

EURASIAN WATER-MILFOIL

Myriophyllum spicatum

Eurasian water-milfoil is an exotic species introduced to the United States from its native range in Europe and Asia. The fast growing shoots and extensive canopy formation can obstruct recreation and navigation. The ability to grow in cool water gives it a quick start in the spring. Eurasian water-milfoil often crowds and shades native plants, giving it a competitive advantage.

Description: Eurasian water-milfoil has long, spaghetti like stems, sometimes 6.6 feet (2 m) or more in length, that emerge from roots and rhizomes. Leaves are divided like a feather, with a short stalk and about 12-20 pairs of thread-like leaflets. The leaf divisions are all about the same length and closely spaced, resembling the bones on a fish spine. Leaves are in whorls of 3-5, and can be widely spaced 0.4-1.2 inches (1-3 cm) or more. The flower spike sticks out of the water with whorls of flowers in the axils of short bracts. The 0.08-0.12 inch (2-3 mm) fruit has four parts with a smooth to slightly roughened surface.

Habitat: Eurasian water-milfoil grows submersed in water depths of 3-20 feet (0.9-6 m). The only parts of the plant that may grow out of the water are the flower stalks, which are only a few inches tall. However, the submersed shoots may form a dense canopy right at the water's surface, causing the infamous nuisance problem as well as impacting native plant and animal communities. Rooted in the bottom, the root crowns have many stems growing from them up to the surface. Near the surface, each stem may branch multiple times to form a dense mass.

Similar species: There are seven native species of water-milfoil in this region. Eurasian water-milfoil most closely resembles northern water-milfoil (*Myriophyllum sibiricum*). The most reliable way to distinguish between them is by the number of leaf divisions. Eurasian water-milfoil usually has more than 12 pairs of leaflets, whereas Northern water-milfoil has less than 12 (usually 5-12). The presence or absence of winter buds in late summer is also a helpful characteristic. Northern water-milfoil produces winter buds, but Eurasian water-milfoil does not. Although individual plants of these two species may look similar, their growth form is quite different. Northern water-milfoil doesn't typically form a branched canopy at the water's surface and it grows in a more controlled manner with slower growth and less fragmentation.

Management and Control: Eurasian water-milfoil has been the target of many management strategies ranging from mechanical harvesting to herbicides. There has recently been some evidence that a native weevil (*Euhrychiopsis lecontei*) may provide a biological control. This tiny aquatic weevil has been associated with some natural declines of Eurasian water-milfoil. In some test plots on milfoil infested lakes, the weevil has been shown to reduce milfoil growth and limit canopy formation. The possibility of using a native weevil for biocontrol shows promise (Sheldon and Creed 1995).

Information adapted from the following sources:

Borman, S., Korth, R., Temte, J. Through the Looking Glass – A Field Guide to Aquatic Plants. DNR Publication # FH-207-97.

Madsen, J.D., Welling, C. H. Eurasian Watermilfoil (*Myriophyllum spicatum* L.). Lakeline, Spring 2002. pp 29-30.



** If you would like to learn more about aquatic plants and how to identify them, get a copy of one of the best aquatic plant field guides in the nation, Through the Looking Glass: A Field Guide to Aquatic Plants, Borman, S. It can be purchased from UW-Extension Lakes, 715-346-2116 or online at www.uwsp.edu/cnr/uwexlakes.



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