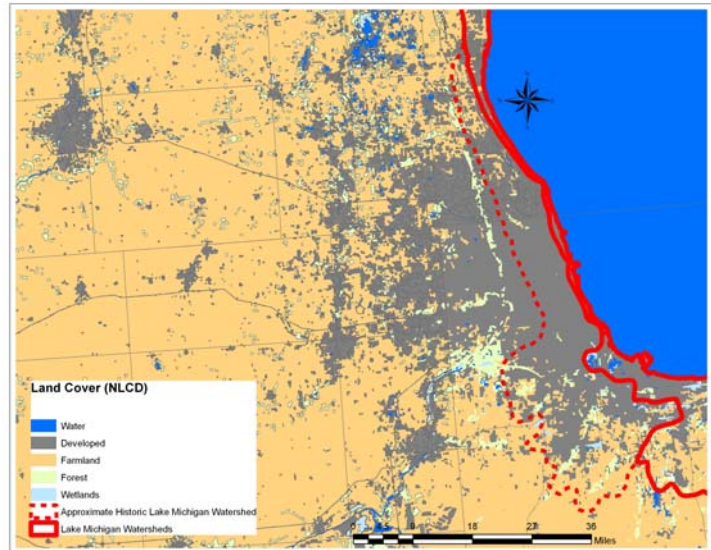


Chicago Area Waterway System

For more information, see the Chicago Waterways website at <http://www.chicagoareawaterways.org/>.

Water System Overview

- The Chicago River once flowed into Lake Michigan. To facilitate a reversal of the flow of the Chicago River to divert water from Lake Michigan to the Chicago Area Waterway System (CAWS), the Chicago Sanitary and Ship Canal, the Calumet-Sag Channel and the North Shore Channel were constructed over 100 years ago. The diversion and the artificial waterways facilitated navigation and protected the drinking water intakes in Lake Michigan from Chicago wastes. The Little Calumet River North Leg, the Chicago River, the South Branch of the Chicago River and North Branch of the Chicago River downstream from its confluence with the North Shore Channel are natural rivers that have been modified through channelization and widened and deepened.
- The CAWS includes the Calumet River and Chicago River basin water bodies that are generally classified as Secondary Contact Recreation and Indigenous Aquatic Life. The CAWS also includes Lake Calumet and a variety of tributaries designated as General Use.
- Land use within the CAWS basin is generally urban with extensive industrial development. Basin stakeholders include the City of Chicago and 31 suburban municipalities. Flow in the CAWS is dominated by treated wastewater from 5 million residents and an additional industrial load of approximately 4.5 million population equivalents.
- Chicago's wastewater system was developed with a combined sewer system that accepted both stormwater and sanitary waste. After rainstorms, the capacity of the sewer system became overwhelmed on a regular basis and combined sewer overflows (CSO) occurred. These CSOs are discharged into the CAWS and frequently from the river into Lake Michigan. To address this problem, the Metropolitan Water Reclamation District of Greater Chicago (MWRDGC) developed the Tunnel and Reservoir project (TARP), which included the construction of the Deep Tunnel project. The Deep Tunnel is a series of tunnels that lie 250 to 300 feet below the Chicago River and are located parallel to it. The first phase of the TARP project or "Deep Tunnel" project has been completed. During periods of heavy rainfall, the TARP project directs combined sanitary waste and infiltrating rainwater into massive tunnels and collection reservoirs where it can be withdrawn for treatment after the rain subsides.
- A comprehensive multi-year evaluation of current conditions in the Chicago Waterway System, and its potential for expanded uses, has been launched by the Illinois EPA. This evaluation, also called a Use Attainability Analysis (UAA), will be the first in-depth look at the system in nearly three decades. In mid-February, the Illinois Environmental Protection Agency announced plans for the project that involves the Chicago River, its two main branches (North Branch and South Branch), the Cal-Sag Channel, the Chicago Sanitary and Ship Canal, and tributaries in an area extending from the metropolitan Chicago area to the Lockport vicinity. The Chicago Waterway System makes up the surface drainage network serving the majority of the Greater Chicago metropolitan area. The system receives discharge from three of the largest municipal wastewater treatment plants in the nation as well as releases from more than 100 individual combined sewer outfalls.
- Since passage of the Clean Water Act in 1972, there have been major upgrades of treatment facilities along the Chicago Waterway. Under IEPA oversight, extensive pretreatment programs have begun, as well as treatment of industrial wastes before discharge. The first phase of the Tunnel and Reservoir (TARP) project or "Deep Tunnel" project has been completed.
- Recreational boating and other sports are on the rise within the system and improved fish populations and species diversity now support a modest recreational fishing use. These benefits indicate that the current use classification is outdated, making the planned study a timely undertaking. Jointly, these efforts have significantly improved conditions and public interest in the waterway, resulting in increased efforts to restore abandoned areas and provide public open spaces along the banks. As part of the study, a stakeholders advisory group will be created and involved through the review process and the completed review will be posted for Internet viewing.



Watershed Activities

- Chicago's shoreline habitats provide stopover sites for migratory birds and support rare plants. The dune restoration area at Loyola Beach currently supports State of Illinois endangered species. In addition the federally listed piping plover has stopped at this location. The project supports measures called for in the Service's Urban Bird Conservation

Treaty by implementing dune enhancement and expansion of restoration beyond the existing dune area through invasive species control, planting native species, species inventory and education projects. The outcome of the project will be a restored dune area providing a tangible resource for rare coastal bird and plant species.

Impaired (303d) Waters

Waterbody Name	Impairment
12th St. Beach	Pathogens, PCBs
31st St. Beach	Pathogens, PCBs
49th St. Beach	Pathogens, PCBs
57th St. Beach	Pathogens, PCBs
67th St. Beach	Pathogens, PCBs
Albion Beach	Pathogens, PCBs
Armitage Beach	Pathogens, PCBs
Calumet Beach	Pathogens, PCBs
Clark Beach	Pathogens, PCBs
Elder Beach	Pathogens, PCBs
Foster Beach	Pathogens, PCBs
Fullerton Beach	Pathogens, PCBs
Gilson Beach	Pathogens, PCBs
Glencoe Beach	Pathogens, PCBs
Greenwood Beach	Pathogens, PCBs
Hollywood/Ostermann Beach	Pathogens, PCBs
Howard Beach	Pathogens, PCBs
Ill Beach State Park North	Pathogens, PCBs
Ill Beach State Park South	Pathogens, PCBs
Jackson Park/63rd Beach	Pathogens, PCBs
Jarvis Beach	Pathogens, PCBs
Juneway Terrace	Pathogens, PCBs
Kenilworth Beach	Pathogens, PCBs
Lake Bluff Beach	Pathogens, PCBs
Lake Forest Beach	Pathogens, PCBs
Lake Michigan	PCBs

Waterbody Name	Impairment
Lee Beach	Pathogens, PCBs
Lighthouse Beach	Pathogens, PCBs
Lloyd Beach	Pathogens, PCBs
Loyola (Greenleaf) Beach	Pathogens, PCBs
Maple Beach	Pathogens, PCBs
Montrose Beach	Pathogens, PCBs
North Ave. Beach	Pathogens, PCBs
North Point Beach	Pathogens, PCBs
North Shore/Columbia	Pathogens, PCBs
Northwestern University Beach	Pathogens, PCBs
Oak St. Beach	Pathogens, PCBs
Ohio St. Beach	Pathogens, PCBs
Park Ave. Beach	Pathogens, PCBs
Pratt Beach	Pathogens, PCBs
Rainbow	Pathogens, PCBs
Rogers Beach	Pathogens, PCBs
Rosewood Beach	Pathogens, PCBs
Schiller Beach	Pathogens, PCBs
South Boulevard Beach	Pathogens, PCBs
South Shore Beach	Pathogens, PCBs
Thorndale Beach	Pathogens, PCBs
Touhy (Leone) Beach	Pathogens, PCBs
Tower Beach	Pathogens, PCBs
Waukegan North Beach	Pathogens, PCBs
Waukegan South Beach	Pathogens, PCBs
Webster Beach	Pathogens, PCBs

Data Sources. Land cover map and percentages: National Land Cover database, 1992 (<http://edc.usgs.gov/products/landcover/nlcd.html>); Land use change: NOAA Coastal Change Analysis Program, 1996 and 2001 (<http://www.csc.noaa.gov/crs/lca/ccap.html>); Total Maximum Daily Load (TMDL) Impaired Waters: Surf Your Watershed (www.epa.gov/surf)