>Brighton Pl. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>7th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>8th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>73rd (Avalon)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>42nd St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>61st (Avalon)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>60th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Cape May</td>
<td>5th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>57th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>53rd St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>50th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>46th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>44th St. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>43rd (Avalon)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>78th (Avalon)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cape May</td>
<td>Pennlyn Pl. (Ocean City)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Ocean Beach Club (Long Branch)</td>
<td>1</td>
<td>1/wk</td>
<td>23</td>
<td>13%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>L Street Beach (Belmar)</td>
<td>1</td>
<td>1/wk</td>
<td>22</td>
<td>9%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Rec Center (Highlands)</td>
<td>1</td>
<td>1/wk</td>
<td>22</td>
<td>9%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Union (Spring Lake)</td>
<td>1</td>
<td>1/wk</td>
<td>22</td>
<td>9%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Brown South (Spring Lake)</td>
<td>1</td>
<td>1/wk</td>
<td>22</td>
<td>9%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>York Avenue (Spring Lake)</td>
<td>1</td>
<td>1/wk</td>
<td>23</td>
<td>9%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>7th Avenue (Belmar)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>5%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Washington (Spring Lake)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>5%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>7th (Asbury Park)</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>5%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>12th (Belmar)</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>5%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>North Bath (Long Branch)</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>5%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>East Main (Manasquan)</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>5%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Essex (Spring Lake)</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>5%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Monmouth Beach Club (Monmouth Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>5%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>20th Avenue (Belmar)</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>5%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Elberon Beach Club (Long Branch)</td>
<td>1</td>
<td>1/wk</td>
<td>22</td>
<td>5%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Seven President’s Park (Monmouth Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>22</td>
<td>5%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Ocean Park (Bradley Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Neptune (Sea Girt)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Area E - Visitor Center (Sandy Hook)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>The Terrace (Sea Girt)</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Beacon (Sea Girt)</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Lake Takanassee Beach Club (Long Branch)</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Worthington (Spring Lake)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Evergreen South (Bradley Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Joline (Long Branch)</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>New York (Sea Girt)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Ideal Beach (Middletown)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Thomson (Leonardo)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Miller Beach (Highlands)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Conner's Beach (Highlands)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Army Rec. Beach (Sandy Hook)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>-------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Fort Hancock (Sandy Hook)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Village Beach Club (Loch Arbour)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Public Beach (Sea Bright)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Broadway (Ocean Grove)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>3rd (Asbury Park)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Sylvania (Avon)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Laird (Long Branch)</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Cedar (Allenhurst)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Baltimore (Sea Girt)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Asbury (Asbury Park)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Main (Ocean Grove)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Area C - Surf Beach (Sandy Hook)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Deal Casino (Deal)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Shark River Beach &amp; Yacht Club (Neptune Twp)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ocean</td>
<td>Beachwood Beach West (Beachwood)</td>
<td>1</td>
<td>1/wk</td>
<td>29</td>
<td>38%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Maxon (Pt Pleasant)</td>
<td>1</td>
<td>1/wk</td>
<td>25</td>
<td>32%</td>
</tr>
<tr>
<td>Ocean</td>
<td>River (Pt Pleasant)</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>31%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Windward Beach (Brick)</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>27%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Money Island (Dover)</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>27%</td>
</tr>
<tr>
<td>Ocean</td>
<td>West Beach (Pine Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>23</td>
<td>22%</td>
</tr>
<tr>
<td>Ocean</td>
<td>East Beach (Pine Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>21</td>
<td>19%</td>
</tr>
<tr>
<td>Ocean</td>
<td>New Jersey (Beach Haven Terrace)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>18%</td>
</tr>
<tr>
<td>Ocean</td>
<td>14th (Ship Bottom)</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>17%</td>
</tr>
<tr>
<td>Ocean</td>
<td>5th (Seaside Park)</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>16%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Wildwood (Ocean Gate)</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>16%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Summit (Island Heights)</td>
<td>3</td>
<td>1/wk</td>
<td>20</td>
<td>15%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Anglesea (Ocean Gate)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>15%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Stockton (Beach Haven Crest)</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>13%</td>
</tr>
<tr>
<td>Ocean</td>
<td>75th (Harvey Cedars)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>12%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Hancock (Seaside Heights)</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>11%</td>
</tr>
<tr>
<td>Ocean</td>
<td>21st (Barnegat Light)</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Ocean</td>
<td>16th (Surf City)</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Jennifer (Stafford)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>6%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Shelter Island (Dover)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>6%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Bay Beach (Barnegat)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>6%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Central (Pt Pleasant Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Reese (Lavallette)</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Berkeley (Beach Haven)</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Brick Beach (Brick)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Lyman (Mantoloking)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Mount (Bay Head)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------</td>
<td>------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Ocean</td>
<td>Broadway (Pt Pleasant Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>14th (Ship Bottom)</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Brooklyn (Lavallette)</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>7th (Brick)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Parkertown (Little Egg Harbor)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Stockton (Brant Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Berkeley Island (Berkeley)</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>25th (Ship Bottom)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Unit 1 (Island Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>A23 (Island Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Leeward (Beach Haven)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>New Jersey (Beach Haven Terrace)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>23rd (Surf City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Roxie (North Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Maryland (Pt Pleasant Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Fielder (Dover)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Access Road (Island Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Florida (Haven Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>South 3rd (Ship Bottom)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Johnson (Bay Head)</td>
<td>3</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Brooklyn (Lavallette)</td>
<td>1</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>4th (Dover)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Atlantic (Harvey Cedars)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Brighton (Seaside Park)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Lincoln (Seaside Heights)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Bryn Mawr (Lavallette)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Webster (Beach Haven)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>50th (Brant Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>North 10th (Surf City)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>23rd (South Seaside)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Guyer (Lavallette)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Jersey City (Lavallette)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Trenton (Lavallette)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>North Beach (Dover)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Sheridan (Seaside Heights)</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>12th (Seaside Park)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>14th (Beach Haven)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>O St (Seaside Park)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>USCG 110 (Island Beach)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>10th (Barnegat Light)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>24th (Barnegat Light)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
</tbody>
</table>
### County Beach Tier Monitoring

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ocean</td>
<td>Loveladies (Lovelades)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>75th (Harvey Cedars)</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Bergen (Harvey Cedars)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>East Tuna Way (Chadwick)</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Princeton (Mantoloking)</td>
<td>3</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Ocean</td>
<td>Station Ave (Pine Beach)</td>
<td>No data</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>

N/A: Not applicable

### Closings

**Closing Issuance:** New Jersey’s policy is to issue closings, not advisories, when bacteria levels exceed standards. There is no geometric mean standard. If bacteria levels exceed the single-sample standard, the beach is resampled immediately. If the second sample exceeds the standard, the beach is closed. There is no protocol for delaying or foregoing a closing when resampling confirms an exceedance. Resampling is conducted in conjunction with a sanitary survey of the beach. If high bacteria concentrations are found at an ocean station, sampling is conducted linearly along the beach to determine the extent of the affected area. This “bracket sampling” can result in an extension of a beach closing to contiguous lifeguarded beaches.¹ The public is notified of beach closings via signs, red flags, the Internet and a telephone hotline.

**Reopening Procedures:** Daily monitoring is conducted until the beachwater meets quality standards and the results of the sanitary survey are acceptable. States that monitor more frequently after an exceedance is found will tend to have higher percent exceedance rates and lower total closing/advisory days than they would have had if their sampling frequency did not increase after an exceedance was found. No additional sampling is conducted after rainfall events at beaches with preemptive rainfall closings. Instead, beaches are reopened according to the rainfall policy in place.

**Number of Closings:** New Jersey had 208 closing events in 2008. Total closing days for events lasting six consecutive weeks or less increased 47% to 208 days in 2008 from 142 days in 2007, 134 days in 2006, and 79 days in 2005. In addition, there were no extended or permanent events in 2008 or 2007. Extended events are those in effect more than 6 consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. The increase in closing days in 2008 was due to 117 preemptive closing days for the medical waste that washed up onto Cape May beaches. Without this event, there would have been a 36% decrease from 2007 levels.

**Causes of Closings and Advisories:** For events lasting six consecutive weeks or less, 15% (31) of closing/advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, 27% (56) were preemptive (i.e. without waiting for monitoring results) due to heavy rainfall, 0% (1) were preemptive due to known sewage spills/leaks, and 58% (120) were preemptive due to medical waste and trash on the beach.

The reported sources of beachwater contamination for 2008 are as follows: 15% (31) of closing days were from unknown sources of contamination, 27% (56) were from stormwater runoff, 0% (1) were from sewage spills/leaks, and 58% (120) were from medical waste and trash on the beach.

### 2008 New Jersey Closings

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Atlantic</td>
<td>Kentucky (Atlantic City)</td>
<td>6/3/07</td>
<td>6/4/07</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Cape May</td>
<td>10th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>----------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------------</td>
<td>-----------------</td>
</tr>
<tr>
<td>Cape May</td>
<td>11th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>12th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>13th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>14th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>15th (Avalon)</td>
<td>8/23/08</td>
<td>8/24/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>15th (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>15th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>15th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>15th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>18th (Avalon)</td>
<td>8/23/08</td>
<td>8/24/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>18th (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>18th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>18th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>18th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>20th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>21st St (Avalon)</td>
<td>8/23/08</td>
<td>8/24/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>21st St (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>21st St (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>21st St (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>22nd St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>24th (Avalon)</td>
<td>8/23/08</td>
<td>8/24/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>24th (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>24th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>24th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>24th (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>26th (Avalon)</td>
<td>8/23/08</td>
<td>8/24/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>26th (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>26th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>26th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>26th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>28th (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>28th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>28th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>30th (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>30th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>30th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>30th St (Ocean City)</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>30th St (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>--------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------------</td>
<td>------------</td>
</tr>
<tr>
<td>Cape May</td>
<td>32nd (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>32nd (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>32nd (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>32nd St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>34th St (Ocean City)</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>34th St (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>35th (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>35th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>35th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>35th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>36th St. (Ocean City)</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>36th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>38th (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>38th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>38th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>39th St (Ocean City)</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Preempt-other</td>
<td>Trash</td>
</tr>
<tr>
<td>Cape May</td>
<td>39th St (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>40th St (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>40th St (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>40th St (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>42nd St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>43rd (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>43rd (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>44th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>46th St. (Ocean City)</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>46th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>48th (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>50th (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>50th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>50th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>50th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>53rd St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>55th (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>57th (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>57th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>57th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>57th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>5th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>60th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>61st (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>61st (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-------------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------------</td>
<td>--------------</td>
</tr>
<tr>
<td>Cape May</td>
<td>61st (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>65th (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>65th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>65th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>69th (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>69th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>69th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>73rd (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>73rd (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>76th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>76th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>78th (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>78th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>78th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>7th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>8th St. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>9th (Avalon)</td>
<td>8/23/08</td>
<td>8/24/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>9th (Avalon)</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>9th (Avalon)</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>9th (Avalon)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>9th St (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>Atlantic Blvd. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>Brighton Pl. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>Congress (Cape May City)</td>
<td>9/4/08</td>
<td>9/5/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>North (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>Park (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>Pennlyn Pl. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>Queen North (Cape May City)</td>
<td>9/4/08</td>
<td>9/5/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>Seaspray Rd (Ocean City)</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Preempt-other</td>
<td>Trash</td>
</tr>
<tr>
<td>Cape May</td>
<td>St. Charles Pl. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>Stenton Pl. (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>Stockton (Cape May City)</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Cape May</td>
<td>Stockton (Cape May City)</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Cape May</td>
<td>Stockton (Cape May City)</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Cape May</td>
<td>Stockton (Cape May City)</td>
<td>9/4/08</td>
<td>9/5/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>Surf (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Cape May</td>
<td>Waverly Blvd (Ocean City)</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Preempt-other</td>
<td>Medical waste</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Beacon (Sea Girt)</td>
<td>6/1/08</td>
<td>6/2/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Beacon (Sea Girt)</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>----------------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------------</td>
<td>--------------</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Beacon (Sea Girt)</td>
<td>6/23/08</td>
<td>6/24/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Beacon (Sea Girt)</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Beacon (Sea Girt)</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Beacon (Sea Girt)</td>
<td>7/5/08</td>
<td>7/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Beacon (Sea Girt)</td>
<td>7/6/08</td>
<td>7/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Beacon (Sea Girt)</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Beacon (Sea Girt)</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Beacon (Sea Girt)</td>
<td>8/1/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Beacon (Sea Girt)</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Brown South (Spring Lake)</td>
<td>6/1/08</td>
<td>6/2/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Brown South (Spring Lake)</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Brown South (Spring Lake)</td>
<td>6/23/08</td>
<td>6/24/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Brown South (Spring Lake)</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Brown South (Spring Lake)</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Brown South (Spring Lake)</td>
<td>7/5/08</td>
<td>7/6/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Brown South (Spring Lake)</td>
<td>7/6/08</td>
<td>7/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Brown South (Spring Lake)</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Brown South (Spring Lake)</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Brown South (Spring Lake)</td>
<td>8/1/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Brown South (Spring Lake)</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>L Street Beach (Belmar)</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>L Street Beach (Belmar)</td>
<td>7/5/08</td>
<td>7/6/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>L Street Beach (Belmar)</td>
<td>7/6/08</td>
<td>7/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>L Street Beach (Belmar)</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>L Street Beach (Belmar)</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>L Street Beach (Belmar)</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>L Street Beach (Belmar)</td>
<td>8/1/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>L Street Beach (Belmar)</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>L Street Beach (Belmar)</td>
<td>8/16/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Ocean Beach Club (Long Branch)</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monmouth</td>
<td>The Terrace (Sea Girt)</td>
<td>6/1/08</td>
<td>6/2/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>The Terrace (Sea Girt)</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>The Terrace (Sea Girt)</td>
<td>6/23/08</td>
<td>6/24/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>The Terrace (Sea Girt)</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>The Terrace (Sea Girt)</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>The Terrace (Sea Girt)</td>
<td>7/5/08</td>
<td>7/6/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>The Terrace (Sea Girt)</td>
<td>7/6/08</td>
<td>7/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>The Terrace (Sea Girt)</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>The Terrace (Sea Girt)</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>The Terrace (Sea Girt)</td>
<td>8/1/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>The Terrace (Sea Girt)</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------</td>
<td>--------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------------</td>
<td>-------------</td>
</tr>
<tr>
<td>Monmouth</td>
<td>Thomson (Leonardo)</td>
<td>6/23/08</td>
<td>6/24/08</td>
<td>Preempt-other</td>
<td>Fuel spill</td>
</tr>
<tr>
<td>Monmouth</td>
<td>York Avenue (Spring Lake)</td>
<td>6/1/08</td>
<td>6/2/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>York Avenue (Spring Lake)</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>York Avenue (Spring Lake)</td>
<td>6/23/08</td>
<td>6/24/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>York Avenue (Spring Lake)</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>York Avenue (Spring Lake)</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>York Avenue (Spring Lake)</td>
<td>7/5/08</td>
<td>7/6/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>York Avenue (Spring Lake)</td>
<td>7/6/08</td>
<td>7/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>York Avenue (Spring Lake)</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>York Avenue (Spring Lake)</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>York Avenue (Spring Lake)</td>
<td>8/1/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monmouth</td>
<td>York Avenue (Spring Lake)</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Ocean</td>
<td>Beachwood Beach West (Beachwood)</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Beachwood Beach West (Beachwood)</td>
<td>6/19/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Beachwood Beach West (Beachwood)</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Beachwood Beach West (Beachwood)</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Beachwood Beach West (Beachwood)</td>
<td>7/4/08</td>
<td>7/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Beachwood Beach West (Beachwood)</td>
<td>7/5/08</td>
<td>7/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Beachwood Beach West (Beachwood)</td>
<td>7/6/08</td>
<td>7/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Maxon (Pt Pleasant)</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Maxon (Pt Pleasant)</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Maxon (Pt Pleasant)</td>
<td>7/30/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Maxon (Pt Pleasant)</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Maxon (Pt Pleasant)</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Maxon (Pt Pleasant)</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Money Island (Dover)</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Money Island (Dover)</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>River (Pt Pleasant)</td>
<td>7/30/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>River (Pt Pleasant)</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>River (Pt Pleasant)</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>River (Pt Pleasant)</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>River (Pt Pleasant)</td>
<td>8/14/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Station Ave (Pine Beach )</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Station Ave (Pine Beach )</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Wildwood (Ocean Gate)</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Wildwood (Ocean Gate)</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Windward Beach (Brick)</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Windward Beach (Brick)</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Windward Beach (Brick)</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Windward Beach (Brick)</td>
<td>7/30/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ocean</td>
<td>Windward Beach (Brick)</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

NJ.15 Natural Resources Defense Council
<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ocean</td>
<td>Windward Beach (Brick)</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** Preempt-other, Preemptive due to reasons not listed here; Preempt-rain, Preemptive due to rainfall; Preempt-sew, Preemptive due to sewage discharge or spill; Sanitary-sew-over, Sanitary sewer overflow.

**Notes**

1 Virginia Loftin, New Jersey Department of Environmental Protection, personal communication, May 2009.
3 Virginia Loftin, New Jersey Department of Environmental Protection, personal communication, June 2009.
New York is the only state in the nation with ocean, estuarine, and Great Lakes coastline. There are 127 miles of Atlantic Ocean coastline, 231 miles of shorefront on Long Island Sound, 548 miles of Long Island bayfront, and 83 miles of shorefront on islands off the Long Island coast. In addition to these marine waters, there are at least 200 miles of freshwater shoreline on Lake Erie and Lake Ontario. The state of New York has more than 318 Great Lakes and marine beaches. Most of these beaches are on Atlantic waters; only 39 are on Lake Erie or Lake Ontario. Great Lakes shoreline is found in Cayuga, Chautauqua, Erie, Jefferson, Monroe, Niagara, Orleans, Oswego, and Wayne Counties. All of these counties have Great Lakes beaches except for Orleans County. Beaches on Atlantic waters are found in Bronx, Kings, Nassau, Queens, Richmond, Suffolk, and Westchester Counties.

The coastal beach monitoring program in New York is administered by the New York State Department of Health in conjunction with eight county health departments, the New York City Department of Health and Mental Hygiene, the New York State Office of Parks, Recreation, and Historic Preservation, and one State Health Department District Office. New York State establishes water quality standards for public bathing beachwater through Subpart 6-2 of the State Sanitary Code. Sampling practices, locations, and notification protocols for coastal beaches in the state have been established by each of the administering agency’s 11 contractors in accordance with the U.S. EPA guidance criteria for the requirements of the BEACH Act grant. New York monitors water quality at inland beaches as well as coastal beaches; this summary includes only information about the state’s coastal (including Great Lakes) beachwater quality monitoring program.

The monitoring season generally extends from May to September. Severe storms in 2008 contributed to a significant number of both marine and Great Lakes beach closings.

More than 70 percent of New York City’s 6,000 miles of sewer system are combined with stormwater pipes, which can discharge a mixture of rainfall runoff and raw sewage into area waterways during and immediately after precipitation. These excess flows contain floating debris made up of litter and toilet-generated waste such as hygiene products, as well as heavy pollutant loads. When discharged to the New York/New Jersey Harbor Complex, the floating debris tends to collect into slicks that can wash up on beaches. The multi-agency Floatables Action Plan employs several means of controlling floating debris, such as: helicopter surveillance to locate slicks, skimmer vessels fitted with nets that collect floating debris, floating booms that trap debris near sewer-system discharge points for later collection, and sewer-system improvements intended to maximize the ability to retain floating debris. These methods have prevented tons of floating debris from reaching area beaches.

At this time, many of the state’s jurisdictions have ongoing sanitary survey projects targeting beaches with a history of water quality exceedances. These sanitary surveys will identify sources of elevated indicator organism levels. They are being conducted at Point Gratiot, Wright Park East/West, Main Street, and Lake Erie State Beaches in Chautauqua County, Hamburg Bathing, Evans Town Park, Lake Erie, Wendt, and Woodlawn Beaches in Erie County, Durand Beach in Monroe County, Fair Haven Beach in Cayuga County, and Benjamins, Centerport Yacht Club, and Valley Grove Beaches in Suffolk County.

New York City’s beach monitoring program maintains a website that provides the public with information about how to keep the beaches clean. This website has information about what can be done while at the beach as well as landscaping and cleaning practices at home that can influence beachwater quality.

The EPA’s Helicopter Surveillance Program monitors algal blooms along the New York City coastline during the bathing season. Information about blooms is communicated to the New York City beach program and is considered when making
The EPA also monitors the Atlantic coastline of Nassau and Suffolk Counties for algal blooms. Some jurisdictions use algal density in beach operation protocol due to water clarity/bather surveillance concerns (high concentrations of algae can make it difficult for rescue personnel to see swimmers in the water). New York State received a $347,300 federal BEACH Act grant in 2008 and was eligible for a $348,000 grant in 2009. In general, BEACH Act grant funding is not adequate to fully fund the program, and contracting entities support portions of the program.

### Standards

**Indicator Organisms:** Enterococcus and *E. coli*

**Standards:** For marine beaches, New York uses an enterococcus single-sample maximum of 104 cfu/100 ml. For freshwater beaches, New York uses an *E. coli* single-sample maximum of 235 cfu/100 ml or 61 cfu/100 ml for enterococcus.

All of the counties with marine beaches and most of the counties with Great Lakes beaches issue preemptive rain advisories or other preemptive advisories. The table below includes some examples of the standards for preemptive advisories that are in place in New York.

<table>
<thead>
<tr>
<th>Agency</th>
<th>Preemptive Standard</th>
</tr>
</thead>
<tbody>
<tr>
<td>New York State Office of Parks, Recreation, and Historic Preservation</td>
<td>Rainfall: Greater than 0.5 inch of rain in 24 hours; used only at selected beaches. Guideline only, not an adopted state standard.</td>
</tr>
<tr>
<td>New York City Department of Health, Public Health Engineering</td>
<td>Rainfall: All Bronx private beaches and Douglaston: threshold levels of 0.2 inch per 2 hours or 0.4 inch per 24 hours (advisory duration is 48 hours). Kiddie/Gerritsen: threshold levels of 0.2 inch per 2 hours or 0.4 inch per 24 hours (advisory duration is 72 hours). For Kingsborough Community College, Manhattan, Midland, and South Beach: 1.5 inches per 6 hours threshold of rainfall (advisory duration is 12 hours). Other: When there is a known sewage spill.</td>
</tr>
<tr>
<td>Suffolk County Department of Health Services</td>
<td>Other: Debris on beach, unusual or massive algal blooms, sewage treatment plant malfunction, septic system malfunction, spills, unusual levels of seabather eruptions, or other symptomology.</td>
</tr>
<tr>
<td>Westchester County Health Department</td>
<td>Rainfall: For five beaches within Mamaroneck Harbor and two beaches within Echo Bay, New Rochelle: for 0.5 inches of rain within 24 hours beaches must close for 1 day; for 1 inch of rain within 24 hours beaches must close for 2 days; for greater than 2 inches of rain, the department will make a determination for the beach closure duration.</td>
</tr>
<tr>
<td>Monroe County Health Laboratory</td>
<td>Monroe County has been using a preemptive model since 1973 based on measurements of rainfall, flow of the Genesee River, turbidity, algae and other organic debris.</td>
</tr>
</tbody>
</table>

At beaches in New York, a sanitation and safety survey or investigation that reveals the presence of floatable debris, medical/infectious waste or toxic contaminants, petroleum products, and/or other contamination on the beach or evidence of sewage and wastewater discharge can trigger an advisory or closing. Some jurisdictions monitor for fecal and total coliform to supplement enterococcus or *E. coli* monitoring. The results are not used for beach actions.

Several of New York's contracting entities have developed models of various designs and complexity for their beaches. For example, the Interstate Environmental Commission has developed an extensive hydrodynamic loading model that is integrated into the beach monitoring and notification programs of the New York City Department of Health & Mental Hygiene and the Westchester, Nassau and Suffolk County Health Departments.

### Monitoring

**Determination of Monitoring Locations and Frequency:** Monitoring locations and sampling frequency are determined by a variety of factors, including, but not limited to, potential pollution sources, historical water quality and physical
characteristics of the beach property. Samples taken as part of sanitary surveys and special studies may be taken at outfalls and other sources.4

**Practice:** Sample collection methods are performed in accordance with EPA guidance criteria and approved laboratory method procedures. The days of the week and availability of sample results vary by jurisdiction and may vary by beach.4 In New York City, sample collection is generally performed in the morning on weekdays. Water samples are collected in approximately three feet of water at a depth of 18 inches. Results are available 24 hours after the sample reaches the lab for analysis. Routine samples are generally collected early in the week, and resamples occur later in the week as needed.6

**Results:** In 2008, New York reported 365 coastal beaches, 1 (<1%) of which was monitored daily, 25 (7%) more than once a week, 167 (46%) once a week, 41 (11%) every other week, 119 (33%) once a month, and 12 beaches where public access was prohibited (3%) were not monitored. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 8 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Krull Park in Niagara County (42%), Tanner Park in Suffolk County (41%), Pultneyville Mariners Beach in Wayne County (37%), Woodlawn Beach, Woodlawn Beach State Park in Erie County (34%), Sunset Bay Beach Club (32%) and Lake Erie State Park Beach (32%) in Chautauqua County, Ontario Beach in Monroe County (30%), Minasseroke Beach in Suffolk County (29%), and Evans Town Park (29%) and Lake Erie Beach (26%) in Erie County.

Niagara County had the highest percent exceedance rate in 2008 (29%), followed by Wayne (26%), Monroe (24%), Erie (22%), Chautauqua (21%), Westchester (8%), Cayuga (7%), Suffolk (7%), Queens (6%), Nassau (5%), Richmond (4%), Jefferson (3%), Kings (2%), Bronx (1%), and Oswego (0%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 304 beaches, the percent of samples exceeding the standard in 2008 was 8 percent, the lowest since 2005 (11 percent in 2007, 9 percent in 2006 and 10 percent in 2005).

<table>
<thead>
<tr>
<th>2008 New York Monitoring Frequency and Results by Beach</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>County</strong></td>
</tr>
<tr>
<td>Bronx</td>
</tr>
<tr>
<td>Bronx</td>
</tr>
<tr>
<td>Bronx</td>
</tr>
<tr>
<td>Bronx</td>
</tr>
<tr>
<td>Bronx</td>
</tr>
<tr>
<td>Bronx</td>
</tr>
<tr>
<td>Bronx</td>
</tr>
<tr>
<td>Bronx</td>
</tr>
<tr>
<td>Bronx</td>
</tr>
<tr>
<td>Bronx</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>--------------</td>
</tr>
<tr>
<td>Cayuga</td>
</tr>
<tr>
<td>Chautauqua</td>
</tr>
<tr>
<td>Chautauqua</td>
</tr>
<tr>
<td>Chautauqua</td>
</tr>
<tr>
<td>Chautauqua</td>
</tr>
<tr>
<td>Chautauqua</td>
</tr>
<tr>
<td>Chautauqua</td>
</tr>
<tr>
<td>Chautauqua</td>
</tr>
<tr>
<td>Chautauqua</td>
</tr>
<tr>
<td>Chautauqua</td>
</tr>
<tr>
<td>Erie</td>
</tr>
<tr>
<td>Erie</td>
</tr>
<tr>
<td>Erie</td>
</tr>
<tr>
<td>Erie</td>
</tr>
<tr>
<td>Erie</td>
</tr>
<tr>
<td>Erie</td>
</tr>
<tr>
<td>Erie</td>
</tr>
<tr>
<td>Erie</td>
</tr>
<tr>
<td>Erie</td>
</tr>
<tr>
<td>Erie</td>
</tr>
<tr>
<td>Jefferson</td>
</tr>
<tr>
<td>Jefferson</td>
</tr>
<tr>
<td>Jefferson</td>
</tr>
<tr>
<td>Kings</td>
</tr>
<tr>
<td>Kings</td>
</tr>
<tr>
<td>Kings</td>
</tr>
<tr>
<td>Kings</td>
</tr>
<tr>
<td>Kings</td>
</tr>
<tr>
<td>Kings</td>
</tr>
<tr>
<td>Kings</td>
</tr>
<tr>
<td>Kings</td>
</tr>
<tr>
<td>Kings</td>
</tr>
<tr>
<td>Kings</td>
</tr>
<tr>
<td>Kings</td>
</tr>
<tr>
<td>Monroe</td>
</tr>
<tr>
<td>Monroe</td>
</tr>
<tr>
<td>Monroe</td>
</tr>
<tr>
<td>Monroe</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>-------------</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>----------</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Nassau</td>
</tr>
<tr>
<td>Niagara</td>
</tr>
<tr>
<td>Niagara</td>
</tr>
<tr>
<td>Oswego</td>
</tr>
<tr>
<td>Oswego</td>
</tr>
<tr>
<td>Oswego</td>
</tr>
<tr>
<td>Oswego</td>
</tr>
<tr>
<td>Oswego</td>
</tr>
<tr>
<td>Oswego</td>
</tr>
<tr>
<td>Oswego</td>
</tr>
<tr>
<td>Queens</td>
</tr>
<tr>
<td>Queens</td>
</tr>
<tr>
<td>Queens</td>
</tr>
<tr>
<td>Queens</td>
</tr>
<tr>
<td>Queens</td>
</tr>
<tr>
<td>Queens</td>
</tr>
<tr>
<td>Queens</td>
</tr>
<tr>
<td>Queens</td>
</tr>
<tr>
<td>Queens</td>
</tr>
<tr>
<td>Queens</td>
</tr>
<tr>
<td>Queens</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>----------------</td>
</tr>
<tr>
<td>Richmond</td>
</tr>
<tr>
<td>Richmond</td>
</tr>
<tr>
<td>Richmond</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>-----------</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>---------</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>-----------</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>--------------</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Suffolk</td>
</tr>
<tr>
<td>Wayne</td>
</tr>
</tbody>
</table>
### County Beach Tier Monitoring Frequency Total Samples Percent Exceedance

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wayne</td>
<td>Sodus Point Lake Side</td>
<td>3</td>
<td>1/wk</td>
<td>9</td>
<td>22%</td>
</tr>
<tr>
<td>Wayne</td>
<td>Sodus Point Park Bayside</td>
<td>3</td>
<td>1/wk</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Shore Acres Club</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>22%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Hudson Park</td>
<td>1</td>
<td>1/wk</td>
<td>36</td>
<td>17%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Harbor Island Beach</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>13%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Mamaroneck Beach and Cabana Club</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>11%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Rye Town Park-Oakland Beach</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>11%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Surf Club</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>11%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Beckwithe Pointe</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>11%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Greentree Club</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>6%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Orienta Beach Club</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Rye Playland Beach</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Beach Point Club</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Larchmont Manor Park</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Coveleigh Beach Club</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Westchester Country Club Beach</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Vip Club</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Manunsing Island Club</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Shenorock Shore Club</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Glen Island Park</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Echo Bay Yacht Club</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>5%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Davenport Club</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Westchester</td>
<td>American Yacht Club</td>
<td>2</td>
<td>1/wk</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Larchmont Shore Club</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Westchester</td>
<td>Isle of San Socecci</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Westchester</td>
<td>New Rochelle Rowing Club</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Westchester</td>
<td>Marinas Edge</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>

N/A: Not applicable

### Closings and Advisories

**Closing/Advisory Issuance:** Both closings and advisories are issued for beaches in the state. Whether or not geometric mean standards are applied when making closing and advisory decisions depends on the local beach authority. New York City applies a geometric mean standard for enterococcus of 35 cfu/100 ml for a series of five or more samples collected during a 30-day period.3

When monitoring of water at beaches shows that levels of certain bacteria exceed standards, New York's beach managers either notify the public or resample if there is reason to doubt the validity of the original sample result. Resampling is performed no more than 48 hours after the routine monitoring results indicated an exceedance. If the resample exceeds the water quality standard, public notification occurs. This notification is in the form of a sign or functionally equivalent communication measure stating the type of advisory or closing and the reason it was issued (heavy rainfall, high levels of bacteria, etc.). The agencies with immediate regulatory jurisdiction over each beach may utilize a variety of different mechanisms to notify the public after an exceedance. Signs are located where they are most likely to be noticed by beach users. They are placed at beach entrances, on bulletin boards, or in the general
vicinity of the common swimming areas. Functionally equivalent communication measures include mass media, such as newspapers, television and radio, Internet web sites, telephone hotlines, and technical reports.2

New York City does not issue an advisory or closing based solely on monitoring results. It uses administrative review and management tools when evaluating beach status for the determination of the correct regulatory action. New York City conducts a resample or issues an advisory or closing after analyzing ongoing water quality trends, historical water quality data, reports of pollution events, and other factors that may be affecting the beach, including animal waste, septic or sewage disposal systems, and illegal sewage connections.6 In New York City, signs must be posted for the duration of closing and advisory events. A website and a hotline are also maintained.5 Generally, advisory and closings in New York City apply to entire beaches rather than sections of a beach.6

Reopening Procedures: Reopening procedures may vary by beach and may be dependent on a variety of factors, including monitoring results, modeling protocol and environmental data.4 In New York City, if a beach is placed under advisory or closed, in addition to routine water testing, resampling is conducted to assess the water quality conditions. Additional sampling may occur on a case-by-case basis.6

Number of Closings and Advisories: New York had 846 closing/advisory events lasting six consecutive weeks or less in 2008. Total closing/advisory days for 846 events lasting six consecutive weeks or less increased 4 percent to 1,610 days in 2008 from 1,547 days in 2007, 1,280 days in 2006, and 827 days in 2005. In addition, there were two extended events (141 days total) and no permanent events in 2008. Extended events are those in effect more than 6 consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. In 2007, there were no extended or permanent events.

Causes of Closings and Advisories: For events lasting six consecutive weeks or less, 33% (524) of closing/advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, 66% (1,058) were preemptive (i.e. without waiting for monitoring results) due to heavy rainfall, <1% (1) was preemptive due to known sewage spills/leaks, and 2% (27) were preemptive due to other reasons.

The reported sources of beachwater contamination for 2008 are as follows: 8% (135) of closing/advisory days were from unknown sources of contamination, 84% (1,355) were from stormwater runoff, 20% (328) were from sewage spills/leaks, and 5% (80) were from other sources of contamination. Totals exceed 100 percent because more than one source of contamination was reported for some events.

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>State Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bronx</td>
<td>American Turners</td>
<td>6/1/08</td>
<td>6/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bronx</td>
<td>American Turners</td>
<td>6/9/08</td>
<td>6/11/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bronx</td>
<td>American Turners</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>American Turners</td>
<td>6/29/08</td>
<td>7/2/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>American Turners</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>American Turners</td>
<td>7/23/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>American Turners</td>
<td>8/3/08</td>
<td>8/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------------</td>
<td>----------------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------------</td>
<td>------------------------------</td>
</tr>
<tr>
<td>Bronx</td>
<td>American Turners</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>American Turners</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>American Turners</td>
<td>8/15/08</td>
<td>8/18/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>American Turners</td>
<td>8/30/08</td>
<td>9/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>6/1/08</td>
<td>6/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>6/4/08</td>
<td>6/6/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>6/9/08</td>
<td>6/11/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>6/29/08</td>
<td>7/2/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>7/23/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>8/3/08</td>
<td>8/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>8/15/08</td>
<td>8/18/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>8/30/08</td>
<td>9/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>9/6/08</td>
<td>9/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>9/9/08</td>
<td>9/11/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Danish American Beach Club</td>
<td>9/13/08</td>
<td>9/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>6/1/08</td>
<td>6/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>6/4/08</td>
<td>6/6/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>6/9/08</td>
<td>6/11/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>6/29/08</td>
<td>7/2/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>7/23/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------------</td>
<td>-------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------</td>
<td>--------------------------------</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>8/3/08</td>
<td>8/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>8/15/08</td>
<td>8/18/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>8/30/08</td>
<td>9/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>9/6/08</td>
<td>9/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>9/9/08</td>
<td>9/11/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Manhem Beach Club</td>
<td>9/13/08</td>
<td>9/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>6/1/08</td>
<td>6/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>6/4/08</td>
<td>6/6/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>6/9/08</td>
<td>6/11/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>6/12/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>6/29/08</td>
<td>7/2/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>7/23/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>8/3/08</td>
<td>8/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>8/15/08</td>
<td>8/18/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>8/30/08</td>
<td>9/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>9/6/08</td>
<td>9/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>9/9/08</td>
<td>9/11/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Morris Yacht and Beach Club</td>
<td>9/13/08</td>
<td>9/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Schuyler Hill Civic Association</td>
<td>6/1/08</td>
<td>6/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bronx</td>
<td>Schuyler Hill Civic Association</td>
<td>6/4/08</td>
<td>6/6/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Schuyler Hill Civic Association</td>
<td>6/9/08</td>
<td>6/11/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------------</td>
<td>-------------------------------</td>
</tr>
<tr>
<td>Bronx</td>
<td>Schuyler Hill Civic Association</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Schuyler Hill Civic Association</td>
<td>6/29/08</td>
<td>7/2/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Schuyler Hill Civic Association</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Schuyler Hill Civic Association</td>
<td>7/23/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Schuyler Hill Civic Association</td>
<td>8/3/08</td>
<td>8/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Schuyler Hill Civic Association</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Schuyler Hill Civic Association</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Schuyler Hill Civic Association</td>
<td>8/15/08</td>
<td>8/18/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Schuyler Hill Civic Association</td>
<td>8/30/08</td>
<td>9/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>6/1/08</td>
<td>6/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>6/4/08</td>
<td>6/6/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>6/9/08</td>
<td>6/11/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>6/29/08</td>
<td>7/2/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>7/23/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>8/3/08</td>
<td>8/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>8/15/08</td>
<td>8/18/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>8/30/08</td>
<td>9/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>9/6/08</td>
<td>9/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>9/9/08</td>
<td>9/11/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>Trinity Danish Young People’s Society</td>
<td>9/13/08</td>
<td>9/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>6/1/08</td>
<td>6/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>----------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------------</td>
<td>------------------------------</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>6/4/08</td>
<td>6/6/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>6/9/08</td>
<td>6/11/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>6/29/08</td>
<td>7/2/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>7/23/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>8/3/08</td>
<td>8/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>8/15/08</td>
<td>8/18/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>8/30/08</td>
<td>9/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>9/6/08</td>
<td>9/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>9/9/08</td>
<td>9/11/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Bronx</td>
<td>White Cross Fish Club</td>
<td>9/13/08</td>
<td>9/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Cayuga</td>
<td>Fair Haven Beach State Park</td>
<td>6/11/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Cayuga</td>
<td>Fair Haven Beach State Park</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cayuga</td>
<td>Fair Haven Beach State Park</td>
<td>7/26/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cayuga</td>
<td>Fair Haven Beach State Park</td>
<td>7/30/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cayuga</td>
<td>Fair Haven Beach State Park</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Blue Water Beach</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>6/18/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>6/24/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>7/1/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>7/4/08</td>
<td>7/5/08</td>
<td>Preempt-rain</td>
<td>Other</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>7/8/08</td>
<td>7/10/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>7/10/08</td>
<td>7/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>7/12/08</td>
<td>7/16/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>7/20/08</td>
<td>7/23/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>8/2/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>8/4/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------------</td>
<td>-------------</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>8/10/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Lake Erie State Park Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Main Street Beach</td>
<td>7/11/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Point Gratiot Beach</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Point Gratiot Beach</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Point Gratiot Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Wright Park East</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Wright Park East</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Wright Park East</td>
<td>8/8/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Wright Park West</td>
<td>7/1/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Chautauqua</td>
<td>Wright Park West</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bennett Beach</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Bennett Beach</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Erie</td>
<td>Bennett Beach</td>
<td>7/19/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Bennett Beach</td>
<td>8/9/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Evans Town Park</td>
<td>6/28/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Evans Town Park</td>
<td>7/10/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Evans Town Park</td>
<td>7/15/08</td>
<td>7/19/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Evans Town Park</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Evans Town Park</td>
<td>7/31/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Evans Town Park</td>
<td>8/8/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Evans Town Park</td>
<td>8/13/08</td>
<td>8/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Hamburg Bathing Beach</td>
<td>6/10/08</td>
<td>6/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Hamburg Bathing Beach</td>
<td>6/16/08</td>
<td>6/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Hamburg Bathing Beach</td>
<td>6/29/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Hamburg Bathing Beach</td>
<td>7/3/08</td>
<td>7/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Hamburg Bathing Beach</td>
<td>7/10/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Hamburg Bathing Beach</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Hamburg Bathing Beach</td>
<td>7/20/08</td>
<td>7/21/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Hamburg Bathing Beach</td>
<td>7/26/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Hamburg Bathing Beach</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Lake Erie Beach</td>
<td>6/28/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Lake Erie Beach</td>
<td>7/17/08</td>
<td>7/19/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Lake Erie Beach</td>
<td>7/24/08</td>
<td>7/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Lake Erie Beach</td>
<td>8/8/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Lake Erie Beach</td>
<td>8/13/08</td>
<td>8/14/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Pioneer Camp</td>
<td>7/3/08</td>
<td>7/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>St. Vincent Depaul Beach</td>
<td>7/8/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>St. Vincent Depaul Beach</td>
<td>7/8/08</td>
<td>7/10/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>------------------</td>
<td>-----------------------------</td>
</tr>
<tr>
<td>Erie</td>
<td>St. Vincent Depaul Beach</td>
<td>7/16/08</td>
<td>7/19/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Erie</td>
<td>St. Vincent Depaul Beach</td>
<td>7/20/08</td>
<td>7/28/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>St. Vincent Depaul Beach</td>
<td>8/8/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Wendt Beach</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Wendt Beach</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Erie</td>
<td>Wendt Beach</td>
<td>7/17/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Wendt Beach</td>
<td>8/11/08</td>
<td>8/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>6/11/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>6/14/08</td>
<td>6/15/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>6/17/08</td>
<td>6/19/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>6/19/08</td>
<td>6/21/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>6/22/08</td>
<td>6/23/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>6/29/08</td>
<td>7/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>7/3/08</td>
<td>7/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>7/4/08</td>
<td>7/6/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>7/9/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Preempt-sew</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>7/23/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>7/25/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>7/29/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>8/2/08</td>
<td>8/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>8/4/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>------------</td>
<td>---------------------------------</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>8/10/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>8/12/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>8/17/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>8/24/08</td>
<td>8/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>8/25/08</td>
<td>8/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Woodlawn Beach-Woodlawn Beach State Park</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kings</td>
<td>Gerritsen/Kiddie Beach</td>
<td>6/1/08</td>
<td>6/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Kings</td>
<td>Gerritsen/Kiddie Beach</td>
<td>6/9/08</td>
<td>6/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Kings</td>
<td>Gerritsen/Kiddie Beach</td>
<td>6/14/08</td>
<td>6/19/08</td>
<td>Preempt-rain</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Kings</td>
<td>Gerritsen/Kiddie Beach</td>
<td>6/29/08</td>
<td>7/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Kings</td>
<td>Gerritsen/Kiddie Beach</td>
<td>7/14/08</td>
<td>7/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Kings</td>
<td>Gerritsen/Kiddie Beach</td>
<td>7/22/08</td>
<td>7/27/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Kings</td>
<td>Gerritsen/Kiddie Beach</td>
<td>7/28/08</td>
<td>8/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Kings</td>
<td>Gerritsen/Kiddie Beach</td>
<td>8/3/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Kings</td>
<td>Gerritsen/Kiddie Beach</td>
<td>8/11/08</td>
<td>8/14/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Kings</td>
<td>Gerritsen/Kiddie Beach</td>
<td>8/15/08</td>
<td>8/19/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Kings</td>
<td>Gerritsen/Kiddie Beach</td>
<td>8/30/08</td>
<td>9/2/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Kings</td>
<td>Kingsborough Community College</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Kings</td>
<td>Kingsborough Community College</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Kings</td>
<td>Manhattan Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Kings</td>
<td>Manhattan Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>5/31/08</td>
<td>6/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>6/13/08</td>
<td>6/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>6/28/08</td>
<td>6/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------------</td>
<td>-------------------------------</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>7/20/08</td>
<td>7/22/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>7/26/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>7/29/08</td>
<td>7/30/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>7/30/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>8/2/08</td>
<td>8/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>8/4/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>8/7/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>8/10/08</td>
<td>8/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>8/16/08</td>
<td>8/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Durand Beach</td>
<td>8/25/08</td>
<td>8/27/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Monroe</td>
<td>Hamlin Beach Area 4</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Monroe</td>
<td>Hamlin Beach Area 4</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monroe</td>
<td>Hamlin Beach Area 4</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Monroe</td>
<td>Hamlin Beach Area 4</td>
<td>8/25/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Monroe</td>
<td>Hamlin Beach Area 4</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Monroe</td>
<td>Hamlin Beach State Park-Area 3</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Monroe</td>
<td>Hamlin Beach State Park-Area 3</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monroe</td>
<td>Hamlin Beach State Park-Area 3</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Monroe</td>
<td>Hamlin Beach State Park-Area 3</td>
<td>8/25/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Monroe</td>
<td>Hamlin Beach State Park-Area 3</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>7/5/08</td>
<td>7/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>7/16/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>7/20/08</td>
<td>7/22/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>7/25/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>7/28/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>8/1/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>8/7/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>------------------------</td>
<td>------------</td>
<td>-----------</td>
<td>-------------</td>
<td>-----------</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>8/14/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>8/16/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>8/25/08</td>
<td>8/26/08</td>
<td>Preempt-other</td>
<td>Other</td>
</tr>
<tr>
<td>Monroe</td>
<td>Ontario Beach</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nassau</td>
<td>Bar Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Bar Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Bar Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Bar Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Bar Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Bar Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Bar Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Biltmore Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Biltmore Beach</td>
<td>7/18/08</td>
<td>8/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nassau</td>
<td>Biltmore Beach</td>
<td>8/14/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nassau</td>
<td>Biltmore Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Centre Island Bay Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Centre Island Bay Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Centre Island Bay Beach</td>
<td>7/29/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Centre Island Bay Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Centre Island Bay Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Centre Island Bay Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Centre Island Bay Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Centre Island Sound Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Centre Island Sound Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Centre Island Sound Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Centre Island Sound Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Centre Island Sound Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Centre Island Sound Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Centre Island Sound Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Crescent Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Crescent Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Crescent Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Crescent Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Crescent Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Crescent Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Crescent Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Hewlett Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Hewlett Beach</td>
<td>7/23/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------------</td>
<td>--------------------------</td>
<td>------------</td>
<td>----------</td>
<td>------------------</td>
<td>----------------</td>
</tr>
<tr>
<td>Nassau</td>
<td>Hewlett Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Hewlett Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Hewlett Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Inc. Village of Laurel Hollow</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Inc. Village of Laurel Hollow</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Inc. Village of Laurel Hollow</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Inc. Village of Laurel Hollow</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Inc. Village of Laurel Hollow</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Inc. Village of Laurel Hollow</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Inc. Village of Laurel Hollow</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Island Park Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Island Park Beach</td>
<td>7/23/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Island Park Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Island Park Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Island Park Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Jones Beach-Zach’s Bay</td>
<td>6/5/08</td>
<td>6/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Lattington Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Lattington Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Lattington Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Lattington Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Lattington Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Lattington Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Lattington Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Merrick Estates Civic Association</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Morgan Memorial Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Morgan Memorial Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Morgan Memorial Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Morgan Memorial Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Morgan Memorial Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Morgan Memorial Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Morgan Memorial Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Philip Healey</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nassau</td>
<td>Philip Healey</td>
<td>7/23/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Philip Healey</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Philip Healey</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Philip Healey</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Piping Rock Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Piping Rock Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Piping Rock Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Piping Rock Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
</tbody>
</table>
## Testing the Waters 2009

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>State Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nassau</td>
<td>Piping Rock Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Piping Rock Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Piping Rock Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Piping Rock Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Prybil Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Prybil Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Prybil Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Prybil Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Prybil Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Prybil Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Prybil Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Ransom Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Ransom Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Ransom Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Ransom Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Ransom Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Ransom Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Ransom Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Seacliff Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Seacliff Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Seacliff Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Seacliff Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Seacliff Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Seacliff Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Seacliff Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Soundside Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Soundside Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Soundside Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Soundside Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Soundside Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Soundside Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Soundside Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Soundside Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Stehli Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Stehli Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Stehli Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Stehli Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Stehli Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Stehli Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Stehli Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>--------------------------------</td>
<td>------------</td>
<td>-----------</td>
<td>-----------------</td>
<td>--------------</td>
</tr>
<tr>
<td>Nassau</td>
<td>Stehli Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Tappan Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Tappan Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Tappan Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Tappan Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Tappan Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Tappan Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Tappan Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>The Creek Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>The Creek Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>The Creek Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>The Creek Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>The Creek Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>The Creek Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>The Creek Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>The Creek Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Theodore Roosevelt Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Theodore Roosevelt Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Theodore Roosevelt Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Theodore Roosevelt Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Theodore Roosevelt Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Theodore Roosevelt Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Theodore Roosevelt Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>Theodore Roosevelt Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>West Harbor Memorial Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>West Harbor Memorial Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>West Harbor Memorial Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>West Harbor Memorial Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>West Harbor Memorial Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>West Harbor Memorial Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>West Harbor Memorial Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nassau</td>
<td>West Harbor Memorial Beach</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Niagara</td>
<td>Krull Park</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Niagara</td>
<td>Krull Park</td>
<td>7/1/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Niagara</td>
<td>Krull Park</td>
<td>7/22/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Niagara</td>
<td>Wilson-Tuscarora State Park Beach</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Niagara</td>
<td>Wilson-Tuscarora State Park Beach</td>
<td>8/17/08</td>
<td>8/19/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Queens</td>
<td>Breezy Point 219th Street</td>
<td>6/5/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Queens</td>
<td>Douglas Manor</td>
<td>6/1/08</td>
<td>6/3/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Septic</td>
</tr>
<tr>
<td>Queens</td>
<td>Douglas Manor</td>
<td>6/4/08</td>
<td>6/6/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Septic, Comb-sew-overflow</td>
</tr>
<tr>
<td>Queens</td>
<td>Douglas Manor</td>
<td>6/9/08</td>
<td>6/11/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Septic</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------------</td>
<td>-------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------------------------</td>
<td>---------------------------------------------</td>
</tr>
<tr>
<td>Queens</td>
<td>Douglas Manor</td>
<td>6/12/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Queens</td>
<td>Douglas Manor</td>
<td>6/13/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Septic</td>
</tr>
<tr>
<td>Queens</td>
<td>Douglas Manor</td>
<td>7/23/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Queens</td>
<td>Douglas Manor</td>
<td>8/3/08</td>
<td>8/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Queens</td>
<td>Douglas Manor</td>
<td>8/6/08</td>
<td>8/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Queens</td>
<td>Douglas Manor</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Queens</td>
<td>Douglas Manor</td>
<td>8/15/08</td>
<td>8/18/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Queens</td>
<td>Douglas Manor</td>
<td>8/30/08</td>
<td>9/1/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Queens</td>
<td>Douglas Manor</td>
<td>9/6/08</td>
<td>9/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Queens</td>
<td>Douglas Manor</td>
<td>9/9/08</td>
<td>9/11/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Queens</td>
<td>Douglas Manor</td>
<td>9/13/08</td>
<td>9/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Richmond</td>
<td>Midland Beach/South Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Richmond</td>
<td>Midland Beach/South Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Richmond</td>
<td>South Beach</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater, Comb-sew-overflow</td>
</tr>
<tr>
<td>Richmond</td>
<td>Wolfe’s Pond Park</td>
<td>8/1/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Amityville Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Amityville Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Amityville Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Amityville Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Asharoken Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Asharoken Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Asharoken Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Asharoken Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Asharoken Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bay Hills Poa</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bay Hills Poa</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bay Hills Poa</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bay Hills Poa</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bay Hills Poa</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayberry Beach and Tennis Club</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayberry Beach and Tennis Club</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayberry Beach and Tennis Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------------</td>
<td>-------------</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayberry Beach and Tennis Club</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayberry Cove Beach</td>
<td>7/7/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayberry Cove Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayberry Cove Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayberry Cove Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayberry Cove Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayberry Cove Beach</td>
<td>8/15/08</td>
<td>8/25/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayberry Cove Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Baycrest Association Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Baycrest Association Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Baycrest Association Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Baycrest Association Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Baycrest Association Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayport Beach</td>
<td>7/23/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayport Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayport Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayview Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayview Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayview Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Bayview Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Beech Road Beach</td>
<td>6/23/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Beech Road Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Beech Road Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Beech Road Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Beech Road Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Benjamins Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Benjamins Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Benjamins Beach</td>
<td>7/30/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Benjamins Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Benjamins Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Brightwaters Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Brightwaters Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Brightwaters Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Brightwaters Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Broadway Beach Broadway Beach</td>
<td>6/25/08</td>
<td>6/30/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Broadway Beach Broadway Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Broadway Beach Broadway Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Broadway Beach Broadway Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Broadway Beach Broadway Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------------</td>
<td>----------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------</td>
<td>---------</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Broadway Beach Broadway Beach</td>
<td>8/15/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Broadway Beach Broadway Beach</td>
<td>8/22/08</td>
<td>8/25/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Broadway Beach Broadway Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Centerport Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Centerport Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Centerport Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Centerport Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Centerport Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Centerport Yacht Club</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Centerport Yacht Club</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Centerport Yacht Club</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Centerport Yacht Club</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Centerport Yacht Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Centerport Yacht Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Centerport Yacht Club</td>
<td>8/17/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Centerport Yacht Club</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Cold Spring Harbor Beach Club</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Cold Spring Harbor Beach Club</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Cold Spring Harbor Beach Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Cold Spring Harbor Beach Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Cold Spring Harbor Beach Club</td>
<td>8/12/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Cold Spring Harbor Beach Club</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Corey Creek Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Corey Creek Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Corey Creek Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Corey Creek Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Crab Meadow Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Crab Meadow Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Crab Meadow Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Crab Meadow Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Crab Meadow Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Crescent Beach-Suffolk</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Crescent Beach-Suffolk</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Crescent Beach-Suffolk</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Crescent Beach-Suffolk</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Crescent Beach-Suffolk</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Eagle Dock Community Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Eagle Dock Community Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Eagle Dock Community Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Eagle Dock Community Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Eagle Dock Community Beach</td>
<td>8/12/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------------</td>
<td>----------------</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Eagle Dock Community Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>East Islip Beach</td>
<td>7/1/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>East Islip Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>East Islip Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>East Islip Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>East Islip Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Fleets Cove Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Fleets Cove Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Fleets Cove Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Fleets Cove Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Fleets Cove Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Friendship Drive Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Friendship Drive Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Friendship Drive Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Friendship Drive Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Friendship Drive Beach</td>
<td>8/15/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Friendship Drive Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Gold Star Battalion Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Gold Star Battalion Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Gold Star Battalion Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Gold Star Battalion Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Gold Star Battalion Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Grantland Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Grantland Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Grantland Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Grantland Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Grantland Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Haven’s Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Haven’s Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Haven’s Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Haven’s Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Haven’s Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Head of the Bay Club</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Head of the Bay Club</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Head of the Bay Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Head of the Bay Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Head of the Bay Club</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Hobart Beach-Bay</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Hobart Beach-Bay</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Hobart Beach-Bay</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Hobart Beach-Bay</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------------</td>
<td>---------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------</td>
<td>---------------</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Hobart Beach-Bay</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Hobart Beach-Inlet</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Hobart Beach-Inlet</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Hobart Beach-Inlet</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Hobart Beach-Inlet</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Hobart Beach-Inlet</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Huntington Beach Community Assoc.</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Huntington Beach Community Assoc.</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Huntington Beach Community Assoc.</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Huntington Beach Community Assoc.</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Huntington Beach Community Assoc.</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Indian Field Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Indian Field Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Indian Field Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Indian Field Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Indian Field Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Islip Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Islip Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Islip Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Islip Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Knollwood Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Knollwood Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Knollwood Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Knollwood Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Knollwood Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Little Bay Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Little Bay Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Little Bay Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Little Bay Beach</td>
<td>8/9/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Little Bay Beach</td>
<td>8/15/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Little Bay Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Lloyd Harbor Village Park</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Lloyd Harbor Village Park</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Lloyd Harbor Village Park</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Lloyd Harbor Village Park</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Lloyd Harbor Village Park</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Long Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Long Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------</td>
<td>---------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------------</td>
<td>---------------</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Long Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Long Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Long Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Miller Place Park</td>
<td>7/1/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Miller Place Park</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Miller Place Park</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Miller Place Park</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Miller Place Park</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Miller Place Park</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Miller Place Park</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Minasseroke Beach</td>
<td>6/30/08</td>
<td>9/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Nathan Hale Beach Club</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Nathan Hale Beach Club</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Nathan Hale Beach Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Nathan Hale Beach Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Nathan Hale Beach Club</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Nissequogue Point Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Nissequogue Point Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Nissequogue Point Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Nissequogue Point Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Nissequogue Point Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Old Field Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Old Field Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Old Field Club</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Patchogue Village Pool and Beach Club</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Patchogue Village Pool and Beach Club</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Patchogue Village Pool and Beach Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Patchogue Village Pool and Beach Club</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Prices Bend Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Prices Bend Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Prices Bend Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Prices Bend Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Prices Bend Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sandspit Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sandspit Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sandspit Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sandspit Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sayville Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sayville Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>----------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------------</td>
<td>-------------</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sayville Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sayville Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sayville Marina Park</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sayville Marina Park</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sayville Marina Park</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sayville Marina Park</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sayville Marina Park</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Schubert Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Schubert Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Schubert Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Schubert Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Schubert Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Scotts Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Scotts Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Scotts Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Scotts Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Scotts Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Shoreham Shore Club</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Shoreham Shore Club</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Shoreham Shore Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Shoreham Shore Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Shoreham Shore Club</td>
<td>8/15/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Shoreham Shore Club</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Shoreham Village Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Shoreham Village Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Shoreham Village Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Shoreham Village Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Shoreham Village Beach</td>
<td>8/15/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Shoreham Village Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Short Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Short Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Short Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Short Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Short Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sound Beach POA East</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sound Beach POA East</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sound Beach POA East</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sound Beach POA East</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sound Beach POA East</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sound Beach POA West</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sound Beach POA West</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>----------------------</td>
<td>--------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>------------</td>
<td>----------</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sound Beach POA West</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sound Beach POA West</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Sound Beach POA West</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Soundview Beach Association</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Soundview Beach Association</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Soundview Beach Association</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Soundview Beach Association</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Soundview Beach Association</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Steers Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Steers Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Steers Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Steers Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Steers Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Stony Brook Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Stony Brook Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Stony Brook Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Stony Brook Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Stony Brook Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Stony Brook Yacht Club</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Stony Brook Yacht Club</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Stony Brook Yacht Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Stony Brook Yacht Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Stony Brook Yacht Club</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tanner Park</td>
<td>7/3/08</td>
<td>9/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Terraces on the Sound</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Terraces on the Sound</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Terraces on the Sound</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Terraces on the Sound</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Terraces on the Sound</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tides Property Owners Association</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tides Property Owners Association</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tides Property Owners Association</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tides Property Owners Association</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tides Property Owners Association</td>
<td>8/15/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Tides Property Owners Association</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Valley Grove Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Valley Grove Beach</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Valley Grove Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Valley Grove Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Valley Grove Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Valley Grove Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-------------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------</td>
<td>--------------</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Venetian Shores</td>
<td>7/6/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Venetian Shores</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Venetian Shores</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Venetian Shores</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Venetian Shores</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>West Islip Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>West Islip Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>West Islip Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>West Islip Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>West Meadow Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>West Meadow Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>West Meadow Beach</td>
<td>8/15/08</td>
<td>8/17/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>West Meadow Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>West Oaks Recreation Club</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>West Oaks Recreation Club</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>West Oaks Recreation Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>West Oaks Recreation Club</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Wildwood State Park Beach</td>
<td>6/24/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Wincoma Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Wincoma Beach</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Wincoma Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Wincoma Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Wincoma Beach</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Woodhull Landing</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Woodhull Landing</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Woodhull Landing</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Woodhull Landing</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Suffolk</td>
<td>Woodhull Landing</td>
<td>9/6/08</td>
<td>9/8/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Wayne</td>
<td>Pultneyville Mariners Beach</td>
<td>6/10/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Wayne</td>
<td>Pultneyville Mariners Beach</td>
<td>6/19/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Other, Wildlife</td>
</tr>
<tr>
<td>Wayne</td>
<td>Pultneyville Mariners Beach</td>
<td>7/22/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Wayne</td>
<td>Pultneyville Mariners Beach</td>
<td>8/26/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Wayne</td>
<td>Sodus Point Lake Side</td>
<td>7/15/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Westchester</td>
<td>Beach Point Club</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Beach Point Club</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Beach Point Club</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Beach Point Club</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Beach Point Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Beach Point Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Beach Point Club</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Beach Point Club</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------------</td>
<td>------------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------------</td>
<td>----------------</td>
</tr>
<tr>
<td>Westchester</td>
<td>Coveleigh Beach Club</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Coveleigh Beach Club</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Coveleigh Beach Club</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Coveleigh Beach Club</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Coveleigh Beach Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Coveleigh Beach Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Coveleigh Beach Club</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Coveleigh Beach Club</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Davenport Club</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Davenport Club</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Davenport Club</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Davenport Club</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Davenport Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Davenport Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Davenport Club</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Davenport Club</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Echo Bay Yacht Club</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Echo Bay Yacht Club</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Echo Bay Yacht Club</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Echo Bay Yacht Club</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Echo Bay Yacht Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Echo Bay Yacht Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Echo Bay Yacht Club</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Echo Bay Yacht Club</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Greentree Club</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Greentree Club</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Greentree Club</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Greentree Club</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Greentree Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Greentree Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Greentree Club</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Greentree Club</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Greentree Club</td>
<td>8/18/08</td>
<td>8/20/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Harbor Island Beach</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Harbor Island Beach</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Harbor Island Beach</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Harbor Island Beach</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Harbor Island Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Harbor Island Beach</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Harbor Island Beach</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Harbor Island Beach</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Hudson Park</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>State Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>---------------</td>
<td>----------------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------------</td>
<td>-------------------</td>
</tr>
<tr>
<td>Westchester</td>
<td>Hudson Park</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Hudson Park</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Hudson Park</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Hudson Park</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Hudson Park</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Hudson Park</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Hudson Park</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Mamaroneck Beach and Cabana Club</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Mamaroneck Beach and Cabana Club</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Mamaroneck Beach and Cabana Club</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Mamaroneck Beach and Cabana Club</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Mamaroneck Beach and Cabana Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Mamaroneck Beach and Cabana Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Mamaroneck Beach and Cabana Club</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Mamaroneck Beach and Cabana Club</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Orienta Beach Club</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Orienta Beach Club</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Orienta Beach Club</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Orienta Beach Club</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Orienta Beach Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Orienta Beach Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Orienta Beach Club</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Orienta Beach Club</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Shore Acres Club</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Shore Acres Club</td>
<td>6/15/08</td>
<td>6/17/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Shore Acres Club</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Shore Acres Club</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Shore Acres Club</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Shore Acres Club</td>
<td>8/8/08</td>
<td>8/9/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Shore Acres Club</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Westchester</td>
<td>Shore Acres Club</td>
<td>8/15/08</td>
<td>8/16/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** Comb-sew-overflow, Combined sewer overflow; Other, Strong waves or wind, chemical spills, no lifeguard, jellyfish, etc.; Preempt-other, Preemptive due to reasons not listed here; Preempt-rain, Preemptive due to rainfall.

**Notes**

NORTH CAROLINA

5th in beachwater quality (2% of samples exceeded national standards)

Most of North Carolina’s 240 public coastal beaches, which stretch along 320 miles of Atlantic waters, are located on barrier islands. Twenty counties have marine coastline, and all have at least one public beach.

The North Carolina Department of Environment and Natural Resources (NCDENR), which administers the state’s BEACH Act grant, has been monitoring beaches along the North Carolina coast since 1997. This agency conducts sampling activities and issues notifications using uniform procedures throughout the state; these duties are not delegated to local authorities.1

North Carolina’s swim season is from April 1 to October 31. Monitoring occurs year-round, but is less frequent during the off-season.2

The barrier islands are impacted by visits from millions of tourists each year. The state’s estuarine beaches are threatened by pollution from agricultural, septic system, and development runoff, particularly in the southern region from Cape Lookout to Sunset Beach, where many of the most popular beach communities are located. Except for areas adjacent to storm drains, including Greensboro St. emergency vehicle access/ stormwater outfall pipe, drain pipe at Martin Street, drain pipe at MP 8 3/4, drain pipe at Lake Dr. beach access, drain pipe at S. Nags Head/Federal Park Border, drain pipe at Oregon St, drain pipe at Hollowell St., drain pipe at MP 12.5, drain pipe at MP 10.5, and public access at the Hanby Beach storm drain, beaches along the open ocean are not as impacted by stormwater as beaches on the sound side. Therefore, most beach advisories occur on the sound side, particularly at beaches where waterfowl congregate and in areas where there is a lack of tidal action and water circulation because of the distance from an ocean inlet.1

Sanitary surveys at sites with advisories have revealed waterfowl and other birds and pet waste as problems. Sanitary survey efforts are continuing into 2009.

The NCDENR conducts some outreach to educate the public about actions they can take to keep beaches clean, but they encourage local governments to take the lead on posting signs and taking out newspaper advertisements asking people to clean up after their pets and to refrain from feeding gulls and ducks.1

Data from the beachwater quality monitoring program was used to inform extensive studies of contamination from storm drains with ocean outfalls in Dare County. North Carolina is exploring the use of best management practices (BMPs) for reducing bacteria in stormwater discharge. BMPs include bioretention areas, marshland buffers, filters installed into outfall catch basins, UV disinfection, and hydrodynamic separators.3 The NCDENR expects to see improved beachwater quality when the installation of a $1.1 million bacteria filtration system for treating a stormwater outfall in Dare County is completed this fall. If this pilot project proves successful, more of these systems will be installed at other storm drains in the state.4

North Carolina monitors for *Karenia brevis*, a marine algae responsible for causing “red tide,” a type of harmful algal bloom. Once a *K. brevis* bloom is detected off the east coast of Florida, satellite imagery is used to locate the Gulf Stream. When the Gulf Stream comes near the North Carolina coast, sampling for *K. brevis* begins.1

North Carolina received a $299,150 BEACH Act grant in 2008 and was eligible for a $302,000 grant in 2009. The state funds monitoring of Tier 2 and Tier 3 beaches (about half of the beaches) while the EPA grant pays for monitoring at Tier 1 beaches.2 The annual contribution from the state to the monitoring program is approximately $240,000.1

**Standards**

**Indicator Organism:** Enterococcus
Standards: North Carolina uses the Enterolert® method for analysis instead of membrane filtration. This method produces bacterial counts in terms of most probable number (mpn) rather than colony forming units (cfu), but both of these values are intended to represent the number of organisms in a sample. From May 1 to September 30, North Carolina's water quality standards at its Tier 1 beaches are a single-sample maximum of 104 mpn/100 ml water and a running monthly geometric mean of 35 mpn/100 ml. These standards match the BEACH Act-required standards for full-body water contact recreation in marine waters. Action levels at Tier 2 and Tier 3 beaches are different. At Tier 2 beaches, the standard is a single-sample maximum of 276 mpn/100 ml, and at Tier 3 beaches, the standard is a single-sample maximum of 500 mpn/100 ml.5 During April and October, the standard for Tier 1 beaches is generally the same as the standard for Tier 2 beaches.2 However, the NCDENR can opt to apply Tier 1 standards during those months if the water temperature is warm enough for high recreational usage.1 The NCDENR observes fecal coliform results from the state's shellfish growing waters in order to get an indication of water quality at nearby recreational sites.

During extreme rain events such as tropical storms and hurricanes, the NCDENR sometimes issues blanket advisories that cover large regions or all of coastal North Carolina.1 In addition, permanent signs are posted on either side of storm drain outfalls stating that swimming between the signs is not recommended and that waters may be contaminated by discharge from the pipe.1 Otherwise, preemptive rainfall advisories are not issued because the beachwater quality monitoring data indicate that water quality at ocean beaches is not affected by rainfall except near storm drains. Preemptive advisories are issued after known sewage spills, when pumping of floodwaters between the primary dune and the ocean beaches occurs, or when disposal of dredge material from closed shellfishing waters is placed on ocean beaches.2

Monitoring

Determination of Sampling Locations and Frequency: North Carolina has prioritized its beaches based on usage and potential for contamination. Tier 1 beaches are adjacent to resort areas, public accesses, and sailing camps and are used on a daily basis. All ocean beaches are considered Tier 1. Tier 2 beaches constitute areas such as those in the intracoastal waterway, tidal creeks, and exposed shoals. People frequent Tier 2 sites mostly on weekends and they are usually accessed by watercraft. Tier 3 beaches are used an average of four times per month, or used less frequently but intensively for special events such as triathlons.

Practice: Samplers take care not to disturb bottom sediment when sampling. Samples are collected in the ocean surf 16 feet from the sampler’s body using a telescopic golf ball retriever in knee-deep water, 6 to 12 inches below the surface of the water. Approximately half of the samples are collected by boat, and these samples are taken in water that is three feet deep, 12 inches below the surface. Samples taken from piers must be taken at the location of the most used area 6 to 12 inches below the water’s surface. If a site exceeds the 104 mpn/100 ml criteria more than just occasionally, it becomes a triplicate sampling site.

Storm drains that extend to the water’s edge are sampled 10 feet on either side when practical. Storm drains that do not extend to the water’s edge are sampled where the swash enters the surf.2 Lateral sampling to determine the extent of the plume from discharging storm drains is done in Dare County. Lateral sampling is also done at some sites when the geometric mean is exceeded in order to determine the extent of the contaminated area.2

Sampling is routinely conducted Monday to Thursday, but takes place on Fridays and weekends if necessary. Sampling is conducted early enough in the day for the samples to be received by the lab before 2 pm. Sample results are available approximately 24 hours after samples are delivered to the lab for analysis. In addition to recording sampling data, samplers record rainfall, air and water temperature, wind speed and direction, current direction, tidal stage, and the presence of waterfowl and wildlife.2

Results: In 2008, North Carolina reported 240 coastal beaches, 110 (46%) of which were monitored once a week, and 130 (54%) every other week. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). These
exceedances include monitoring events that occurred during the off-season when water contact recreation is rare. In 2008, 1 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Public Beach south side of Dawson Creek Bridge (17%) and Dawson Creek 100 yards north of bridge (17%) in Pamlico County, Southern Shores Private Soundside Access in Dare County (13%), Cama Access, Corner of Waynick Blvd. and Sunset Ave (WB) in New Hanover County (11%), Public Beach SW Mouth of Whittaker Creek north of marker #3 (11%), Vandemere Creek (11%), and Near Mouth of Gatlin Creek (10%) in Pamlico County, Swanquarter Bay- End of Docks on SR 1136 in Hyde County (10%), and Ocean End of Henderson Blvd. AO in Carteret County (8%).

Pamlico County had the highest exceedance rate (9%) followed by Hyde (1%), New Hanover (1%), Carteret (1%), Dare (1%), and Onslow (1%), Beaufort, Pender, Currituck, and Brunswick Counties reported less than one percent exceedances, while Bertie, Camden, Chowan, Craven, Pasquotank, Perquimans, and Tyrrell Counties reported no exceedances.

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 206 beaches, the percent of samples exceeding the standard remained steady at one percent from 2007 to 2008—a decrease from 2 percent in 2005 and 2006.

### 2008 North Carolina Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Beaufort</td>
<td>Dock on S. side of Hwy 92 bridge on the W. side of Bath</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>5%</td>
</tr>
<tr>
<td>Beaufort</td>
<td>Pamlico River-Ragged Point Swim Area</td>
<td>3</td>
<td>2/mo</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Beaufort</td>
<td>W of Hills Point-Pamlico River</td>
<td>2</td>
<td>2/mo</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Beaufort</td>
<td>Pamlico River-Junction of Upper Goose Creek and Dinah’s Landing</td>
<td>2</td>
<td>2/mo</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Beaufort</td>
<td>E Shore of Blounts Bay- Pamlico River</td>
<td>2</td>
<td>2/mo</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Beaufort</td>
<td>SE of Austin Pt- Pamlico River</td>
<td>2</td>
<td>2/mo</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Beaufort</td>
<td>Sound access at the intersection of E. Main St. and Tooley St. Belhaven</td>
<td>1</td>
<td>2/mo</td>
<td>30</td>
<td>0%</td>
</tr>
<tr>
<td>Beaufort</td>
<td>Pamlico River- Tripp Point Recreational Area</td>
<td>3</td>
<td>2/mo</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Beaufort</td>
<td>Pamlico River- Maul’s Point</td>
<td>3</td>
<td>2/mo</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Beaufort</td>
<td>Pamlico River- Washington- Railroad Trestle</td>
<td>3</td>
<td>2/mo</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Beaufort</td>
<td>Pamlico River- City Park</td>
<td>3</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Bertie</td>
<td>Boat ramp at the intersection of SR 1500 and Vincent St.</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Cape Fear River, beach area adjacent to Southport municipal pier</td>
<td>2</td>
<td>2/mo</td>
<td>20</td>
<td>5%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>ICW, marker #59 near Holden Beach</td>
<td>2</td>
<td>2/mo</td>
<td>20</td>
<td>5%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Public Access, 58th St/SE and E. Beach Drive-Oak Island</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>3%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>ICWW end of Beach Drive at Bonaparte’s Landing</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Waterway Park</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>SW side, Holden Beach Bridge</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Public Access, west end of Oak Island Drive-Oak Island</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------</td>
<td>-----------------------------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Intracoastal Waterway, waterfront park at end of NE 52nd St</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Intracoastal Waterway, shoreline adjacent to Ocean isle Wildlife boat ramp</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Intracoastal Waterway, beach area adjacent to Howells Pt Wildlife boat ramp</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Public access at First and Chadbourn St.</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Public Access, 46th St/SE and E. Beach Drive-Oak Island</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Caswell Beach public Access off Caswell Beach Rd.</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Lighthouse Park; Ed Zaleskiway Way-Oak Island</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Beach access between Bald Head Harbor entrance &amp; Bald Head Cr.</td>
<td>1</td>
<td>1/wk</td>
<td>29</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Ocean pier at Ocean Blvd. And Durham St.</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Middleton Public Access-Oak Island</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Ferry Road public access</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Public access at Driftwood Street-Ocean Isle Beach</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Ocean pier between 14th and 15th Place East and Beach Dr.</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Public access at Ocean Dr. and Keziah St.</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>East Beach area- Beach access #42</td>
<td>1</td>
<td>1/wk</td>
<td>29</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Greensboro St. emergency vehicle access/ Stormwater outfall pipe</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Public access just west of Mile marker #1</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Ocean pier at 30th Place West and Beach Dr.</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Public access at 40th and Main St.</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Oak Island Wildlife ramp off Fish Factory Rd</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>ICW, soundside access at E. end of ocean Isle Bch.</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Ocean pier at Main St. and Sunset Blvd.</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Public access at Dolphin Street Holden Beach</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>South Beach area- Beach access # 17</td>
<td>1</td>
<td>1/wk</td>
<td>29</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Ocean Pier at Causeway and First St.</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Public access at Dawson Street-Ocean Isle Beach</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Public access, east end Sunset beach</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Public Access, east end Holden Beach</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Intracoastal Waterway, beach area between marker #28 &amp; marker #29</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Intracoastal Waterway, marker#67 near Holden Beach</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Camden</td>
<td>Sound access on SR 1153</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Camden</td>
<td>Canal boat ramp on SR 1153</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Ocean end of Henderson Blvd., AO</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>8%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Bogue Sound- Canal Leading to Moonlite Bay</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>5%</td>
</tr>
<tr>
<td>Carteret</td>
<td>North side mouth of Town Creek in Beaufort</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>5%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Radio Island Public Beach Access</td>
<td>1</td>
<td>1/wk</td>
<td>39</td>
<td>5%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>----------</td>
<td>-------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Carteret</td>
<td>Harker’s Island bridge at swimming area</td>
<td>2</td>
<td>2/mo</td>
<td>22</td>
<td>5%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Park Service Dock</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>3%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Mile marker 7½, oceanside</td>
<td>1</td>
<td>1/wk</td>
<td>35</td>
<td>3%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Mile post 4½, oceanside of Pelican Dr.</td>
<td>1</td>
<td>1/wk</td>
<td>35</td>
<td>3%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Ocean end of New Bern St., AO</td>
<td>1</td>
<td>1/wk</td>
<td>35</td>
<td>3%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Ocean end of Central Dr., Atlantic Ocean</td>
<td>1</td>
<td>1/wk</td>
<td>35</td>
<td>3%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Fort Macon, Park Access</td>
<td>1</td>
<td>1/wk</td>
<td>36</td>
<td>3%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Mile marker 15, oceanside</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>AO-Public Beach Access, Inlet Rd., West side of</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Coast Guard and Inlet Dr.</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Carteret</td>
<td>¼ mile W of 20 ½ mile marker, oceanside</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Mile post 19½, oceanside</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Indian Beach-Public Beach Access @ mile marker 12</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Core Sound White Point</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>400 yds SE of Bean Island off Core Banks</td>
<td>3</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Lennoxville Boat Ramp</td>
<td>3</td>
<td>2/mo</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>100 yds. NE Gallant’s Channel Bridge by Shore</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Mouth of Back Creek-Left Side by Beach</td>
<td>3</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Public Access near Fawn Drive in Emerald Isle</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Taylor’s Creek at post office dock</td>
<td>3</td>
<td>2/mo</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Pine Knoll Shores-Just east of mile marker 8½-Hwy 58 east</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>2½ miles north of Cape Pt near Barden Inlet</td>
<td>1</td>
<td>1/wk</td>
<td>32</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Morehead City-Drain Pipe at 16th street</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Cedar Is-Bch area SE of Wildlife Ramp adjacent to Ferry Landing</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Adams Creek off Silver Dollar Rd</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Cape Lookout Coast Guard Dock</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>W side of mouth of South River</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Bogue Sound-Goose Creek, off campground</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Core Sd.-Shell point off Harkers Island</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Bogue Sound-Boat Landing Tourist Center</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Bogue Sound-W Salter Path, ~200 yds off of Wam Squam Ln</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>N end of Old Ferry Rd., soundside</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Deer Crk-Public access end of Bogue Sound Dr</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Newport River-Public access NW of Bridge</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Off Brown’s Island</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Knob Island-N side</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>North River-at hwy 70 bridge</td>
<td>2</td>
<td>2/mo</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>West end of Sugarloaf Island, Morehead City</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>ICW, marker #44</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>-----------------------------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Carteret</td>
<td>Bogue Sd.-Archer Point</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Shackelford Banks-nun buoy #2</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Whitehurst Island E of marker 24</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Bogue Inlet mouth of Coast Guard Channel</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Bogue Sound-E side of Mouth of Gales Creek</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Spoils Island off Salty Shores</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>1/2 mile W of mile marker 10, oceanside</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>50 yards east of NC Marine Fisheries Dock</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>ICW, Ski Beach, channel to Bogue Inlet</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Headen Ln. Salter Path- Soundside ~200 yds. off shore</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Carteret</td>
<td>Shackelford Banks-by restrooms</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Chowan</td>
<td>Chowan River Wildlife Ramp, east side of Bridge</td>
<td>3</td>
<td>2/mo</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Craven</td>
<td>Neuse River-Pine Cliff Recreation Area</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Craven</td>
<td>Neuse River-Flanner’s Beach</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Craven</td>
<td>Neuse River-Green Spring Swim Area</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Craven</td>
<td>Neuse River-Great Neck Point</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Craven</td>
<td>Neuse River-200 yds. N. of mouth of North West Creek</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Craven</td>
<td>Hancock Creek Dock at Wildlife Ramp</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Craven</td>
<td>Mouth of Slocum Creek, North Side Beach</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Craven</td>
<td>Neuse River-Union Point</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Currituck</td>
<td>AO- 2.8 miles N of Corolla Ramp</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>3%</td>
</tr>
<tr>
<td>Currituck</td>
<td>Corolla Ramp, end of paved Rd.</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Currituck</td>
<td>Park on Woodhouse Dr. Grandy, NC</td>
<td>3</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Currituck</td>
<td>100 yds offshore in sound near intersection of hwvy 12 and Albacore St. Corolla</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Currituck</td>
<td>Currituck S Beach Access at Pine island</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Currituck</td>
<td>Corolla, Albacore St. Beach Access</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Currituck</td>
<td>Corolla Lighthouse Beach Access</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Currituck</td>
<td>Swimming area at end of SR 1142</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Currituck</td>
<td>Dock at the end of SR 1245</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Southern Shores Private Soundside Access</td>
<td>1</td>
<td>1/wk</td>
<td>38</td>
<td>13%</td>
</tr>
<tr>
<td>Dare</td>
<td>Drain Pipe at Martin Street</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>6%</td>
</tr>
<tr>
<td>Dare</td>
<td>Jockey’s Ridge Soundside Access</td>
<td>1</td>
<td>1/wk</td>
<td>36</td>
<td>6%</td>
</tr>
<tr>
<td>Dare</td>
<td>Drain Pipe at Lake Dr beach access</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>3%</td>
</tr>
<tr>
<td>Dare</td>
<td>Drain Pipe at MP 8/4</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>3%</td>
</tr>
<tr>
<td>Dare</td>
<td>Colington Harbour swimming beach</td>
<td>1</td>
<td>1/wk</td>
<td>35</td>
<td>3%</td>
</tr>
<tr>
<td>Dare</td>
<td>Southeast side of Mann’s Harbor Bridge</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>2Mi SW of Frisco Vol Fire Dept</td>
<td>3</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Oregon Inlet Coastguard Station</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>New Inlet Sound Access</td>
<td>3</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Canadian Hole</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>----------</td>
<td>-----------------------------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>---------------------</td>
</tr>
<tr>
<td>Dare</td>
<td>100 yds ENE of Little Bridge, Causeway, Nags Head</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Wanchese Seafood Industrial Park</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>500 yds. Offshore, 100 yds. S of E. side of Wright Memorial Bridge</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>1 1/2 Mi SW of RO Plant</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Roanoke Sound, Dunube St D/P South Nags Head</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>The Swimming Hole</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Shallowbag Bay-Swim Platform Manteo Bridge</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>100 yrs. offshore of 7517 S. Va. Dare Trail, Nags Head</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Kitty Hawk Bay Wildlife Ramp in Jet Ski Riding Area</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>100 yrs offshore at Sunset Strip Dr.-Frisco, NC</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>500 yrs off Spy Glass Rd.- Currituck Sd.</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>100 yrs offshore at Island Creek Ct.-Avon, NC</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>100 yrs offshore at North Holiday Rd.-Rodanthe</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>500 yrs off Sandyridge Rd.-Currituck Sd.</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Ramp #38 and access</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Ramp #34 and access</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Ramp #55 and Access</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>1/4 Mi E of EMS Station</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Oregon Inlet Federal Campground</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Hillcrest Dr. access</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Beach access 1 1/2 Mile N of Kitty Hawk Pier</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Drain Pipe at MP 12.5</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Conch St beach access</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Beach at Cape Hatteras Lighthouse</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Nags Head Bath House</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Drain Pipe at Hollowell St</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Bath House on SR 1206</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Northernmost beach access</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Sound access across from ramp #29</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Ocean Ramp #30</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Beach access at Sprigtail Dr.</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Ramp #23 and access</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>750 yds off Ocean Bay Blvd.-Currituck Sd.</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>3/4 miles N. of sound access across from ramp #29</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>800 yds off SR 1425</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Beach access at 3rd St</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>100 ft- North of Jennettes Pier</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Drain Pipe at MP 10.5</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Beach access S of Refuge offices</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Drain Pipe at Oregon St</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>------------------------------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Dare</td>
<td>Drain Pipe at S Nags Head/Federal Park Border</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Bath House at Ocean Bay Dr</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>S-turns' just N of Rodanthe</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Frisco Bath House</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Beach Access at Sportsman Dr.</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Dare</td>
<td>Federal Campground</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Hyde</td>
<td>Swanquarter Bay-end of docks on SR 1136</td>
<td>3</td>
<td>2/mo</td>
<td>21</td>
<td>10%</td>
</tr>
<tr>
<td>Hyde</td>
<td>AO-5 miles SW of Ocracoke state ferry</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Hyde</td>
<td>Beach access by Airport Ramp</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Hyde</td>
<td>Ocracoke-1st public access SW of State Ferry</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Hyde</td>
<td>Federal Campground-Ocracoke</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Cama Access, corner of Waynick Blvd. and Sunset Ave (WB)</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>11%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Fort Fisher-Beach Adjacent to NCWRC Ramp</td>
<td>2</td>
<td>2/mo</td>
<td>20</td>
<td>5%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Banks Channel, swimming beach south of Coast Guard station</td>
<td>2</td>
<td>2/mo</td>
<td>21</td>
<td>5%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Banks Channel-Waynick Blvd. - Between Taylor and Bellamy Streets</td>
<td>1</td>
<td>1/wk</td>
<td>35</td>
<td>3%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Banks Channel-Waynick Blvd. Approx. 150 yds N of Iula St.</td>
<td>1</td>
<td>1/wk</td>
<td>35</td>
<td>3%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Banks Channel-Waynick Blvd.-Between Snyder and Seashore Streets</td>
<td>1</td>
<td>1/wk</td>
<td>35</td>
<td>3%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Stone Street Public Access-Ocean side Wrightsville Beach</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Fort Fisher Beach State Park access off Loggerhead Rd.</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Ocean pier at Salisbury St. public access</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Ocean pier near Carolina Beach Ave. and Salt Marsh Ave.</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Public access at the Hanby Beach Storm Drain</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Cape Fear River, W. end of Snows Cut</td>
<td>3</td>
<td>2/mo</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>N. end of Wrightsville Beach at public access #2 off Lumina Dr.</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Ocean Pier at K. Ave.</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Carolina Beach Inlet-N. end of Carolina Beach</td>
<td>2</td>
<td>2/mo</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Public Bch on Masonboro Sd-end of Florida Ave in Carolina Beach</td>
<td>2</td>
<td>2/mo</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Middle Sound at Nixon’s Channel at Figure Eight</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Area behind the northern end of Masonboro Island</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Ocean pier at Nathan St. and S. Lumina Dr.</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Public beach access at Hemlet Ave.</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Onslow</td>
<td>New River, NC Hwy. 172 bridge</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>5%</td>
</tr>
<tr>
<td>Onslow</td>
<td>N. Topsail Bridge - Wildlife Ramp</td>
<td>3</td>
<td>2/mo</td>
<td>20</td>
<td>5%</td>
</tr>
<tr>
<td>Onslow</td>
<td>New River, Wilson Park</td>
<td>3</td>
<td>2/mo</td>
<td>20</td>
<td>5%</td>
</tr>
<tr>
<td>Onslow</td>
<td>Sound side Bear Island</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>------------------------------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Onslow</td>
<td>Onslow Beach - Public access ~1/4 mile south of Onslow Beach Bridge</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Onslow</td>
<td>Sanders Creek at Bear Creek</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Onslow</td>
<td>ICW, Swan Point</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Onslow</td>
<td>Wards Shore-Bogue Sound</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Onslow</td>
<td>Bogue Sd.-1/2 mile S of Bear Inlet, soundside</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Onslow</td>
<td>New River at mouth of Southwest Creek</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Onslow</td>
<td>N. Topsail, Emergency Vehicle Access</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Onslow</td>
<td>Regional public access at mile marker 12 on New River Inlet Rd.</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Onslow</td>
<td>Public Access, mouth of NE Creek-New River</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Onslow</td>
<td>AO- ~1 mile S of Bogue Inlet</td>
<td>1</td>
<td>1/wk</td>
<td>34</td>
<td>0%</td>
</tr>
<tr>
<td>Pamlico</td>
<td>Dawson Crk., 100 yds N of bridge</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>17%</td>
</tr>
<tr>
<td>Pamlico</td>
<td>Public Beach S side of Dawson Crk Bridge</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>11%</td>
</tr>
<tr>
<td>Pamlico</td>
<td>Neuse River-end of state Rd 1310</td>
<td>2</td>
<td>2/mo</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Pamlico</td>
<td>Just E of Wilkinson Pt</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>5%</td>
</tr>
<tr>
<td>Pamlico</td>
<td>Kennals Beach</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Pamlico</td>
<td>Just E of the Mouth of Beard Ck</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Pamlico</td>
<td>Pasquotank River- E.C. Coast Guard Station Beach</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Pender</td>
<td>Stump Sound just east of Dixon Point</td>
<td>2</td>
<td>2/mo</td>
<td>20</td>
<td>5%</td>
</tr>
<tr>
<td>Pender</td>
<td>Public access #S-1 at end of Shoreline Dr. (soundside station)</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Pender</td>
<td>ICW, Hwy. 210 bridge at Surf City</td>
<td>2</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Pender</td>
<td>Public access at S. Shore Dr. and Kinston Ave.</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Pender</td>
<td>Public access #O-10 at Ocean Blvd and Crews Ave.</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Pender</td>
<td>Public access #O-3 at mile marker 3</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Pender</td>
<td>Public Access at Broadway St. &amp; N. Shore Dr.</td>
<td>1</td>
<td>1/wk</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Perquimans</td>
<td>Albemarle Sd. At end of Holiday Lane Rd.</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Tyrell</td>
<td>Albemarle Sd.-Bull Bay Swimming Area 4H Camp</td>
<td>3</td>
<td>2/mo</td>
<td>19</td>
<td>0%</td>
</tr>
</tbody>
</table>

**Advisories**

**Advisory Issuance:** The NCDENR does not have the authority to close beaches; it issues alerts and advisories only. However, the state and county health directors do have the authority to close any body of water if necessary for the protection of public health. During the off-season, advisories are not posted.
From May 1 to September 30 at Tier 1 beaches, an exceedance of either the single-sample maximum or geometric mean standard triggers an alert or advisory. When tier-based action levels are exceeded, a swimming advisory or alert is issued. An alert is issued for Tier 1 beaches whose enterococcus levels are between 104 and 500 mpn/100 ml. A second sample is collected immediately when an alert is issued, and if levels in the resample exceed 104 mpn/100 ml then the alert converts to an advisory. For Tier 1 beaches that are sampled in triplicate, an advisory is issued without resampling when two out of three simultaneous samples exceed 104 mpn/100 ml. For Tier 2 beaches, an alert is issued if a sample is between 276 and 500 mpn/100 ml and a resample is conducted. This alert converts to an advisory if the re-sample is over 276 mpn/100 ml. An advisory is issued without a resample at Tier 1 and 2 beaches if a single sample is greater than 500 mpn/100 ml. Alerts are not issued at Tier 3 beaches. Instead, they are resampled if the levels are higher than 500 mpn/100 ml and if the second sample is above that level, an advisory is issued. Alerts are announced in press releases and on the website but no advisory sign is posted at the beach. Signs are posted and press releases are issued when advisories are issued. The program’s project manager decides whether to post advisory signs during April and October when colder temperatures result in fewer swimmers. Advisories can be issued for sections of a beach instead of the whole beach for certain types of preemptive advisories such as the permanent advisories issued when storm drains are actively discharging.

Reopening Procedures: Tier 1 beaches continue to be monitored weekly after an advisory is issued. For a geometric mean advisory at a Tier 1 beach to be rescinded, the beach must have two consecutive weekly samples below 35 mpn/100 ml and meet the geometric mean standard for the last five samples. If a station has triplicate sampling, two out of three samples have to be below 104 mpn/100 ml for the advisory to be lifted. Tier 2 and 3 beaches are monitored weekly after an advisory is issued until levels fall below 276 mpn/100 ml and 500 mpn/100 ml, respectively. The NCDENR samples after storm events, sewage spills, dredge disposal, and floodwater pumping to confirm safe bacteria levels before lifting preemptive advisories. States that monitor more frequently after storm or pollution events will tend to have higher percent exceedance rates and fewer total closing/advisory days than they would have had if their sampling frequency did not alter after storm or pollution events.

Number of Advisories: North Carolina had 24 advisory events in 2008. Total advisory days for 24 events lasting six consecutive weeks or less increased 37 percent to 168 days in 2008 from 123 days in 2007, 346 days in 2006, and 197 days in 2005. There were no extended or permanent events in 2008 or 2007. Extended events are those in effect more than 6 consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks.

Causes of Advisories: All advisory days in 2008 were due to monitoring that revealed elevated bacteria levels from unknown sources of contamination.

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Brunswick</td>
<td>Cape Fear River, beach area adjacent to Southport municipal pier</td>
<td>9/18/08</td>
<td>9/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Brunswick</td>
<td>Public Access, 58th St/SE and E. Beach Drive-Oak Island</td>
<td>5/1/08</td>
<td>5/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Carteret</td>
<td>Harker’s Island bridge at swimming area</td>
<td>10/17/08</td>
<td>10/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Carteret</td>
<td>Mile post 4½, oceanside of Pelican Dr.</td>
<td>9/23/08</td>
<td>9/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Carteret</td>
<td>North side mouth of Town Creek in Beaufort</td>
<td>9/23/08</td>
<td>9/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Carteret</td>
<td>North side mouth of Town Creek in Beaufort</td>
<td>10/7/08</td>
<td>10/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Carteret</td>
<td>Radio Island Public Beach Access</td>
<td>9/16/08</td>
<td>9/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Carteret</td>
<td>Radio Island Public Beach Access</td>
<td>9/27/08</td>
<td>10/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Currituck</td>
<td>AO-2.8 miles N of Corolla Ramp</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>---------------------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>-----------------</td>
</tr>
<tr>
<td>Dare</td>
<td>Colington Harbour swimming beach</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Dare</td>
<td>Jockey’s Ridge Soundside Access</td>
<td>5/13/08</td>
<td>5/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Dare</td>
<td>Jockey’s Ridge Soundside Access</td>
<td>9/10/08</td>
<td>9/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Dare</td>
<td>Southern Shores Private Soundside Access</td>
<td>5/13/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Dare</td>
<td>Southern Shores Private Soundside Access</td>
<td>9/3/08</td>
<td>9/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Dare</td>
<td>Southern Shores Private Soundside Access</td>
<td>9/23/08</td>
<td>10/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Hyde</td>
<td>Swanquarter Bay- end of docks on SR 1136</td>
<td>5/22/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Banks Channel-Waynick Blvd.-Between Snyder and</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Seashore Streets</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>New Hanover</td>
<td>Banks Channel-Waynick blvd. Approx. 150 yds N of</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Iula St.</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>New Hanover</td>
<td>Cama Access, corner of Waynick Blvd. and Sunset</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>New Hanover</td>
<td>Ave (WB)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>New Hanover</td>
<td>Fort Fisher-Beach Adjacent to NCWRC Ramp</td>
<td>9/17/08</td>
<td>9/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Pamlico</td>
<td>Near mouth of Gatlin Crk</td>
<td>9/17/08</td>
<td>9/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Pamlico</td>
<td>Public Beach S side of Dawson Crk Bridge</td>
<td>9/11/08</td>
<td>10/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Pamlico</td>
<td>Vandemere Creek</td>
<td>8/29/08</td>
<td>9/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Pender</td>
<td>Stump Sound just east of Dixon Point</td>
<td>9/27/08</td>
<td>9/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

**Notes**

Ohio has 53 public beaches lining 7.3 miles of Lake Erie shoreline. These beaches are found in Ashtabula, Lake, Cuyahoga, Lorain, Erie, Lucas, and Ottawa Counties.

The state’s beachwater quality monitoring program is administered by the Ohio Department of Health (ODH). This department, in addition to monitoring some of Lake Erie’s beaches, coordinates activities at coastal beaches monitored by the Lake County General Health District, the Cuyahoga County Board of Health, and the Northeast Ohio Regional Sewer District. Ohio is a “home rule” state and the state can only recommend that a municipality post a warning sign when the state standard is exceeded. However, local agencies are complying with these recommendations, and advisories are issued when the standard is exceeded. Some inland beaches are also monitored for water quality in Ohio, but this report includes information about only Lake Erie monitoring activities.

The monitoring season varies depending on the monitoring agency, but generally runs from Memorial Day through Labor Day. Partly due to elevated bacteria levels along the Lake Erie shore, the Northeast Ohio Regional Sewer District is making changes to its combined sewer system in order to reduce combined sewer overflows. The Cleveland Department of Public Health develops educational materials for the beachgoing public and participates in various outreach activities held along the Lake Erie shore. In 2009, Erie County is planning on using a rapid analytical method to monitor the water quality at the beaches that fall under its jurisdiction.

Monitoring for harmful algal blooms is not currently conducted in Ohio. A plan to combine harmful algal bloom and beachwater quality information online using the current beachwater quality system is under consideration.

Ohio received a $220,780 federal BEACH Act grant in 2008 and was eligible for a $224,000 grant in 2009. The BEACH Act grants fully fund Ohio’s Lake Erie beach monitoring program.

### Standards

**Indicator Organism:** *E. coli.*

**Standards:** Ohio uses the *E. coli* single-sample maximum standard of 235 cfu/100 ml for beach closing and advisory decisions. There are no preemptive rainfall standards, but preemptive rainfall advisories can be issued by beach managers if they feel water quality has been compromised by rain. Beach managers may also restrict beach access because of sewage or other pollution spills, or for any other threat to public health.

A predictive model called Nowcast uses environmental factors including rainfall, turbidity, and wave height to predict *E. coli* levels. Huntington Beach and Edgewater Beach are placed on advisory status if Nowcast predicts that the probability of *E. coli* concentrations exceeding 235 cfu/100 ml is 30 percent or greater. Bacterial monitoring at Huntington Beach has shown that Nowcast-based notifications are issued in a more protective pattern than if they had been issued based on bacterial monitoring. In another modeling effort, the Ashtabula Township Park Commission has collaborated with the US Geological Survey (USGS) in continued testing and refining of a model for predicting *E. coli* concentrations at Lakeshore Park. The model was used to examine and compare the association between *E. coli* concentrations and algal density.

### Monitoring

**Determination of Monitoring Locations and Frequency:** For the most part, monitoring is conducted at the area of the beach used most by the public.
Practice: Monitoring practices depend somewhat on the agency conducting the monitoring. Guidance recommends that samples be taken in water that is three feet deep, one foot below the surface, in an area of the beach generally used for swimming. Sampling results are generally available 18 to 24 hours after samples are delivered to the lab. Sampling occurs every day of the week at Lake County beaches, Monday through Friday or daily at Cuyahoga County beaches, and Monday through Thursday at all other beaches with the exception of two island beaches, which are sampled on Monday.

Results: In 2008, Ohio reported 45 coastal beaches, 6 (13%) of which were monitored daily, 37 (82%) more than once a week, and 2 (4%) once a week. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state's daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 19 percent of all reported beach monitoring samples exceeded the state's daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Lakeshore Park in Ashtabula County (53%), Euclid State Park (47%) and Villa Angela State Park (45%) in Cuyahoga County, Bay View West in Erie County (41%), Edgewater State Park in Cuyahoga County (34%), Lakeview Beach (31%) and Century Beach (30%) in Lorain County, Edison Creek in Erie County (30%), Camp Perry in Ottawa County (28%), and Huron River West in Erie County (27%).

Cuyahoga County had the highest percent exceedance rate in 2008 (35%) followed by Lorain (30%), Ashtabula (21%), Lucas (15%), Lake (15%), Erie (14%), and Ottawa (8%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 20 beaches, the percent of samples exceeding the standard increased to 22 percent in 2008, the highest level since 2005 (20 percent, 21 percent, and 18 percent, in 2007, 2006, and 2005 respectively).

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ashtabula</td>
<td>Lakeshore Park</td>
<td>2</td>
<td>4/wk</td>
<td>55</td>
<td>53%</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Geneva State Park</td>
<td>2</td>
<td>4/wk</td>
<td>55</td>
<td>13%</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Conneaut Township Park</td>
<td>2</td>
<td>4/wk</td>
<td>55</td>
<td>11%</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Walnut Beach</td>
<td>2</td>
<td>4/wk</td>
<td>55</td>
<td>7%</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>1</td>
<td>Daily</td>
<td>109</td>
<td>47%</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>1</td>
<td>Daily</td>
<td>109</td>
<td>45%</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>1</td>
<td>Daily</td>
<td>108</td>
<td>34%</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Huntington Beach</td>
<td>1</td>
<td>Daily</td>
<td>104</td>
<td>12%</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View West</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>41%</td>
</tr>
<tr>
<td>Erie</td>
<td>Edison Creek</td>
<td>3</td>
<td>3/wk</td>
<td>40</td>
<td>30%</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River West</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>27%</td>
</tr>
<tr>
<td>Erie</td>
<td>Vermilion River East</td>
<td>3</td>
<td>3/wk</td>
<td>40</td>
<td>23%</td>
</tr>
<tr>
<td>Erie</td>
<td>Sherod Creek</td>
<td>3</td>
<td>3/wk</td>
<td>39</td>
<td>21%</td>
</tr>
<tr>
<td>Erie</td>
<td>Showse Park</td>
<td>3</td>
<td>3/wk</td>
<td>40</td>
<td>20%</td>
</tr>
<tr>
<td>Erie</td>
<td>Crystal Rock</td>
<td>3</td>
<td>3/wk</td>
<td>40</td>
<td>18%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>----------</td>
<td>------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Erie</td>
<td>Darby Creek</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>17%</td>
</tr>
<tr>
<td>Erie</td>
<td>Sugar Creek</td>
<td>3</td>
<td>3/wk</td>
<td>40</td>
<td>15%</td>
</tr>
<tr>
<td>Erie</td>
<td>Vermilion River West</td>
<td>3</td>
<td>3/wk</td>
<td>40</td>
<td>15%</td>
</tr>
<tr>
<td>Erie</td>
<td>Pickerel Creek</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>15%</td>
</tr>
<tr>
<td>Erie</td>
<td>Cedar Point Chausee</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>15%</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River East</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>15%</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View East</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>12%</td>
</tr>
<tr>
<td>Erie</td>
<td>Old Womans Creek West</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>12%</td>
</tr>
<tr>
<td>Erie</td>
<td>Whites Landing</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>12%</td>
</tr>
<tr>
<td>Erie</td>
<td>Fichtel Creek</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>10%</td>
</tr>
<tr>
<td>Erie</td>
<td>Kiwanis</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>10%</td>
</tr>
<tr>
<td>Erie</td>
<td>Cranberry Creek</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>5%</td>
</tr>
<tr>
<td>Erie</td>
<td>Hoffman Ditch</td>
<td>3</td>
<td>3/wk</td>
<td>39</td>
<td>3%</td>
</tr>
<tr>
<td>Erie</td>
<td>Old Womans Creek East</td>
<td>3</td>
<td>3/wk</td>
<td>40</td>
<td>3%</td>
</tr>
<tr>
<td>Erie</td>
<td>Lion’s Park</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>2%</td>
</tr>
<tr>
<td>Erie</td>
<td>Battery Park</td>
<td>3</td>
<td>3/wk</td>
<td>41</td>
<td>2%</td>
</tr>
<tr>
<td>Erie</td>
<td>Sawmill Creek</td>
<td>3</td>
<td>3/wk</td>
<td>40</td>
<td>0%</td>
</tr>
<tr>
<td>Erie</td>
<td>Chappel Creek</td>
<td>3</td>
<td>3/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>1</td>
<td>Daily</td>
<td>104</td>
<td>22%</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>1</td>
<td>Daily</td>
<td>208</td>
<td>11%</td>
</tr>
<tr>
<td>Lorain</td>
<td>Lakeview Beach</td>
<td>2</td>
<td>4/wk</td>
<td>55</td>
<td>31%</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>2</td>
<td>4/wk</td>
<td>96</td>
<td>30%</td>
</tr>
<tr>
<td>Lucas</td>
<td>Maumee Bay State Park (ERIE)</td>
<td>2</td>
<td>4/wk</td>
<td>53</td>
<td>15%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Camp Perry</td>
<td>2</td>
<td>4/wk</td>
<td>53</td>
<td>28%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Port Clinton (DeepLakeview)</td>
<td>2</td>
<td>4/wk</td>
<td>53</td>
<td>11%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Lakeside Beach</td>
<td>2</td>
<td>4/wk</td>
<td>53</td>
<td>4%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Catavba Island State Park</td>
<td>2</td>
<td>4/wk</td>
<td>53</td>
<td>2%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>East Harbor State Park</td>
<td>2</td>
<td>4/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>South Bass Island State Park</td>
<td>3</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Ottawa</td>
<td>Kelleys Island State Park</td>
<td>3</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
</tbody>
</table>

**Closings and Advisories**

**Closing and Advisory Issuance:** Advisories due to monitoring results are issued at Lake Erie beaches in Ohio by local authorities based on recommendations by the state. Local jurisdictions have the authority to close beaches if they choose. No geometric mean standard is applied when making closing and advisory decisions. In 2008, local jurisdictions notified the public when bacterial exceedances were found.

The public is notified of advisories and closings via a telephone hotline, website, signs, and newspaper articles. Suggested language for signs posting a beach includes: “Water Quality Advisory - Bacterial levels here currently exceed state standards. Children, the elderly and those in ill health are advised not to swim.” Advisories are generally issued for whole beaches, not sections of a beach.
**Reopening Procedures:** The monitoring frequency does not generally increase if a beach is placed under advisory. This is because nearly all beaches are already sampled daily or as frequently as laboratory availability will allow.\(^1\) When the sample results are acceptable, beach managers are contacted and advised that signs can be taken down.

**Number of Closings and Advisories:** Ohio had 312 closing/advisory events in 2008. Total closing/advisory days for 312 events lasting six consecutive weeks or less increased 19% to 783 days in 2008 from 657 days in 2007, 629 days in 2006, and 182 days in 2005. In addition, there were no extended or permanent events in 2008 or 2007. Extended events are those in effect more than 6 consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks.

**Causes of Closings and Advisories:** For events lasting six consecutive weeks or less, 94% (733) of closing/advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, and 6% (50) were preemptive (i.e. without waiting for monitoring results) based on the results of computer modeling. All closing and advisory days in 2008 were from unknown sources of contamination.

### 2008 Ohio Beach Closings and Advisories

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ashtabula</td>
<td>Conneaut Township Park</td>
<td>6/13/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Conneaut Township Park</td>
<td>7/9/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Conneaut Township Park</td>
<td>7/23/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Geneva State Park</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Geneva State Park</td>
<td>6/13/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Geneva State Park</td>
<td>7/10/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Geneva State Park</td>
<td>7/24/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Geneva State Park</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Geneva State Park</td>
<td>8/8/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Geneva State Park</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Lakeshore Park</td>
<td>6/4/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Lakeshore Park</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Lakeshore Park</td>
<td>7/1/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Lakeshore Park</td>
<td>7/4/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Lakeshore Park</td>
<td>7/10/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Lakeshore Park</td>
<td>7/17/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Lakeshore Park</td>
<td>7/24/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Lakeshore Park</td>
<td>7/30/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Lakeshore Park</td>
<td>8/7/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Lakeshore Park</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Lakeshore Park</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Lakeshore Park</td>
<td>9/5/08</td>
<td>9/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Walnut Beach</td>
<td>6/11/08</td>
<td>6/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Walnut Beach</td>
<td>6/27/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Walnut Beach</td>
<td>7/10/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Ashtabula</td>
<td>Walnut Beach</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>5/20/08</td>
<td>5/22/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>----------</td>
<td>--------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------------</td>
<td>--------</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>5/25/08</td>
<td>5/27/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>5/28/08</td>
<td>5/29/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>6/1/08</td>
<td>6/2/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>6/4/08</td>
<td>6/7/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>6/13/08</td>
<td>6/14/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>6/22/08</td>
<td>6/23/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>6/27/08</td>
<td>6/28/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>6/29/08</td>
<td>6/30/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>7/4/08</td>
<td>7/5/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>7/10/08</td>
<td>7/12/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>7/18/08</td>
<td>7/19/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>7/22/08</td>
<td>7/25/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>7/27/08</td>
<td>7/29/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>8/6/08</td>
<td>8/10/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>8/16/08</td>
<td>8/17/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>8/30/08</td>
<td>9/1/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Edgewater State Park</td>
<td>9/4/08</td>
<td>9/6/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>5/20/08</td>
<td>5/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>5/28/08</td>
<td>5/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>6/1/08</td>
<td>6/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>6/4/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>6/11/08</td>
<td>6/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>6/13/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>6/15/08</td>
<td>6/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>6/17/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>6/23/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>6/29/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>7/8/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>7/17/08</td>
<td>7/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>7/21/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>7/30/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>8/3/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>8/16/08</td>
<td>8/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>8/19/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------------</td>
<td>------------------</td>
<td>------------</td>
<td>----------</td>
<td>-------------</td>
<td>-----------</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>8/31/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Euclid State Park</td>
<td>9/5/08</td>
<td>9/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Huntington Beach</td>
<td>6/1/08</td>
<td>6/2/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Huntington Beach</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Huntington Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Huntington Beach</td>
<td>6/29/08</td>
<td>6/30/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Huntington Beach</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Huntington Beach</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Huntington Beach</td>
<td>7/18/08</td>
<td>7/19/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Huntington Beach</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Huntington Beach</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Huntington Beach</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Huntington Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Preempt-model</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>5/20/08</td>
<td>5/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>5/28/08</td>
<td>5/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>6/1/08</td>
<td>6/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>6/4/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>6/11/08</td>
<td>6/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>6/14/08</td>
<td>6/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>6/17/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>6/23/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>6/27/08</td>
<td>6/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>6/29/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>7/7/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>7/9/08</td>
<td>7/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>7/14/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>7/17/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>7/31/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>8/7/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>8/11/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>8/18/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>8/22/08</td>
<td>8/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Cuyahoga</td>
<td>Villa Angela State Park</td>
<td>8/31/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Battery Park</td>
<td>7/11/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View East</td>
<td>5/28/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View East</td>
<td>6/10/08</td>
<td>6/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View East</td>
<td>7/18/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>---------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>--------</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View East</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View East</td>
<td>8/1/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View West</td>
<td>5/28/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View West</td>
<td>6/12/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View West</td>
<td>6/20/08</td>
<td>6/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View West</td>
<td>6/26/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View West</td>
<td>7/2/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View West</td>
<td>7/15/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View West</td>
<td>7/29/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View West</td>
<td>8/5/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View West</td>
<td>8/15/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Bay View West</td>
<td>8/21/08</td>
<td>9/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Cedar Point Chausee</td>
<td>5/28/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Cedar Point Chausee</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Cedar Point Chausee</td>
<td>7/18/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Cedar Point Chausee</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Cedar Point Chausee</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Cedar Point Chausee</td>
<td>8/15/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Cranberry Creek</td>
<td>7/11/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Cranberry Creek</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Crystal Rock</td>
<td>5/28/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Crystal Rock</td>
<td>6/10/08</td>
<td>6/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Crystal Rock</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Crystal Rock</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Crystal Rock</td>
<td>7/24/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Darby Creek</td>
<td>5/28/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Darby Creek</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Darby Creek</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Darby Creek</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Darby Creek</td>
<td>7/24/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Darby Creek</td>
<td>8/26/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Edison Creek</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Edison Creek</td>
<td>6/10/08</td>
<td>6/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Edison Creek</td>
<td>6/19/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Edison Creek</td>
<td>6/24/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Edison Creek</td>
<td>6/27/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Edison Creek</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Edison Creek</td>
<td>7/18/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Edison Creek</td>
<td>8/8/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Edison Creek</td>
<td>8/15/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Fichtel Creek</td>
<td>6/27/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------</td>
<td>------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------</td>
<td>----------</td>
</tr>
<tr>
<td>Erie</td>
<td>Fichtel Creek</td>
<td>7/24/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Hoffman Ditch</td>
<td>8/8/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River East</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River East</td>
<td>6/12/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River East</td>
<td>6/27/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River East</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River East</td>
<td>8/8/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River East</td>
<td>8/15/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River East</td>
<td>8/26/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River West</td>
<td>5/28/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River West</td>
<td>6/20/08</td>
<td>6/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River West</td>
<td>7/1/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River West</td>
<td>7/11/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River West</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River West</td>
<td>8/8/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River West</td>
<td>8/15/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River West</td>
<td>8/21/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Huron River West</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Kiwanis</td>
<td>6/10/08</td>
<td>6/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Kiwanis</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Kiwanis</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Kiwanis</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Kiwanis</td>
<td>8/22/08</td>
<td>8/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Lion's Park</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Old Womans Creek East</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Old Womans Creek West</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Old Womans Creek West</td>
<td>7/24/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Old Womans Creek West</td>
<td>8/7/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Pickerel Creek</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Pickerel Creek</td>
<td>6/27/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Pickerel Creek</td>
<td>7/8/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Pickerel Creek</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Pickerel Creek</td>
<td>8/26/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Sherod Creek</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Sherod Creek</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Sherod Creek</td>
<td>7/19/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Sherod Creek</td>
<td>7/31/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Sherod Creek</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Showse Park</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Showse Park</td>
<td>6/24/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Showse Park</td>
<td>7/11/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Showse Park</td>
<td>7/24/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Sugar Creek</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>------------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------</td>
<td>--------</td>
</tr>
<tr>
<td>Erie</td>
<td>Sugar Creek</td>
<td>7/10/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Sugar Creek</td>
<td>7/18/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Sugar Creek</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Sugar Creek</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Vermilion River East</td>
<td>6/5/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Vermilion River East</td>
<td>6/13/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Vermilion River East</td>
<td>6/19/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Vermilion River East</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Vermilion River East</td>
<td>7/3/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Vermilion River West</td>
<td>6/6/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Vermilion River West</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Vermilion River West</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Vermilion River West</td>
<td>7/22/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Vermilion River West</td>
<td>8/15/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Whites Landing</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Whites Landing</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Whites Landing</td>
<td>7/15/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Whites Landing</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Erie</td>
<td>Whites Landing</td>
<td>8/29/08</td>
<td>9/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>5/28/08</td>
<td>5/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>6/1/08</td>
<td>6/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>6/11/08</td>
<td>6/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>6/13/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>6/19/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>6/30/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>7/12/08</td>
<td>7/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>7/23/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>8/9/08</td>
<td>8/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>8/16/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Fairport Harbor</td>
<td>8/30/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>5/20/08</td>
<td>5/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>5/28/08</td>
<td>5/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>6/1/08</td>
<td>6/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>----------</td>
<td>------------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------</td>
<td>--------</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>6/13/08</td>
<td>6/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>6/29/08</td>
<td>6/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>8/3/08</td>
<td>8/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lake</td>
<td>Headlands State Park (E)</td>
<td>8/20/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>6/13/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>6/17/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>6/27/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>7/4/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>7/10/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>7/15/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>7/18/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>7/22/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>7/30/08</td>
<td>7/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>8/1/08</td>
<td>8/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>8/7/08</td>
<td>8/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>8/8/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>8/12/08</td>
<td>8/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>8/15/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Century Beach</td>
<td>9/5/08</td>
<td>9/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Lakeview Beach</td>
<td>6/6/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Lakeview Beach</td>
<td>6/11/08</td>
<td>6/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Lakeview Beach</td>
<td>6/13/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Lakeview Beach</td>
<td>6/18/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Lakeview Beach</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Lakeview Beach</td>
<td>7/4/08</td>
<td>7/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Lakeview Beach</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Lakeview Beach</td>
<td>7/11/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Lakeview Beach</td>
<td>7/17/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Lakeview Beach</td>
<td>7/23/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lorain</td>
<td>Lakeview Beach</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>
## County | Beach | Start Date | End Date | Reason | Source
--- | --- | --- | --- | --- | ---
Lorain | Lakeview Beach | 8/6/08 | 8/8/08 | Bacteria | Unknown
Lorain | Lakeview Beach | 8/15/08 | 8/19/08 | Bacteria | Unknown
Lorain | Lakeview Beach | 8/20/08 | 8/21/08 | Bacteria | Unknown
Lorain | Lakeview Beach | 8/29/08 | 9/3/08 | Bacteria | Unknown
Lorain | Lakeview Beach | 9/5/08 | 9/6/08 | Bacteria | Unknown
Lucas | Maumee Bay State Park (Erie) | 6/5/08 | 6/6/08 | Bacteria | Unknown
Lucas | Maumee Bay State Park (Erie) | 6/11/08 | 6/12/08 | Bacteria | Unknown
Lucas | Maumee Bay State Park (Erie) | 6/13/08 | 6/17/08 | Bacteria | Unknown
Lucas | Maumee Bay State Park (Erie) | 7/4/08 | 7/8/08 | Bacteria | Unknown
Lucas | Maumee Bay State Park (Erie) | 7/31/08 | 8/1/08 | Bacteria | Unknown
Lucas | Maumee Bay State Park (Erie) | 8/15/08 | 8/19/08 | Bacteria | Unknown
Lucas | Maumee Bay State Park (Erie) | 8/20/08 | 8/21/08 | Bacteria | Unknown
Lucas | Maumee Bay State Park (Erie) | 9/5/08 | 9/6/08 | Bacteria | Unknown
Ottawa | Camp Perry | 6/18/08 | 6/19/08 | Bacteria | Unknown
Ottawa | Camp Perry | 7/1/08 | 7/3/08 | Bacteria | Unknown
Ottawa | Camp Perry | 7/4/08 | 7/8/08 | Bacteria | Unknown
Ottawa | Camp Perry | 7/10/08 | 7/15/08 | Bacteria | Unknown
Ottawa | Camp Perry | 7/22/08 | 7/25/08 | Bacteria | Unknown
Ottawa | Camp Perry | 8/1/08 | 8/5/08 | Bacteria | Unknown
Ottawa | Camp Perry | 8/7/08 | 8/13/08 | Bacteria | Unknown
Ottawa | Camp Perry | 8/15/08 | 8/19/08 | Bacteria | Unknown
Ottawa | Camp Perry | 8/20/08 | 8/22/08 | Bacteria | Unknown
Ottawa | Camp Perry | 8/28/08 | 8/29/08 | Bacteria | Unknown
Ottawa | Camp Perry | 9/3/08 | 9/4/08 | Bacteria | Unknown
Ottawa | Camp Perry | 9/5/08 | 9/6/08 | Bacteria | Unknown
Ottawa | Catawba Island State Park | 8/20/08 | 8/21/08 | Bacteria | Unknown
Ottawa | Lakeside Beach | 7/1/08 | 7/2/08 | Bacteria | Unknown
Ottawa | Lakeside Beach | 7/11/08 | 7/15/08 | Bacteria | Unknown
Ottawa | Port Clinton (Deep/Lakeview) | 7/4/08 | 7/8/08 | Bacteria | Unknown
Ottawa | Port Clinton (Deep/Lakeview) | 8/20/08 | 8/22/08 | Bacteria | Unknown
Ottawa | Port Clinton (Deep/Lakeview) | 8/28/08 | 8/29/08 | Bacteria | Unknown
Ottawa | Port Clinton (Deep/Lakeview) | 9/3/08 | 9/4/08 | Bacteria | Unknown
Ottawa | Port Clinton (Deep/Lakeview) | 9/5/08 | 9/6/08 | Bacteria | Unknown

**Explanation of Frequently Used Terms:** Preempt-model, Preemptive due to the results of computer models that use easily measurable physical parameters like wind direction and wave height to predict bacterial levels in real time.

**Notes**

Oregon has 59 beaches lining 186 miles of Pacific Ocean coastline. There are seven coastal counties: Clatsop, Coos, Curry, Lincoln, Tillamook, Douglas, and Lane.

The state’s beachwater quality monitoring program is administered by the Oregon Department of Human Services (DHS). The Oregon Department of Environmental Quality (DEQ) conducts beach monitoring through an inter-agency agreement with the DHS. The administering agency determines sampling practices, locations, standards, and notification protocols and practices throughout the state.

Sampling occurs all year with more monitoring occurring during the peak season from May to September. Of the beaches that are sampled, some are sampled only during the non-peak use season, when they are frequented by surfers and wet weather is expected to compromise water quality (October through April), some are sampled only during the peak use season (May through September), and some are sampled year-round.1

Monitoring revealed consistently high bacteria levels in stormwater discharges to Nye Beach in Lincoln County. Watershed investigations were conducted by local government officials at Nye Beach to determine impacts on beachwater quality. Mitigation of sources of fecal bacteria and beach contamination has begun and is expected to reduce the number of beach advisories. A sign was developed and posted above the discharge pipe warning the public not to play in the stormwater runoff or near the pipe. Also, watershed education leaflets were developed and distributed in the city’s utility bills.

Oregon’s beach monitoring program, in cooperation with the DEQ, loaned equipment and a mobile lab to Oregon State University and the South Coast Watershed Council as part of a Nonpoint Source Pollution – Section 319 grant. The study found that the primary sources of bacterial contaminants on Mill, Harris, and Sunset Bay beaches originate inland, and that the fecal indicator bacteria are delivered to the beach and near-shore environment by the fresh water creeks that cross the beach before flowing into the Pacific Ocean. The study also found that the most likely sources for elevated bacteria levels in streams flowing into Harris and Mill Beaches are pet/animal feces, failed septic systems, and combined sewer overflows. The study authors recommended development of a predictive model that uses easily measured environmental and water quality variables to estimate recreational water quality, as well as improving public understanding about the specific time periods when it is likely that beachwaters contain elevated concentrations of fecal indicator bacteria, particularly at Sunset Bay.1

The program participated in two Children’s Clean Water festivals to educate citizens about the Beach Program, marine water quality issues and actions people can take to protect their health and preserve marine environments. The coastal watershed model used at these festivals will continue to be used to help increase the awareness of the beach monitoring program and provide an understanding of the importance of water quality. Also in 2008, the program held its Third Annual Clean Beaches Art Contest for fourth and fifth graders. The students were asked to create an art piece that communicated how certain everyday activities can affect our oceans. In addition to these outreach activities, program staff visited city halls, visitor centers, chambers of commerce, local health departments, parks, surf shops, hotels and other businesses along the Oregon coast and provided program brochures. An annual newsletter titled Beach News is used to create awareness of new information and to keep individuals up to date on program happenings.1

The Oregon Department of Agriculture and the Oregon Fish and Wildlife Division monitor for harmful algal blooms that may impact shellfish consumption safety.3

Oregon received a $225,970 federal BEACH Act grant in 2008 and was eligible for a $229,000 grant in 2009. The federal grants fully fund the Oregon beach monitoring and notification program.
Standards

Indicator Organism: Enterococcus

Standards: Oregon uses a single-sample maximum enterococcus standard of 158 cfu/100 ml for beach advisory decisions in marine waters. This standard corresponds to the EPA’s “Moderate Full Body Contact Recreation” value for 19 illnesses/1000 swimmers. The DHS says their use of a standard that is less strict than the EPA’s “Designated Beach Area” standard is protective of public health, given the small number of swimmers and other recreational users of coastal waters in Oregon. The state does not have preemptive standards for rainfall but does issue preemptive sewage advisories.2 The state does not use predictive models to make advisory decisions, but analyses to determine the effect of storm events on marine water quality are ongoing. Correlational analyses between enterococcus levels and rainfall are continuously used to gauge the effect of storm events on bacteria concentrations at monitored beaches.1

Monitoring

Determination of Monitoring Locations and Frequency: In Oregon, sampling frequency and location varies from season to season. Beaches are prioritized for sampling based on the number of people recreating in the water, previous water quality data, known and suspected point and non-point pollution sources, and public comments. Sampling locations are re-evaluated every other year and prioritized based on use levels and previous monitoring results. Lightly used beaches with low bacteria counts are essentially allowed to rotate off the list to allow other beaches to be sampled. Water samples are taken near known or potential pollution sources.

Practice: Water samples are collected on weekdays at ankle to knee depth in the middle of typical bathing areas. All samples are collected and processed by a DEQ employee who travels the coastline in a mobile lab. Sampling results are generally known 24 hours after the sample is delivered to a lab.

Results: In 2008, Oregon reported 59 coastal beaches, 11 (19%) of which were monitored once a week, 15 (25%) every other week, and 33 (56%) were not monitored. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 3 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Harris Beach State Park in Curry County (20%), Nye Beach in Lincoln County (7%), Sunset Bay State Park Beach in Coos County (6%), Rockaway Beach in Tillamook County (5%), Bandon Beach State Wayside in Coos County (5%), Gold Beach in Curry County (5%), Cannon Beach in Clatsop County (4%), Mill Beach (4%) and Battle Rock State Park Beach (4%) in Curry County, and D River Beach in Lincoln County (2%).

Curry County had the highest exceedance rate (8%) followed by Coos (4%), Lincoln (3%), Clatsop (2%), Tillamook (1%), Douglas (0%), and Lane (0%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 22 beaches, the percent of samples exceeding the standard returned to 2005 levels at 3 percent after increasing to 8 and 6 percent in 2007 and 2006, respectively.

<table>
<thead>
<tr>
<th>2008 Oregon Monitoring Frequency and Results by Beach</th>
</tr>
</thead>
<tbody>
<tr>
<td>County</td>
</tr>
<tr>
<td>--------</td>
</tr>
<tr>
<td>Clatsop</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>------------</td>
</tr>
<tr>
<td>Clatsop</td>
</tr>
<tr>
<td>Clatsop</td>
</tr>
<tr>
<td>Clatsop</td>
</tr>
<tr>
<td>Clatsop</td>
</tr>
<tr>
<td>Clatsop</td>
</tr>
<tr>
<td>Clatsop</td>
</tr>
<tr>
<td>Coos</td>
</tr>
<tr>
<td>Coos</td>
</tr>
<tr>
<td>Coos</td>
</tr>
<tr>
<td>Coos</td>
</tr>
<tr>
<td>Coos</td>
</tr>
<tr>
<td>Curry</td>
</tr>
<tr>
<td>Curry</td>
</tr>
<tr>
<td>Curry</td>
</tr>
<tr>
<td>Curry</td>
</tr>
<tr>
<td>Curry</td>
</tr>
<tr>
<td>Curry</td>
</tr>
<tr>
<td>Curry</td>
</tr>
<tr>
<td>Curry</td>
</tr>
<tr>
<td>Curry</td>
</tr>
<tr>
<td>Curry</td>
</tr>
<tr>
<td>Curry</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Lane</td>
</tr>
<tr>
<td>Lane</td>
</tr>
<tr>
<td>Lane</td>
</tr>
<tr>
<td>Lane</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>------------</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Lincoln</td>
</tr>
<tr>
<td>Tillamook</td>
</tr>
<tr>
<td>Tillamook</td>
</tr>
<tr>
<td>Tillamook</td>
</tr>
<tr>
<td>Tillamook</td>
</tr>
<tr>
<td>Tillamook</td>
</tr>
<tr>
<td>Tillamook</td>
</tr>
<tr>
<td>Tillamook</td>
</tr>
<tr>
<td>Tillamook</td>
</tr>
<tr>
<td>Tillamook</td>
</tr>
<tr>
<td>Tillamook</td>
</tr>
<tr>
<td>Tillamook</td>
</tr>
<tr>
<td>Tillamook</td>
</tr>
<tr>
<td>Tillamook</td>
</tr>
</tbody>
</table>

N/A: Not applicable

Advisories

Advisory Issuance: In Oregon, the public is guaranteed free and uninterrupted use of all beaches along the coastline. Therefore, beach advisories are issued, but not closings. The beach monitoring program calculates the geometric mean for tracking trends only, not for issuing advisories.

Public notification for beach advisories occurs if a single sample result exceeds Oregon’s action limit. Resampling, in lieu of issuing public notification, is acceptable if there is reason to doubt the accuracy or certainty of the first sample, but to date, there have not been exceedances attributed to sampling or laboratory error that required resampling prior to the issuance of an advisory.1 There is no protocol for foregoing an advisory when an exceedance is found. The public is notified of advisories via media releases, phone calls to city and county officials, email notification to local governments and interested stakeholders, a 24-hour beach advisory hotline, and the Internet. County health departments, local governments, or Oregon Parks and Recreation Department, depending on who has jurisdiction over the affected beach, are responsible for posting signs at beaches where advisories have been issued, and permanent advisory signs have been installed at most of Oregon’s monitored beaches. The signs are aluminum and hinged to display a “water monitoring site” message when there is no advisory in effect and a “health advisory” message when an advisory is in effect.1 Local jurisdictions posted an advisory sign at the beach every time an exceedance was identified in 2008.

Advisories are issued for entire beaches rather than for sections of a beach.

Reopening Procedures: Advisories are not lifted until enterococcus concentrations meet applicable water quality standards. Following an advisory, additional samples are collected to lift the advisory sooner, rather than waiting until the next routine sampling results are received. If resources are available, the additional samples are collected within 96 hours of the advisory, after which routine sampling resumes.2 Beginning in 2008, the program began conducting followup monitoring after known sewage spills and major pollution events.1 States that monitor more frequently after an exceedance is found and after pollution events will tend to have higher percent exceedance rates and lower total closing/
advisory days than they would have had if their sampling frequency did not increase after an exceedance was found or after pollution events.

**Number of Advisories:** Oregon had 26 advisory events in 2008. Total advisory days for 26 events lasting six consecutive weeks or less decreased 15 percent to 86 days in 2008 from 101 days in 2007, 66 days in 2006, and 117 days in 2005. In addition, there were no extended or permanent events in 2008 or 2007. Extended events are those in effect more than 6 consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks.

**Causes of Advisories:** For events lasting six consecutive weeks or less, 93% (80) of advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, and 7% (6) were preemptive (i.e. without waiting for monitoring results) due to known sewage spills/leaks.

The reported sources of beachwater contamination for 2008 are as follows: 52% (45) of advisory days were from unknown sources of contamination, 15% (13) were from sewage spills/leaks, and 33% (28) were from other sources of contamination including sewer line cross connections and a clogged ocean outfall line.

**2008 Oregon Beach Advisories**

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Clatsop</td>
<td>Cannon Beach</td>
<td>1/30/08</td>
<td>2/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Clatsop</td>
<td>Cannon Beach</td>
<td>2/26/08</td>
<td>2/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Clatsop</td>
<td>Cannon Beach</td>
<td>3/25/08</td>
<td>3/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Clatsop</td>
<td>Cannon Beach</td>
<td>7/1/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Clatsop</td>
<td>Cannon Beach</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Coos</td>
<td>Sunset Bay State Park Beach</td>
<td>8/21/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Curry</td>
<td>Bandon Beach State Wayside</td>
<td>9/17/08</td>
<td>9/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Curry</td>
<td>Battle Rock State Park Beach</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Coos</td>
<td>Gold Beach</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Curry</td>
<td>Harris Beach State Park</td>
<td>6/5/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Curry</td>
<td>Harris Beach State Park</td>
<td>6/17/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Curry</td>
<td>Harris Beach State Park</td>
<td>6/25/08</td>
<td>7/4/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Curry</td>
<td>Harris Beach State Park</td>
<td>7/22/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Curry</td>
<td>Harris Beach State Park</td>
<td>9/23/08</td>
<td>9/26/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Curry</td>
<td>Mill Beach</td>
<td>7/15/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Curry</td>
<td>Mill Beach</td>
<td>8/28/08</td>
<td>9/4/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Douglas</td>
<td>Umpqua Beach</td>
<td>2/5/08</td>
<td>2/7/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Lincoln</td>
<td>D River Beach</td>
<td>8/20/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lincoln</td>
<td>Nye Beach</td>
<td>1/10/08</td>
<td>1/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lincoln</td>
<td>Nye Beach</td>
<td>1/31/08</td>
<td>2/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lincoln</td>
<td>Nye Beach</td>
<td>2/5/08</td>
<td>2/7/08</td>
<td>Preempt-sew</td>
<td>Other</td>
</tr>
<tr>
<td>Lincoln</td>
<td>Nye Beach</td>
<td>2/14/08</td>
<td>2/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lincoln</td>
<td>Nye Beach</td>
<td>4/23/08</td>
<td>4/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Lincoln</td>
<td>Nye Beach</td>
<td>8/21/08</td>
<td>8/22/08</td>
<td>Preempt-sew</td>
<td>Sanitary-sew-over</td>
</tr>
<tr>
<td>Tillamook</td>
<td>Rockaway Beach</td>
<td>4/9/08</td>
<td>4/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Tillamook</td>
<td>Rockaway Beach</td>
<td>9/23/08</td>
<td>9/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** Other, Strong waves or wind, chemical spills, no lifeguard, jellyfish, etc.; Preempt-sew, Preemptive due to sewage discharge or spill; Sanitary-sew-over, Sanitary sewer overflow.
Notes


2 Jennifer Ketterman, Department of Human Services, personal communication, May 2009.

The 40 miles of Lake Erie shoreline in Pennsylvania are all located in Erie County. Of this shoreline, approximately seven miles of beach are in Presque Isle State Park, less than one mile is a permitted public bathing beach outside the state park, and the remainder is composed of private, unpermitted beaches or other shoreline.

The Pennsylvania Department of Conservation and Natural Resources is responsible for monitoring beaches at Presque Isle State Park. Other permitted beaches located on Lake Erie are monitored by the individual permit holders, which are usually local municipalities or organizations. Results of all monitoring programs are reported to the Erie County Department of Health, which periodically collects samples at various beaches in the county to crosscheck monitoring results. Practices are regulated by the state, with permit holders allowed to monitor more frequently than the state requires if they desire.

Beachwater quality monitoring activities are conducted from Memorial Day to Labor Day.

Sanitary surveys were conducted at two beaches at Presque Isle State Park in 2007. In addition, three research projects conducted by local universities addressed E. coli transport from streams upcurrent of Presque Isle, the concentration of beach sands for E. coli in beach sands, and the variation of E. coli density at various locations and depths within the geographic boundaries of certain beaches. The results of those studies have been utilized by beach managers in implementing beach grooming. Additional research using qPCR analysis to determine the human E. coli and bacteroides contributions to the total bacterial load has been initiated.

Pennsylvania’s beach monitoring program does not conduct outreach to the public to inform them about behaviors that influence beachwater quality because this type of outreach is not part of the Pennsylvania Sea Grant program.1

Pennsylvania does not monitor for harmful algal blooms in Lake Erie, as harmful algal blooms have not been identified in the eastern basin of Lake Erie where Pennsylvania beaches are located.1

Pennsylvania received a $219,650 federal BEACH Act grant in 2008 and was eligible for a $222,000 grant in 2009. The Lake Erie beach monitoring program is fully funded by BEACH Act grants.

**Standards**

**Indicator Organism:** E. coli

**Standards:** In Pennsylvania, if a single-sample E. coli count is between 235 and 1000 cfu/100 ml, a swimming advisory is issued. If a single-sample count is 1000 cfu/100 ml or greater, a swimming restriction is posted and swimming is prohibited. Pennsylvania also uses the 5-sample, 30-day geometric mean standard for E. coli of 126 cfu/100 ml to post restrictions.1

Pennsylvania issues preemptive rain advisories at its Lake Erie beaches when rainfall exceeds 0.5 inches in a 24-hour period.1 Beaches are also preemptively posted with restrictions when there is a known sewage spill and when high waves and strong winds out of the west are present.1 A rapid method of determining bacterial levels, qPCR, is used in the event of a presumptive advisory issued by the Presque Isle Beach manager to confirm within four hours if the E. coli concentrations warrant the advisory. Advisories or restrictions based on monitoring data, however, are determined solely by using the standard culture-based method, not by qPCR analysis.

In 2004, the Erie County Department of Health began developing a predictive model of recreational beachwater quality based on weather, known sewage discharges, storm events, and water currents. The department uses data collected...
by the beach program to see if a correlation exists between weather conditions and high bacterial counts. The model will allow beach managers to issue advisories or restrictions based on real-time measurement of specific weather conditions prior to obtaining the results of monitoring samples.\(^2\) A stream gauge has been installed on a major tributary to Lake Erie that influences the water quality of the beaches to inform the development of predictive water quality models for additional beaches on Presque Isle State Park.\(^1\) In 2008, a water quality buoy that retrieves water quality data in real time was deployed off of Presque Isle, and the data from this buoy are also being utilized in predictive model development.\(^1\)

**Monitoring**

**Practice:** Samples are collected between 9 a.m. and noon in water that is approximately 30 inches deep, midway between the surface and the bottom. Lab analysis takes a minimum of 24 hours to complete. Presque Isle beaches are sampled on Sundays and Mondays and Freeport Beach is sampled on Thursdays.\(^1\)

**Determination of Monitoring Locations and Frequency:** By regulation, at least three samples of water are taken from each beach at least once a week. Two samples are taken approximately 50 feet from each end of the beach and the third sample is taken in the center. Presque Isle State Park has established a protocol that requires two samplings each week.

**Results:** In 2008, Pennsylvania reported 12 Lake Erie beaches, 11 (92%) of which were monitored more than once a week, and one (8%) once a week. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 9 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Beach 1 West Extension (18%), Freeport Beach (18%), Beach 1 East (14%), Beach 1 West (13%), and Barracks Beach (10%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of six beaches, the percent of samples exceeding the standard increased to 5 percent in 2008 from 2 percent in 2007, but decreased from 9 and 6 percent in 2006 and 2005, respectively.
Restrictions and Advisories

Restriction and Advisory Issuance: Swimming advisories and restrictions are issued at Lake Erie beaches, rather than beach closings. If the E. coli level in a regulatory sample is greater than or equal to 235 cfu/100ml, but less than 1,000 cfu/100ml, the beach is posted with a swimming advisory, swimming is permitted, and the public is informed that the E. coli level exceeds standards. They are also advised about what precautions to take should they choose to enter the water. If the E. coli level is equal to or greater than 1,000 cfu/100 ml, the beach is posted with a swimming restriction and swimming is not permitted. There is no protocol for delaying or foregoing an advisory or restriction when bacterial standards are exceeded. When advisories or restrictions are issued, appropriate officials and the media are notified and warnings are posted on park entrance signs. Lifeguards prevent people from entering the water during a restriction. Advisories and restrictions are issued for an entire beach, not sections of a beach.

Reopening Procedures: If an advisory or a restriction is posted, beaches are resampled for three consecutive days. Restrictions are converted to advisories if the E. coli count drops to between 235 and 1000 cfu/100 ml, and advisories are lifted when resampling indicates a bacteria level below 235 cfu/100 ml. States that monitor more frequently after an exceedance is found will tend to have higher percent exceedances and lower total advisory days than they would have had if their sampling frequency did not change after an exceedance was found. In Pennsylvania, the sampling schedule does not change when preemptive rainfall advisories are issued.

Number of Restrictions and Advisories: Pennsylvania had 39 restriction/advisory events in 2008. Total restriction/advisory days for 39 events lasting six consecutive weeks or less increased nine-fold to 45 days in 2008 from 6 days in 2007, but was about on par with previous years levels (53 days in 2006 and 39 days in 2005). In addition, there were no extended or permanent events in 2008. Extended events are those in effect more than 6 consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. In 2007, there was one extended event (90 days total) and no permanent events.

Causes of Restrictions and Advisories: For events lasting six consecutive weeks or less, 82% (37) of restriction/advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, 18% (8) were preemptive (i.e. without waiting for monitoring results) due to results of predictive modeling of beachwater bacteria levels.

The reported sources of beachwater contamination for 2008 are as follows: All restriction/advisory days were from stormwater runoff.

### 2008 Pennsylvania Beach Restrictions and Advisories

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Erie</td>
<td>Barracks Beach</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Barracks Beach</td>
<td>6/12/08</td>
<td>6/13/08</td>
<td>Preempt-model</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Barracks Beach</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Barracks Beach</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Barracks Beach</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 East</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 East</td>
<td>6/12/08</td>
<td>6/13/08</td>
<td>Preempt-model</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>----------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------</td>
<td>----------</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 East</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Preempt-model</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 East</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 East</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 East</td>
<td>7/26/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 East</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 West</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 West</td>
<td>6/12/08</td>
<td>6/13/08</td>
<td>Preempt-model</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 West</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 West</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Preempt-model</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 West</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 West</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Preempt-model</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 West</td>
<td>9/9/08</td>
<td>9/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 West Extension</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 West Extension</td>
<td>6/12/08</td>
<td>6/13/08</td>
<td>Preempt-model</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 West Extension</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 West Extension</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Preempt-model</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 West Extension</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 West Extension</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 1 West Extension</td>
<td>7/31/08</td>
<td>8/1/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 10 (Bundy Beach)</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 10 (Bundy Beach)</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 10 (Bundy Beach)</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 10 (Bundy Beach)</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 11</td>
<td>9/1/08</td>
<td>9/2/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 6</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 6</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 8 (Pettinato Beach)</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 9 (Pine Tree Beach)</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 9 (Pine Tree Beach)</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Beach 9 (Pine Tree Beach)</td>
<td>7/24/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Freeport Beach</td>
<td>7/9/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Erie</td>
<td>Mill Road Beaches</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** Preempt-model, Preemptive due to the results of computer models that use easily measurable physical parameters like wind direction and wave height to predict bacterial levels in real time.

**Notes**

Rhode Island has 238 public coastal beaches along about 400 miles of Atlantic Ocean and Narragansett Bay waters. All Rhode Island counties have coastal beaches that are monitored. The Rhode Island Department of Health is responsible for beachwater monitoring and water quality notifications. This agency determines sampling practices, locations, standards, and notification protocols and practices throughout the state. Rhode Island requires licensing of beaches that are open to the public by permit and/or payment of a fee, or are maintained as a private club or association requiring membership fees or dues, or are maintained with or without charge for the recreation of groups of ten or more children. Beaches that don’t meet these criteria can be used for swimming, but the Department of Health does not promote or endorse the use of non-licensed beaches for primary contact recreation. Licensed freshwater beaches are monitored as well, but are not included in this summary.

The regular monitoring season runs from Memorial Day through Labor Day. The City of Newport grants money to a local Aquidneck Island volunteer organization, Clean Ocean Access, to continue sampling Easton’s Beach and Atlantic Beach Club Beach during the off-season when surfers utilize the beach area as well as four additional non-licensed beaches in Newport.

The 2008 bathing season saw a significant increase in beach closings and closing days from the 2007 season. This was probably partly due to increased rainfall in 2008, but also to refined sampling procedures that focus monitoring efforts in areas of greatest concern and target sample collection for times when high bacteria counts are most likely to be present. These enhanced monitoring activities further protect public health, but they also result in an increase in the number of beach closings. Closing days at beaches in the City of Warwick may have increased due to delays in obtaining samples to see if the water quality had improved and the beaches could be reopened. These beaches could not be reopened until samples met water quality standards, but since this sampling was delayed, the beaches had to remain closed because until they were sampled there was no way to know whether the beachwater was meeting standards.

Monitoring data has triggered ongoing efforts to identify beach cleanup and prevention activities at Scarborough State Beach, Easton’s Beach, and Warren Town Beach. The Department of Health continues to work with the Rhode Island Department of Environmental Management (RIDEM) to determine if combined sewer overflows in the upper bay may be contributing to beach closings at Conimicut Point.

The monitoring program in Rhode Island has a strong source identification emphasis. If standard assessment procedures do not reveal the source of contamination when a beach exceeds standards, then the RIDEM is contacted for assistance with identification and elimination of sources. As part of the EPA’s New England Beach Strategy, the Department of Health is coordinating monitoring efforts, facilitating data exchange, and working to correct issues facing beaches in the City of Warwick. The Department of Health is also working with the Town of Bristol to find and eliminate sources of contamination at their beaches.

The Department of Health is required to conduct sanitary surveys of all licensed beaches every five years. The latest survey effort began in 2008 and is ongoing. It is anticipated that the results will help fine-tune the location and frequency of sampling efforts.

The Department of Health uses every opportunity to convey the importance of not feeding wildlife. This outreach is done on a casual basis when someone from the public asks why a beach has poor water quality and as part of more formal outreach efforts to improve water quality at beaches with known wildlife problems. Formal outreach efforts were conducted at Oakland Beach in 2008. Also in 2008, the beach program helped prepare a small news segment on beachwater sampling and beachwater quality. In addition, the program participated in Governor’s Bay Day by educating the public about what they can do to minimize beach closings.
During the 2008 swim season, seaweed levels at Easton’s Beach were monitored in an effort to see what role seaweed has on bacteria levels. A seaweed harvester was purchased for use during the summer of 2009. The harvester will run along the water’s edge and collect seaweed that has washed up on the shore. The Department of Health is hoping to see improved water quality at Easton’s Beach when the seaweed is regularly removed.

Rhode Island is not affected by harmful algal blooms.

Rhode Island received a $209,650 federal BEACH Act grant in 2008 and was eligible for a $213,000 grant in 2009. The cost of the coastal monitoring program is fully funded by the federal grant.

**Standards**

**Indicator Organism:** Enterococcus

**Standards:** Rhode Island’s coastal bathing water standard is a single-sample maximum of 104 cfu/100 ml of enterococcus.

If a known sewage discharge occurs in close proximity to a beach, the beach is closed immediately without waiting for sampling results to confirm contamination. Two beaches have preemptive rainfall standards: Scarborough and Easton’s Beaches are closed when there is more than one inch of rainfall in a 24-hour period. Easton’s Beach reopens within 12 hours of cessation of heavy rain. The beach monitoring program generally recommends no water contact within three days of heavy rainfall. The Department of Health continues to collect data for the development of a comprehensive preemptive closing model. Occasionally, beachwater is tested for salinity, but the results do not effect beach closing.

**Monitoring**

**Determination of Monitoring Locations and Frequency:** High priority for more frequent monitoring is given to beaches with direct known sources of pollution (i.e. stormwater outfalls, septic/sewer connections, population density, location of nearby sewer plants) and high usage, and to facilities that have exhibited poor water quality in the past. Monitoring locations are focused in areas of greatest concern and sampling times are targeted for when high bacteria counts are likely to occur. The number of samples collected on a beach is dependent on the length of coastline and the presence of physical barriers to circulation (jetties, groins, etc.). Furthermore, streams and pipes are sampled as needed (wet weather events, investigations, etc.). In the past, only licensed beaches were monitored, but in 2008 several non-licensed but popular swimming beaches were monitored.

**Practice:** Samples are collected in the morning, just below the surface of the water in water that is approximately three feet deep. Results are available 24 hours after delivery to the lab. Sampling generally takes place Monday through Friday, but if needed, can be done on weekends.

**Results:** In 2008, Rhode Island reported 234 coastal beaches, 15 (6%) of which were monitored more than once a week, 9 (4%) once a week, 5 (2%) every other week, 46 (20%) less than once a month, and 159 (68%) were not monitored. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 14 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Saunderstown Yacht Club in Washington County (37%), Atlantic Beach Club (35%) and Easton’s Beach (32%) in Newport County, Camp Grosvenor in Washington County (30%), Marine Avenue Beach (28%) in Newport County, Scarborough State Beach North (28%), and Scarborough State Beach South (22%) in Washington County.
Conimicut Point Beach in Kent County (21%), Third Beach (19%) and Mackerel Cove Beach (17%) in Newport County, and Oakland Beach in Kent County (14%).

Newport County had the highest exceedance rate (18%) followed by Washington (12%), Kent (12%), and Bristol (10%). Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 38 beaches, the percent of samples exceeding the standard increased to 14 percent in 2008 after three years of consistent decreases (16, 12, and 7 percent in 2005, 2006, and 2007, respectively).

### 2008 Rhode Island Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bristol</td>
<td>Bristol Town Beach</td>
<td>1</td>
<td>3/wk</td>
<td>100</td>
<td>12%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Warren Town Beach</td>
<td>1</td>
<td>2/wk</td>
<td>110</td>
<td>11%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Barrington Beach</td>
<td>1</td>
<td>3/wk</td>
<td>82</td>
<td>7%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Camp St. Dorothy</td>
<td>1</td>
<td>1/wk</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Bristol</td>
<td>Rumstick Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Annawamscutt Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Bristol Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Bristol Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Hopeworth Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Warren Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Baia Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Latham Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Touisset Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Camp Crosby</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Barrington Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Barrington Unnamed #4</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Warren Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Barrington Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Barrington Unnamed #3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bristol</td>
<td>Juniper Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kent</td>
<td>Conimicut Point Beach</td>
<td>1</td>
<td>3/wk</td>
<td>80</td>
<td>21%</td>
</tr>
<tr>
<td>Kent</td>
<td>Oakland Beach</td>
<td>1</td>
<td>3/wk</td>
<td>121</td>
<td>14%</td>
</tr>
<tr>
<td>Kent</td>
<td>City Park Beach</td>
<td>1</td>
<td>3/wk</td>
<td>64</td>
<td>9%</td>
</tr>
<tr>
<td>Kent</td>
<td>Goddard Memorial State Park</td>
<td>1</td>
<td>3/wk</td>
<td>141</td>
<td>7%</td>
</tr>
<tr>
<td>Kent</td>
<td>Rocky Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kent</td>
<td>Chepiwanoxet</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kent</td>
<td>Warwick Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kent</td>
<td>Warwick Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kent</td>
<td>Potowomut</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kent</td>
<td>Cole Farm Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kent</td>
<td>Buttonwoods Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kent</td>
<td>Longmeadow</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kent</td>
<td>Cedar Tree Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>
## County Beach | Tier | Monitoring Frequency | Total Samples | Percent Exceedance
--- | --- | --- | --- | ---
Kent Gaspee Point  | 3 | None | 0 | N/A
Kent Mill Cove Beach  | 3 | None | 0 | N/A
Newport Atlantic Beach Club  | 1 | 3/wk | 108 | 35%
Newport Easton's Beach  | 1 | 2/wk | 290 | 32%
Newport Marine Avenue Beach  | 3 | 1/wk | 53 | 28%
Newport Third Beach  | 1 | 3/wk | 117 | 19%
Newport Mackerel Cove Beach  | 2 | 4/yr | 30 | 17%
Newport Peabody's Beach  | 2 | 4/yr | 19 | 11%
Newport King Park Swim Area  | 3 | 1/wk | 51 | 10%
Newport Sachuest Beach  | 2 | 4/yr | 39 | 8%
Newport Easton's Point  | 3 | 1/wk | 53 | 8%
Newport Fort Adams State Park  | 1 | 3/wk | 58 | 7%
Newport Ochre Point (Ruggles)  | 3 | 1/wk | 53 | 6%
Newport Spouting Rock Beach Association  | 2 | 4/yr | 20 | 5%
Newport Fogland Beach  | 2 | 4/yr | 24 | 4%
Newport Elm Street Pier  | 3 | 1/wk | 52 | 4%
Newport Vanzandt Pier  | 3 | 1/wk | 53 | 4%
Newport Grinells Beach  | 2 | 2/wk | 16 | 0%
Newport Sandy Point Beach  | 2 | 4/yr | 16 | 0%
Newport Hazard's Beach  | 2 | 4/yr | 14 | 0%
Newport Warrens Point Beach Club  | 2 | 4/yr | 14 | 0%
Newport Briggs Beach  | 2 | 4/yr | 11 | 0%
Newport Goosewing Beach  | 2 | 4/yr | 17 | 0%
Newport South Shore Beach  | 2 | 4/yr | 12 | 0%
Newport Gooseberry Beach  | 2 | 4/yr | 12 | 0%
Newport Middletown Unnamed #1  | 3 | None | 0 | N/A
Newport Portsmouth Unnamed #1  | 3 | None | 0 | N/A
Newport Prudence Island Unnamed #7  | 3 | None | 0 | N/A
Newport Portsmouth Unnamed #7  | 3 | None | 0 | N/A
Newport Prudence Island Unnamed #11  | 3 | None | 0 | N/A
Newport Portsmouth Unnamed #2  | 3 | None | 0 | N/A
Newport Jamestown Unnamed #4  | 3 | None | 0 | N/A
Newport Little Compton Unnamed #4  | 3 | None | 0 | N/A
Newport Little Compton Unnamed #2  | 3 | None | 0 | N/A
Newport Portsmouth Unnamed #10  | 3 | None | 0 | N/A
Newport Tiverton Unnamed #1  | 3 | None | 0 | N/A
Newport Tiverton Unnamed #10  | 3 | None | 0 | N/A
Newport Tiverton Unnamed #7  | 3 | None | 0 | N/A
Newport Prudence Island Unnamed #10  | 3 | None | 0 | N/A
Newport Fort Weatherill  | 3 | None | 0 | N/A
Newport Fort Getty  | 3 | None | 0 | N/A
Newport Tiverton Unnamed #2  | 3 | None | 0 | N/A
<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Newport</td>
<td>Prudence Island Unnamed #4</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Little Compton Unnamed #8</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Portsmouth Unnamed #11</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Teddys Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Seaside Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Middletown Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Island Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Tiverton Unnamed #6</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Patience Island Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Newport Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Prudence Island Unnamed #3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Little Compton Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Mccorrie Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Portsmouth Unnamed #4</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Little Compton Unnamed #3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Portsmouth Unnamed #5</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Portsmouth Unnamed #13</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Prudence Island Unnamed #9</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Portsmouth Unnamed #3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Rocky Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Tiverton Unnamed #4</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Little Compton Unnamed #11</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Portsmouth Unnamed #6</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Newport Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Portsmouth Unnamed #8</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Little Compton Unnamed #7</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Tiverton Unnamed #3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Little Compton Unnamed #6</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Tiverton Unnamed #11</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Tiverton Unnamed #12</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Prudence Island Unnamed #8</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Tiverton Unnamed #9</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Kings Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Jamestown Unnamed #3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Prudence Island Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Portsmouth Unnamed #12</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Prudence Island Unnamed #6</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Little Compton Unnamed #5</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Prudence Island Unnamed #5</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>West Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Jamestown Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Little Compton Unnamed #9</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Newport</td>
<td>Tiverton Unnamed #5</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Jamestown Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Portsmouth Unnamed #9</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Collins Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Little Compton Unnamed #10</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Prudence Island Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Sapowet Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Tiverton Unnamed #8</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Newport</td>
<td>Portsmouth Unnamed #14</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Providence</td>
<td>East Providence Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Providence</td>
<td>Cranston Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Providence</td>
<td>Sabins Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Providence</td>
<td>East Providence Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Providence</td>
<td>Bullocks Neck</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Providence</td>
<td>Crescent Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Providence</td>
<td>Cranston Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Providence</td>
<td>Bold Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Saunetown Yacht Club</td>
<td>2</td>
<td>4/yr</td>
<td>38</td>
<td>37%</td>
</tr>
<tr>
<td>Washington</td>
<td>Camp Grosvenor</td>
<td>1</td>
<td>3/wk</td>
<td>43</td>
<td>30%</td>
</tr>
<tr>
<td>Washington</td>
<td>Scarborough State Beach North</td>
<td>1</td>
<td>2/wk</td>
<td>209</td>
<td>28%</td>
</tr>
<tr>
<td>Washington</td>
<td>Scarborough State Beach South</td>
<td>1</td>
<td>2/wk</td>
<td>123</td>
<td>22%</td>
</tr>
<tr>
<td>Washington</td>
<td>Bonnet Shores Beach Club</td>
<td>1</td>
<td>2/mo</td>
<td>33</td>
<td>12%</td>
</tr>
<tr>
<td>Washington</td>
<td>Matunuck Town Beach</td>
<td>2</td>
<td>4/yr</td>
<td>21</td>
<td>10%</td>
</tr>
<tr>
<td>Washington</td>
<td>Camp Fuller-Ymca Beach</td>
<td>2</td>
<td>2/mo</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Washington</td>
<td>East Beach</td>
<td>3</td>
<td>4/yr</td>
<td>13</td>
<td>8%</td>
</tr>
<tr>
<td>Washington</td>
<td>Dunes Club</td>
<td>2</td>
<td>4/yr</td>
<td>28</td>
<td>7%</td>
</tr>
<tr>
<td>Washington</td>
<td>North Kingstown Town Beach</td>
<td>1</td>
<td>1/wk</td>
<td>82</td>
<td>2%</td>
</tr>
<tr>
<td>Washington</td>
<td>Plum Beach Club</td>
<td>2</td>
<td>2/mo</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Misquamicut State Beach</td>
<td>1</td>
<td>2/mo</td>
<td>22</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Roy Carpenter's Beach</td>
<td>2</td>
<td>4/yr</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Charlestown Breachway</td>
<td>3</td>
<td>2/yr</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>East Matunuck State Beach</td>
<td>3</td>
<td>2/yr</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Salty Brine Beach</td>
<td>3</td>
<td>2/yr</td>
<td>9</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Surf Hotel</td>
<td>3</td>
<td>2/yr</td>
<td>2</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Capt Roger Wheeler</td>
<td>1</td>
<td>1/wk</td>
<td>71</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Narragansett Town Beach</td>
<td>1</td>
<td>3/mo</td>
<td>37</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Willow Dell Beach Club</td>
<td>2</td>
<td>4/yr</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Atlantic Beach Casino Resort</td>
<td>3</td>
<td>4/yr</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Ocean House</td>
<td>3</td>
<td>2/yr</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Westerly Town Beach-New</td>
<td>3</td>
<td>4/yr</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Charlestown Beach</td>
<td>3</td>
<td>4/yr</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Ballards Inn</td>
<td>3</td>
<td>4/yr</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------------</td>
<td>----------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Washington</td>
<td>Alfies</td>
<td>2</td>
<td>4/yr</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Dunes Park</td>
<td>2</td>
<td>4/yr</td>
<td>9</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Charlestown Town Beach</td>
<td>2</td>
<td>4/yr</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Sandy Shore Motel</td>
<td>2</td>
<td>4/yr</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Atlantic Beach Park</td>
<td>2</td>
<td>4/yr</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Pleasant View Inn</td>
<td>2</td>
<td>4/yr</td>
<td>9</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Westerly Town Beach-Old</td>
<td>2</td>
<td>4/yr</td>
<td>9</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Misquamicut Club</td>
<td>2</td>
<td>4/yr</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Blue Shutters Beach</td>
<td>2</td>
<td>4/yr</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Weekapaug Fire District</td>
<td>2</td>
<td>4/yr</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Galilee Beach Club Associat</td>
<td>2</td>
<td>4/yr</td>
<td>8</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Jims Trailer Park</td>
<td>2</td>
<td>4/yr</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Andrea Hotel</td>
<td>2</td>
<td>4/yr</td>
<td>10</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Sam’s Beach</td>
<td>2</td>
<td>4/yr</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Seaside Beach Club</td>
<td>2</td>
<td>4/yr</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Fred Benson Town Beach</td>
<td>2</td>
<td>4/yr</td>
<td>7</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Misquamicut Fire District Beach</td>
<td>3</td>
<td>4/yr</td>
<td>6</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Atlantic Pizza And Grill</td>
<td>2</td>
<td>4/yr</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Paddy’s Beach</td>
<td>2</td>
<td>4/yr</td>
<td>5</td>
<td>0%</td>
</tr>
<tr>
<td>Washington</td>
<td>Block Island Unnamed #8</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Block Island Unnamed #4</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Narragansett Unnamed #4</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Block Island Unnamed #7</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Block Island Unnamed #11</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Westquage Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Block Island Unnamed #6</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>North Kingstown Unnamed #13</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>South Kingstown Unnamed #3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Block Island Unnamed #12</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>North Kingstown Unnamed #9</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Narragansett Unnamed #5</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Moonstone Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>North Kingstown Unnamed #10</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Narragansett Unnamed #10</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Westerly Unamed # 3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Deep Hole Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Narragnaset Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Trustom Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Cafe Pasture Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>North Kingstown Unnamed #12</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>North Kingstown Unnamed #7</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Charlestown Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------</td>
<td>---------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Washington</td>
<td>North Kingstown Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Kelly Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>North Kingstown Unnamed #8</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Block Island Unnamed #9</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>North Kingstown Unnamed #3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Narragansett Unnamed #3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Narragansett Unnamed #7</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>North Kingstown Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Green Hill Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>North Kingstown Unnamed #6</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>South Kingstown Unnamed #5</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Quonochotaug Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Narragansett Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>North Kingstown Unnamed #4</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Narragansett Unnamed #6</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Block Island Unnamed #3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Block Island Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Westerly Unamed # 4</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Narragansett Unnamed #11</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Block Island Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Block Island Unnamed #10</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>South Kingstown Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Westerly Unamed # 2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>South Kingstown Unnamed #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>North Kingstown Unnamed #11</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Narragansett Unnamed #8</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Narragansett Unnamed #9</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Block Island Unnamed #5</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>South Kingstown Unnamed #4</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Westerly Unamed # 1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Napa Tree Point Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>Charlestown Unnamed #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Washington</td>
<td>North Kingstown Unnamed #5</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>

N/A: Not Applicable

### Closings and Advisories

**Closing/Advisory Issuance:** Rhode Island issues both beach closings (for bacterial contamination) and advisories (due to rain). Beaches north of Conimicut Point in Warwick and Nayatt Point in Barrington are unlicensed because of ongoing water quality issues, and the public is advised to avoid water contact in those areas. No geometric mean standard is applied when determining whether to issue a beach closing. Typically, if sampling results exceed the standard, a beach is closed. However, the Department of Health considers several environmental factors before deciding whether to close a beach based on monitoring results, including the presence of wildlife, seaweed, how many tides have occurred since the
sample was collected, the history of sample results for that beach, and rainfall. On rare occasions, if environmental factors do not suggest fecal contamination, the beach may remain open while it is resampled.

The public is notified of closings and advisories via signs, a hotline, a website, press releases to television and radio stations, and an e-mail list. A beach flagging system is being replaced with permanent signage for the 2009 swim season.

Typically, entire beaches are closed rather than sections. However, some beaches may occasionally advise swimmers not to use certain portions, such as those areas close to streams after rainfall.

**Reopening Procedures:** If a beach is closed or placed under advisory, sampling is conducted daily until the water quality meets standards and the beach is reopened. If a less frequently monitored beach exceeds standards, it is monitored once a week for four weeks after meeting standards. If standards are violated again during this 4-week period, the beach is monitored once a week for the remainder of the beach season. Extensive wet weather sampling is conducted to determine the reopening schedule for beaches under preemptive rainfall advisories. States that monitor more frequently after an exceedance is found or after heavy rainfall will tend to have higher percent exceedance rates and lower total closing/advisory days than they would have had if their sampling schedule did not alter after an exceedance was found or after heavy rainfall.

**Number of Closings and Advisories:** Rhode Island had 53 closing/advisory events in 2008. Total closing/advisory days for events lasting six consecutive weeks or less increased 44% to 124 days in 2008 from 86 days in 2007, 256 days in 2006, and 57 days in 2005. In addition, there were no extended or permanent events in 2008. Extended events are those in effect more than 6 consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. In 2007, there were no extended events and one permanent event (94 days total).

**Causes of Closings and Advisories:** All closing and advisory days in 2008 were due to monitoring that revealed elevated bacteria levels.

The reported sources of beachwater contamination for 2008 are as follows: 30% (38) of closing/advisory days were from unknown sources of contamination, 64% (81) were from stormwater runoff, 5% (6) were from sewage spills, and 2% (2) were from heavy seaweed.

### 2008 Rhode Island Beach Closings and Advisories

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bristol</td>
<td>Barrington Beach</td>
<td>6/17/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bristol</td>
<td>Barrington Beach</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Barrington Beach</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bristol</td>
<td>Bristol Town Beach</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bristol</td>
<td>Bristol Town Beach</td>
<td>6/26/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bristol</td>
<td>Bristol Town Beach</td>
<td>8/13/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Warren Town Beach</td>
<td>6/17/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bristol</td>
<td>Warren Town Beach</td>
<td>6/26/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Bristol</td>
<td>Warren Town Beach</td>
<td>7/17/08</td>
<td>7/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Bristol</td>
<td>Warren Town Beach</td>
<td>7/25/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kent</td>
<td>City Park Beach</td>
<td>6/17/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kent</td>
<td>City Park Beach</td>
<td>6/25/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kent</td>
<td>City Park Beach</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kent</td>
<td>City Park Beach</td>
<td>7/24/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kent</td>
<td>Conimicut Point Beach</td>
<td>6/5/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kent</td>
<td>Conimicut Point Beach</td>
<td>6/17/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kent</td>
<td>Conimicut Point Beach</td>
<td>6/24/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------------</td>
<td>--------------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------</td>
<td>---------------</td>
</tr>
<tr>
<td>Kent</td>
<td>Conimicut Point Beach</td>
<td>7/1/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kent</td>
<td>Conimicut Point Beach</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kent</td>
<td>Conimicut Point Beach</td>
<td>7/22/08</td>
<td>7/23/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kent</td>
<td>Conimicut Point Beach</td>
<td>7/24/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kent</td>
<td>Goddard Memorial State Park</td>
<td>6/10/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kent</td>
<td>Oakland Beach</td>
<td>6/10/08</td>
<td>6/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kent</td>
<td>Oakland Beach</td>
<td>6/17/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kent</td>
<td>Oakland Beach</td>
<td>6/24/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kent</td>
<td>Oakland Beach</td>
<td>7/1/08</td>
<td>7/3/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kent</td>
<td>Oakland Beach</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kent</td>
<td>Oakland Beach</td>
<td>7/24/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Newport</td>
<td>Atlantic Beach Club</td>
<td>6/5/08</td>
<td>6/6/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Newport</td>
<td>Atlantic Beach Club</td>
<td>6/17/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Newport</td>
<td>Atlantic Beach Club</td>
<td>6/19/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Newport</td>
<td>Atlantic Beach Club</td>
<td>6/24/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Newport</td>
<td>Atlantic Beach Club</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Newport</td>
<td>Atlantic Beach Club</td>
<td>7/10/08</td>
<td>7/12/08</td>
<td>Bacteria</td>
<td>Heavy seaweed</td>
</tr>
<tr>
<td>Newport</td>
<td>Atlantic Beach Club</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Newport</td>
<td>Atlantic Beach Club</td>
<td>7/25/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Newport</td>
<td>Atlantic Beach Club</td>
<td>8/1/08</td>
<td>8/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Newport</td>
<td>Easton’s Beach</td>
<td>7/24/08</td>
<td>7/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Newport</td>
<td>Easton’s Beach</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Newport</td>
<td>Fort Adams State Park</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Newport</td>
<td>Mackerel Cove Beach</td>
<td>6/6/08</td>
<td>6/11/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Newport</td>
<td>Sachuest Beach</td>
<td>2/8/08</td>
<td>2/11/08</td>
<td>Bacteria</td>
<td>Sew-break</td>
</tr>
<tr>
<td>Newport</td>
<td>Third Beach</td>
<td>6/25/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Newport</td>
<td>Third Beach</td>
<td>7/24/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Washington</td>
<td>Camp Grosvenor</td>
<td>6/11/08</td>
<td>6/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Washington</td>
<td>Camp Grosvenor</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Washington</td>
<td>Camp Grosvenor</td>
<td>8/13/08</td>
<td>8/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Washington</td>
<td>Camp Grosvenor</td>
<td>8/20/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Washington</td>
<td>Dunes Club</td>
<td>7/15/08</td>
<td>7/16/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Washington</td>
<td>Sauderstown Yacht Club</td>
<td>6/18/08</td>
<td>6/20/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Washington</td>
<td>Sauderstown Yacht Club</td>
<td>7/29/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Washington</td>
<td>Scarborough State Beach North</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Washington</td>
<td>Scarborough State Beach South</td>
<td>7/25/08</td>
<td>7/26/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** Sew-break, Sewer line blockage/break.

**Notes**

SOUTH CAROLINA

19th in beachwater quality (8% of samples exceeded national standards)

There are 63 beaches in South Carolina lining 180 miles of Atlantic coastline (102 miles on the mainland coast, and 78 miles on islands without bridges from the mainland barrier islands or on sandbars). There are six coastal counties: Beaufort, Charleston, Colleton, Georgetown, Horry, and Jasper (which has a relatively small coastal waterfront).

The state’s beachwater quality monitoring program is administered by the Department of Health and Environmental Control (DHEC). During the 2008 swim season, all sampling duties were conducted by the DHEC. The agency determines notification protocols and practices throughout the state.

The monitoring season is from May 15 to October 15. Fewer advisories due to elevated bacteria monitoring results were issued in 2008 because there was less rainfall and a reduction in contaminated runoff. Fewer preemptive rainfall advisories were issued as well. This is partly because of less rainfall, but also because the program began using a rainfall model to issue preemptive advisories at Tier 1 beaches in Horry County. Before the model was used to issue preemptive advisories, preemptive rainfall advisories that turned out to be unnecessary were issued at these beaches. Another reason for a drop in the number of preemptive rainfall advisories is the permanent signs that have been installed at locations where there is a standing advisory not to swim after rainfall. Preemptive rainfall advisories are no longer separately issued for these locations because the signs provide notification.

In 2008, eleven cabin owners on Hunting Island were required to disconnect, pump out, and cap off their septic tanks, which had become exposed due to erosion. An ultraviolet study was initiated in 2007 at the swash system at Pirateland Campgrounds to identify and eliminate sources of bacterial contamination. This study is ongoing. South Carolina’s beach program implemented sanitary surveys at some beaches in 2009.

The state provided a mini-grant to the town of Surfside Beach in 2008 that was used to purchase signs and promotional items. These promotional items are distributed to rental offices and hotel lobbies, where tourists will find them. Recipients of the promotional items are encouraged to visit Town Hall to get information about the hazards of swimming in swashes, signage, and the state program’s website.

Monitoring of harmful algal blooms is conducted through another program area of the DHEC.

South Carolina received a $293,270 federal BEACH Act grant in 2008 and was eligible for a $297,000 grant in 2009. Federal grants fully fund South Carolina’s beach monitoring and notification program.

Standards and Testing

Indicator Organism: Enterococcus

Standards: South Carolina applies a single-sample maximum standard for enterococcus of 104 cfu/100 ml. Preemptive rainfall advisories are issued at certain beaches that have a history of high bacteria levels from stormwater, and a rain model is used for posting preemptive advisories at Horry County’s Tier 1 beaches. Most pipe outfalls and swashes in Horry County are under permanent rainfall advisory, with permanent signs posted.

Monitoring

Determination of Monitoring Locations and Frequency: In South Carolina, beaches are prioritized for inclusion in the monitoring program based on level of use and water quality history. The primary factor that distinguishes Tier 1 from Tier 2 beaches is that Tier 1 beaches have stormwater outfalls. Sampling is deliberately conducted at swashes and outfalls.
Practice: Samples are taken at a depth of 20 to 40 inches, 12 inches below the surface. Samples are taken randomly with respect to tide level. Samples are delivered to the DHEC Region lab within 6 hours of sampling and results are available in 24 hours. The day of the week on which samples are taken varies. DHEC conducted all sampling activities in 2008.

Results: In 2008, SC reported 63 coastal beaches, 7 (11%) of which was monitored once a week, 16 (25%) every other week, and 40 (63%) were not monitored. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 8 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Myrtle Beach in Horry County (15%), Harbor Island in Beaufort County (15%), and Surfside Beach (12%), Briarcliffe Acres (10%), Arcadia Beach (8%) and South Carolina State Park and Campground (7%) in Horry County.

Horry County had the highest percent exceedance rate in 2008 (11%), followed by Beaufort (2%), Colleton (1%), and Charleston and Georgetown (0%).

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 23 beaches, the percent of samples exceeding the standard increased to 8 percent in 2008 after steady decreases from 14 percent in 2005, 9 percent in 2006, and 6 percent in 2007.
<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Charleston</td>
<td>Seabrook Island</td>
<td>2</td>
<td>2/mo</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Charleston</td>
<td>Folly Beach</td>
<td>2</td>
<td>2/mo</td>
<td>96</td>
<td>0%</td>
</tr>
<tr>
<td>Charleston</td>
<td>Kiawah Island</td>
<td>2</td>
<td>2/mo</td>
<td>59</td>
<td>0%</td>
</tr>
<tr>
<td>Charleston</td>
<td>Stono River-Limehouse Sandbar</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Stono River-Wolf Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Deveaux Banks-North Side</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Botany Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Cape Romain-Key Inlet</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Bird Key</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Prices Inlet</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Lighthouse Inlet-Morris Island South End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Capers Island-North End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Capers Inlet-South End Capers Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Capers Inlet-North End Dewees Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Dewees Island-South End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Dewees Inlet-North End of Isle of Palms</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Privateer Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Raccoon Key</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Morris Island-Sandbar on North End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Charleston</td>
<td>Kiawah-North End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Colleton</td>
<td>Edisto Island</td>
<td>2</td>
<td>2/mo</td>
<td>141</td>
<td>1%</td>
</tr>
<tr>
<td>Colleton</td>
<td>Otter Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Georgetown</td>
<td>Debordieu Beach</td>
<td>2</td>
<td>2/mo</td>
<td>21</td>
<td>0%</td>
</tr>
<tr>
<td>Georgetown</td>
<td>Pawleys Island Beach</td>
<td>2</td>
<td>2/mo</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Georgetown</td>
<td>Litchfield Beach</td>
<td>2</td>
<td>2/mo</td>
<td>33</td>
<td>0%</td>
</tr>
<tr>
<td>Georgetown</td>
<td>Garden City Beach</td>
<td>2</td>
<td>2/mo</td>
<td>11</td>
<td>0%</td>
</tr>
<tr>
<td>Georgetown</td>
<td>Huntington Beach State Park</td>
<td>2</td>
<td>2/mo</td>
<td>22</td>
<td>0%</td>
</tr>
<tr>
<td>Georgetown</td>
<td>Murrells Inlet-North Side</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Georgetown</td>
<td>Murrells Inlet-South Side</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Georgetown</td>
<td>North Island-South End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Georgetown</td>
<td>South Island-North End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Georgetown</td>
<td>North Santee River-South End of South Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Georgetown</td>
<td>South Santee River-South End of Cedar Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Georgetown</td>
<td>Sandbar Off Shore of South End of Cedar Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Georgetown</td>
<td>North Island-North End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Georgetown</td>
<td>Debordieu-South End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Horry</td>
<td>Myrtle Beach</td>
<td>1</td>
<td>1/wk</td>
<td>860</td>
<td>15%</td>
</tr>
<tr>
<td>Horry</td>
<td>Surfside Beach</td>
<td>1</td>
<td>1/wk</td>
<td>196</td>
<td>12%</td>
</tr>
<tr>
<td>Horry</td>
<td>Briarcliffe Acres Beach</td>
<td>1</td>
<td>1/wk</td>
<td>83</td>
<td>10%</td>
</tr>
<tr>
<td>Horry</td>
<td>Arcadia Beach</td>
<td>1</td>
<td>1/wk</td>
<td>102</td>
<td>8%</td>
</tr>
<tr>
<td>Horry</td>
<td>South Carolina State Park and Campground</td>
<td>1</td>
<td>1/wk</td>
<td>107</td>
<td>7%</td>
</tr>
</tbody>
</table>
Advisories

Advisory Issuance: The beachwater quality monitoring program has the authority to issue advisories, but not closings; in South Carolina, only elected officials can close a beach. The DHEC issues an advisory immediately when the enterococcus bacteria level reaches 500 cfu/100 ml and above. If the bacteria level is above 104 cfu/100 ml but below 500 cfu/100 ml, an additional sample is collected. If the second sample is also above 104 cfu/100 ml, then the department issues an advisory. Thus far, when a beach meets the bacterial standards for advisory issuance, there are no overriding factors taken into account before issuing an advisory. Advisories are not issued in South Carolina based on the geometric mean of five samples during a 30-day period.

When an advisory is issued, the DHEC or the municipality posts signs (generally within four hours, unless prevented by storm conditions), provides web announcements, and issues news releases to all local media outlets.

Advisories are issued for all affected areas of a beach.

Reopening Procedures: Beaches whose water quality has fallen below standards or that have been under a rainfall advisory are sampled daily and reopened when the standards are met. States that monitor more frequently after an exceedance is found or after heavy rain will tend to have higher percent exceedance rates and lower total closing/advisory days than they would have had if their sampling schedule did not alter after an exceedance was found or after heavy rainfall.

Number of Advisories: South Carolina had 18 advisory events in 2008. Total advisory days for 18 events lasting six consecutive weeks or less decreased 67 percent to 36 days in 2008 from 108 days in 2007, 684 days in 2006, and 592 days in 2005. In addition, there were no extended or permanent events in 2008 or 2007. Extended events are those in effect more than 6 consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks.

Causes of Advisories: For events lasting six consecutive weeks or less, 83% (30) of advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, and 17% (6) were preemptive (i.e. without waiting for monitoring results) due to heavy rainfall.

The reported sources of beachwater contamination for 2008 are as follows: 6% (2) of advisory days were from unknown sources of contamination, 83% (30) were from stormwater runoff, and 11% (4) were from other sources of contamination.
<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Horry</td>
<td>North Myrtle Beach</td>
<td>9/7/08</td>
<td>9/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Horry</td>
<td>South Carolina State Park and Campground</td>
<td>5/21/08</td>
<td>5/23/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Horry</td>
<td>South Carolina State Park and Campground</td>
<td>6/16/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Horry</td>
<td>South Carolina State Park and Campground</td>
<td>6/16/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Horry</td>
<td>Springmaid Beach</td>
<td>10/10/08</td>
<td>10/12/08</td>
<td>Preempt-rain</td>
<td>Unknown</td>
</tr>
<tr>
<td>Horry</td>
<td>Surfside Beach</td>
<td>7/11/08</td>
<td>7/12/08</td>
<td>Preempt-rain</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Horry</td>
<td>Surfside Beach</td>
<td>8/13/08</td>
<td>8/16/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Horry</td>
<td>Surfside Beach</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Horry</td>
<td>Surfside Beach</td>
<td>9/7/08</td>
<td>9/8/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Horry</td>
<td>Surfside Beach</td>
<td>9/7/08</td>
<td>9/11/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Horry</td>
<td>Surfside Beach</td>
<td>9/7/08</td>
<td>9/13/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Horry</td>
<td>Surfside Beach</td>
<td>9/26/08</td>
<td>9/27/08</td>
<td>Preempt-rain</td>
<td>Agricultural runoff</td>
</tr>
<tr>
<td>Horry</td>
<td>Surfside Beach</td>
<td>10/1/08</td>
<td>10/2/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Horry</td>
<td>Surfside Beach</td>
<td>10/11/08</td>
<td>10/13/08</td>
<td>Preempt-rain</td>
<td>Other</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** Other, Strong waves or wind, chemical spills, no lifeguard, jellyfish, etc.; Preempt-rain, Preemptive due to rainfall.

**Notes**

2. Shannon Berry, Beach Monitoring Program Coordinator, South Carolina Department of Health and Environmental Control, personal communication, April 2009.
Virtually the entire Texas coast is bordered by barrier islands that separate the Gulf of Mexico and the bays. The mainland has over 1400 miles of coastline, but most of it is privately owned or is comprised of wetlands. Of the barrier islands, which have almost 400 miles of Gulf shoreline and more than 650 miles of mainland side shoreline, three are privately owned and have beaches that can only be accessed by boat. Padre Island National Seashore and the McFaddin National Wildlife Refuge are accessible to the public. Most of the mainland side of the barrier islands is wetlands with little or no opportunity for water contact recreation. In all, 56 miles of mainland coast, 235 miles of barrier island Gulf coast, and 33 miles of mainland side barrier island coast are subject to monitoring under the BEACH Act. There are 169 public coastal beaches lining this 324 miles of coastline. Nine counties had monitored beaches in 2008: Aransas, Brazoria, Cameron, Jefferson, Galveston, Kleberg, Matagorda, Nueces, and San Patricio. Another five counties with at least one public water contact recreation coastal beach had no monitored beaches: Calhoun, Chambers, Harris, Refugio, and Willacy. Orange County, Kenedy County, and Victoria County are on the coast but have no publicly accessible beaches and/or no water contact recreation beaches.

Beachwater quality monitoring is conducted through a program operated by the Texas General Land Office (GLO), which contracts with county health departments, universities, and commercial laboratories to conduct sampling for the Texas Beach Watch Program. Sampling practices and procedures are monitored by the GLO and must be conducted in accordance with EPA-approved methods. Padre Island National Seashore and the McFaddin National Wildlife Refuge are federally managed and are monitored at limited locations. Beaches are monitored year-round, with weekly monitoring from May to September for all monitored beaches and during the month of March to coincide with spring break at Gulf of Mexico beaches. Monitoring is conducted every other week for all remaining months.

Sampling results are used to classify beach water quality. GLO participates in the Corpus Christi Bay Bacteria Task Force, which is working to determine the sources of bacteria in Corpus Christi Bay.

Texas is conducting an unparalleled outreach campaign about its beachwater quality monitoring program in 2009. The GLO launched a revised Beach Watch website in March, and banner ads ran on selected websites identified as beach tourist websites and on major media websites in Texas’ urban areas in early 2009. In April of 2009, the GLO began a public service announcement campaign with television, radio, and web banner ads that will continue through Labor Day. A continuing outreach program is the Texas Adopt-A-Beach Program. The program strives to raise public awareness, educate citizens about the sources of debris, and generate public support for state, national and international action to clean up coastal waters.

In Texas, the Texas Parks and Wildlife Department (TPWD) has a team of biologists that responds to incidents where fish or other animals have been harmed. These specially trained biologists contact other agencies and personnel (including Texas Department of State Health Services if human health issues are suspected, Texas Commission on Environmental Quality for impacts to natural resources, and the governing authority that manages a particular area), collect water samples for analysis and confirmation of algae, if appropriate, collect water quality and environmental data, and identify and count the number of dead wildlife, among other tasks. The TPWD monitors harmful algal blooms and communicates to the public through their web site, email alerts, and a hotline. The Harmful Algal Bloom Workgroup has produced the Texas Harmful Algal Bloom Response Plan for identification and management of harmful algal blooms in Texas.

Texas received a $379,140 federal BEACH Act grant in 2008 and was eligible for a $383,000 grant in 2009. All BEACH Act funds are utilized for water quality testing and public notification. The GLO allocates funding for salaries and other administrative expenses.
**Standards**

**Indicator Organism:** Enterococcus

**Standards:** Texas applies an enterococcus single-sample maximum of 104 cfu/100ml to the averaged result of duplicate samples when making decisions about advisories.

Texas does not have preemptive rainfall standards. In the case of a known sewage spill, the decision to issue a pre-emptive closing or advisory would be made by local government.¹

In 2007, the GLO funded a study that examined the occurrence and levels of *Vibrio vulnificus* during the summer at six beach stations currently monitored for enterococcus through the Texas Beach Watch Program. *V. vulnificus* causes a bacterial infection that may be contracted by eating contaminated seafood, especially oysters. The bacteria can also enter the body through open wounds when swimming or wading in infected waters. Symptoms of infection include vomiting, diarrhea, abdominal pain, and a blistering dermatitis. The GLO’s 2007 testing was conducted with residual grant funds and confirmed the presence of *V. vulnificus*. However, as long-term funding for testing has not been established and *V. vulnificus*-related hazards increase with temperature and salinity rather than intensity of occurrence, the GLO will provide general cautionary notice on the Beach Watch website instead of conducting regular tests. The Texas Department of Health tests regularly for *V. vulnificus* in Galveston Bay as it is a primary health consideration to oyster consumption and harvesting as well as skin contact.

**Monitoring**

**Determination of Monitoring Locations and Frequency:** Recreational beach segments that are used most frequently by the public and where health risks are the greatest are given priority for monitoring.

**Practice:** The Texas Beach Watch Program collects samples between sunrise and noon. Samples are generally collected about one foot below the surface in water that is knee deep in an area where people are engaging in recreational activity. If the majority of recreational activity occurs at a depth significantly different than two feet, then samples can be collected at the location of greatest swimmer activity. Also, if the two-foot sampling depth occurs more than 50 meters from shore, samples can be collected 50 meters from shore or at the location of greatest swimmer activity. Two samples are taken and averaged per sampling location. Additional samples are also taken for quality assurance and quality control. Sample results are available a minimum of 24 hours after the lab receives the sample. Routine sampling usually takes place on Tuesdays, with Mondays and Wednesdays as alternate sampling days.

**Results:** In 2008, Texas reported 169 public coastal beaches, 65 (38%) of which were monitored once a week, and 104 (62%) were not monitored. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 6 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Ropes Park (30%), JFK Causeway-SW (23%), and Cole Park (20%) in Nueces County, Nueces Bay Causeway #4 in San Patricio County (16%), Laguna Shores in Nueces County (15%), Appfel Park in Galveston County (15%), Poenisich Park in Nueces County (14%), and Clara St. (14%), Crystal Beach-O’Neill Road (13%), and West End (13%) in Galveston County.

San Patricio County had the highest exceedance rate (16%) followed by Jefferson (9%), Kleberg (9%), Nueces (8%), Galveston (7%), Matagorda (7%), Brazoria (7%), Aransas (7%), and Cameron (1%).
Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 58 beaches, the percent of samples exceeding the standard decreased to 6 percent in 2008 after three consecutive years of increases (9, 8, and 6 percent in 2007, 2006, and 2005, respectively).

### 2008 Texas Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Aransas</td>
<td>Rockport Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>323</td>
<td>7%</td>
</tr>
<tr>
<td>Aransas</td>
<td>Copano Causeway-South</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Aransas</td>
<td>Copano Bay State Fishing Pier</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Aransas</td>
<td>Highway 188 @ Port Bay North</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Aransas</td>
<td>Goose Island State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Aransas</td>
<td>Highway 188 @ Port Bay South</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Aransas</td>
<td>Copano Causeway-North</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Aransas</td>
<td>12th Street</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Aransas</td>
<td>Copano Bay Bridge</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Bryan Beach</td>
<td>1</td>
<td>1/wk</td>
<td>103</td>
<td>12%</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Quintana</td>
<td>1</td>
<td>1/wk</td>
<td>191</td>
<td>9%</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Surfside</td>
<td>1</td>
<td>1/wk</td>
<td>694</td>
<td>6%</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Follets Island</td>
<td>1</td>
<td>1/wk</td>
<td>427</td>
<td>5%</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Swan Lake</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Seidler’s Landing</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Southwest Brazoria</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brazoria</td>
<td>San Luis Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brazoria</td>
<td>County Road 257A</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Peach Point WMA</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Matagorda Island State Park-Backside 2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Matagorda Island State Park-Backside 4</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Olivia Haterius Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Lighthouse Beach &amp; Bird Sanctuary</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Matagorda Island State Park-Backside 3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Point Comfort City Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>King Fisher Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Boggy Bayou ROW</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Bauer Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Indianola Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Port Alto Public Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Matagorda Island State Park-Backside 1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Swan Point Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Bayfront Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Magnolia Beach Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>State Highway 35</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>-------------------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Six Mile Road</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Calhoun</td>
<td>Matagorda Island State Park - Gulf</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cameron</td>
<td>Boca Chica State Park</td>
<td>1</td>
<td>1/wk</td>
<td>484</td>
<td>4%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Park Road 100 Bay Access #2</td>
<td>1</td>
<td>1/wk</td>
<td>79</td>
<td>1%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Isla Blanca Park</td>
<td>1</td>
<td>1/wk</td>
<td>161</td>
<td>1%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Atwood Park</td>
<td>1</td>
<td>1/wk</td>
<td>163</td>
<td>1%</td>
</tr>
<tr>
<td>Cameron</td>
<td>South Padre Island Access Point #6</td>
<td>1</td>
<td>1/wk</td>
<td>161</td>
<td>1%</td>
</tr>
<tr>
<td>Cameron</td>
<td>South Padre Island (Town of South Padre Island)</td>
<td>1</td>
<td>1/wk</td>
<td>719</td>
<td>0%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Access Point #3</td>
<td>1</td>
<td>1/wk</td>
<td>83</td>
<td>0%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Access Point #4</td>
<td>1</td>
<td>1/wk</td>
<td>76</td>
<td>0%</td>
</tr>
<tr>
<td>Cameron</td>
<td>Andy Bowie Park</td>
<td>1</td>
<td>1/wk</td>
<td>159</td>
<td>0%</td>
</tr>
<tr>
<td>Cameron</td>
<td>N Cameron County-Bayside</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cameron</td>
<td>South Padre Island-North</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Cameron</td>
<td>Park Road 100 Bay Access #1</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chambers</td>
<td>Chambers County</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Chambers</td>
<td>McCollum Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Galveston</td>
<td>Appfel Park</td>
<td>1</td>
<td>1/wk</td>
<td>213</td>
<td>15%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Clara St.</td>
<td>1</td>
<td>1/wk</td>
<td>301</td>
<td>14%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Crystal Beach-O’neill Road</td>
<td>1</td>
<td>1/wk</td>
<td>68</td>
<td>13%</td>
</tr>
<tr>
<td>Galveston</td>
<td>West End</td>
<td>1</td>
<td>1/wk</td>
<td>136</td>
<td>13%</td>
</tr>
<tr>
<td>Galveston</td>
<td>25th St.</td>
<td>1</td>
<td>1/wk</td>
<td>348</td>
<td>12%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Gulf Shores</td>
<td>1</td>
<td>1/wk</td>
<td>134</td>
<td>12%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Stewart Beach</td>
<td>1</td>
<td>1/wk</td>
<td>244</td>
<td>11%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Seadrift</td>
<td>1</td>
<td>1/wk</td>
<td>66</td>
<td>11%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Rollover Pass West</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>9%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Port Bolivar-Rettilon Road</td>
<td>1</td>
<td>1/wk</td>
<td>62</td>
<td>8%</td>
</tr>
<tr>
<td>Galveston</td>
<td>West End Galveston-Sea Isle</td>
<td>1</td>
<td>1/wk</td>
<td>156</td>
<td>6%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Dellanera Park</td>
<td>1</td>
<td>1/wk</td>
<td>158</td>
<td>6%</td>
</tr>
<tr>
<td>Galveston</td>
<td>61st St.</td>
<td>1</td>
<td>1/wk</td>
<td>244</td>
<td>5%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Spanish Grant/Bermuda Beach</td>
<td>1</td>
<td>1/wk</td>
<td>241</td>
<td>4%</td>
</tr>
<tr>
<td>Galveston</td>
<td>San Luis Pass</td>
<td>1</td>
<td>1/wk</td>
<td>154</td>
<td>4%</td>
</tr>
<tr>
<td>Galveston</td>
<td>45th St.</td>
<td>1</td>
<td>1/wk</td>
<td>510</td>
<td>3%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Indian Beach</td>
<td>1</td>
<td>1/wk</td>
<td>114</td>
<td>3%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Pirates Beach</td>
<td>1</td>
<td>1/wk</td>
<td>284</td>
<td>2%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Rollover Pass East</td>
<td>1</td>
<td>1/wk</td>
<td>146</td>
<td>1%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Galveston Island State Park Backside</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>0%</td>
</tr>
<tr>
<td>Galveston</td>
<td>West End Galveston-Jamaica Beach</td>
<td>1</td>
<td>1/wk</td>
<td>72</td>
<td>0%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Texas City Dike</td>
<td>1</td>
<td>1/wk</td>
<td>40</td>
<td>0%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Galveston Island State Park</td>
<td>1</td>
<td>1/wk</td>
<td>146</td>
<td>0%</td>
</tr>
<tr>
<td>Galveston</td>
<td>Skyline Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Galveston</td>
<td>Frank Carmona Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>----------</td>
<td>-------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Galveston</td>
<td>Caplen</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Galveston</td>
<td>Caplen/Crystal Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Galveston</td>
<td>East Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Galveston</td>
<td>Erman Pilsner Boat Ramp</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Galveston</td>
<td>High Island West</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Galveston</td>
<td>Haney Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Galveston</td>
<td>High Island East</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Galveston</td>
<td>Skyline Drive</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Galveston</td>
<td>Gilchrist West</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Galveston</td>
<td>Gilchrist East</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Galveston</td>
<td>Holiday</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Harris</td>
<td>Lynchburg Row</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Harris</td>
<td>Evergreen Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Harris</td>
<td>Pine Gully Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Harris</td>
<td>Bayland Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Harris</td>
<td>Miramar Street</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Harris</td>
<td>River Terrace Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Harris</td>
<td>Clear Lake Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Harris</td>
<td>Sylvan Beach Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Sea Rim State Park</td>
<td>1</td>
<td>1/wk</td>
<td>172</td>
<td>12%</td>
</tr>
<tr>
<td>Jefferson</td>
<td>McFaddin NWR</td>
<td>1</td>
<td>1/wk</td>
<td>439</td>
<td>8%</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kauffer-Hubert #1</td>
<td>2</td>
<td>1/wk</td>
<td>99</td>
<td>12%</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kauffer-Hubert #2</td>
<td>2</td>
<td>1/wk</td>
<td>101</td>
<td>9%</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Riviera Beach Pier</td>
<td>3</td>
<td>1/wk</td>
<td>87</td>
<td>8%</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kauffer-Hubert #3</td>
<td>2</td>
<td>1/wk</td>
<td>102</td>
<td>7%</td>
</tr>
<tr>
<td>Kleberg</td>
<td>CR 1140 North</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kleberg</td>
<td>CR 1140 South</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kleberg</td>
<td>North Padre Island</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Palacios-Palacios Pavilion</td>
<td>1</td>
<td>1/wk</td>
<td>204</td>
<td>12%</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Jetty Park</td>
<td>1</td>
<td>1/wk</td>
<td>367</td>
<td>6%</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Sargent Beach</td>
<td>1</td>
<td>1/wk</td>
<td>282</td>
<td>5%</td>
</tr>
<tr>
<td>Matagorda</td>
<td>East Bay</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Jenson’s Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Lookout Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Foley Reserve Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Matagorda</td>
<td>FM 1095</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Matagorda</td>
<td>South Bay Boat Ramp</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Matagorda</td>
<td>East Sargent Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Matagorda</td>
<td>East Matagorda Peninsula</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Oyster Lake Road</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>1</td>
<td>1/wk</td>
<td>210</td>
<td>30%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------</td>
<td>--------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Nueces</td>
<td>JFK Causeway - SW</td>
<td>1</td>
<td>1/wk</td>
<td>91</td>
<td>23%</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>1</td>
<td>1/wk</td>
<td>357</td>
<td>20%</td>
</tr>
<tr>
<td>Nueces</td>
<td>Laguna Shores</td>
<td>1</td>
<td>1/wk</td>
<td>80</td>
<td>15%</td>
</tr>
<tr>
<td>Nueces</td>
<td>Poenisch Park</td>
<td>1</td>
<td>1/wk</td>
<td>83</td>
<td>14%</td>
</tr>
<tr>
<td>Nueces</td>
<td>Emerald Beach</td>
<td>1</td>
<td>1/wk</td>
<td>80</td>
<td>10%</td>
</tr>
<tr>
<td>Nueces</td>
<td>Padre Bali Park</td>
<td>1</td>
<td>1/wk</td>
<td>697</td>
<td>8%</td>
</tr>
<tr>
<td>Nueces</td>
<td>Corpus Christi Marina</td>
<td>1</td>
<td>1/wk</td>
<td>242</td>
<td>7%</td>
</tr>
<tr>
<td>Nueces</td>
<td>McGee Beach</td>
<td>1</td>
<td>1/wk</td>
<td>154</td>
<td>6%</td>
</tr>
<tr>
<td>Nueces</td>
<td>University Beach</td>
<td>1</td>
<td>1/wk</td>
<td>82</td>
<td>4%</td>
</tr>
<tr>
<td>Nueces</td>
<td>Packery Channel Park</td>
<td>1</td>
<td>1/wk</td>
<td>73</td>
<td>3%</td>
</tr>
<tr>
<td>Nueces</td>
<td>Corpus Christi Beach - Main</td>
<td>1</td>
<td>1/wk</td>
<td>301</td>
<td>2%</td>
</tr>
<tr>
<td>Nueces</td>
<td>Port Aransas Park</td>
<td>1</td>
<td>1/wk</td>
<td>353</td>
<td>2%</td>
</tr>
<tr>
<td>Nueces</td>
<td>JP Luby Park</td>
<td>1</td>
<td>1/wk</td>
<td>339</td>
<td>2%</td>
</tr>
<tr>
<td>Nueces</td>
<td>Lighthouse Lakes Kayak Trail #1</td>
<td>1</td>
<td>1/wk</td>
<td>80</td>
<td>1%</td>
</tr>
<tr>
<td>Nueces</td>
<td>Port Aransas-South</td>
<td>1</td>
<td>1/wk</td>
<td>172</td>
<td>1%</td>
</tr>
<tr>
<td>Nueces</td>
<td>Mustang Island State Park</td>
<td>1</td>
<td>1/wk</td>
<td>426</td>
<td>1%</td>
</tr>
<tr>
<td>Nueces</td>
<td>Mustang Island</td>
<td>1</td>
<td>1/wk</td>
<td>88</td>
<td>0%</td>
</tr>
<tr>
<td>Nueces</td>
<td>Redhead Pond WMA</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>Roberts Point Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ocean Drive - West</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>SPI Drive - NW</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>SH 361 ROW-SW</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>SPI Drive-SW</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>Hans &amp; Pat Sutter Wildlife Refuge</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>SH 361 Row-NE</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>Philip Dimitt Municipal Fishing Pier</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>SPI Drive-SE</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>Doddridge Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>Mustang Island State Park-Backside</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ocean Drive-East</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>Palmetto Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>Port Aransas-Jetty</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>SH 361 Row-NW</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>Swantner Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>JFK Causeway-SE</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>JFK Causeway - NW</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>Corpus Christi Beach-South</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>JFK Causeway-NE</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>Port Street</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>SH 361 ROW-SE</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Nueces</td>
<td>SPI Drive-NE</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>
### County Beach Tier Monitoring

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nueces</td>
<td>Corpus Christi Beach-North</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Refugio</td>
<td>TPWD Boat Ramp-Refugio</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Patricio</td>
<td>Nueces Bay Causeway #4</td>
<td>3</td>
<td>1/wk</td>
<td>88</td>
<td>16%</td>
</tr>
<tr>
<td>San Patricio</td>
<td>Indian Point Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Patricio</td>
<td>Nueces Bay Causeway #1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Patricio</td>
<td>Nueces Bay Causeway #3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Patricio</td>
<td>Nueces Bay Causeway #2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Patricio</td>
<td>Highway 1069 ROW</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Willacy</td>
<td>Fred Stone Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Willacy</td>
<td>Placement Area #8</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Willacy</td>
<td>Mansfield Cut/County Line</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>

N/A: Not applicable

### Closings and Advisories

**Closing/Advisory Issuance:** The GLO does not have the authority to close beaches or post advisory signs at the beaches. This authority lies with local government officials and health departments. The GLO recommends beach advisories when the bacterial standard is exceeded. Two samples are taken simultaneously at each location and the results are averaged before comparing to the standard. No geometric mean standard for five samples taken over a 30-day period is applied. As soon as an exceedance is found, a recommendation for an advisory is posted on the Texas Beach Watch website. All local governments have chosen to post advisory signs at beach access points when sample results exceed the standard. Local governments and individuals who subscribe are notified by e-mail. Advisories are routinely issued for sections of a beach rather than a whole beach.

**Reopening Procedures:** Samples are taken daily until bacteria levels fall below the standard. States that monitor more frequently after an exceedance is found will tend to have higher percent exceedance rates and lower total closing/advisory days than they would have had if their sampling schedule did not alter after an exceedance was found.

**Number of Closings and Advisories:** Texas had 278 closing/advisory events in 2008. Total closing/advisory days for 278 events lasting six consecutive weeks or less decreased 40 percent to 318 days in 2008 from 532 days in 2007, 473 days in 2006, and 420 days in 2005. In addition, there were no extended or permanent events in 2008 or 2007. In 2008, there were no events longer than one week. Extended events are those in effect more than 6 consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks.

**Causes of Closings and Advisories:** All closing and advisory days in 2008 were due to monitoring that revealed elevated bacteria levels.

The reported sources of beachwater contamination for 2008 are as follows: 64% (204) of closing/advisory days were from unknown sources of contamination, 29% (92) were from stormwater runoff, and 7% (22) were from other sources of contamination.

### 2008 Texas Beach Closings and Advisories

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Aransas</td>
<td>Rockport Beach Park</td>
<td>1/2/08</td>
<td>1/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>------------------------</td>
<td>------------</td>
<td>----------</td>
<td>------------</td>
<td>--------</td>
</tr>
<tr>
<td>Aransas</td>
<td>Rockport Beach Park</td>
<td>1/14/08</td>
<td>1/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Aransas</td>
<td>Rockport Beach Park</td>
<td>4/28/08</td>
<td>4/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Aransas</td>
<td>Rockport Beach Park</td>
<td>6/2/08</td>
<td>6/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Aransas</td>
<td>Rockport Beach Park</td>
<td>7/28/08</td>
<td>7/29/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Aransas</td>
<td>Rockport Beach Park</td>
<td>9/8/08</td>
<td>9/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Aransas</td>
<td>Rockport Beach Park</td>
<td>9/15/08</td>
<td>9/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Bryan Beach</td>
<td>5/20/08</td>
<td>5/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Bryan Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Bryan Beach</td>
<td>10/14/08</td>
<td>10/15/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Bryan Beach</td>
<td>10/28/08</td>
<td>10/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Bryan Beach</td>
<td>11/13/08</td>
<td>11/14/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Follets Island</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Follets Island</td>
<td>10/28/08</td>
<td>10/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Follets Island</td>
<td>11/13/08</td>
<td>11/14/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Quintana</td>
<td>3/4/08</td>
<td>3/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Quintana</td>
<td>5/20/08</td>
<td>5/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Quintana</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Quintana</td>
<td>10/28/08</td>
<td>10/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Quintana</td>
<td>11/13/08</td>
<td>11/14/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Surfside</td>
<td>6/30/08</td>
<td>7/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Surfside</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Surfside</td>
<td>7/22/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Surfside</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Surfside</td>
<td>10/14/08</td>
<td>10/15/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Surfside</td>
<td>10/15/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Surfside</td>
<td>10/28/08</td>
<td>10/29/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Brazoria</td>
<td>Surfside</td>
<td>11/13/08</td>
<td>11/14/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Cameron</td>
<td>Atwood Park</td>
<td>7/16/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Cameron</td>
<td>Boca Chica State Park</td>
<td>5/5/08</td>
<td>5/7/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Cameron</td>
<td>Boca Chica State Park</td>
<td>5/19/08</td>
<td>5/20/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Cameron</td>
<td>Isla Blanca Park</td>
<td>2/26/08</td>
<td>2/27/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Cameron</td>
<td>Park Road 100 Bay Access #2</td>
<td>12/24/08</td>
<td>12/26/08</td>
<td>Bacteria</td>
<td>Wildlife</td>
</tr>
<tr>
<td>Cameron</td>
<td>South Padre Island (Town of South Padre Island)</td>
<td>1/1/08</td>
<td>1/3/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Cameron</td>
<td>SOUTH PADRE ISLAND ACCESS POINT #6</td>
<td>7/16/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Galveston</td>
<td>25th St.</td>
<td>1/16/08</td>
<td>1/17/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>25th St.</td>
<td>5/5/08</td>
<td>5/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>25th St.</td>
<td>5/6/08</td>
<td>5/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>25th St.</td>
<td>5/13/08</td>
<td>5/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>25th St.</td>
<td>5/20/08</td>
<td>5/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>25th St.</td>
<td>6/3/08</td>
<td>6/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>25th St.</td>
<td>7/29/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>--------------</td>
<td>---------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------</td>
<td>----------</td>
</tr>
<tr>
<td>Galveston</td>
<td>25th St.</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>25th St.</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>25th St.</td>
<td>8/21/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>45th St.</td>
<td>1/16/08</td>
<td>1/17/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>45th St.</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>45th St.</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>45th St.</td>
<td>9/29/08</td>
<td>9/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>61st St.</td>
<td>1/16/08</td>
<td>1/17/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>61st St.</td>
<td>6/3/08</td>
<td>6/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>61st St.</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>61st St.</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>61st St.</td>
<td>10/6/08</td>
<td>10/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Appfel Park</td>
<td>6/24/08</td>
<td>6/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Appfel Park</td>
<td>7/22/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>Appfel Park</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Appfel Park</td>
<td>9/23/08</td>
<td>9/25/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Appfel Park</td>
<td>9/25/08</td>
<td>9/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Appfel Park</td>
<td>9/26/08</td>
<td>9/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Appfel Park</td>
<td>9/29/08</td>
<td>9/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Appfel Park</td>
<td>9/30/08</td>
<td>10/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Appfel Park</td>
<td>10/6/08</td>
<td>10/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Appfel Park</td>
<td>10/7/08</td>
<td>10/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Appfel Park</td>
<td>10/20/08</td>
<td>10/21/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Galveston</td>
<td>Appfel Park</td>
<td>10/21/08</td>
<td>10/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Clara St.</td>
<td>4/8/08</td>
<td>4/9/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Galveston</td>
<td>Clara St.</td>
<td>5/7/08</td>
<td>5/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Clara St.</td>
<td>5/21/08</td>
<td>5/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Clara St.</td>
<td>5/22/08</td>
<td>5/23/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Clara St.</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Clara St.</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>Clara St.</td>
<td>8/12/08</td>
<td>8/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Crystal Beach-O’Neill Road</td>
<td>3/5/08</td>
<td>3/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Crystal Beach-O’Neill Road</td>
<td>4/8/08</td>
<td>4/9/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Galveston</td>
<td>Crystal Beach-O’Neill Road</td>
<td>5/7/08</td>
<td>5/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Crystal Beach-O’Neill Road</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Crystal Beach-O’Neill Road</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>Dellanera Park</td>
<td>5/27/08</td>
<td>5/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Dellanera Park</td>
<td>6/2/08</td>
<td>6/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Dellanera Park</td>
<td>6/16/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Dellanera Park</td>
<td>10/14/08</td>
<td>10/15/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>Gulf Shores</td>
<td>3/5/08</td>
<td>3/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------------</td>
<td>------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>-----------</td>
<td>-----------</td>
</tr>
<tr>
<td>Galveston</td>
<td>Gulf Shores</td>
<td>4/8/08</td>
<td>4/9/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Galveston</td>
<td>Gulf Shores</td>
<td>5/7/08</td>
<td>5/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Gulf Shores</td>
<td>5/21/08</td>
<td>5/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Gulf Shores</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Gulf Shores</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>Indian Beach</td>
<td>5/19/08</td>
<td>5/20/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>Pirates Beach</td>
<td>5/19/08</td>
<td>5/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Pirates Beach</td>
<td>5/27/08</td>
<td>5/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Pirates Beach</td>
<td>10/14/08</td>
<td>10/15/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>Port Bolivar-Rettilon Road</td>
<td>3/5/08</td>
<td>3/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Port Bolivar-Rettilon Road</td>
<td>4/8/08</td>
<td>4/9/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Galveston</td>
<td>Rollover Pass East</td>
<td>4/8/08</td>
<td>4/9/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Galveston</td>
<td>Rollover Pass West</td>
<td>1/22/08</td>
<td>1/23/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>Rollover Pass West</td>
<td>4/8/08</td>
<td>4/9/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Galveston</td>
<td>Rollover Pass West</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>San Luis Pass</td>
<td>1/29/08</td>
<td>1/30/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>San Luis Pass</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Galveston</td>
<td>Seadrift</td>
<td>4/8/08</td>
<td>4/9/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Galveston</td>
<td>Seadrift</td>
<td>5/21/08</td>
<td>5/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Seadrift</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Seadrift</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>Spanish Grant/Bermuda Beach</td>
<td>6/2/08</td>
<td>6/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Spanish Grant/Bermuda Beach</td>
<td>6/16/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Spanish Grant/Bermuda Beach</td>
<td>10/14/08</td>
<td>10/15/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>Stewart Beach</td>
<td>5/5/08</td>
<td>5/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Stewart Beach</td>
<td>5/6/08</td>
<td>5/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Stewart Beach</td>
<td>5/7/08</td>
<td>5/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Stewart Beach</td>
<td>5/20/08</td>
<td>5/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Stewart Beach</td>
<td>7/22/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>Stewart Beach</td>
<td>7/29/08</td>
<td>7/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>Stewart Beach</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>Stewart Beach</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>Stewart Beach</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>West End</td>
<td>3/5/08</td>
<td>3/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>West End</td>
<td>4/8/08</td>
<td>4/9/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Galveston</td>
<td>West End</td>
<td>5/7/08</td>
<td>5/8/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>West End</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Galveston</td>
<td>West End</td>
<td>7/23/08</td>
<td>7/24/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>West End Galveston-Sea Isle</td>
<td>1/29/08</td>
<td>1/30/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Galveston</td>
<td>West End Galveston-Sea Isle</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>----------------</td>
<td>--------------------------------</td>
<td>------------</td>
<td>----------</td>
<td>----------</td>
<td>--------------</td>
</tr>
<tr>
<td>Galveston</td>
<td>West End Galveston-Sea Isle</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>McFaddin NWR</td>
<td>3/31/08</td>
<td>4/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>McFaddin NWR</td>
<td>5/12/08</td>
<td>5/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>McFaddin NWR</td>
<td>6/16/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>McFaddin NWR</td>
<td>6/17/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>McFaddin NWR</td>
<td>7/14/08</td>
<td>7/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>McFaddin NWR</td>
<td>8/18/08</td>
<td>8/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Sea Rim State Park</td>
<td>2/11/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Sea Rim State Park</td>
<td>3/31/08</td>
<td>4/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Sea Rim State Park</td>
<td>6/16/08</td>
<td>6/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Sea Rim State Park</td>
<td>6/17/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kaufer-Hubert #1</td>
<td>1/2/08</td>
<td>1/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kaufer-Hubert #1</td>
<td>1/15/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kaufer-Hubert #1</td>
<td>1/16/08</td>
<td>1/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kaufer-Hubert #1</td>
<td>1/17/08</td>
<td>1/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kaufer-Hubert #1</td>
<td>8/21/08</td>
<td>8/22/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kaufer-Hubert #1</td>
<td>8/22/08</td>
<td>8/23/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kaufer-Hubert #1</td>
<td>10/16/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kaufer-Hubert #1</td>
<td>10/17/08</td>
<td>10/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kaufer-Hubert #1</td>
<td>12/11/08</td>
<td>12/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kaufer-Hubert #2</td>
<td>1/15/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kaufer-Hubert #2</td>
<td>8/22/08</td>
<td>8/23/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kaufer-Hubert #2</td>
<td>10/16/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Kaufer-Hubert #3</td>
<td>1/3/08</td>
<td>1/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Riviera Beach Pier</td>
<td>1/2/08</td>
<td>1/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kleberg</td>
<td>Riviera Beach Pier</td>
<td>1/15/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Jetty Park</td>
<td>2/11/08</td>
<td>2/12/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Jetty Park</td>
<td>3/17/08</td>
<td>3/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Jetty Park</td>
<td>7/22/08</td>
<td>7/25/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Jetty Park</td>
<td>10/14/08</td>
<td>10/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Jetty Park</td>
<td>11/13/08</td>
<td>11/14/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Palacios-Palacios Pavillion</td>
<td>3/17/08</td>
<td>3/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Palacios-Palacios Pavillion</td>
<td>3/18/08</td>
<td>3/19/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Palacios-Palacios Pavillion</td>
<td>5/5/08</td>
<td>5/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Palacios-Palacios Pavillion</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Palacios-Palacios Pavillion</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Palacios-Palacios Pavillion</td>
<td>11/13/08</td>
<td>11/14/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Palacios-Palacios Pavillion</td>
<td>12/9/08</td>
<td>12/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Sargent Beach</td>
<td>6/9/08</td>
<td>6/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>------------</td>
<td>-----------------------</td>
<td>--------------</td>
<td>------------</td>
<td>---------</td>
<td>--------------</td>
</tr>
<tr>
<td>Matagorda</td>
<td>Sargent Beach</td>
<td>11/13/08</td>
<td>11/14/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>3/11/08</td>
<td>3/12/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>3/12/08</td>
<td>3/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>3/13/08</td>
<td>3/14/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>3/14/08</td>
<td>3/15/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>3/25/08</td>
<td>3/26/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>4/29/08</td>
<td>4/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>4/30/08</td>
<td>5/1/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>5/6/08</td>
<td>5/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>5/20/08</td>
<td>5/21/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>5/21/08</td>
<td>5/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>6/17/08</td>
<td>6/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>7/20/08</td>
<td>7/21/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>7/21/08</td>
<td>7/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>8/17/08</td>
<td>8/18/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>8/27/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>8/28/08</td>
<td>9/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>9/6/08</td>
<td>9/7/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>9/23/08</td>
<td>9/24/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>9/24/08</td>
<td>9/25/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>12/9/08</td>
<td>12/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>12/10/08</td>
<td>12/11/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Cole Park</td>
<td>12/21/08</td>
<td>12/22/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Corpus Christi Beach-Main</td>
<td>2/12/08</td>
<td>2/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Corpus Christi Beach-Main</td>
<td>2/26/08</td>
<td>2/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Corpus Christi Beach-Main</td>
<td>3/11/08</td>
<td>3/12/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Corpus Christi Marina</td>
<td>2/26/08</td>
<td>2/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Corpus Christi Marina</td>
<td>3/11/08</td>
<td>3/12/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Corpus Christi Marina</td>
<td>5/6/08</td>
<td>5/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Corpus Christi Marina</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Corpus Christi Marina</td>
<td>8/5/08</td>
<td>8/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Corpus Christi Marina</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Emerald Beach</td>
<td>3/11/08</td>
<td>3/12/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Emerald Beach</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Emerald Beach</td>
<td>9/9/08</td>
<td>9/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Emerald Beach</td>
<td>10/14/08</td>
<td>10/15/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>JFK Causeway-SW</td>
<td>1/3/08</td>
<td>1/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>JFK Causeway-SW</td>
<td>1/16/08</td>
<td>1/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>JFK Causeway-SW</td>
<td>2/6/08</td>
<td>2/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>-----------</td>
<td>----------------------------</td>
<td>------------</td>
<td>----------</td>
<td>---------</td>
<td>--------</td>
</tr>
<tr>
<td>Nueces</td>
<td>JFK Causeway-SW</td>
<td>2/13/08</td>
<td>2/14/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>JFK Causeway-SW</td>
<td>4/16/08</td>
<td>4/17/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>JFK Causeway-SW</td>
<td>7/16/08</td>
<td>7/17/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>JFK Causeway-SW</td>
<td>8/6/08</td>
<td>8/7/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>JFK Causeway-SW</td>
<td>12/10/08</td>
<td>12/11/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>JFK Causeway-SW</td>
<td>12/22/08</td>
<td>12/23/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>JP Luby Park</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>JP Luby Park</td>
<td>7/16/08</td>
<td>7/17/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Laguna Shores</td>
<td>1/3/08</td>
<td>1/4/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Laguna Shores</td>
<td>1/16/08</td>
<td>1/17/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Laguna Shores</td>
<td>3/26/08</td>
<td>3/27/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Laguna Shores</td>
<td>4/16/08</td>
<td>4/17/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Laguna Shores</td>
<td>5/7/08</td>
<td>5/8/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Laguna Shores</td>
<td>12/22/08</td>
<td>12/23/08</td>
<td>Bacteria Wildlife</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Lighthouse Lakes Kayak Trail #1</td>
<td>9/29/08</td>
<td>9/30/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>McGee Beach</td>
<td>2/12/08</td>
<td>2/13/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>McGee Beach</td>
<td>2/13/08</td>
<td>2/14/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>McGee Beach</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria Stormwater</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Mustang Island State Park</td>
<td>3/3/08</td>
<td>3/4/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Mustang Island State Park</td>
<td>6/23/08</td>
<td>6/24/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Padre Bali Park</td>
<td>9/4/08</td>
<td>9/5/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Padre Bali Park</td>
<td>1/16/08</td>
<td>1/17/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Padre Bali Park</td>
<td>2/27/08</td>
<td>2/28/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Padre Bali Park</td>
<td>2/28/08</td>
<td>2/29/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Padre Bali Park</td>
<td>3/4/08</td>
<td>3/5/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Padre Bali Park</td>
<td>5/7/08</td>
<td>5/8/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Padre Bali Park</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Padre Bali Park</td>
<td>7/2/08</td>
<td>7/3/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Padre Bali Park</td>
<td>12/10/08</td>
<td>12/11/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Padre Bali Park</td>
<td>3/11/08</td>
<td>3/12/08</td>
<td>Bacteria Stormwater</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Poenisch Park</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria Stormwater</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Poenisch Park</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria Stormwater</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Poenisch Park</td>
<td>9/23/08</td>
<td>9/24/08</td>
<td>Bacteria Stormwater</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Poenisch Park</td>
<td>9/24/08</td>
<td>9/25/08</td>
<td>Bacteria Stormwater</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Poenisch Park</td>
<td>12/21/08</td>
<td>12/22/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Port Aransas-South</td>
<td>11/10/08</td>
<td>11/11/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Port Aransas Park</td>
<td>3/3/08</td>
<td>3/4/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Port Aransas Park</td>
<td>7/7/08</td>
<td>7/8/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Port Aransas Park</td>
<td>8/11/08</td>
<td>8/12/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>Nueces</td>
<td>Port Aransas Park</td>
<td>10/27/08</td>
<td>10/28/08</td>
<td>Bacteria Unknown</td>
<td></td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Start Date</td>
<td>End Date</td>
<td>Reason</td>
<td>Source</td>
</tr>
<tr>
<td>----------</td>
<td>------------------</td>
<td>------------</td>
<td>----------</td>
<td>--------</td>
<td>--------</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>3/11/08</td>
<td>3/12/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>4/29/08</td>
<td>4/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>4/30/08</td>
<td>5/1/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>5/1/08</td>
<td>5/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>5/2/08</td>
<td>5/3/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>7/8/08</td>
<td>7/9/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>7/9/08</td>
<td>7/10/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>7/10/08</td>
<td>7/11/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>8/19/08</td>
<td>8/20/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>8/20/08</td>
<td>8/21/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>8/26/08</td>
<td>8/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>8/27/08</td>
<td>8/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>8/29/08</td>
<td>8/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>8/30/08</td>
<td>8/31/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>8/31/08</td>
<td>9/1/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>9/9/08</td>
<td>9/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>10/14/08</td>
<td>10/15/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>10/15/08</td>
<td>10/16/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>Ropes Park</td>
<td>10/16/08</td>
<td>10/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Nueces</td>
<td>University Beach</td>
<td>3/11/08</td>
<td>3/12/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>Nueces</td>
<td>University Beach</td>
<td>9/23/08</td>
<td>9/24/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
<tr>
<td>San Patricio</td>
<td>Nueces Bay Causeway #4</td>
<td>1/3/08</td>
<td>1/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Patricio</td>
<td>Nueces Bay Causeway #4</td>
<td>1/15/08</td>
<td>1/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Patricio</td>
<td>Nueces Bay Causeway #4</td>
<td>2/5/08</td>
<td>2/6/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Patricio</td>
<td>Nueces Bay Causeway #4</td>
<td>2/12/08</td>
<td>2/13/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Patricio</td>
<td>Nueces Bay Causeway #4</td>
<td>5/6/08</td>
<td>5/7/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Patricio</td>
<td>Nueces Bay Causeway #4</td>
<td>7/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Patricio</td>
<td>Nueces Bay Causeway #4</td>
<td>9/3/08</td>
<td>9/4/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>San Patricio</td>
<td>Nueces Bay Causeway #4</td>
<td>9/23/08</td>
<td>9/24/08</td>
<td>Bacteria</td>
<td>Stormwater</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** Other, Strong waves or wind, chemical spills, no lifeguard, jellyfish, etc.

**Notes**

Virginia has 47 public beaches stretching along 70 miles of Atlantic and Chesapeake Bay waters. Virginia's beaches are found in Accomack, Gloucester, King George, Mathews, Northampton, and York Counties and in the independent cities of Norfolk, Newport News, Hampton, and Virginia Beach. More than 15 other counties and independent cities in Virginia have marine coastline without beaches.

The state's beachwater quality monitoring program is administered by the Virginia Department of Health and conducted by state employees at local health departments and districts. The administering agency determines sampling practices, locations, standards, and notification protocols and practices throughout the state.

The monitoring season runs from mid-May through Labor Day, with some sites sampled through September. Beach monitoring and swimming advisory information is shared with the Virginia Department of Environmental Quality, which evaluates the data in cooperation with the Department of Health to make determinations on the need for corrective action and the priority of the need.

Beaches are resampled when an exceedance is found, and at this time a duplicate sample is taken and sent for microbial source tracking analysis. In 2008, microbial source tracking for Fairview Beach indicated that bird, dog, wildlife, and human signatures predominated. Additionally, indicator bacteria in sediment were evaluated as a reservoir for these organisms.

The program contracted with the Virginia Institute of Marine Science to evaluate, develop and validate molecular-based methods for detection and quantification of selected indicators to apply to recreational bathing beach sites in Virginia. They conducted beach surveys at Fairview Beach and investigated a potential source of stormwater contamination at Virginia Beach. They also compared qPCR rapid test results with traditional culture methods for quantifying levels of indicator bacteria.

The Virginia Department of Environmental Quality and the Virginia Department of Health, including the Virginia Division of Shellfish Sanitation, work together to regularly monitor the water and shellfish growing areas for the presence of harmful algal blooms and to conduct surveillance for human health effects. Virginia received a $274,650 federal BEACH Act grant in 2008 and was eligible for a $277,000 grant in 2009. The state's beach monitoring and notification program is fully funded by BEACH Act grants.

**Standards**

**Indicator Organism:** Enterococcus

**Standards:** Virginia's water quality standard is a single-sample maximum standard of 104 cfu/100 ml. There are no preemptive rainfall standards, but closings and advisories may be considered based on events such as a harmful algal blooms, fish kills, oil spills, or sewage spills.

**Monitoring**

**Determination of Monitoring Locations and Frequency:** Sampling sites in Virginia are chosen based on proximity to wastewater outfalls, bather load, and ease of access to the beach.

**Practice:** Samples are collected Monday through Thursday in 0.5 m of water, 0.3 m from the surface. Results are available 24 hours after samples are delivered to a lab for analysis.
Results: In 2008, Virginia reported 47 coastal beaches, 45 (96%) of which were monitored once a week, and 2 (4%) not monitored. Maryland monitors Assateague Island National Seashore in Accomack County. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state’s daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 1 percent of all reported beach monitoring samples exceeded the state’s daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Fairview Beach in King George County (32%), King/Lincoln Park in Newport News (6%), Salt Ponds in Hampton (6%), Lesner Bridge East (5%), Sea Gate (5%), and First Landing State Park (5%) in Virginia Beach County.

King George County had the highest exceedance rate (32%) followed by Hampton (3%), Newport News (2%), and Virginia Beach (1%). There were no exceedances in Accomack, Gloucester, Mathews, Norfolk, Northampton, and York Counties.

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 39 beaches, the percent of samples exceeding the standard remained steady at 2 percent from 2005 to 2008.

### 2008 Virginia Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Accomack</td>
<td>Guard Shore</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>0%</td>
</tr>
<tr>
<td>Accomack</td>
<td>Assateague Island National Seashore</td>
<td>1</td>
<td>1/wk</td>
<td>30</td>
<td>0%</td>
</tr>
<tr>
<td>Gloucester</td>
<td>Gloucester Point Beach</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Hampton</td>
<td>Salt Ponds</td>
<td>1</td>
<td>1/wk</td>
<td>18</td>
<td>6%</td>
</tr>
<tr>
<td>Hampton</td>
<td>Buckroe Beach</td>
<td>1</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>King George</td>
<td>Fairview Beach</td>
<td>1</td>
<td>1/wk</td>
<td>25</td>
<td>32%</td>
</tr>
<tr>
<td>Mathews</td>
<td>Festival Beach</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Newport News</td>
<td>King/Lincoln Park</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Newport News</td>
<td>Anderson's Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Newport News</td>
<td>Huntington Beach</td>
<td>1</td>
<td>1/wk</td>
<td>16</td>
<td>0%</td>
</tr>
<tr>
<td>Newport News</td>
<td>Hilton Beach</td>
<td>1</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>10th View, Behind Quality Inn, 1010 W Ocean View Ave</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Capeview Ave., North End</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>5th Bay St., North End</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>21st Bay St., North End Behind Ships Captain Restaurant</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>East Community Beach, End Of East Ocean View Ave.</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Sara Constance Park, East End</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>North Community Beach</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>Ocean View Park, East Side Of Parking Lot</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Norfolk</td>
<td>13th View, North End</td>
<td>1</td>
<td>1/wk</td>
<td>20</td>
<td>0%</td>
</tr>
<tr>
<td>Northampton</td>
<td>Kiptopeke State Park</td>
<td>1</td>
<td>1/wk</td>
<td>19</td>
<td>0%</td>
</tr>
</tbody>
</table>

Virginia Percent Exceedance for 39 Beaches Reported 2005–2008

<table>
<thead>
<tr>
<th>Year</th>
<th>Virginia Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>2005</td>
<td>2%</td>
</tr>
<tr>
<td>2006</td>
<td>2%</td>
</tr>
<tr>
<td>2007</td>
<td>2%</td>
</tr>
<tr>
<td>2008</td>
<td>2%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
</tr>
<tr>
<td>--------------------</td>
<td>--------------------------------------</td>
</tr>
<tr>
<td>Northampton</td>
<td>Town of Cape Charles Public Beach</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Lesner Bridge East</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Sea Gate</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>First Landing State Park</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>45th Street</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Dam Neck South</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>63rd Street</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Sandbridge North</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>28th Street</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>15th Street</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Croatan</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Chick's Beach</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Dam Neck Middle</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Dam Neck North</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Little Island Beach South</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>78th Street</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Chesapeake Beach</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Fort Story South</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Back Bay Beach</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Camp Pendleton</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Little Island Beach North</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Sandbridge South</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Fort Story West</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Fort Story East</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Cape Henry Light House</td>
</tr>
<tr>
<td>York</td>
<td>Yorktown Beach</td>
</tr>
</tbody>
</table>

N/A: Not applicable

Closings and Advisories

Closing and Advisory Issuance: The Virginia Department of Health has the authority to issue advisories and close beaches. The geometric mean standard is not applied when making closing and advisory decisions, only the single-sample maximum standard. If more than one sampling site at a beach exists, the average of the results for all sampling sites is used to make closing and advisory decisions for that beach. If a sample (or average of samples) exceeds the standard, an advisory is issued. There is no protocol for delaying or foregoing an advisory or closing when an exceedance is found. The public is notified via signs at the beach, press releases to local newspapers, and a website. Advisories are issued for whole beaches, not sections of a beach.

Reopening Procedures: If a beach is placed under advisory or closed, the water is resampled immediately and the monitoring frequency is increased until the water meets water quality standards and the beach is reopened. States that monitor more frequently after an exceedance is found will tend to have higher percent exceedance rates and lower total closing/advisory days than they would have had if their sampling frequency did not increase after an exceedance was found.
Number of Closings and Advisories: Virginia had 10 closing/advisory events in 2008. Total closing/advisory days for 10 events lasting six consecutive weeks or less decreased 42% to 29 days in 2008 from 50 days in 2007, 43 days in 2006, and 42 days in 2005. In addition, there were no extended or permanent events in 2008. Extended events are those in effect more than 6 consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. In 2007, there was one extended event (87 days total) and no permanent events.

Causes of Closings and Advisories: All closing and advisory days in 2008 were due to monitoring that revealed elevated bacteria levels from unknown sources of contamination.

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hampton</td>
<td>Salt Ponds</td>
<td>6/4/08</td>
<td>6/5/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>King George</td>
<td>Fairview Beach</td>
<td>5/22/08</td>
<td>5/28/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>King George</td>
<td>Fairview Beach</td>
<td>6/3/08</td>
<td>6/9/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>King George</td>
<td>Fairview Beach</td>
<td>6/24/08</td>
<td>6/27/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>King George</td>
<td>Fairview Beach</td>
<td>7/15/08</td>
<td>7/17/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>King George</td>
<td>Fairview Beach</td>
<td>9/9/08</td>
<td>9/16/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Newport News</td>
<td>King/Lincoln Park</td>
<td>5/29/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>First Landing State Park</td>
<td>9/17/08</td>
<td>9/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Lesner Bridge East</td>
<td>9/17/08</td>
<td>9/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Virginia Beach</td>
<td>Sea Gate</td>
<td>9/17/08</td>
<td>9/18/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

Notes
1 Dan Dietrich, Virginia Department of Health, personal communication, June 2007.
WASHINGTON

11th in beachwater quality (4% of samples exceeded national standards)

Although Washington water temperatures may discourage swimming for a great part of the year, its beach water quality monitoring and notification activities are expected to help prevent public health risks to other primary-contact users, including surfers, windsurfers, scuba divers, kayakers, and boaters. Washington State has nearly 1,400 publicly accessible beaches along the Pacific Ocean and Puget Sound. Of these, 169 are used by an average of at least five people a day during the summer months. These beaches are found in all of Washington's 14 coastal counties.

The state’s beach monitoring program is administered by the Washington State Department of Ecology and Department of Health, which delegates program implementation duties, including beach closing and advisory decisions, to thirteen local health jurisdictions and three tribes. The administering agency determines sampling practices, locations, standards, and notification protocols and practices throughout the state.

The 2008 monitoring season ran from May 20 to September 2. Additionally, three winter surfing beaches were sampled through October or December.

The winter surfing beaches that were monitored are Westhaven State Park in Grays Harbor County and Hobuck and Third Beaches in Clallam County.

In August of 2008, the wastewater treatment plant on McNeil Island had a die-off of microbes that led to diminished wastewater disinfection. The BEACH Program encouraged the local health department to issue a precautionary closing for recreational beaches on August 11, and on August 14, samples were collected and closing signs were posted for swimming and shellfishing at Eagle Island State Park and the north shore of Anderson Island from the ferry landing to Otso Point. Beaches were reopened on August 22 after clean sample results were obtained.

The increase in closings and advisories in 2008 can be attributed to improved communication with Washington’s beach program when a sewage event like a line break, process upset, or overflow occurs.

Two beaches in Island County are enjoying cleaner water due to local efforts to reduce sources of pollution. Freeland County Park showed continuously high bacteria levels and was closed to shellfishing in March, 2006 and to swimming in June 2006. Island County conducted increased water quality monitoring and pollution source identification and remediation. After extensive public outreach, the community reduced bacterial pollution by repairing septic systems, reducing pet waste, and correcting agricultural, business and residential practices. Island County reopened Freeland County Park for swimming in September of 2008, although the shellfish closing remains in effect.

Oak Harbor City Beach Park, also in Island County, was placed under permanent closing in August of 2007 because of continuously high bacteria levels. After numerous pollution sources were identified and corrected, the water quality improved and the beach was reopened in July of 2008.

The Kitsap County Pollution Identification and Correction Program regularly uses BEACH Program data to identify and prioritize beach cleanup and prevention activities. This program has found that failing on-site sewage systems and animal waste are common sources of bacterial pollution. Major projects are in progress on the Upper Hood Canal, Dyes Inlet, Barker Creek, and Enetai Creek, and previous project areas including Port Gamble Bay and Gorst are monitored to ensure that new sources of bacterial contamination are identified and corrected as quickly as possible.

In 2008, the BEACH Program staffed educational outreach booths at several events: the EPA Research Vessel Bold Open House Event, Stadium High School Environmental Club, and South Sound Surfrider. Also, the BEACH Program collaborated with the Department of Health shellfish group to do a press release and radio interview before the 4th of July weekend to encourage modified behavior for improved water quality and how to stay safe at the beach.

In 2009, the BEACH Program will be working with the Department of Health’s shellfish group to establish a sanitary survey element to the program.

A state surcharge on shellfish license sales was initiated to sustain collaboration between harmful algal bloom researchers and state and tribal coastal management. This surcharge will also support long-term harmful algal bloom monitoring and expanding notification and outreach efforts in Washington.
Washington State received a $267,980 federal BEACH Act grant in 2008 and was eligible for a $270,000 grant in 2009. The federal grant fully funds Washington's beach monitoring and notification program. In 2008, 65 beaches identified as high use and/or high risk in Washington were not monitored because of a funding shortage created by increased expenses.1

### Standards

**Indicator Organism:** Enterococcus

**Standards:** Washington uses the single-sample maximum enterococcus standard of 104 cfu/100 ml for making closing and advisory decisions. The geometric mean standard of 35 cfu/100 ml is taken into consideration when determining permanent or extended advisories.1

Washington has no preemptive rainfall advisory standards, but the public is advised to avoid water contact for 24 hours after heavy rains.3

### Monitoring

**Determination of Monitoring Locations and Frequency:** Beaches are chosen for monitoring based on use, extent of water exchange, and potential risks of fecal pollution from sewage treatment plants, septic tanks, stormwater drains, freshwater discharges, marinas, pet waste, livestock, marine mammals, and shore birds. Staff knowledge as well as public input inform the ranking process.1 An effort is made to take samples at outfalls and other sources of contamination.3

**Practice:** Samples are taken in knee-deep water, usually in the mornings to early afternoon. Results are generally known 24 hours after samples are delivered to a lab. Routine sampling in 2008 was generally conducted Monday through Wednesday, with resampling usually done on Thursdays.

**Results:** In 2008, Washington reported 746 coastal beaches, 56 (8%) of which were monitored once a week, 310 (42%) less than once a month, and 380 (51%) were not monitored. (The 310 beaches that were monitored less than once a month were also monitored six times per year by the recreational shellfish program at Washington Department of Health. They were monitored for fecal coliform rather than enterococcus. Washington's Beach Program considers the results of the fecal coliform tests when making beach advisory and closing decisions. However, NRDC does not include the results of the fecal coliform tests in its calculation of percent exceedances of state and federal standards because there are no state or federal fecal coliform standards for recreational marine waters.)

For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state's daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 4 percent of all reported beach monitoring samples exceeded the state's daily maximum bacterial standards. The beaches with the highest percent exceedance rate in 2008 were Pomeroy Park-Manchester Beach in Kitsap County (18%), Larrabee State Park, Wildcat Cove in Whatcom County (16%), Silverdale County Park (14%) and Eagle Harbor Waterfront Park (10%) in Kitsap County, Camp Parsons Boy Scout Brinnon Camp in Jefferson County (9%), Edmonds Underwater Park in Snohomish County (9%), Jamestown in Clallam County (9%), Oak Harbor City Beach Park in Island County (9%), Carkeek Park in King County (8%), and Birch Bay County Park (8%) and Boulevard Park/Bayview Marine Park (8%) in Whatcom County.
Skagit County had the highest exceedance rate (7%) followed by Kitsap (7%), Jefferson (6%), Whatcom (6%), Island (4%), Snohomish (4%), Mason (4%), Clallam (3%), Pierce (3%), King (3%), and Thurston (2%). There were no reported exceedances in Grays Harbor and Pacific Counties.

Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 44 beaches, the percent of samples exceeding the standard remained steady at 4 percent in 2008 from 2007 and 2005 levels (in 2006, exceedance levels increased to 6 percent).

### 2008 Washington Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Clallam</td>
<td>Jamestown</td>
<td>1</td>
<td>1/wk</td>
<td>56</td>
<td>9%</td>
</tr>
<tr>
<td>Clallam</td>
<td>Port Williams Boat Launch</td>
<td>1</td>
<td>1/wk</td>
<td>49</td>
<td>4%</td>
</tr>
<tr>
<td>Clallam</td>
<td>Third Beach, Neah Bay</td>
<td>1</td>
<td>1/wk</td>
<td>30</td>
<td>3%</td>
</tr>
<tr>
<td>Clallam</td>
<td>Salt Creek Recreation Area County Park</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>2%</td>
</tr>
<tr>
<td>Clallam</td>
<td>Hobuck Beach</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>0%</td>
</tr>
<tr>
<td>Clallam</td>
<td>Cline Spit County Park</td>
<td>1</td>
<td>1/wk</td>
<td>53</td>
<td>0%</td>
</tr>
<tr>
<td>Clallam</td>
<td>Sekiu Public Area</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>John Wayne Marina</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Port Angeles Boat Haven</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Freshwater Bay, Beach 416</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Clallam Bay State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Cline Spit</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Mouth of Elwha River</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>La Push Beach Number 3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Ediz Hook Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Shi Shi Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>La Push Marina #1</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Striped Peak Recreation Area</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Larrabee State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Mora</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Seashore Conservation Area</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Clallam Bay Spit Community Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>East Haven Boat Launch</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Agate Bay, Beach 421</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Sekiu Point, Beach 427</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Ediz Hook Boat Launch</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Sequim Bay State Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Shipwreck Point, Beach 429</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Travis Spit, Beach 411a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Diamond Point, Beach 410</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Gibson Spit, Beach 411</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Snow Creek Boat Launch</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>--------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>-------------------</td>
</tr>
<tr>
<td>Clallam</td>
<td>Pillar Point, Beach 425</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Slip Point, Beach 426</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Dungeness National Wildlife Refuge</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Sekiu River, Beach 429a</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Dungeness Recreation Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Freshwater Bay Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Ozette Beach Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Twin Rivers, Beach 423</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Pillar Point, Beach 424</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Sekiu River Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Twin Rivers, Beach 423a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Hollywood Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Sooes Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>La Push Beach Number 2</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>La Push Beach #1</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Point of Arches</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Highway 112 Waysides</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Agate Bay, Beach 420</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Neah Bay Picnic Area</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Pillar Point County Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Twin Rivers, Beach 422</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Hoko River, Beach 428</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Sequim Bay Boat Launch</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Dry Creek, Beach 414</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Striped Peak, Beach 419</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Railroad Bridge Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Rialto Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Port Angeles Waterfront Trail</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>Cline Spit Boat Launch</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Clallam</td>
<td>West Boat Haven Boat Launch</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Westhaven State Park, Half Moon Bay</td>
<td>1</td>
<td>1/wk</td>
<td>85</td>
<td>1%</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Westport-The Groins</td>
<td>1</td>
<td>1/wk</td>
<td>65</td>
<td>0%</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Westhaven State Park, South Jetty</td>
<td>1</td>
<td>1/wk</td>
<td>66</td>
<td>0%</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Ocean City Beach Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Pacific Beach State Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Twin Harbor State Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Griffith-Priday State Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Ocean Shores, Marine View Drive</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Moclips</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Ocean Shores, North Jetty</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Oyhut Beach Access</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------------</td>
<td>----------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Bowerman Basin</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Chance a la Mer/Ocean Shores Main Entrance</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Westport Light State Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Ocean City State Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Pacific Way Beach Access/North Jetty</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Westport Marina</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Damon Point State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Taholah</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Dnr Grays Harbor County</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Grayland Beach Access/South Jetty</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Bonge Road Beach Access/South Jetty</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Taurus Street Beach Access/North Jetty</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Grays Harbor</td>
<td>Roosevelt Beach Access</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Oak Harbor City Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>46</td>
<td>9%</td>
</tr>
<tr>
<td>Island</td>
<td>Freeland County Park / Holmes Harbor</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>4%</td>
</tr>
<tr>
<td>Island</td>
<td>Oak Harbor Lagoon</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>0%</td>
</tr>
<tr>
<td>Island</td>
<td>Keystone Beach Tidelands</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Town Boat Launch</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Libbey County Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Useless Bay Tidelands State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Saratoga Pass Tidelands</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Long Point Beach</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Cultus Bay Recreation Site</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Dugualla Bay, Beach 142</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Admiralty Bay, Beach 124</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Hastie Lake Road Boat Launch</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Oak Harbor City Marina</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Glendale, Beach 100</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Fort Casey State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Double Bluff East Beach</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Mariner’s Cove Boat Launch</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>W. Penn Cove Beach</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Bush Point, Beach 101</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>South Whidbey State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Glendale, Beach 99</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Coupeville Wharf</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Ebey’s Landing State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Rockaway Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Possession Point Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Madrona Beach, Camano Island</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Town Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------------</td>
<td>-------------------------------</td>
<td>------</td>
<td>---------------------</td>
<td>--------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Island</td>
<td>Monroe Landing</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Spur Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Cavalero Beach County Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Dave Mackie Memorial County Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Lagoon Point</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Onanac Point Reef</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Dugualla Bay County Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Flintstone Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Mountain View Road End</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Penn Cove Tidelands</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Cultus Bay Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Cornet Bay Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Sunlight County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Moran’s Beach County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Clinton Ferry Terminal</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Phil Simon Memorial Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Bush Point</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Keystone Ferry Terminal</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Langley Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Joseph Whidbey State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Winas Maylor Pt-East</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Main Street Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Penn Cove Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Fort Ebey State Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Mutiny Bay Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Utsalady County Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Camano Island Country Club Lagoon</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Maple Grove Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Cornet Bay County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Camano Island State Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Deception Pass State Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Glendale Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Island</td>
<td>Langley Water Front Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Camp Parsons Boy Scout Brinnon Camp</td>
<td>1</td>
<td>1/wk</td>
<td>43</td>
<td>9%</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Fort Worden State Park</td>
<td>1</td>
<td>1/wk</td>
<td>58</td>
<td>5%</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Quilicene Boat Haven</td>
<td>1</td>
<td>1/wk</td>
<td>62</td>
<td>5%</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Bolton Peninsula, Beach 56</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Hadlock Boat Launch</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Toandos Tidelands State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Broad Spit</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Beach 2</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------------</td>
<td>-----------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Pleasant Harbor State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>North Beach County Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Squamish Harbor, Beach 59</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Tabor Point, Beach 57</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Jackson Cove, Beach 55</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Triton Cove State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Hicks County Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Ruby Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Beach 6</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Point Whitney Tidelands</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Seal Rock Campground</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Cape George, Beach 409</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Kalaloch Beach And Campground</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Oak Bay Sand Spit</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Duckabush</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Port Townsend North Pier And Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>H.J. Carroll State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>South Beach Comp Area</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Beach 1</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Fort Flagler State Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Indian Island County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>East Beach County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Mystery Bay State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Old Fort Townsend State Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Oak Bay County Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Quilcene Bay Tidelands</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Shine Tidelands</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Dosewallips State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Gardiner Public Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Wolfe Property State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Chetzeomka Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Kinney Point, Beach 404a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Mats Mats Bay Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Right Smart Cove State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Coast Dabob East</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Beach 3</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Cape George, Beach 407</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Port Townsend Boat Basin</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Point Hudson Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Flapjack Cove Tidelands, Beach 54</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Case Shoal, Beach 59a</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------------</td>
<td>--------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Chimacum Creek Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>Beach 4</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Jefferson</td>
<td>J.B. Pope Marine Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Carkeek Park</td>
<td>1</td>
<td>1/wk</td>
<td>49</td>
<td>8%</td>
</tr>
<tr>
<td>King</td>
<td>Saltwater State Park</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>6%</td>
</tr>
<tr>
<td>King</td>
<td>Golden Gardens Park</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>4%</td>
</tr>
<tr>
<td>King</td>
<td>Redondo County Park</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>2%</td>
</tr>
<tr>
<td>King</td>
<td>Richey Viewpoint</td>
<td>1</td>
<td>1/wk</td>
<td>49</td>
<td>0%</td>
</tr>
<tr>
<td>King</td>
<td>Alki Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>49</td>
<td>0%</td>
</tr>
<tr>
<td>King</td>
<td>Seahurst County Park</td>
<td>1</td>
<td>1/wk</td>
<td>49</td>
<td>0%</td>
</tr>
<tr>
<td>King</td>
<td>Lincoln Park</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>0%</td>
</tr>
<tr>
<td>King</td>
<td>101 Avenue SW Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>146th Avenue SW Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>1st Avenue South Bridge Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Northeast Vashon County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Washington Street Boat Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Andover Place Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Hiram M. Chittendon Locks</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Point Robinson County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Poverty Bay County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Durnas Bay Park Wildlife Sanctuary</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Arroyos Natural Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>20th Place Sw Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Don Armeni Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Tramp Harbor Fishing Pier</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Magnolia Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Fisherman’s Terminal</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Spring Beach County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Maury Island Marine Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Ballard Elks Public Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Duwamish Waterway Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Elliot Bay Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Normandy Beach Park/Marine View Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Hamilton View Point Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Aki Point Light Station</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Maury Island, Beach 83</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>West Vashon Island, Beach 77</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Des Moines Fishing Pier</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>West Vashon Island, Beach 78</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Emma Schmitz Me-Kwa Mooks Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Shilshole Bay Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------</td>
<td>--------------------------------------</td>
<td>------</td>
<td>---------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>King</td>
<td>Boeing Creek Reef</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Magnolia Tidelands Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Anthony's Home Port Public Access</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Vashon Beach Boat Launch</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Des Moines Marina City Beach Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Discovery Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Seacrest Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Lowman Beach Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Dash Point State Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Myrtle Edwards Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Richmond Beach County Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Cormorant Cove</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Dockton County Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Burton Acres County Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Point Heyer 'Kvi' Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Three Tree Street Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Southeast Vashon Island, Beach 79</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Smith Cove Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Three Tree Point</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Waterfront Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>East Vashon Island, Beach 85</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Coleman Dock</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>South 239th Beach Access</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Pier 48 Viewpoint</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Camp Sealth</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>King</td>
<td>Harbor Vista Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Pomeroy Park - Manchester Beach</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>18%</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Silverdale County Park</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>14%</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Eagle Harbor Waterfront Park</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>10%</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Fay Bainbridge State Park</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>6%</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Evergreen Park</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>4%</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Arness County Park</td>
<td>1</td>
<td>1/wk</td>
<td>48</td>
<td>4%</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Lions Park</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>0%</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Indianola Dock</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>0%</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Illahee State Park</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>0%</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Blake Island State Park/Tillicum Village</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Manchester State Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Scenic Beach State Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Harper County Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Fort Ward State Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Point No Point County Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>---------</td>
<td>--------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Camp Indianola</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Poulsbo Waterfront Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Foulweather Bluff, Beach 64</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Old Man House State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Bremerton Ferry Terminal</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Pebble Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Miami Beach/Misery Point</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>N.A.D. Marine Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Gamble Bay</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Ollala Boat Launch</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Keyport County Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Blake Island State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Oyster Plant Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Kingston Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Harper Public Fishing Pier</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Keyport County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Tracyton Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Kitsap Memorial State Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Lents Landing</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Liberty Bay Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Bachmann Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Eglon Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Ross Point Tidelands</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Point No Point, Beach 68</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Annapolis Public Assess Area</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Anderson Cove, Beach 40</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Suquamish Center</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Anna Smith Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Hansville, Beach 69</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Salisbury Point County Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Kingston Ferry Terminal</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Port Orchard Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>First Street Dock</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Port Of Waterman Pier</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Port Orchard Pier</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Wynn-Jones County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Crystal Springs Public Fishing Pier</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Liberty Park Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Illahee Pier</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Winslow Ferry Terminal</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Poulsbo Boat Launch And Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Port Orchard Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Port Orchard Waterfront Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Chico Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Port of Brownsville Marine Park and Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Twanoh State Park</td>
<td>1</td>
<td>1/wk</td>
<td>58</td>
<td>7%</td>
</tr>
<tr>
<td>Mason</td>
<td>Walker County Park</td>
<td>1</td>
<td>1/wk</td>
<td>52</td>
<td>4%</td>
</tr>
<tr>
<td>Mason</td>
<td>Pottlatch State Park</td>
<td>1</td>
<td>1/wk</td>
<td>60</td>
<td>0%</td>
</tr>
<tr>
<td>Mason</td>
<td>Squaxin Island State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Fudge Point</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Jarrell Cove, Beach 34</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Arcadia Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Hood Canal, Beach 46</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Grapeview Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Allyn Port And Dock</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Hartstene Bridge Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Dewatto Bay Beach 44b</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Stretch Point State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Hood Canal, Recreational Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Hoodsport, Beach 43</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Jarrell Cove State Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Dewatto Bay, Beach 44a</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>South of Lilliwaup Tidelands State Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Mcmicken Island State Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Eagle Creek Recreational Tidelands</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Harstene Island, Beach 33</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Belfair State Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Lilliwaup Tidelands State Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Port of Allyn Public Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Skokomish Tidelands</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Hood Canal, Beach 47</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Shelton Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>McMicken Island, Beach 25</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Lilliwaup Public Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Union Public Boat Launch</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Octopus Hole</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Port Of Hoodsport</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Jorsted Creek Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Cushman Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Stretch Island, Beach 20 State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Northshore Dock and Boat Launch</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Allyn Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>-------------------</td>
</tr>
<tr>
<td>Mason</td>
<td>Hood Canal, Beach 48</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Jacoby’s Shorecrest County Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Shorecrest County Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Mason</td>
<td>Harvey Rendsland State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Cape Disappointment</td>
<td>1</td>
<td>1/wk</td>
<td>43</td>
<td>0%</td>
</tr>
<tr>
<td>Pacific</td>
<td>Pioneer Road End</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Klipsan Beach Access</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Lewis and Clark Campsite State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Grayland Beach State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Willapa Landing</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Chinook County Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Riekkola Unit, Willapa Nwr</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Nahcotta Small Boat Basin</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Cranberry Road Beach Access</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>South Bend Fishing Access And Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>10th Street Beach Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Oysterville Beach Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Leadbetter Point State Park Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Pacific Pines State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Bay Avenue/Ocean Park Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Bolstead Beach Access</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Loomis Lake State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Ilwaco Marina</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Long Island Unit, Willapa Nwr</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Tokeland Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Midway Beach Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Seaview Beach Access</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>North River Public Fishing Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Lewis Unit, Willapa Nwr</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Northcove Beach Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Fort Columbia Historical State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Long Beach Boardwalk</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pacific</td>
<td>Bruceport County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Owens Beach/Point Defiance Park</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>4%</td>
</tr>
<tr>
<td>Pierce</td>
<td>Titlow Park</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>4%</td>
</tr>
<tr>
<td>Pierce</td>
<td>Ruston Way Waterfront Park</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>4%</td>
</tr>
<tr>
<td>Pierce</td>
<td>Purdy Sandspit County Park</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>2%</td>
</tr>
<tr>
<td>Pierce</td>
<td>Penrose Point State Park</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>0%</td>
</tr>
<tr>
<td>Pierce</td>
<td>Sunnyside Beach Park</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>0%</td>
</tr>
<tr>
<td>Pierce</td>
<td>Steilacoom Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Narrows Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Pierce</td>
<td>Longbranch Dock</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Harborview Drive Road End Viewpoint</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Randall Drive Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Herron Ferry Terminal-Main Land</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Kamas Drive Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>182nd Avenue Kpn Road End</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Wyckoff Shoal, Beach 39</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Pioneer Orchard Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Sunrise Beach Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Thea Foss Waterway</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Hall Road End Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Marine Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Longbranch Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Berg Drive Nw Road End Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>City Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Pitt Passage, Beach 6</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Memorial Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Anderson Island Ferry Dock</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Jerisich Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Days Island</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Home Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>36th Street Nw Road End Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>S Eagle Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Fox Island Bridge Boat Landing</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Fireman’s Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Taylor Bay, Beach 16</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Wauna, Beach 35</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Kopachuck State Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Solo Point Boat Launch</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Point Fosdick, Beach 1a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Salt Point/South Gorden Point</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Joemma State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Maple Hollow Recreation Site</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Devils Head, Beach 13</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Anderson Island, Beach 8</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Kpn Olman Road Vaugh Bay Sandspit</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Windy Bluff, Beach 18</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Point Evans, Beach 36</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Wauna Boat Launch</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Haley Property</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Cutts Island State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Pierce</td>
<td>Wauna, Beach 35a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Eagle Island State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Point Fosdick, Beach 1</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Dash Point County Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Saltars Point Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Brown’s Point Lighthouse Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Pierce</td>
<td>Camp Seymour</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Little Patoes Island, Beach 366a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Moran State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Trump Island, Beach 320</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Decatur Island, Beach 319a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Ewing Island, Beach 367a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Mud Bay Tidelands</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Spring Passage, Beach 240a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Reuben Tarte County Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>East Sound, Beach 274</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Lopez Passm, Beach 312a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Harney Channel, Beach 262</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Coon Island, Beach 245a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Deer Point, Beach 277</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Broken Point, Beach 260a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Spieden Island, Beach 352a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Mackaye Harbor, Beach 306</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Flat Point, Beach 295</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Clark Island State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Kellett Bluff, Beach 341</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>San Juan Channel, Beach 334</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Point Lawrence Recreation Site</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Shaw Island, Beach 260c</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Waldron Island, Beach 361a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Point Lawrence, Beach 231</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>James Island State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Patos Island State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>President’s Channel, Beach 240</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Matia Island State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Cattle Point Lighthouse Recreation Site</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Rosario, Beach 272</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Spieden Island, Beach 352</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Obstruction Pass County Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Reads Bay, Beach 325</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>American Camp</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>----------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>San Juan</td>
<td>Frost Island, Beach 318</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Point Colville</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>South Finger Island, Beach 367c</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Hunter Bay, Beach 314</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Lopez Island, Beach 305</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Blakely Island, Beach 290</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Shark Reef, Beach 304</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Stuart Island, Beach 359</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>San Juan Channel, Beach 298</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>McConnell Island, Beach 245</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Cactus Islands, Beach 353b</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Aieck Bay, Beach 308</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Lover’s Cove, Beach 239</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Obstruction Pass, Beach 276</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Rock Point, Beach 303</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Shaw Island, Beach 260</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Mosquito Pass, Beach 344</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Raccoon Point, Beach 233</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Skull Island State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>North Beach Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Point Doughty, Beach 236</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Deer Harbor, Beach 240b</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Orcas Island, Beach 283</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Double Island, Beach 251</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Olga Marine State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Double Island, Beach 251a</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Sheep Island, Beach 255a</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Griffin Bay Recreation Site</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Willow Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Point Doughty Recreation Site</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Hunter Bay, Beach 313a</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Mitchell Bay Islet</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Port of Friday Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>North Finger Island, Beach 367b</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Hunter Bay Dock County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Orcas Island Ferry Terminal Picnic Area</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Decatur Island, Beach 325a</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Olga County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Castle Island State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Obstruction Pass Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Southeast Stuart Island, Beach 356b</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>San Juan</td>
<td>Stuart Island State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Eagle Cove</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Mud Bay, Beach P1</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Center Island Recreation Site</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Blakely Island, Beach 292a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>East Sound, Beach 267</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Hankin Point, Beach 264</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Waldron Island, Beach 361</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Pear Point, Beach 332</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Shaw Island, Beach 258</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Jones Island State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Freeman Island State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Oak Island, Beach 257a</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Ram Island, Beach 312b</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Armitage Island, Beach 290a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>English Camp Historical Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Shaw Island County Park/Indian Cove</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Odlin County Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Spencer Spit State Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Upright Channel Recreation Site</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>San Juan Island, Beach 330</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Beach Haven, Beach 238</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Johns Island</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Center Island, Beach 324a</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Decatur Island, Beach 324</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Sucia Island State Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>San Juan County Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Fishing Bay</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Thatcher Pass, Beach 291</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Neck Point, Beach 259a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Cattle Point</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Fisherman Bay</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Spate Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Cattle Point, Beach 326a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Reads Bay, Beach 319</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Thatcher Pass, Beach 322</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Lime Kiln Point State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Henry Island, Beach 339a</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Neil Tarte Memorial County Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Lopez Island Tidelands</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Agate Beach County Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-----------------</td>
<td>------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>San Juan</td>
<td>Jackson Beach County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Otis Perkins Day Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>East Sound, Beach 266</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Point Hammond, Beach 362</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Posey Island State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Blind Bay Beach 260d</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Satellite Island, Beach 358</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Blakely Island, Beach 292</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Upright Head, Beach 294</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Cape St. Mary, Beach 311</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Wasp Passage, Beach 259</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Twin Rocks State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Turn Island State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Crane Island, Beach 250a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Indian Cove, Beach 296</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>East Sound, Beach 275</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Little Sucia Island, Beach 367d</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Blind Island State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Mud Bay, Beach P2</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Orcas Island, Beach 282</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Northeast Stuart Island, Beach 356a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Diamond Point, Beach 265</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Lopez Sound, Beach 315</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Lopez Ferry Terminal</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Sandy Point, Beach 364</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Spieden Bluff, Beach 353</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Johns Island, Beach 356</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Hunter Bat, Beach 313</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Canoe Island, Beach 296a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Decatur Island, Beach 323</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Fishery Point, Beach 363</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Mcardel Bay, Beach 309</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>East Sound, Beach 270</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Crane Island, Beach 250b</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Orcas Island, Beach 279</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Lopez Sound, Beach 317</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Cactus Islands, Beach 353a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Orcas Island, Beach 266b</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>McCracken Point, Beach 340</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Barnes Island, Beach 229</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Point Thompson, Beach 234</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>San Juan</td>
<td>Johns Point, Beach 307</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Rocky Bay, Beach 336</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Obstruction Pass Recreation Site</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Shark Reef County Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Iceberg Island State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Flower Isle, Beach 266b</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Doe Bay, Beach 281a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>San Juan</td>
<td>Doe Island State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Bayview State Park</td>
<td>1</td>
<td>1/wk</td>
<td>85</td>
<td>7%</td>
</tr>
<tr>
<td>Skagit</td>
<td>North Beach-Guemes Island</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Dewey Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Smilk Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Northwest Island Marine Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Cypress Head, Beach 210</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Salmon Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Eagle Cliff, Beach 286</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>March Point Recreational Beach</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Vendovi Island, Beach 214</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Eagle Harbor, Beach 212a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Cypress Head, Beach 211</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Cypress Head Recreation Site</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>North Fork Access</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>March Point Tidelands</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Cypress Head, Beach 209</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Sinclair Island Dock</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Skagit Island State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Larrabee State Park, Clayton Beach</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Sne-Oosh Waterfront Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>South Shore Drive Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Samish Island Public Access</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Swinomish Channel Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Deception Pass State Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Sinclair Island Lighthouse, Beach 213a</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Bayview Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Seafarer Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Young County Park North Beach Guemes Island</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Padilla Bay National Estuarine Research Reserve</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Sharpe County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Cone Islands State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Pelican Beach Recreation Site</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Sinclair Island, Beach 213</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------------</td>
<td>------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Skagit</td>
<td>Burrows Island State Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Pioneer Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Alexander/Delmar</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Anacortes Ferry Terminal Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Lower Cap Sante Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Carter Point</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Camp Kirby</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Jensen Access</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Anacortes Marina Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Hope Island/Skagit County</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Saddlebag Island State Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Milltown Access</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Cap Sante Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Community of Christ Church Camp</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Washington Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Strawberry Bay, Beach 287</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Strawberry Island Recreation Site</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Skagit</td>
<td>Cap Sante Marina</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Edmonds Underwater Park</td>
<td>1</td>
<td>1/wk</td>
<td>44</td>
<td>9%</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Marina Beach/Edmonds (Dog Park)</td>
<td>1</td>
<td>1/wk</td>
<td>57</td>
<td>7%</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Howarth Park</td>
<td>1</td>
<td>1/wk</td>
<td>50</td>
<td>6%</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Marina Beach/Edmonds (No Dogs)</td>
<td>1</td>
<td>1/wk</td>
<td>45</td>
<td>4%</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Jetty Island</td>
<td>1</td>
<td>1/wk</td>
<td>24</td>
<td>0%</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Kayak Point County Park</td>
<td>1</td>
<td>1/wk</td>
<td>59</td>
<td>0%</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Picnic Point County Park</td>
<td>1</td>
<td>1/wk</td>
<td>47</td>
<td>0%</td>
</tr>
<tr>
<td>Snohomish</td>
<td>City Park Edmonds Marina Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Sound View Drive Nw Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Hat/Gedney Island Reef</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Nakeeta Beach Tidelands</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Marine Park Boat Launch</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Olympic Beach Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Mukilteo Fishing Pier</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Harborview Drive</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Totem Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Otter Island</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Warm Beach</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Ebey Island</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Norton Avenue Boat Launch</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>South Terminal Viewpoint</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Park Avenue Road End</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>West Pass Bridge</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>-------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Meadowdale County Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Mukilteo Lighthouse Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>North Marine View Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Darlington Beach And Tidelands</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Forest Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Spencer Island County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>South Marine View Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Tulalip Bay Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Mission Beach Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Legue Island Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Burfoot County Park</td>
<td>1</td>
<td>1/wk</td>
<td>51</td>
<td>2%</td>
</tr>
<tr>
<td>Thurston</td>
<td>Frye Cove County Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Priest Point Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Woodward Bay Road Bridge</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Luhrs Boat Launch</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Westbay Marina</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Bayview Market Public Access</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Boston Harbor Boat Ramp</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Fiddlehead Marina</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Nisqually National Wildlife Refuge</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Nisqually Habitat Management Area</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Percival Landing North</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Woodard Bay Natural Area</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Tolmie State Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Swantown Marina</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Thurston</td>
<td>Thurston County Parcel (Indian Rd)</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Larrabee State Park, Wildcat Cove</td>
<td>1</td>
<td>1/wk</td>
<td>37</td>
<td>16%</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Birch Bay County Park</td>
<td>1</td>
<td>1/wk</td>
<td>49</td>
<td>8%</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Boulevard Park/Bayview Marine Park</td>
<td>1</td>
<td>1/wk</td>
<td>26</td>
<td>8%</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Birch Bay State Park</td>
<td>1</td>
<td>1/wk</td>
<td>41</td>
<td>0%</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Marine View Park</td>
<td>3</td>
<td>1/wk</td>
<td>49</td>
<td>0%</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Padden Creek Lagoon</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Monument County Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Little Squalicum Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Zvanich Park/Squalicum Harbor</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Fish Point Park</td>
<td>3</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Semiahmoo County Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Burnstead Spit, Beach 223</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>South Side Boat Launch</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Teddy Bear Cove</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Birch Bay Tidelands</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>
## Testing the Waters 2009

### County Beach Tier Monitoring

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Whatcom</td>
<td>Lighthouse Marine County Park</td>
<td>2</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Cottonwood Beach County Park</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Birch Bay Near Terrell Creek</td>
<td>1</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Maple Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Smugglers Cove Point, Beach 221</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Point Whitehorn</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Lummi Island Recreation Site</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Bumstead Spit South, Beach 223a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Lummi Island, Beach 224</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Smugglers Cove North, Beach 221a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Lummi Island, Beach 220</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Chuckanut Village Park</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Birch Point, Beach 372</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Devils Slide, Beach 220a</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Lummi Island, Beach 223b</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Blaine Harbor And Boat Launch</td>
<td>3</td>
<td>6/yr</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Whatcom</td>
<td>Larrabee State Park</td>
<td>2</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>

N/A: Not applicable

### Closings and Advisories

**Closing/Advisory Issuance:** Local jurisdictions in Washington issue both beach closings and advisories. Samples are taken from three locations at each beach and the bacterial count for the simultaneous samples is averaged before comparison to the standard. Advisories are not generally issued until resampling confirms. There is no protocol for delaying or foregoing an advisory when resampling confirms an exceedance. If the average enterococcus concentration of three samples is more than 1000 cfu/100 ml, the state usually recommends posting an advisory immediately, without waiting for a resample to confirm the exceedance. The public is notified of closings and advisories via websites, signs, news releases, and e-mail. Closings and advisories can be issued for sections of a beach rather than a whole beach but in general are issued for entire beaches.

**Reopening Procedures:** If a beach is closed or placed under advisory, the monitoring frequency is increased until the beach is reopened. States that monitor more frequently after an advisory is issued will tend to have higher percent exceedance rates and lower total closing/advisory days than they would have had if their sampling frequency did not increase after an exceedance was found.

**Number of Closings and Advisories:** Washington had 18 closing/advisory events lasting six consecutive weeks or less in 2008. Total closing/advisory days for 18 events lasting six consecutive weeks or less increased six-fold to 120 days in 2008 from 19 days in 2007, 294 days in 2006, and 216 days in 2005. In addition, there were no extended events and seven permanent events (1,719 days total) in 2008. Extended events are those in effect more than 6 consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks. In 2007, there were no extended events and six permanent events (1330 days total).

**Causes of Closings and Advisories:** For events lasting six consecutive weeks or less, 37% (44) of closing/advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, and 63% (76) were preemptive (i.e. without waiting for monitoring results) due to known sewage spills/leaks.
The reported sources of beachwater contamination for 2008 are as follows: 7% (8) of closing/advisory days were from unknown sources of contamination, and 93% (112) were from sewage spills/leaks.

### 2008 Washington Beach Closings and Advisories

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Start Date</th>
<th>End Date</th>
<th>Reason</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Clallam</td>
<td>Hollywood Beach</td>
<td>1/1/08</td>
<td>12/31/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Clallam</td>
<td>Port Williams Boat Launch</td>
<td>5/23/08</td>
<td>5/30/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Island</td>
<td>Freeland County Park/Holmes Harbor</td>
<td>1/1/08</td>
<td>9/10/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Island</td>
<td>Oak Harbor City Beach Park</td>
<td>1/1/08</td>
<td>7/2/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>King</td>
<td>Discovery Park</td>
<td>3/28/08</td>
<td>3/29/08</td>
<td>Preempt-sew</td>
<td>POTW</td>
</tr>
<tr>
<td>King</td>
<td>Golden Gardens Park</td>
<td>3/28/08</td>
<td>3/29/08</td>
<td>Preempt-sew</td>
<td>POTW</td>
</tr>
<tr>
<td>King</td>
<td>Myrtle Edwards Park</td>
<td>7/23/08</td>
<td>7/25/08</td>
<td>Preempt-sew</td>
<td>Sew-break</td>
</tr>
<tr>
<td>King</td>
<td>Seahurst County Park</td>
<td>8/12/08</td>
<td>8/22/08</td>
<td>Preempt-sew</td>
<td>Sew-break</td>
</tr>
<tr>
<td>King</td>
<td>Waterfront Park</td>
<td>7/23/08</td>
<td>7/25/08</td>
<td>Preempt-sew</td>
<td>Sew-break</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Evergreen Park</td>
<td>8/25/08</td>
<td>8/27/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Lions Park</td>
<td>8/25/08</td>
<td>8/27/08</td>
<td>Preempt-sew</td>
<td>Comb-sew-overflow</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Pomeroy Park-Manchester Beach</td>
<td>6/4/08</td>
<td>6/19/08</td>
<td>Bacteria</td>
<td>Sew-break</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Pomeroy Park-Manchester Beach</td>
<td>8/28/08</td>
<td>8/29/08</td>
<td>Bacteria</td>
<td>Unknown</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Silverdale County Park</td>
<td>6/4/08</td>
<td>6/13/08</td>
<td>Bacteria</td>
<td>Sew-break</td>
</tr>
<tr>
<td>Kitsap</td>
<td>Silverdale County Park</td>
<td>8/18/08</td>
<td>8/30/08</td>
<td>Bacteria</td>
<td>Sew-break</td>
</tr>
<tr>
<td>Mason</td>
<td>Walker County Park</td>
<td>1/1/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Pierce</td>
<td>Eagle Island State Park</td>
<td>8/12/08</td>
<td>8/22/08</td>
<td>Preempt-sew</td>
<td>POTW</td>
</tr>
<tr>
<td>Pierce</td>
<td>Purdy Sandspit County Park</td>
<td>10/3/08</td>
<td>12/31/08</td>
<td>Preempt-sew</td>
<td>Spetic</td>
</tr>
<tr>
<td>Pierce</td>
<td>S Eagle Island</td>
<td>8/12/08</td>
<td>8/22/08</td>
<td>Preempt-sew</td>
<td>POTW</td>
</tr>
<tr>
<td>Snohomish</td>
<td>Marina Beach/Edmonds (Dog Park)</td>
<td>1/1/08</td>
<td>12/31/08</td>
<td>Bacteria</td>
<td>Other</td>
</tr>
<tr>
<td>Thurston</td>
<td>Priest Point Park</td>
<td>5/26/08</td>
<td>9/1/08</td>
<td>Preempt-sew</td>
<td>Unknown</td>
</tr>
</tbody>
</table>

**Explanation of Frequently Used Terms:** Comb-sew-overflow, Combined sewer overflow; Other, Strong waves or wind, chemical spills, no lifeguard, jellyfish, etc.; POTW: Publicly owned treatment works; Preempt-sew, Preemptive due to sewage discharge or spill; Sew-break, Sewer line blockage/break.

**Notes**

Wisconsin has 193 public beaches along 55 miles of Lake Superior and Lake Michigan coastline. Fifteen counties in the state have Great Lakes beaches.

The Wisconsin Department of Natural Resources coordinates Wisconsin’s beach monitoring program and administers the BEACH Act grants, and local health departments conduct the actual water quality monitoring part of the effort. Inland beaches are also monitored; this summary describes only the Great Lakes monitoring efforts.

Most beaches are monitored from Memorial Day weekend through Labor Day weekend, but initiation of monitoring can be delayed where colder temperatures delay the onset of the swim season.

Monitoring and notification activities from the BEACH Act grant program has prompted source identification and beachwater quality improvement efforts at many locations throughout the state. These activities have revealed that wildlife impact water quality at 12 percent of the beaches in the state. The local health departments, Northland College, the University of Wisconsin–Oshkosh, and the Lake Superior Alliance have been brought together to create a comprehensive monitoring and source-tracking program in Ashland, Bayfield and Iron Counties. In response to suspected fecal sources, Bayfield County officials have decided to open a special goose hunt at Thompson West End Park in Washburn to control the high goose population. It is believed that these goose populations are related to the large number of advisories and closings at this beach.

In addition to BEACH Act funding, monitoring efforts in Door County have continued with the financial support of the Door County Public Health Department, the Door County Soil & Water Conservation Department (DCSWCD), and the University of Wisconsin–Oshkosh. Genetic fingerprinting and antibiotic resistance testing on E. coli isolates, rain event and stormwater system samples, bird surveys, and spatial distribution surveys of E. coli at the beaches have been used to identify possible contamination sources. Efforts to mitigate sources continue to be implemented in Door County including replacing impervious surfaces around beaches with porous pavement, as well as construction of rain gardens, naturalized dunes, and bio-filters to remove microbes from stormwater. Monitoring efforts continue at these beaches to assess the effects of these management practices.

A project funded by the Wisconsin Sea Grant focuses on determining the source of elevated E. coli concentrations in surface water where obvious contamination sources (stormwater or sewage overflows) are absent, and on characterizing the E. coli patterns in the near-shore waters of Door and Milwaukee Counties. Another project involves installing rain gardens and green roofs in urban areas in Milwaukee County to study the benefits of using on-site stormwater retention systems to reduce the frequency of flooding events and the conveyance of pollutants to nearby surface waters. The City of Milwaukee installed stormwater infiltration beds to prevent rainwater from running over sand at Bradford Beach.

The City of Racine continues to team up with the University of Wisconsin–Oshkosh to examine the association between water quality and algal blooms. The City of Racine also continues to conduct microbial and chemical source tracking on the Root River, to study whether ambient bacterial DNA exists within aquatic environments and how it may impact rapid bio-detection methods like qPCR. In 2008 the City of Racine conducted daily parallel routine monitoring for freshwater bacterial indicators (E. coli and enterococcus) using currently approved methods and qPCR, and demonstrated that implementation of rapid methods by local public health laboratories is feasible. The City of Racine also encouraged the addition of dune swales by planting approximately 450 new clusters of dune grass to encourage filtration of non-point source pollution from impervious surfaces at North Beach.

Many beach health outreach activities were conducted in 2008. Beach cleanups and dune grass plantings were organized, and magnets, brochures, and signs that promote the beach monitoring program were distributed.
For 2009, Door County Soil and Water Conservation Department obtained a Coastal Zone Management Grant and county and municipal funding to hire an environmental consulting firm to design stormwater remediation efforts for 11 beaches in the county.\textsuperscript{1}

Wisconsin received a $222,420 federal BEACH Act grant in 2008 and was eligible for a $225,000 grant in 2009. While no specific figures are available, local health departments often have to carry some of the costs of the Wisconsin Great Lakes Beach Monitoring and Notification Program because funding for the program is insufficient.\textsuperscript{1}

### Standards and Testing

**Indicator Organism:** *E. coli*

**Standards:** In Wisconsin, a beachwater sample with 236 to 999 cfu/100 ml of *E. coli* results in the issuance of an advisory and a sample greater than or equal to 1000 cfu/100 ml of *E. coli* results in a closing. At the discretion of local beach managers, beaches are closed or placed under advisory after rainfall in some locations after sewer or stormwater overflows or if there are reports of illnesses.\textsuperscript{3}

Milwaukee uses predictive models in addition to monitoring to determine advisories for a few of its beaches.\textsuperscript{1} In 2008, Ozaukee County began utilizing a predictive model to issue advisories and closings as necessary seven days a week at Upper Lake State Park.

### Monitoring

**Determination of Monitoring Locations and Frequency:** Great Lakes beaches are assigned high, medium, and low priority for monitoring based on the potential for impacts from stormwater runoff, beach usage and population density, waterfowl loads, and the proximity of wastewater treatment outfalls and farms.\textsuperscript{1} At high and medium priority beaches, large rain events trigger additional sampling events.\textsuperscript{1}

**Practice:** Samples are taken in knee-deep water, 6 to 12 inches below the surface of the water.\textsuperscript{1} The time of day at which samples are taken varies, but they are generally taken in the morning.\textsuperscript{3} Samples must be delivered to a lab within 24 hours, and results are available 24 hours after delivery to the lab. Days of the week when sampling occurs varies by location.\textsuperscript{3}

**Results:** In 2008, Wisconsin reported 193 Great Lakes beaches, 6 (3\%) of which were monitored daily, 57 (30\%) more than once a week, 58 (30\%) once a week, and 72 (37\%) not monitored. For the fourth consecutive year, NRDC looked at the percent of monitoring samples that exceeded the state's daily maximum bacterial standards (all reported samples were used to calculate the 2008 percent exceedance values, including duplicate samples and samples taken outside the official beach season, if any). In 2008, 14 percent of all reported beach monitoring samples exceeded the state's daily maximum bacterial standards. The beaches with the highest percent exceedance rates in 2008 were Wisconsin Point Beach 2 in Douglas County (52\%), South Shore Beach in Milwaukee County (49\%), Fischer Park Beaches (44\%) and Neshotah Beach (41\%) in Manitowoc County, Eichelman Beach in Kenosha County (40\%), Red Arrow Park Beach Manitowoc (36\%) and Memorial Drive Wayside Beach South (35\%) in Manitowoc County, Pennoyer Park Beach (35\%) and Alford Park Beach (35\%) in Kenosha County, and Harrington State Park Beach North in Ozaukee County (34\%).

Kenosha County had the highest percent exceedance rate in 2008 (32\%) followed by Manitowoc (31\%), Ozaukee (24\%), Milwaukee (22\%), Douglas (19\%), Sheboygan (18\%), Kewaunee (11\%), Racine (7\%), Door (6\%), Ashland (3\%), Bayfield (3\%), Brown (0\%), and Iron (0\%).

**Wisconsin Percent Exceedance for 110 Beaches Reported 2005–2008**

\begin{table}[h]
\centering
\begin{tabular}{|c|c|c|c|c|}
\hline
\textbf{Year} & 2005 & 2006 & 2007 & 2008 \\
\hline
\textbf{Percent Exceedance} & 16\% & 17\% & 16\% & 15\% \\
\hline
\end{tabular}
\end{table}
Comparing percent exceedance values to previous years, NRDC includes only those beaches monitored and reported each year between 2005 and 2008. For this consistent set of 110 beaches, the percent of samples exceeding the standard decreased to 15 percent in 2008 from 16 and 17 percent during the previous three years (16 percent in 2005, 17 percent in 2006, and 16 percent in 2007).

### 2008 Wisconsin Monitoring Frequency and Results by Beach

<table>
<thead>
<tr>
<th>County</th>
<th>Beach</th>
<th>Tier</th>
<th>Monitoring Frequency</th>
<th>Total Samples</th>
<th>Percent Exceedance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ashland</td>
<td>Maslowski Beaches</td>
<td>2</td>
<td>2/wk</td>
<td>17</td>
<td>18%</td>
</tr>
<tr>
<td>Ashland</td>
<td>Casper Road Beach</td>
<td>3</td>
<td>1/wk</td>
<td>15</td>
<td>7%</td>
</tr>
<tr>
<td>Ashland</td>
<td>La Pointe Memorial Beach</td>
<td>3</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Ashland</td>
<td>Bayview Park Beach</td>
<td>2</td>
<td>2/wk</td>
<td>36</td>
<td>0%</td>
</tr>
<tr>
<td>Ashland</td>
<td>Big Bay State Park Beach</td>
<td>3</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Ashland</td>
<td>Kreher Park Beach</td>
<td>2</td>
<td>2/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Ashland</td>
<td>Big Bay Town Park Beach</td>
<td>3</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Thompson West End Park Beach</td>
<td>3</td>
<td>1/wk</td>
<td>27</td>
<td>11%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Herster Beach</td>
<td>3</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Port Wing Beach East</td>
<td>3</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Port Wing Beach West</td>
<td>3</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Washburn Walking Trail Beach/BAB Beach</td>
<td>3</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Washburn Marina Beach</td>
<td>3</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Bono Creek Boat Launch Beach</td>
<td>3</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Sioux River Beach North</td>
<td>3</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Washington Avenue Beach</td>
<td>3</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Broad Street Beach</td>
<td>3</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Sioux River Beach South</td>
<td>3</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Memorial Beach Bayfield</td>
<td>3</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Bark Bay Beaches</td>
<td>3</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Memorial Park Beach Washburn</td>
<td>3</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Siskiwit Bay Beach</td>
<td>3</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Wickal Memorial Boat Launch Beach</td>
<td>3</td>
<td>1/wk</td>
<td>17</td>
<td>0%</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Little Sand Bay Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bayfield</td>
<td>Highway 13 Wayside Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Bayfield</td>
<td>River Loop Road Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brown</td>
<td>Communiversity Park Beach</td>
<td>3</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Brown</td>
<td>Longtail Beach</td>
<td>3</td>
<td>1/wk</td>
<td>18</td>
<td>0%</td>
</tr>
<tr>
<td>Brown</td>
<td>Bayshore Park Beach</td>
<td>3</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Brown</td>
<td>Town of Scott Park Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brown</td>
<td>Van Lanen Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brown</td>
<td>Joliet Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brown</td>
<td>Bay Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brown</td>
<td>Volk’s Landing Boat Launch Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Brown</td>
<td>Riverside Drive Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Door</td>
<td>Baileys Harbor Ridges Park Beach</td>
<td>1</td>
<td>4/wk</td>
<td>64</td>
<td>19%</td>
</tr>
<tr>
<td>Door</td>
<td>Anclam Park Beach</td>
<td>2</td>
<td>2/wk</td>
<td>42</td>
<td>17%</td>
</tr>
<tr>
<td>Door</td>
<td>Lily Bay Boat Launch Beach</td>
<td>3</td>
<td>1/wk</td>
<td>16</td>
<td>13%</td>
</tr>
<tr>
<td>Door</td>
<td>Otumba Park Beach</td>
<td>1</td>
<td>4/wk</td>
<td>66</td>
<td>12%</td>
</tr>
<tr>
<td>Door</td>
<td>Egg Harbor Beach</td>
<td>1</td>
<td>4/wk</td>
<td>61</td>
<td>11%</td>
</tr>
<tr>
<td>Door</td>
<td>Ephraim Beach</td>
<td>1</td>
<td>4/wk</td>
<td>65</td>
<td>11%</td>
</tr>
<tr>
<td>Door</td>
<td>Sunset Park Beach Sturgeon Bay</td>
<td>1</td>
<td>4/wk</td>
<td>63</td>
<td>10%</td>
</tr>
<tr>
<td>Door</td>
<td>Lakeside Park Beach</td>
<td>2</td>
<td>2/wk</td>
<td>41</td>
<td>7%</td>
</tr>
<tr>
<td>Door</td>
<td>Whitefish Dunes Beach</td>
<td>1</td>
<td>4/wk</td>
<td>60</td>
<td>7%</td>
</tr>
<tr>
<td>Door</td>
<td>Whitefish Bay Boat Launch Beach</td>
<td>3</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Door</td>
<td>Jackson Harbor Ridges-WI</td>
<td>3</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Door</td>
<td>Percy Johnson Memorial Park Beach</td>
<td>3</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Door</td>
<td>Sister Bay Beach</td>
<td>1</td>
<td>4/wk</td>
<td>60</td>
<td>5%</td>
</tr>
<tr>
<td>Door</td>
<td>Fish Creek Beach</td>
<td>1</td>
<td>4/wk</td>
<td>64</td>
<td>5%</td>
</tr>
<tr>
<td>Door</td>
<td>Sand Bay Beach 1</td>
<td>2</td>
<td>2/wk</td>
<td>27</td>
<td>4%</td>
</tr>
<tr>
<td>Door</td>
<td>Newport Bay Beach</td>
<td>1</td>
<td>4/wk</td>
<td>58</td>
<td>3%</td>
</tr>
<tr>
<td>Door</td>
<td>Ellison Bay Town Park Beach</td>
<td>1</td>
<td>4/wk</td>
<td>59</td>
<td>3%</td>
</tr>
<tr>
<td>Door</td>
<td>Murphy Park Beach</td>
<td>1</td>
<td>4/wk</td>
<td>59</td>
<td>3%</td>
</tr>
<tr>
<td>Door</td>
<td>Nicolet Beach</td>
<td>1</td>
<td>4/wk</td>
<td>60</td>
<td>3%</td>
</tr>
<tr>
<td>Door</td>
<td>Sandy Bay Town Park Beach</td>
<td>2</td>
<td>2/wk</td>
<td>30</td>
<td>3%</td>
</tr>
<tr>
<td>Door</td>
<td>Clay Banks Beach 2</td>
<td>3</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Door</td>
<td>Europe Bay Beach 3</td>
<td>2</td>
<td>2/wk</td>
<td>30</td>
<td>0%</td>
</tr>
<tr>
<td>Door</td>
<td>Europe Bay Beach 1</td>
<td>2</td>
<td>2/wk</td>
<td>30</td>
<td>0%</td>
</tr>
<tr>
<td>Door</td>
<td>Haines Park Beach</td>
<td>2</td>
<td>2/wk</td>
<td>30</td>
<td>0%</td>
</tr>
<tr>
<td>Door</td>
<td>Portage Park Beach</td>
<td>2</td>
<td>2/wk</td>
<td>30</td>
<td>0%</td>
</tr>
<tr>
<td>Door</td>
<td>Sturgeon Bay Canal Recreation Area Beach</td>
<td>2</td>
<td>2/wk</td>
<td>30</td>
<td>0%</td>
</tr>
<tr>
<td>Door</td>
<td>Gislason Beach</td>
<td>3</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Door</td>
<td>Sand Dune Beach</td>
<td>3</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Door</td>
<td>Rock Island State Park Beach</td>
<td>3</td>
<td>1/wk</td>
<td>9</td>
<td>0%</td>
</tr>
<tr>
<td>Door</td>
<td>School House Beach</td>
<td>3</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Door</td>
<td>Europe Bay Beach 2</td>
<td>2</td>
<td>2/wk</td>
<td>30</td>
<td>0%</td>
</tr>
<tr>
<td>Door</td>
<td>Pebble Beach Road Beach 1 Door</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Lakeshore Drive Beach Door</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Sunset Beach Fish Creek</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Kickapoo Drive Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Braunsdorf Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Sand Cove</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Isle View Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Winnebago Drive Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Potawatomi State Park Beach 2</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Cliff View Drive Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>--------</td>
<td>--------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>-------------------</td>
</tr>
<tr>
<td>Door</td>
<td>Clay Banks Beach 1</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Deer Path Lane Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Arrowhead Lane Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Garrett Bay Boat Launch Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Goldenrod Lane Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Sand Bay Beach 2</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Potawatomi State Park Beach 1</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>County TT Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Chippewa Drive Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Hemlock Lane Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>Bittersweet Lane Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Door</td>
<td>White Pine Lane Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Douglas</td>
<td>Wisconsin Point Beach 2</td>
<td>3</td>
<td>1/wk</td>
<td>25</td>
<td>52%</td>
</tr>
<tr>
<td>Douglas</td>
<td>Brule River State Forest Beach 2</td>
<td>3</td>
<td>1/wk</td>
<td>17</td>
<td>24%</td>
</tr>
<tr>
<td>Douglas</td>
<td>Barker’s Island Inner Beach</td>
<td>2</td>
<td>2/wk</td>
<td>29</td>
<td>21%</td>
</tr>
<tr>
<td>Douglas</td>
<td>Wisconsin Point Beach 1</td>
<td>2</td>
<td>2/wk</td>
<td>29</td>
<td>17%</td>
</tr>
<tr>
<td>Douglas</td>
<td>Wisconsin Point Beach 4</td>
<td>3</td>
<td>1/wk</td>
<td>18</td>
<td>17%</td>
</tr>
<tr>
<td>Douglas</td>
<td>Brule River State Forest Beach 3</td>
<td>3</td>
<td>1/wk</td>
<td>18</td>
<td>17%</td>
</tr>
<tr>
<td>Douglas</td>
<td>Amnicon River Beach</td>
<td>3</td>
<td>1/wk</td>
<td>16</td>
<td>13%</td>
</tr>
<tr>
<td>Douglas</td>
<td>Middle River Beach</td>
<td>3</td>
<td>1/wk</td>
<td>16</td>
<td>13%</td>
</tr>
<tr>
<td>Douglas</td>
<td>Allouez Bay Beach 3</td>
<td>3</td>
<td>1/wk</td>
<td>17</td>
<td>12%</td>
</tr>
<tr>
<td>Douglas</td>
<td>Brule River State Forest Beach 1</td>
<td>3</td>
<td>1/wk</td>
<td>17</td>
<td>12%</td>
</tr>
<tr>
<td>Douglas</td>
<td>Wisconsin Point Beach 5</td>
<td>3</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Douglas</td>
<td>Wisconsin Point Beach 3</td>
<td>3</td>
<td>1/wk</td>
<td>16</td>
<td>6%</td>
</tr>
<tr>
<td>Douglas</td>
<td>Allouez Bay Beach 2</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Douglas</td>
<td>Allouez Bay Beach 1</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Douglas</td>
<td>Barker’s Island Outer Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Douglas</td>
<td>Conners Point Beaches</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Iron</td>
<td>Saxon Harbor Beach West</td>
<td>3</td>
<td>1/wk</td>
<td>12</td>
<td>0%</td>
</tr>
<tr>
<td>Iron</td>
<td>Saxon Harbor Beach East</td>
<td>3</td>
<td>1/wk</td>
<td>4</td>
<td>0%</td>
</tr>
<tr>
<td>Iron</td>
<td>Oronto Bay Beach 3</td>
<td>3</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Iron</td>
<td>Oronto Bay Beach 2</td>
<td>3</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Iron</td>
<td>Oronto Bay Beach 1</td>
<td>3</td>
<td>1/wk</td>
<td>15</td>
<td>0%</td>
</tr>
<tr>
<td>Kenosha</td>
<td>Eichelman Beach</td>
<td>2</td>
<td>2/wk</td>
<td>43</td>
<td>40%</td>
</tr>
<tr>
<td>Kenosha</td>
<td>Alford Park Beach</td>
<td>3</td>
<td>1/wk</td>
<td>23</td>
<td>35%</td>
</tr>
<tr>
<td>Kenosha</td>
<td>Pennoyer Park Beach</td>
<td>3</td>
<td>1/wk</td>
<td>23</td>
<td>35%</td>
</tr>
<tr>
<td>Kenosha</td>
<td>Southport Park Beach</td>
<td>3</td>
<td>1/wk</td>
<td>21</td>
<td>29%</td>
</tr>
<tr>
<td>Kenosha</td>
<td>Simmons Island Beach</td>
<td>2</td>
<td>2/wk</td>
<td>29</td>
<td>17%</td>
</tr>
<tr>
<td>Kenosha</td>
<td>Melissa Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kenosha</td>
<td>Lakeshore Drive Beach Kenosha</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kewaunee</td>
<td>City of Kewaunee Beach</td>
<td>3</td>
<td>1/wk</td>
<td>17</td>
<td>18%</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Monitoring Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>----------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>----------------------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Kewaunee</td>
<td>Crescent Beach</td>
<td>2</td>
<td>2/wk</td>
<td>28</td>
<td>7%</td>
</tr>
<tr>
<td>Kewaunee</td>
<td>Red River Park Beaches</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kewaunee</td>
<td>9th Avenue Wayside Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Kewaunee</td>
<td>Lighthouse Vista Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Fischer Park Beaches</td>
<td>3</td>
<td>1/wk</td>
<td>36</td>
<td>44%</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Neshotah Beach</td>
<td>2</td>
<td>2/wk</td>
<td>39</td>
<td>41%</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Red Arrow Park Beach Manitowoc</td>
<td>2</td>
<td>2/wk</td>
<td>36</td>
<td>36%</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Memorial Drive Wayside Beach South</td>
<td>2</td>
<td>2/wk</td>
<td>34</td>
<td>35%</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Hika Park Bay</td>
<td>3</td>
<td>1/wk</td>
<td>22</td>
<td>32%</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Memorial Drive Wayside Beach North</td>
<td>2</td>
<td>2/wk</td>
<td>37</td>
<td>30%</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Point Beach State Forest-Lakeshore Picnic Area Beach</td>
<td>2</td>
<td>2/wk</td>
<td>31</td>
<td>19%</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Point Beach State Forest-Concession Stand Beach</td>
<td>2</td>
<td>2/wk</td>
<td>31</td>
<td>19%</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Point Beach State Forest-Lighthouse Picnic Area Beach</td>
<td>2</td>
<td>2/wk</td>
<td>31</td>
<td>19%</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>YMCA Beach</td>
<td>2</td>
<td>2/wk</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Maritime Dr Boat Launch Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Two Creek Boat Launch Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Lincoln High School Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>University Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Silver Creek Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Warm Water Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Manitowoc</td>
<td>Memorial Drive Wayside Beach Middle</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Marinette</td>
<td>Seagull Bar Wildlife Area Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Marinette</td>
<td>Red Arrow Marinette 3 Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Marinette</td>
<td>Red Arrow Marinette 2 Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Marinette</td>
<td>Michaelis Park Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Marinette</td>
<td>Red Arrow Marinette 1 Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Marinette</td>
<td>Peshtigo Harbor Boat Launch Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Milwaukee</td>
<td>South Shore Beach</td>
<td>1</td>
<td>Daily</td>
<td>55</td>
<td>49%</td>
</tr>
<tr>
<td>Milwaukee</td>
<td>McKinley Beach</td>
<td>1</td>
<td>Daily</td>
<td>45</td>
<td>29%</td>
</tr>
<tr>
<td>Milwaukee</td>
<td>Atwater Park Beach</td>
<td>2</td>
<td>2/wk</td>
<td>30</td>
<td>23%</td>
</tr>
<tr>
<td>Milwaukee</td>
<td>Bradford Beach</td>
<td>1</td>
<td>Daily</td>
<td>54</td>
<td>22%</td>
</tr>
<tr>
<td>Milwaukee</td>
<td>South Shore Rocky Beach</td>
<td>1</td>
<td>Daily</td>
<td>28</td>
<td>21%</td>
</tr>
<tr>
<td>Milwaukee</td>
<td>Grant Park Beach</td>
<td>2</td>
<td>2/wk</td>
<td>214</td>
<td>20%</td>
</tr>
<tr>
<td>Milwaukee</td>
<td>Bay View Park Beach</td>
<td>3</td>
<td>1/wk</td>
<td>23</td>
<td>17%</td>
</tr>
<tr>
<td>Milwaukee</td>
<td>Tietjen Beach / Doctor’s Park</td>
<td>2</td>
<td>2/wk</td>
<td>27</td>
<td>15%</td>
</tr>
<tr>
<td>Milwaukee</td>
<td>Klode Park Beach</td>
<td>2</td>
<td>2/wk</td>
<td>28</td>
<td>14%</td>
</tr>
<tr>
<td>Milwaukee</td>
<td>Bender Beach</td>
<td>2</td>
<td>2/wk</td>
<td>33</td>
<td>12%</td>
</tr>
<tr>
<td>Milwaukee</td>
<td>Watercraft Beach</td>
<td>1</td>
<td>Daily</td>
<td>34</td>
<td>12%</td>
</tr>
<tr>
<td>Milwaukee</td>
<td>Sheridan Park Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Milwaukee</td>
<td>Big Bay Park Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Oconto</td>
<td>Oconto City Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>County</td>
<td>Beach</td>
<td>Tier</td>
<td>Frequency</td>
<td>Total Samples</td>
<td>Percent Exceedance</td>
</tr>
<tr>
<td>------------</td>
<td>--------------------------------------------</td>
<td>------</td>
<td>-----------</td>
<td>---------------</td>
<td>--------------------</td>
</tr>
<tr>
<td>Ozaukee</td>
<td>Harrington State Park Beach North</td>
<td>1</td>
<td>4/wk</td>
<td>65</td>
<td>34%</td>
</tr>
<tr>
<td>Ozaukee</td>
<td>County Road D Boat Launch Beach</td>
<td>1</td>
<td>4/wk</td>
<td>62</td>
<td>32%</td>
</tr>
<tr>
<td>Ozaukee</td>
<td>Harrington State Park Beach South</td>
<td>1</td>
<td>4/wk</td>
<td>63</td>
<td>32%</td>
</tr>
<tr>
<td>Ozaukee</td>
<td>Cedar Beach Rd Beach</td>
<td>1</td>
<td>4/wk</td>
<td>64</td>
<td>31%</td>
</tr>
<tr>
<td>Ozaukee</td>
<td>Upper Lake Park Beach</td>
<td>1</td>
<td>Daily</td>
<td>204</td>
<td>19%</td>
</tr>
<tr>
<td>Ozaukee</td>
<td>Concordia University</td>
<td>1</td>
<td>4/wk</td>
<td>46</td>
<td>15%</td>
</tr>
<tr>
<td>Ozaukee</td>
<td>Lion’s Den Gorge Nature Preserve</td>
<td>3</td>
<td>1/wk</td>
<td>26</td>
<td>0%</td>
</tr>
<tr>
<td>Ozaukee</td>
<td>Pebble Road Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ozaukee</td>
<td>Sandy Beach Road Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ozaukee</td>
<td>Silver Beach Road Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ozaukee</td>
<td>Virmond County Park</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Ozaukee</td>
<td>Jay Road Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Racine</td>
<td>Zoo Beach</td>
<td>1</td>
<td>5/wk</td>
<td>219</td>
<td>8%</td>
</tr>
<tr>
<td>Racine</td>
<td>North Beach</td>
<td>1</td>
<td>5/wk</td>
<td>292</td>
<td>5%</td>
</tr>
<tr>
<td>Racine</td>
<td>Shoop Park Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Racine</td>
<td>Myers Park Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Racine</td>
<td>Parkway Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Racine</td>
<td>Michigan Boulevard Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Racine</td>
<td>Wind Point Lighthouse Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>Kohler Andrae State Park North Picnic Beach</td>
<td>1</td>
<td>4/wk</td>
<td>54</td>
<td>33%</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>General King Park Beach</td>
<td>2</td>
<td>2/wk</td>
<td>30</td>
<td>23%</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>Kohler Andrae State Park South Picnic Beach</td>
<td>1</td>
<td>4/wk</td>
<td>52</td>
<td>23%</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>Deland Park Beach</td>
<td>2</td>
<td>2/wk</td>
<td>31</td>
<td>23%</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>Kohler Andrae State Park Nature Center Beach</td>
<td>1</td>
<td>4/wk</td>
<td>53</td>
<td>15%</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>Kohler Andrae State Park North Beach</td>
<td>1</td>
<td>4/wk</td>
<td>54</td>
<td>15%</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>Blue Harbor Beach</td>
<td>1</td>
<td>4/wk</td>
<td>50</td>
<td>12%</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>Van Ess Road Beach</td>
<td>3</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>KK Road Beach</td>
<td>3</td>
<td>1/wk</td>
<td>13</td>
<td>0%</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>Amsterdam Beach</td>
<td>3</td>
<td>1/wk</td>
<td>14</td>
<td>0%</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>3rd Street Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>Foster Road Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>Lakeview Park Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>Wilson Lima Beach / White's Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>Whitcomb Avenue Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
<tr>
<td>Sheboygan</td>
<td>Vollrath Park Beach</td>
<td>1</td>
<td>None</td>
<td>0</td>
<td>N/A</td>
</tr>
</tbody>
</table>

N/A: Not applicable

Closings and Advisories

Closing and Advisory Issuance: Wisconsin issues both closings and advisories. Closings are issued when sample results exceed 1000 cfu/100 ml, and advisories are issued when sample results are greater than the standard (235 cfu/100 ml) but less than 1000 cfu/100 ml. The geometric mean water quality standard for fresh water may be used to make closing
and advisory decisions at high priority beaches. Resampling to confirm an exceedance is not done before an advisory or closing is issued, and there is no protocol for delaying or foregoing an advisory or closing when a sample exceeds standards. Some counties with longer beaches combine multiple samples along the beach before analyzing for bacteria and some take an average value of multiple samples analyzed separately, and make closing and advisory decisions for the entire beach based on the composite or average results. Local health departments for beaches that do not have a strong sample history to suggest that composite sampling is useful are encouraged to close beach segments or an entire beach based on individual sample exceedances.3 Green signs are posted at beaches where monitoring samples have met standards, yellow signs are posted when advisories are issued, and red signs are posted when beaches are closed. Other notification methods include a website, an automatic e-mail messaging service, and a really simple syndication service (RSS Feed) that provides daily updates on beach conditions and the issuance of closings or advisories.1

Reopening Procedures: Beaches are resampled immediately when an advisory or closing is issued. Advisories and closings are lifted when the next daily sample result is below the established closing criteria.2 States that monitor more frequently after an exceedance is issued will tend to have higher percent exceedance rates and lower total closing/advisory days than they would have had if their sampling frequency did not increase after an exceedance was found.

Number of Closings and Advisories: Wisconsin had 578 closing/advisory events in 2008. Total closing/advisory days for events lasting six consecutive weeks or less increased 18 percent to 883 days in 2008 from 747 days in 2007, 1,101 days in 2006, and 1,018 days in 2005. In addition, there were no extended or permanent events in 2008 or 2007. Extended events are those in effect more than 6 consecutive weeks but not more than 13 consecutive weeks; permanent events are in effect for more than 13 consecutive weeks.

Causes of Closings and Advisories: For events lasting six consecutive weeks or less, 66% (587) of closing/advisory days in 2008 were due to monitoring that revealed elevated bacteria levels, 30% (263) were preemptive (i.e., without waiting for monitoring results) due to heavy rainfall, 2% (14) were preemptive due to results of predictive modeling of beach-water bacteria levels, and 2% (19) were preemptive due to other reasons.

The reported sources of beachwater contamination for 2008 are as follows: 100% (883) of closing/advisory days were from unknown sources of contamination, and 30% (263) were from stormwater runoff. Totals exceed 100 percent because more than one source of contamination was associated with some events.

<table>
<thead>
<tr>
<th>2008 Wisconsin Beach Closings and Advisories</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>County</strong></td>
</tr>
<tr>
<td>Ashland</td>
</tr>
<tr>
<td>Ashland</td>
</tr>
<tr>
<td>Ashland</td>
</tr>
<tr>
<td>Ashland</td>
</tr>
<tr>
<td>Ashland</td>
</tr>
<tr>
<td>Ashland</td>
</tr>
<tr>
<td>Ashland</td>
</tr>
<tr>
<td>Ashland</td>
</tr>
<tr>
<td>Ashland</td>
</tr>
<tr>
<td>Ashland</td>
</tr>
<tr>
<td>Bayfield</td>
</tr>
<tr>
<td>Bayfield</td>
</tr>
<tr>
<td>Bayfield</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>-------------</td>
</tr>
<tr>
<td>Bayfield</td>
</tr>
<tr>
<td>Bayfield</td>
</tr>
<tr>
<td>Bayfield</td>
</tr>
<tr>
<td>Bayfield</td>
</tr>
<tr>
<td>Bayfield</td>
</tr>
<tr>
<td>Bayfield</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>------------</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>-------------</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>Door</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>------------</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>------------</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Douglas</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kenosha</td>
</tr>
<tr>
<td>Kewaunee</td>
</tr>
<tr>
<td>Kewaunee</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>------------</td>
</tr>
<tr>
<td>Kewaunee</td>
</tr>
<tr>
<td>Kewaunee</td>
</tr>
<tr>
<td>Kewaunee</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>------------</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>------------</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Manitowoc</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>--------------</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>-----------</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Milwaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>----------</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>-------------</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>--------</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Ozaukee</td>
</tr>
<tr>
<td>Racine</td>
</tr>
<tr>
<td>Racine</td>
</tr>
<tr>
<td>Racine</td>
</tr>
<tr>
<td>Racine</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>County</td>
</tr>
<tr>
<td>------------------</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
<tr>
<td>Sheboygan</td>
</tr>
</tbody>
</table>

Explanation of Frequently Used Terms: Preempt-model, Preemptive due to the results of computer models that use easily measurable physical parameters like wind direction and wave height to predict bacterial levels in real time; Preempt-other, Preemptive due to reasons not listed here; Preempt-rain, Preemptive due to rainfall.
Notes


2 Julie Kinzelman, City of Racine Health Department, personal communication, July 2009.

3 Shaunna Chase, Wisconsin Dept. of Natural Resources, Beach Program Coordinator, personal communication, May 2008.