

# THE OZAUKEE COUNTY PUBLIC HEALTH DEPARTMENT

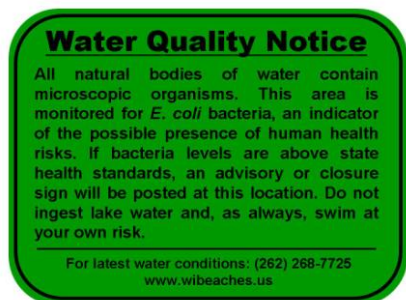
## 2011 BEACH REPORT

In 2011, the Ozaukee County Public Health Department was again awarded an Environmental Protection Agency (EPA) grant by the Wisconsin Department of Natural Resources (WDNR) to monitor Ozaukee County public beaches. This year the decision was made to continue weekend monitoring of five high priority beaches. High priority beaches in the Harrington State Park complex include Hwy D Boat Launch, Harrington North and South beaches, and Cedar Beach. Upper Lake Park beach in Port Washington is also a high priority beach. These high priority beaches were monitored Thursday thru Sunday starting the second week of June. Concordia University public beach was not monitored this year due to construction on campus. The public beach at Lion's Den was monitored once a week according to the WDNR classification for low priority beaches.

In cooperation with the City of Port Washington, the Ozaukee County Public Health Department (OCPHD) tested the water quality at six beaches from June 16<sup>th</sup> to September 4<sup>th</sup> of this year. The water samples were collected and transported to the Water Utility laboratory prior to 10:00 AM for E. coli analysis using the 18-hour IDEXX system. City of Port Washington Water Utility lab staff processed the samples and provided Health Department personnel with results the following morning. If posting an advisory was necessary, Health Department staff notified local or state personnel to facilitate proper sign placement. When bacterial exceedances occurred, beach water was re-sampled the following day and continued until such time that bacteria levels in beach water were safe for swimming.

In addition to taking beach water samples, E. coli lab results, beach condition data, weather, and rainfall data were also monitored. This information and advisories then were entered daily into the USGS Beachhealth website <http://www.wibeaches.us>. Daily advisories were also available locally to the general public through the Health Department beach hotline at 262-268-7725.

The WDNR Beach Advisory Workgroup continued the use of three advisory signs for the 2011 beach season: open, advisory and closed. The open sign has a green background, the advisory sign has a yellow background and the closed sign has a red background. All beaches monitored in Ozaukee County used the three sign format. The WDNR Beach Advisory Workgroup establishes all standards for advisories during the 2011 beach season. The Health Department does issue yellow preemptive advisories in the presence of high turbidity, high rainfall and/or significant algae concentrations. Sign specifics and **bacterial standards in MPN** are summarized in the table below:



open sign	advisory sign	closed sign
Green/'good'	Yellow/'poor'	Red/closure
235 MPN & below	Between 235 & 1000 MPN	1000 MPN & above

A summary of the 2011 advisories for the high priority beaches in Ozaukee County is included below:

### Hwy D Boat Launch Advisories

0 closure advisories	3 preemptive advisories	3 'poor' advisories	6 total advisories	43 'good' sampling events	49 total sampling events
----------------------------	-------------------------------	---------------------------	--------------------------	------------------------------------	-----------------------------------

### Harrington North Beach Advisories

0 closure advisories	3 preemptive advisories	1 'poor' advisory	4 total advisories	45 'good' sampling events	49 total sampling events
----------------------------	-------------------------------	-------------------------	--------------------------	------------------------------------	-----------------------------------

### Harrington South Beach Advisories

1 closure advisory	16 preemptive advisories	4 'poor' advisories	21 total advisories	30 'good' sampling events	51 total sampling events
--------------------------	--------------------------------	---------------------------	---------------------------	------------------------------------	-----------------------------------

### Cedar Beach Advisories

1 closure advisory	7 preemptive advisories	2 'poor' advisories	10 total advisories	39 'good' sampling events	49 total sampling events
--------------------------	-------------------------------	---------------------------	---------------------------	------------------------------------	-----------------------------------

At Upper Lake Park beach, water monitoring yielded 61 advisories. Advisories were determined using the WDNR 'Virtual Beach' predictive software in development since 2007 (see link below). Rainfall totals, creek flow data, and beach water turbidity are some factors in the predictive model for Upper Lake Park beach. <http://dnr.wi.gov/org/es/science/pdf/OzaukeeCountyWisconsin.pdf>

### Upper Lake Park Beach Advisories

0 closure advisories	6 total advisories	55 'good' advisories	61 monitoring events
----------------------------	--------------------------	----------------------------	----------------------------

The table below contains a summary of the total number of advisories for each high priority beach.

### Percent total advisories at high priority beaches

Hwy D boat launch	Harrington north beach	Harrington south beach	Cedar beach	Upper Lake Park beach
12.2%	8.2%	41.2%	20.4%	9.8%

At Lion's Den beach water was monitored once per week and re-sampled as necessary until 'good' or open conditions were attained.

### Lion's Den beach advisories

closures	'poor'	open/'good'
0	2	12