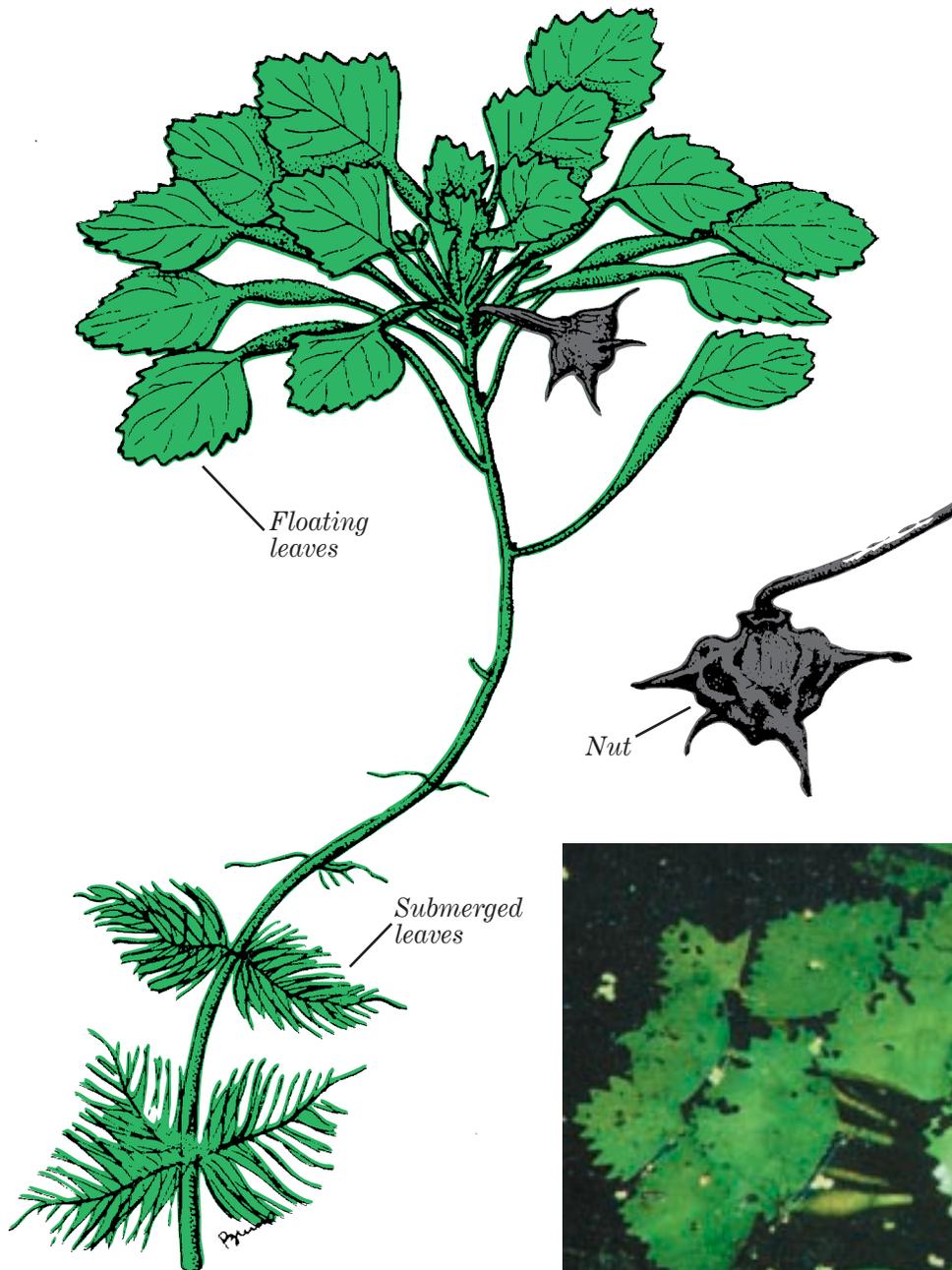


Water Chestnut

Take it out before it takes over!



STOP THIS PLANT NOW!

- Look for this non-native, invasive plant
- Pull out any plants you find
- Dispose of plants far away from water, in upland areas or in a landfill
- Report all sightings as soon as possible

It only reproduces by seed, so any plant you destroy will prevent up to 120 new plants from growing next year!

Threats

The dense growth of water chestnut can effectively choke a waterbody, making boating, fishing and swimming nearly impossible. This weed also shades out native aquatic plants and offers little value to wildlife. The seeds have sharp spines that can inflict puncture wounds. The ecologically important tidal freshwater coves from Cromwell to Essex, CT are in danger. All shallow (<16 ft) lakes and ponds are also at risk.



*Aquatic Plants of New England Series:
Trapa natans, Crow and Hellquist 1983.*

Illustration by Pam Bruns

Barre Hellquist



Seeds of water chestnut

Description

Water Chestnut is a rooted, aquatic plant with both floating and submersed leaves. The floating leaves form a rosette and are green, glossy and triangular with toothed edges. The submersed leaves are feathery, and are found whorled around the stem. Plant stems are cord-like and can attain lengths of up to 16 feet. Water chestnut is an annual plant, overwintering entirely by seed. In July the plant begins to produce seeds (called nuts) with 4 sharp spines. Mature seeds are green to greenish brown and sink to the bottom. Seeds may remain alive in the sediment for up to 12 years! Floating black nuts will not sprout. (*Please note:* this plant species is not the same as the “water chestnut” used in Asian cooking.)

Habitat

Shallow (< 16 ft) areas of freshwater lakes and ponds, and slow-moving streams and rivers.

Distribution

Water chestnut’s native range is Europe, Asia and Africa. Since its introduction into North America in 1877, it has become a nuisance species because of its ability to reproduce rapidly and form dense floating mats. Water chestnut is presently found in Massachusetts, Vermont, Connecticut, New York, Pennsylvania, Maryland and

Virginia. Within the Connecticut River watershed, water chestnut is found in Massachusetts and Connecticut in a few coves, ponds and an impoundment. The seeds, or severed plant parts carrying seeds, may drift downstream. Ducks and geese may also be responsible for the plants dispersal. Canada geese have been seen with the spiny nuts attached to their feathers.

Control

Early detection is the key to control since smaller populations are easier to eliminate than larger ones. It also costs less to control a small infestation because plants can be individually hand-pulled. Large populations require the use of mechanical harvesters or application of aquatic herbicides to achieve control. Infested waters must be treated for 5-12 years to eliminate the invading population. However, some infestations are so extensive (e.g. >300 acres in Lake Champlain) that complete eradication may never be achieved. Many states, including Massachusetts, New Hampshire, South Carolina, Florida, New York and Arizona, have adopted laws to prohibit the intentional distribution of this aggressive plant.

This fact sheet is a cooperative project with the Connecticut Department of Environmental Protection.

References

A Guide to Invasive Non-native Aquatic Plants in Massachusetts. C.B. Hellquist, North Adams State College, and Massachusetts Department of Environmental Management, Lakes and Ponds Program. June, 1997.

Vermont Invasive Exotic Plant Fact Sheet Series: Water Chestnut. Vermont Agency of Natural Resources and the Nature Conservancy, Vermont Chapter. June, 1998.

Please report any sightings of water chestnut to:

Silvio O. Conte Fish & Wildlife Refuge
52 Avenue A
Turners Falls, MA 01376
413/863 0209

Federal Relay Service
for the deaf and hard-of-hearing
1 800/877-8339

U.S. Fish & Wildlife Service
<http://www.fws.gov>

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