

Lake Michigan Basin

Landscape Context

The Lake Michigan basin is the largest of the four lake basins in Michigan. It contains all waters that flow into Lake Michigan from the western half of the Lower Peninsula of Michigan and all flows that go south from the Upper Peninsula.

The Lake Michigan basin is 28,509 square land miles and includes the major Upper Peninsula watersheds of the Menominee, Cedar, Ford, Escanaba, Rapid, Whitefish, Sturgeon and Manistique rivers plus several small coastal watersheds. In the Lower Peninsula, the major watersheds are the Pine, Elk, Boardman, Platte, Betsie, Manistee, Pere Marquette, White, Muskegon, Grand, Kalamazoo and St. Joseph rivers plus several small coastal watersheds. This basin is most developed in the southern portion, with agricultural (37%) land most dominant in that area. Forestry (36%) is the primary land use in the northern portion of the basin. Wetlands comprise 19% of the basin and are more common in northern areas.

Priority Threats

Nine threats to wildlife and landscape features in this basin were identified as significant by participants at a workshop for this region (see Methods chapter in the Introductory Text & Statewide Assessments section for more information). Invasive species (both established species that require control or eradication, and the potential for more species to colonize) and fragmentation were considered as the most severe threats. These were followed by riparian modifications and altered sediment loads. The remaining threats considered significant are: social attitudes, wetland modifications, thermal changes, macrophyte removal and lack of scientific knowledge.

Priority Conservation Actions

The following are conservation actions that were repeated most frequently within each landscape feature category and, therefore, should be considered priorities for the basin, because they will have the most widespread benefits for wildlife conservation in this region (no order implied):

Great Lakes

- Continue vigilance and cooperation toward prevent the introduction and establishment of aquatic invasive species
- Enforce the use of sediment barriers and best management practices during road siting, construction and maintenance
- Reduce effluent flows
- Strengthen existing environmental laws and enforcement of permits controlling effluent discharge

Inland Lakes

- Maintain and rehabilitate natural hydrology
- Manage or modify lake-level control structures to mimic natural water levels and fluctuations
- Strengthen water quality laws and enforcement of permits controlling effluent discharge
- Work with and educate Drain Commissioners to mimic or use natural processes
- Work with local governments to develop and refine planning and zoning regulations and ordinances that consider natural processes

Rivers

- Continue vigilance and cooperation toward preventing the introduction and establishment of aquatic invasive species

MICHIGAN'S WILDLIFE ACTION PLAN
AQUATIC SYSTEMS: LAKE MICHIGAN BASIN

- Enforce the use of sediment barriers and best management practices during road siting, construction and maintenance
- Maintain and rehabilitate natural hydrology
- Remove dams to rehabilitate natural hydrology and habitat connectivity
- Work with local governments to develop and refine planning and zoning regulations and ordinances that consider natural processes
- Work with road commissions on placement and maintenance of stream crossings

Wetlands

- Continue vigilance and cooperation toward preventing the introduction and establishment of aquatic invasive species
- Maintain or rehabilitate natural hydrology and hydrologic functions
- Work with local governments to develop and refine planning and zoning regulations and ordinances that consider natural processes