

Aquatic Plants of Marsh, Jones and Downing Ponds, New Durham



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Overview

- This slideshow includes four sections aimed at helping you effectively Weed Watch on your waterbody:
 - The first section shows photos of NATIVE aquatic plants that have been documented in your waterbody to date. Learn these and ignore them! *They are fine.*
 - The second section shows photos of algae you may encounter during your survey. Some are good, some are of concern.
 - The third section shows photos of INVASIVE aquatic plants you do not want in your waterbody. *Search for these and report immediately!*
 - The final section shows photos of INVASIVE aquatic animals you do not want in your waterbody. *Search for these and report immediately!*

Types of Aquatic Plants

Emergent



Submergent



Floating



Algae





Plant Refresher

Native plants of

Marsh, Jones and Downing Ponds



Floating-leaved plants

- Includes both rooted and unrooted here



Yellow water lily

White water lily





Water shield

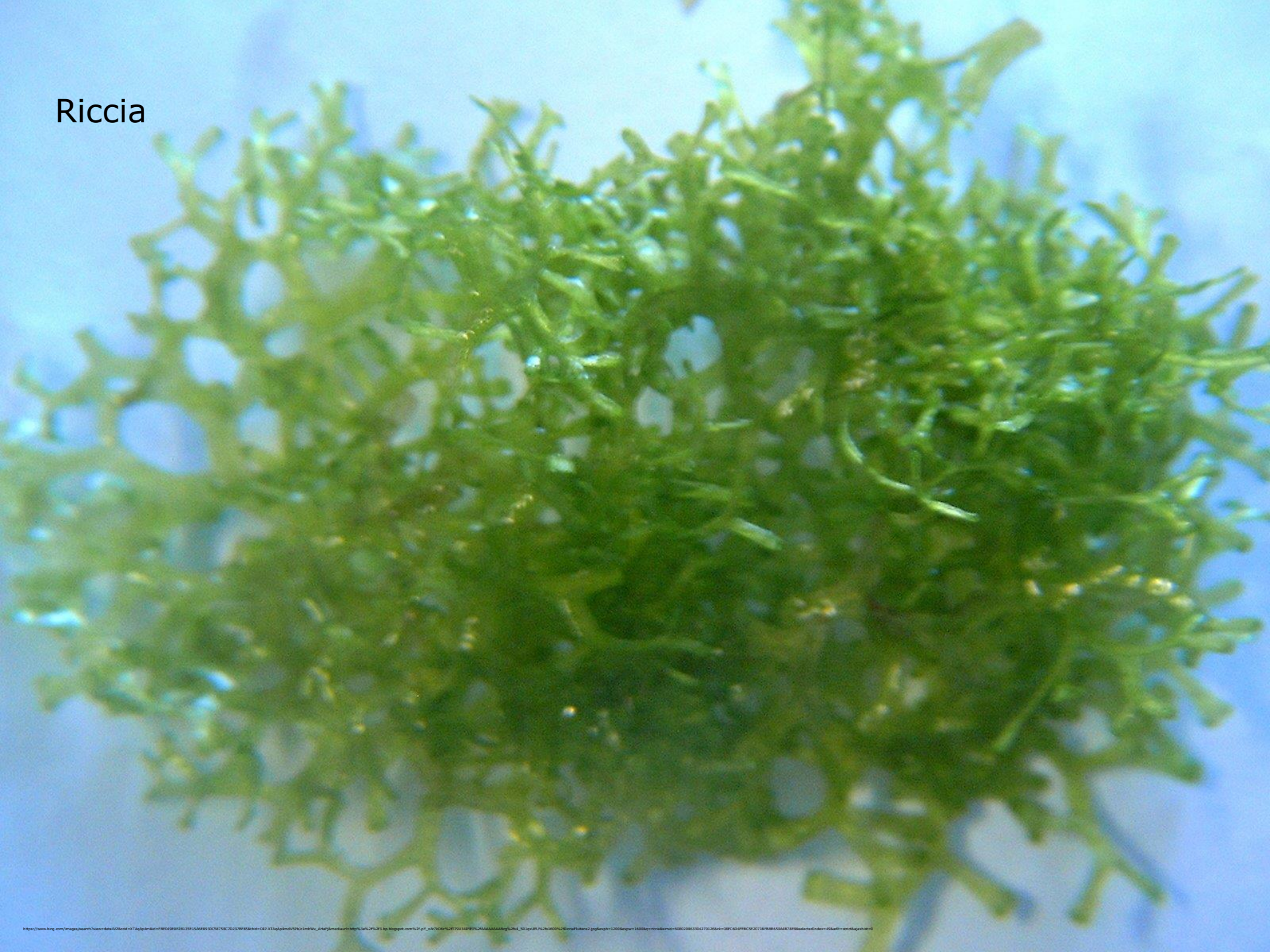
Floating heart



Duckweed- note that this is a very tiny plant, which almost appears as a scum on the surface, often mistaken for an algal bloom. Top side of leaves is green, underside is red with trailing roots.



Riccia





Emergent plants

- Plants that are rooted and have most of their biomass as erect vegetation above the water



Cattail

Bur-reed



Rush





Pickerelweed



Three-way
sedge

Arrowhead





Sedge

Grass



Joe pye weed



Sweet gale



Arrow arum





Submergent plants

- Rooted or unrooted
- Vegetative portion wholly underwater
- Flowers may be emergent

Bladderwort





Pondweed



Coontail



Native milfoil



Robbins Pondweed

Spike rush (emergent and submergent)



Aquatic moss (*Fontinalis*)



Algae


(also important to look at)



- Single celled to colonial
- Simple plants
- Base of the food chain



Green algae= OK



Cyanobacteria often form scums at the surface. Scums often wash up close to shore due to wind or water current. Scums can be greenish, blue-greenish or bluish.

***Cyanobacteria (Blue-green algae)-
Call us! These could produce toxins.***



The Exotic Plants

(aka- plants you don't want)

Use these pictures to help you identify any new growth that may come in.

Report any sightings of these to:

Amy P. Smagula

NH DES

29 Hazen Drive

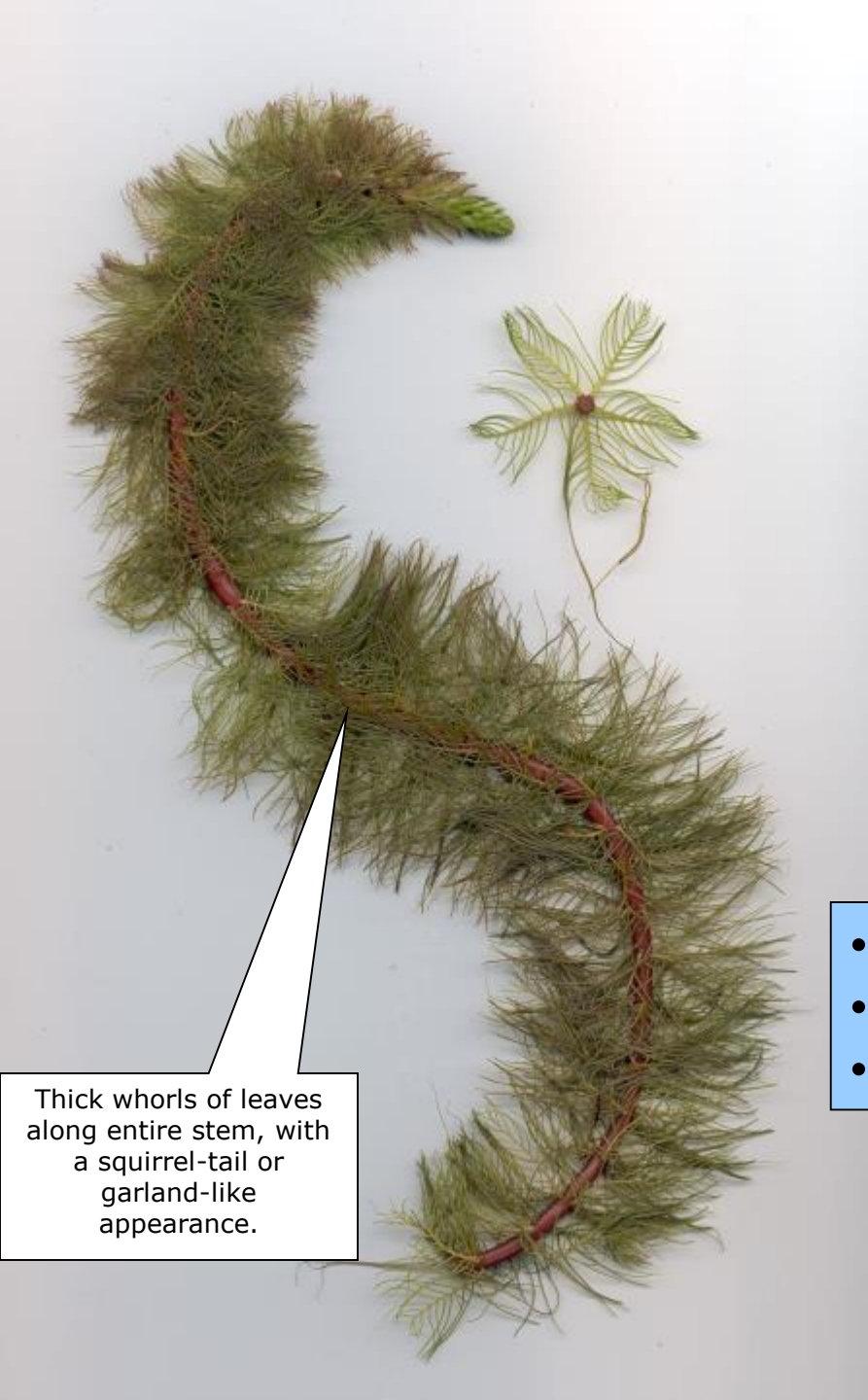
Concord, NH 03301

Amy.Smagula@des.nh.gov

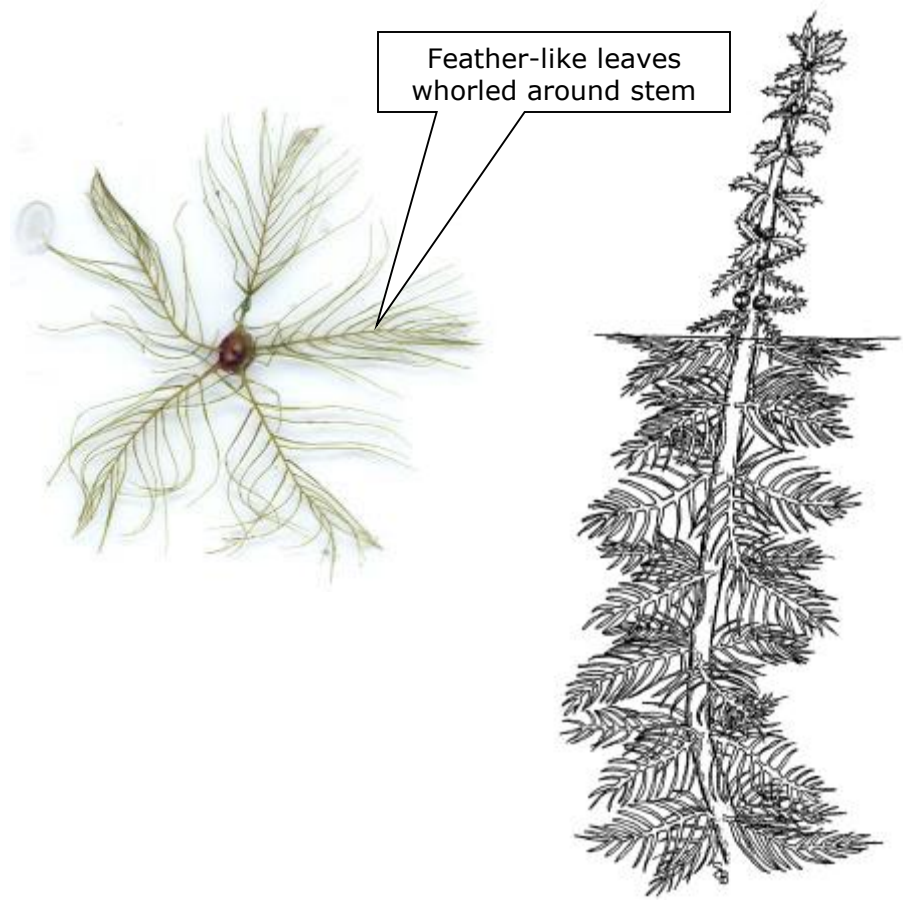
603-271-2248



Variable milfoil (EXOTIC)



Thick whorls of leaves along entire stem, with a squirrel-tail or garland-like appearance.



Feather-like leaves whorled around stem

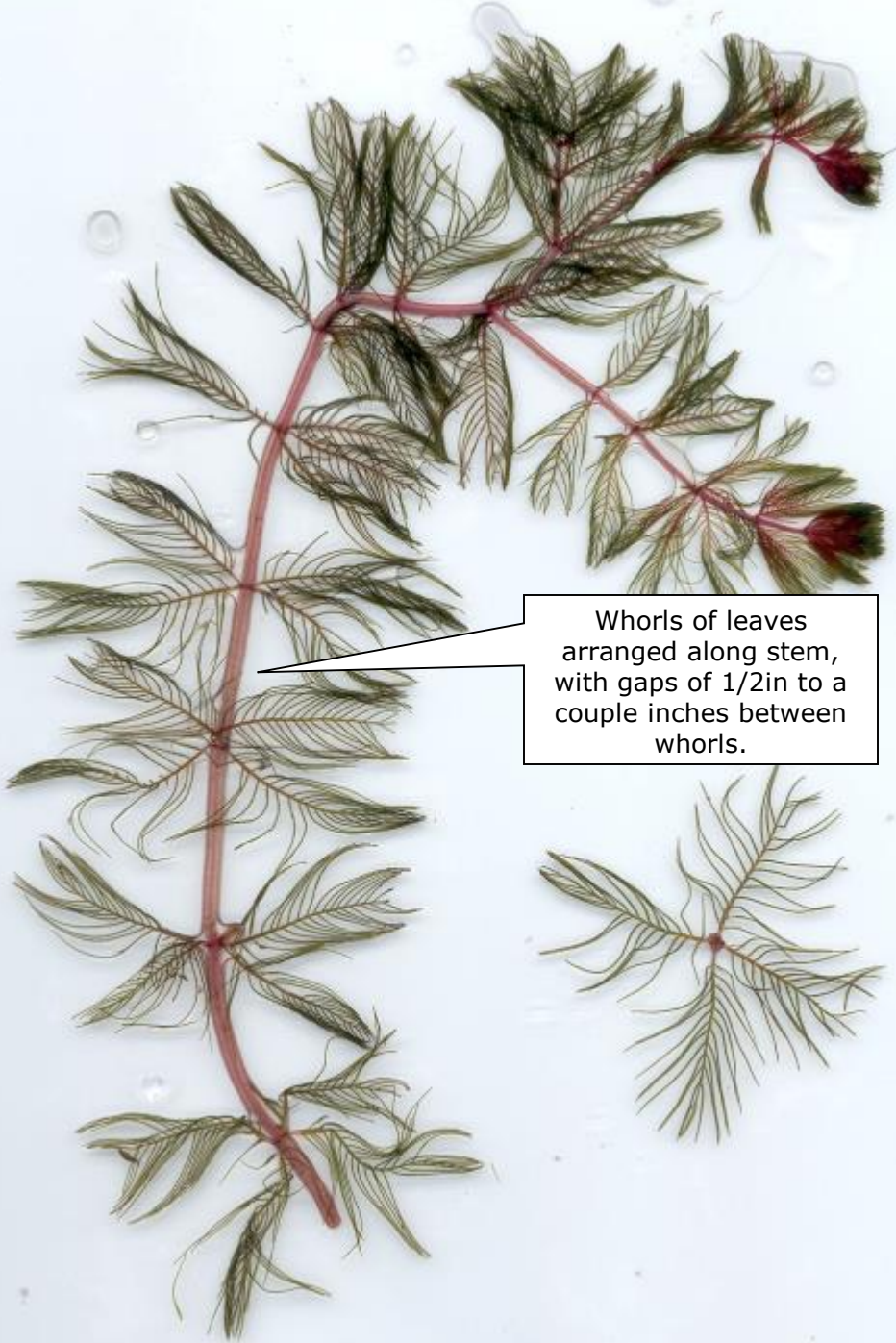
- Variable milfoil- *Myriophyllum heterophyllum*
- Native to southern and central U.S., not to NH
- In several waterbodies in NH

A photograph of a Variable milfoil flower stem. The stem is reddish-brown and arches from the bottom left towards the top right. It has small, green, lanceolate leaves arranged in whorls. At the tip of the stem, there are several small, yellowish flowers. The background is a bright blue, textured surface, possibly a tarp or fabric, with some water droplets visible. A dark shadow of the stem is cast onto the blue background.

Variable milfoil flower

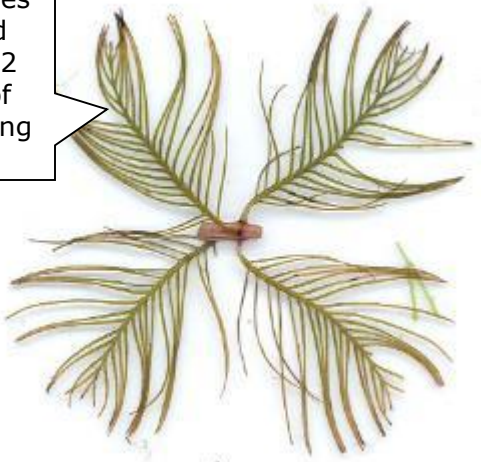


Eurasian milfoil (EXOTIC)

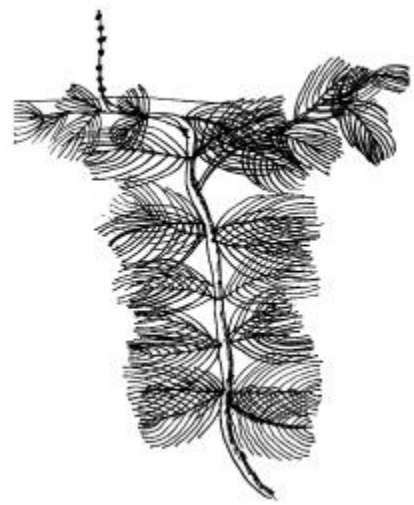


Whorls of leaves arranged along stem, with gaps of 1/2in to a couple inches between whorls.

Feather-like leaves whorled around stem, at least 12 or more pairs of small leaflets along one leaf



- Eurasian milfoil- *Myriophyllum spicatum*
- Native to Asia
- In 5 waterbodies in NH





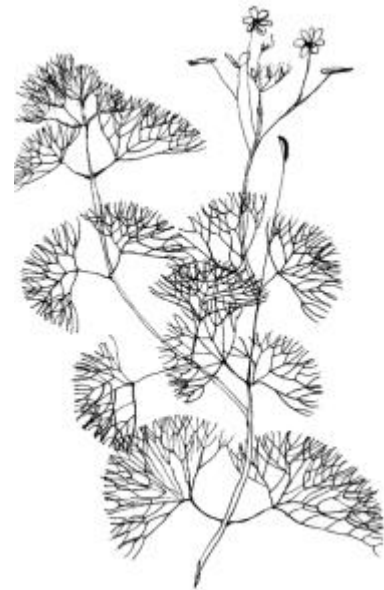
Fanwort (EXOTIC)




Branching leaves arranged opposite along stem. Note leaf is attached by a short stem to main stem of plant.



- Fanwort- *Cabomba caroliniana*
- Native to Europe/Asia
- In 9 waterbodies in NH



A photograph of a Hydrilla plant specimen, showing several upright, green stems with small, narrow leaves. The stems are arranged in a cluster, and the background is a light blue-grey color. The text 'Hydrilla (EXOTIC)' is overlaid in the bottom left corner.

Hydrilla (EXOTIC)



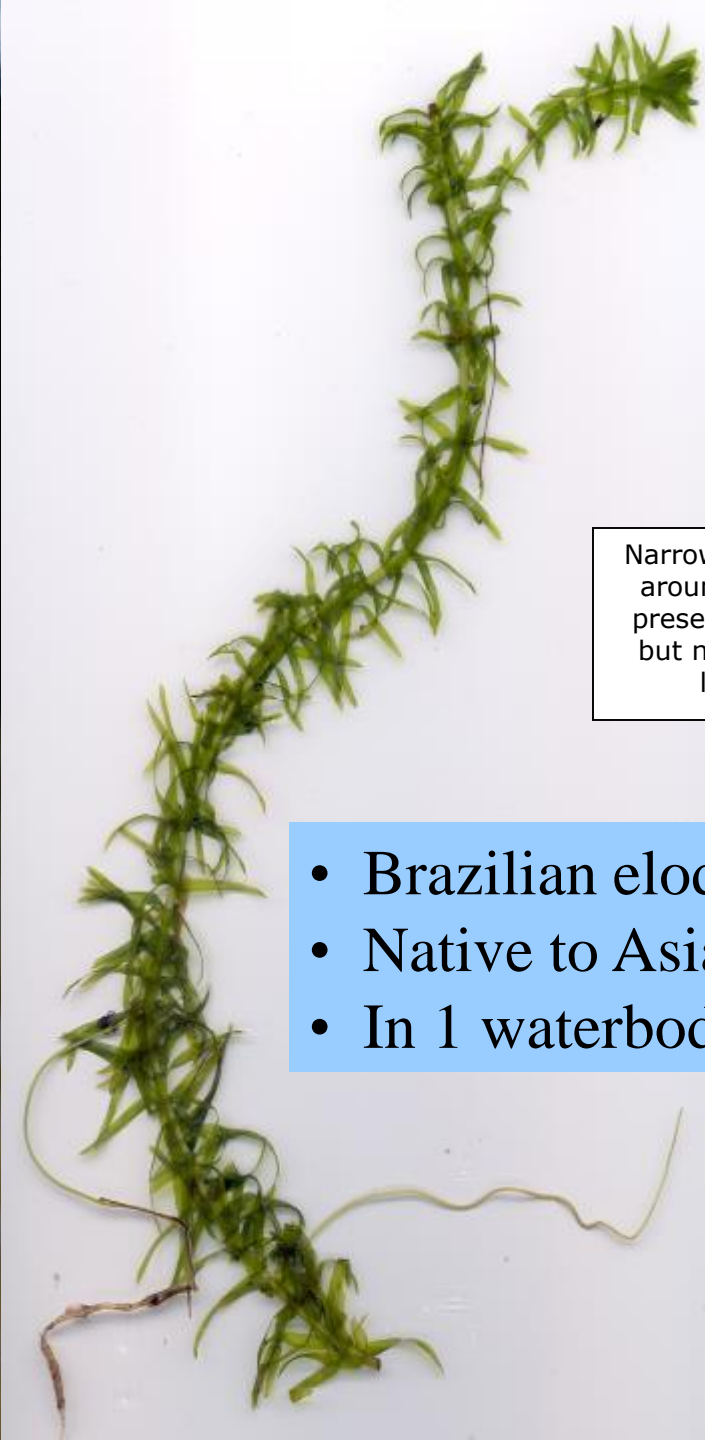
Small narrow leaves whorled around stem. Note teeth on leaf edge for hydrilla.



- Hydrilla- *Hydrilla verticillata*
- Native to South America
- Not yet found in NH (but found in MA and ME)



Brazilian elodea (EXOTIC)

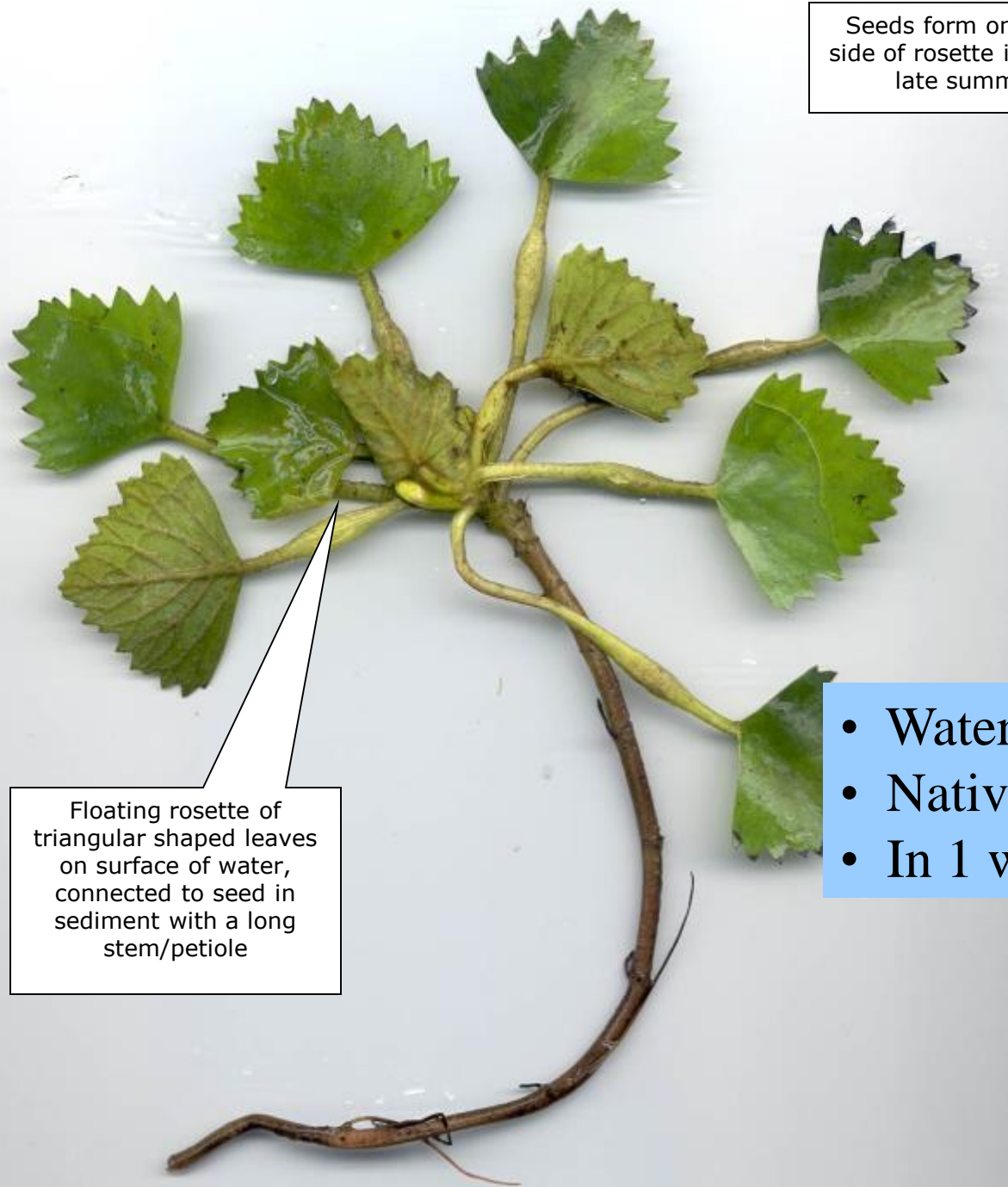


Narrow leaves whorled around stem. Teeth present on leaf edges but need magnifying lens to see.

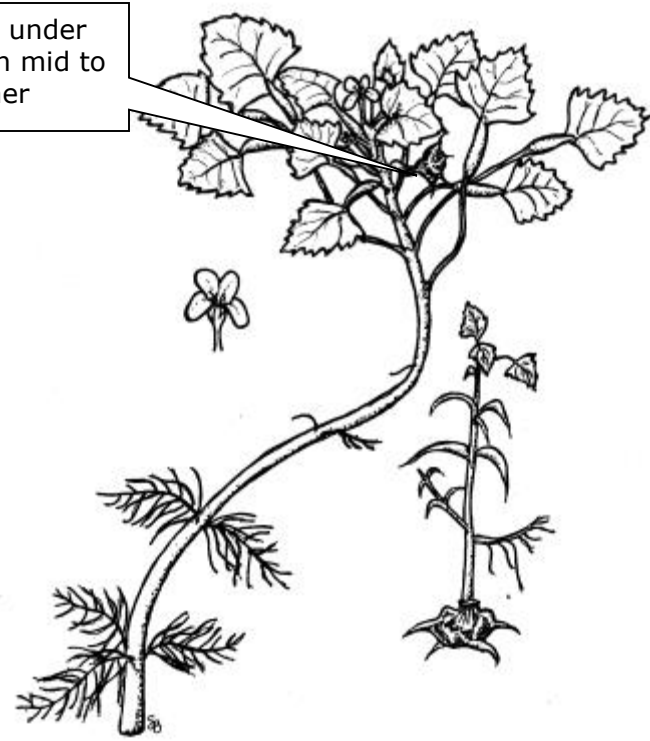
- Brazilian elodea- *Egeria densa*
- Native to Asia and South America
- In 1 waterbody in NH



Water chestnut- EXOTIC



Seeds form on under side of rosette in mid to late summer



Floating rosette of triangular shaped leaves on surface of water, connected to seed in sediment with a long stem/petiole

- Water chestnut- *Trapa natans*
- Native to Asia
- In 1 waterbody in NH

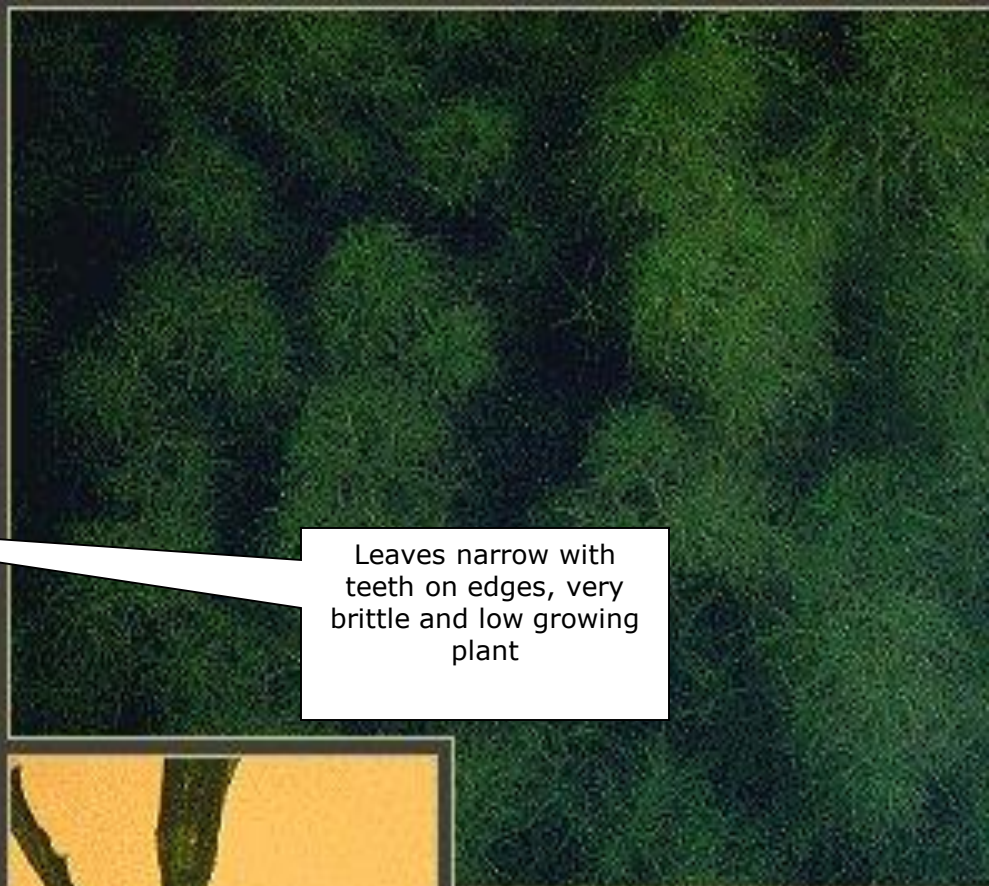


Curly-leaf Pondweed



Leaves are narrow with wavy (lasagna noodle) like edges to them, crisp like lettuce

Water Naiad



Leaves narrow with teeth on edges, very brittle and low growing plant





Stalks of small purple flowers form in July and persist until September. One plant can produce up to 2.5 million seeds.

Leaves opposite or whorled on a square stiff stem, rooted in moist, not wet or standing water soils

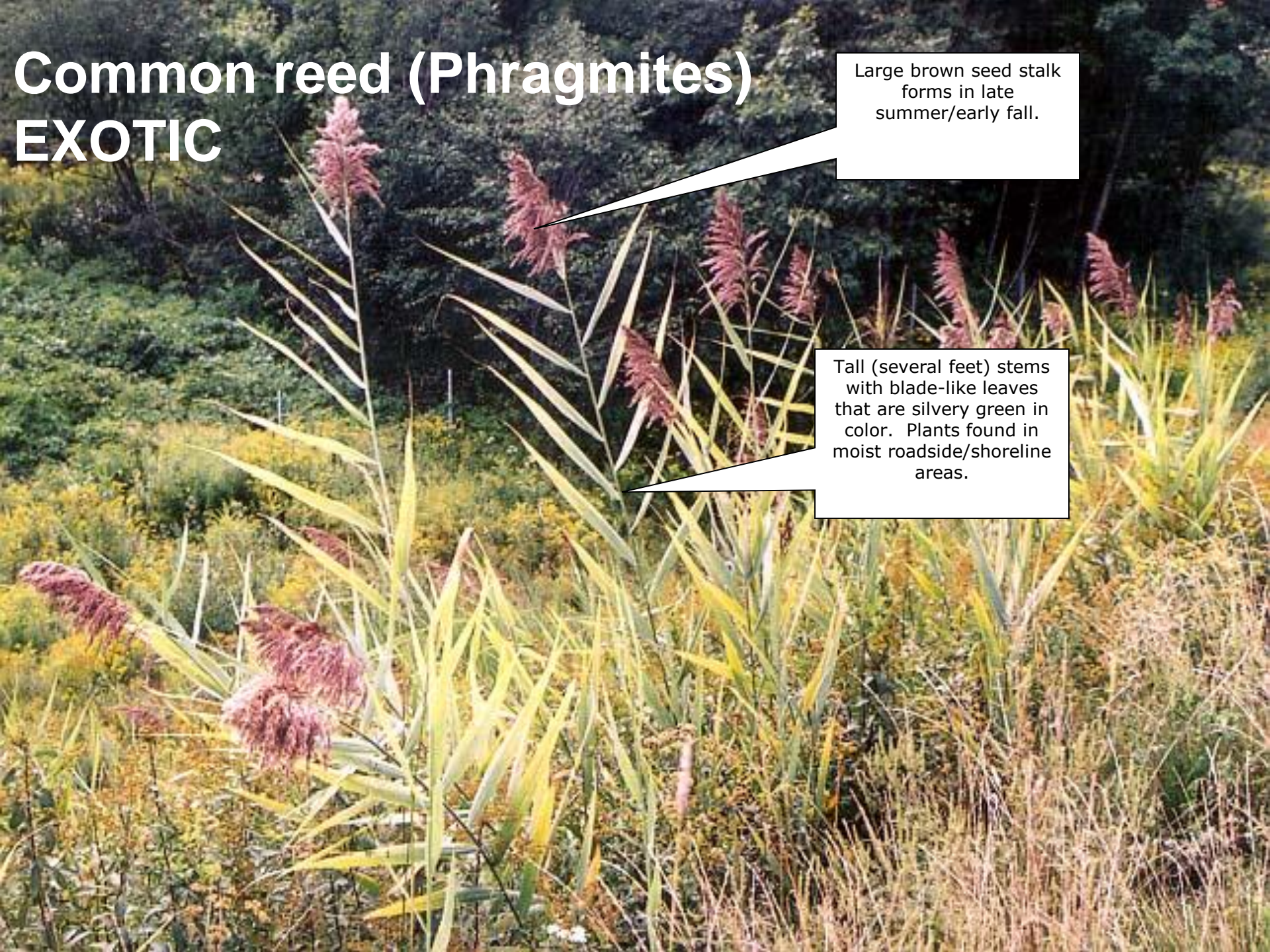
Purple loosestrife (EXOTIC)

Common reed (Phragmites)

EXOTIC


Large brown seed stalk forms in late summer/early fall.

Tall (several feet) stems with blade-like leaves that are silvery green in color. Plants found in moist roadside/shoreline areas.





Yellow iris (EXOTIC)



Invasive Aquatic Animals

(aka- critters you don't want)

Report any sightings of these to:

Amy P. Smagula

NH DES

29 Hazen Drive

Concord, NH 03301

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Asian Clam



Roughly the diameter of a dime,
sometimes a quarter



Chinese Mystery Snail



Zebra Mussel



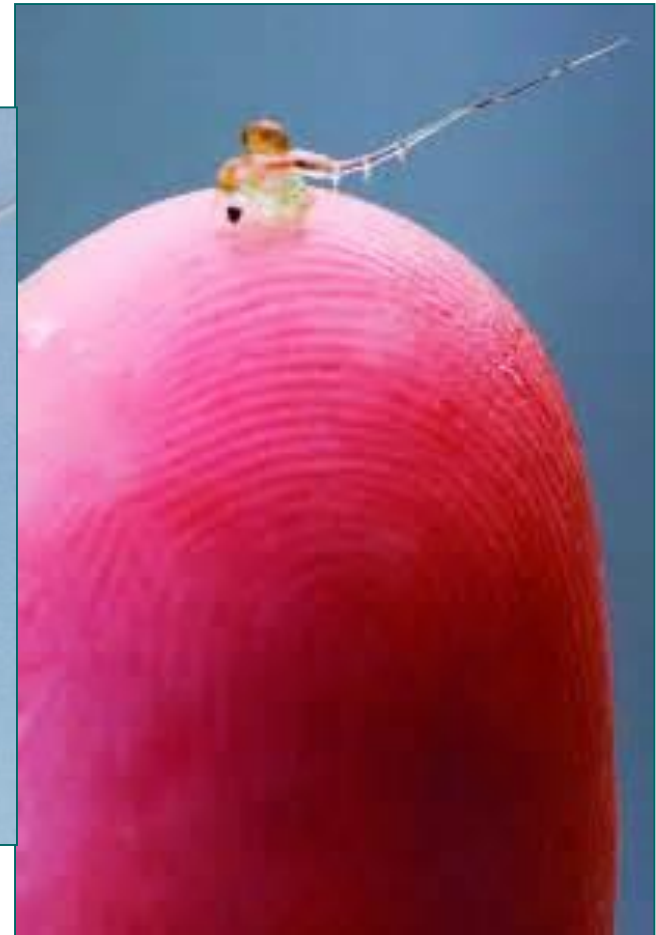
Roughly the size of a pistachio nut



Spiny Water Flea



Several spiny water fleas on fishing line



Spiny water flea on fingertip

Please...

When in doubt about an identification, please send in voucher specimens or email photos of what you have to Amy.Smagula@des.nh.gov for proper identification.