The P Project

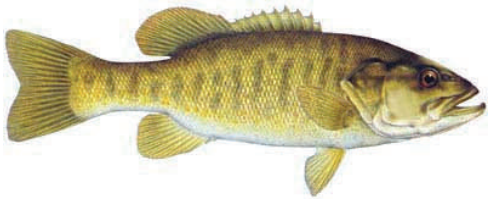
Reducing Phosphorus in the Onondaga Lake Watershed

What is Phosphorus? Phosphorus is an essential nutrient for plant growth but too much can have a devastating impact on lakes and streams. Increased amounts of phosphorus entering waterways can stimulate algae blooms and plant growth. As these plants die and decompose they reduce the amount of oxygen available to fish and other aquatic life.

How Does Phosphorus Affect Me? Excess plant growth stimulated by high phosphorus inputs can impair many uses of waterways. Boating and fishing become difficult and lakes and streams look and smell bad.

Where Does Phosphorus Come From? Phosphorus has many sources. Some exists naturally in lakes and streams but human activities from residential, urban and agricultural areas contribute a significant amount of phosphorus. Storm water, or runoff, travels across land and picks up phosphorus from fertilizers, eroded soil particles, septic systems and pet waste and discharges it into nearby lakes and streams.

MOW YOUR WAY TO CLEAN WATER
Lawn care practices can have a big impact on water quality.



MORE PHOSPHORUS, LESS FISH
Excess phosphorus increases plant growth. As plants and algae die and decay, they rob the water of dissolved oxygen. This can devastate fish populations.

GREEN AND GOOEY Excess phosphorus leads to an explosion of plant growth and algae blooms in lakes.

PHOSPHORUS EXPRESSWAY Storm drains are designed to prevent flooding, but they also provide a direct route for phosphorus and other pollutants to enter lakes and streams.

NEWS FLASH: Onondaga Lake Park Trials No Phosphorus Fertilizer.

You can too. Soil tests were done and the results are in. No additional phosphorus is needed to grow healthy grass at Onondaga Lake Park. The park plans to pilot the use of no-phosphorus fertilizer in 2008 on two athletic fields near the Griffin Visitor Center and the adjacent green area located between the playground and the lake. The grounds crew will evaluate the condition of the grass relative to prior years to determine if the switch made a difference. All are welcome to visit the park and athletic fields and see the results themselves. For a limited time, you too can save money and make your own personal contribution to cleaner water. Cornell Cooperative Extension will distribute lawn care fact sheets and **FREE** bags of No-phosphorus fertilizer at Onondaga Lake Day on June 7th and the OLP Annual Progress Meeting on September 29th. Visit the OLP website for more information.

What can you do to protect water quality?

Test Your Soil Test your soil before applying fertilizers. Soils in many parts of the Central New York have an adequate amount of phosphorus to grow a healthy lawn. Testing your soil will save you money and will prevent applying excess phosphorus. Contact your local **Cornell Cooperative Extension** office for more information. Free soil tests are available to the first 25 participants in the P-Project.

Fertilize Responsibly Use only 0-phosphate fertilizer unless a soil test indicates the need for a low phosphorus fertilizer. Only apply lawn fertilizer in the fall when grass needs the nutrients to develop a strong root system. Time the application when the forecast is rain-free. Sweep up any spillage immediately and avoid fertilizing near storm drains or waterways.

Pick Up Pet Waste Pet waste contains phosphorus that can run off into streams and lakes with storm water. Pick up pet waste promptly and flush it in the toilet or place in the garbage. Never drop pet waste in streets or ditches.

Properly Dispose of Yard Waste Yard waste such as leaves and grass clippings can contribute significant amounts of phosphorus to water ways. Keep these wastes out of ditches, streets, storm drains and streams either by bagging them in paper yard waste bags or by using them in your yard. Leaves can be composted and grass clippings provide a natural fertilizer if left on the lawn.

CLEAN SWEEP Sweep excess fertilizer and grass clippings back into your lawn so nutrients don't enter ditches and storm drains.

Plant Bare Areas Exposed soil, and the phosphorus attached to soil particles, is easily washed away with rain. Keep soil covered with vegetation or mulch. Plants reduce the chance that phosphorus will reach waterways because grass, shrubs, and trees slow the speed and decreases the amount of water runoff.

PLAY THE NUMBERS GAME Every bag of fertilizer has a string of three numbers on its label. These numbers represent the percentage of nitrogen, phosphate, and potash in the fertilizer. In most cases, a fertilizer with a **0-percentage** of phosphate should be selected. Using a higher percentage could degrade water quality and is usually unnecessary to maintain a healthy lawn. For a limited time 0-phosphate fertilizer will be available free at certain **Onondaga Lake Partnership** events. It can also be purchased from some nurseries and hardware stores.

More Information

- **Cornell Cooperative Extension of Onondaga County** offers soil test kits and periodic workshops on landscaping for water quality. Call 315-424-9485 or visit: www.cce.cornell.edu/Onondaga
- **Cornell University's Department of Horticulture** Gardening and lawn care website: www.hort.cornell.edu/gardening.
- **Onondaga Lake Partnership (OLP)** promotes cooperation among government agencies and other parties involved in managing the environmental issues of Onondaga Lake and the Onondaga Lake Watershed. Visit: www.onlakepartners.org

ONONDAGA LAKE PARTNERSHIP
A clean lake reflects well on all of us.

Cornell University
Cooperative Extension
Onondaga County

The P-Project is a partnership of Cornell Cooperative Extension of Onondaga County, the Onondaga County Council on Environmental Health, and Onondaga County Parks. Made possible by a mini-grant from the OLP with funding by US EPA. Adapted from a similar project done by the Cayuga County Water Quality Management Agency and its partners. Spring, 2008.

Images appear courtesy of reduce.org