



Watershed Council

Helping You Protect Your Vital Resources

The Tip of the Mitt Watershed Council was formed in 1979 by local lake associations with assistance from the University of Michigan Biological Station. The Tip of the Mitt Watershed Council is the voice for Northern Michigan's waters. We are dedicated to protecting our lakes, streams, wetlands, and ground water through respected advocacy, innovative education, technically sound water quality monitoring, and thorough research. We achieve our mission by empowering others and we believe in the capacity to make a positive difference. We work locally, regionally and throughout the Great Lakes Basin to achieve our goals.

The Watershed Council is a nonprofit organization supported primarily through private donations. Please join our efforts.

Yes! I want to support the Tip of the Mitt Watershed Council's work to protect Northern Michigan's valuable water resources!

Here is my tax deductible contribution of:

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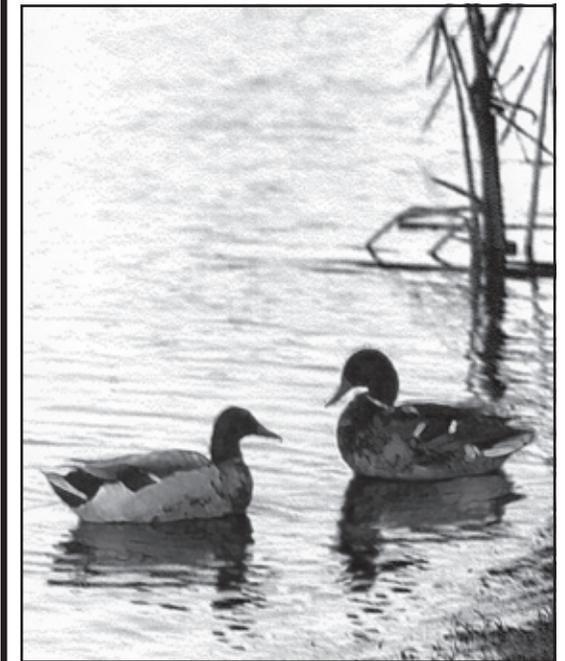
Please make checks payable to "TOMWC" and mail to the address below.

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A feeding program which supports a large population of waterfowl can contribute hundreds of pounds of phosphorus per year to a lake and cause excessive weed and algae growth.

Please Don't Feed the Waterfowl!



Vital Resources Series



Please Don't Feed the Waterfowl!

Wild waterfowl are a common occurrence on lakes, streams, and wetlands throughout Northern Michigan. Their presence adds to the beauty and charm of Northern Michigan's water resources.

Waterfowl feed on plants and other aquatic organisms. Their excretions contain high levels of nutrients which help stimulate aquatic productivity as part of a natural nutrient cycle. However, when humans provide supplemental sources of food, artificially high populations can develop. Feeding waterfowl may cause them to become semi-domesticated, thereby depending on humans for food rather than foraging.

Large numbers of waterfowl can result in nuisance problems. Waterfront property owners also know that roosting waterfowl can spoil beaches, boats and docks with their excrement.

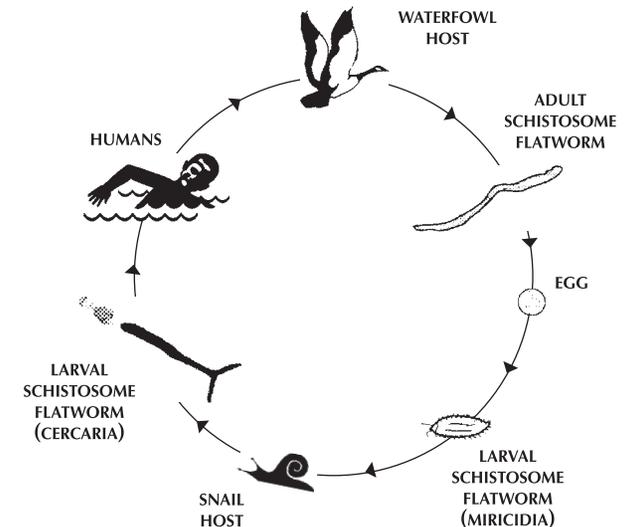
One duck can excrete nearly a pound of phosphorus annually. That much phosphorus can stimulate almost 500 pounds of weed and algae growth. A feeding program which supports a large population of waterfowl can contribute hundreds of pounds of phosphorus per year to a lake and cause excessive weed and algae growth.

Many kinds of waterfowl are involved in the life cycle of the organisms that cause swimmer's itch. Creating

unnatural concentrations of waterfowl through feeding may contribute to swimmer's itch problems.

Swimmer's itch is a skin irritation that is caused by certain flatworms. It is a fairly common occurrence on many of the lakes in our area.

The parasitic life cycle of the flatworms is quite complex and involves two very specific hosts, generally a snail and a waterfowl. The larval stage of a flatworm is called "miricidia" and its first host is the snail. It leaves the snail host as a cercaria. The cercaria then enters its next host, usually waterfowl or an aquatic mammal such as a muskrat. It is at this stage that the cercaria burrow into humans. Since humans are not the proper host, the larvae soon die. The itching sensation is caused by an allergic reaction to the dead larvae. If the cercaria is successful and enters the proper host, it can complete its life cycle as an adult flatworm, released from the host's waste. The adult flatworms mate and lay eggs and the life cycle begins again.



The "Swimmer's Itch" (Schistosome) Life Cycle

(ILLUSTRATIONS NOT TO SCALE)

Waterfowl should be enjoyed and encouraged to stay on the lake through habitat and nesting improvement programs, but not through continuous artificial feeding. If waterfowl are allowed to find natural sources of food throughout the summer, they will not be dependent on human feeding when winter comes.