

COASTAL HEALTH PROBLEM STATEMENT – REVISION 5

Contact (including external, ingestion, and inhalation) with near shore water of the Great Lakes can pose a risk to human health. Much of the cause¹ is due to pollution that enters and accumulates in the Great Lakes as a result of combined sewer overflows (CSO), sanitary sewer overflows (SSO), shedding from bathers, illegal and malfunctioning private sewage treatment systems (e.g. septic and aerobic systems), runoff (storm water, agricultural, industrial, and urban landscape), avian/animal deposition, contamination from boaters, and the release of pollutants from contaminated sediments. Inconsistent compliance with sewage treatment and control, lack of waste water and storm water enforcement, and aging and overloaded waste water treatment and collection infrastructure also contribute to the risk of adverse health effects.

¹Coastal Health is affected by the overall health of the natural ecosystem addressed in the Great Lakes Collaboration Habitat/Species strategy chapter. Coastal Health is also affected by the legacy of industrial pollution addressed in the Persistent Bio-accumulative Toxics Reduction and Areas of Concern/Restoration Sediments strategy chapter.

COASTAL HEALTH – OVERARCHING GOAL (REVISION 6)

By 2010, contact with near shore waters of the Great Lakes will pose limited risk to human health (The Great Lakes are a natural body of water and hence the achievement of null risk is unrealistic).

Subcategories for Alternative Approaches

1. Wet weather events (CSO, SSO, storm water, run-off)
 - a. Adopt long term combined sewer overflow control programs consistent with the CWA National CSO policy by 2010:
 - Comply with CWA National CSO Policy as soon as possible but no later than 2008
 - Receive Congressional allocations of \$1.5 billion for correcting CSOs in eligible communities
 - Implement storm water control programs by 2008
 - Review and update industrial pretreatment program by 2007 in communities with CSO and SSO events
 - Issue updated NPDES permits, where appropriate, based on IPP reviews
 - b. Eliminate chronic wet weather sanitary sewer overflows by 2010
 - c. Establish, staff and provide resources for testing and enforcement programs for private sewer systems by 2010
 - g. Achieve a 90 – 95% reduction in agricultural runoff by 2010
 - i. Achieve a 90 – 95% reduction in urban landscape runoff by 2010
 - k. Require all public and private facilities within 5 miles of the Great Lakes to be connected to, and utilizing, a permitted sewage treatment and control facility by 2015.
 - l. Present a facilities plan for wastewater treatment to the USEPA by 2010
 - m. Identify a funding mechanism for the building and restoration of wastewater and storm water collection and treatment infrastructure, with the assistance of the USEPA, which will be presented to Congress by 2010

- o. Reduce the bacterial and chemical contamination of Great Lakes near shore water resulting from storm water discharge through the development, implementation, and maintenance of BMP.
 - s. Present a waste water enforcement plan to the Governors of the Great Lakes states for review and approval with the assistance of the USEPA
 - u. Achieve a 90 – 95% reduction in industrial runoff by 2010
2. Dry weather impacts (algal blooms, wildlife, beach sands)
- e. Achieve a 90 – 95% reduction in bacterial and chemical contamination of Great Lakes near shore water resulting from the transport of pollution present in beach sands through the development, implementation, and maintenance of BMP by 2010
 - h. Achieve a 90 – 95% reduction in bacterial contamination of Great Lakes near shore water resulting from the deposition of pollutants due to avian/animal sources through the development, implementation, and maintenance of BMP by 2010
 - j. Achieve a 90 – 95% reduction in bacterial and chemical contamination of Great Lakes near shore water and their tributaries resulting from the re-suspension of pollutants from contaminated sediments (targeting AOC) by 2010
 - r. Reduce nutrient, especially phosphorous, inputs to the Great lakes to prevent blue-green algae (*Microcystis spp*) and minimize green algae (*Cladophora spp*) growth whose presence has been recently linked to human health effects (blue-green) and a potential increase in bacterial indicator organisms (green).
 - t. Prevent the pollution of the near shore waters of the Great Lakes by provide adequate, cost-effective pumping facilities and enforcing regulations with regard to the disposal of onboard (boater) waste.
3. Improved Beach Management Schemes
- d. Improve the bathing water quality of the Great Lakes by 2010 through the inception of basin-wide BMP designed to detect and remediation contamination sources
 - q. Assess contamination sources using a holistic, watershed approach
 - v. Assist USEPA in the trialing, standardization, and implementation of rapid testing techniques for the improvement of Great Lakes health risk assessment
 - w. Assist in refining USEPA beach management protocols
4. Public Communication and Education
- f,n. Develop and post informational signage for all Great Lakes beaches regarding the potential health risks associated with bather shedding in conjunction with a well-publicized educational campaign
 - p. Provide public education in conjunction with agricultural and citizen incentives to encourage the development of sustainable practices which improve the health of the Great Lakes ecosystem

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