

# FRIGHTENING FACTS

South Carolina and North Carolina Exotic Plant Pest Councils



SCIENTIFIC NAME: ALLIARIA PETIOLATA
COMMON NAME: GARLIC MUSTARD
\*KNOWN TO OCCUR IN SC AND NC\*

### WHAT IS GARLIC MUSTARD?

Plant Type: biennial herb Family: Brassicaceae (mustard)

Form/Size: first year plant is a rosette, second year plant is an erect stem (single or

multiple), average height of 1m

Leaves: simple, alternate, triangular,

serrated (toothed)

<u>NOTE</u>: on the first year rosette, leaves are more kidney shaped, and round-toothed (less serrate) than on the second year plant **Flowers**: in clusters, white, small regular

flowers, four petals in cross shape, blooms in early spring

Fruit: oblong pod containing seeds, many pods on a

single silique (fruiting structure)

Means of Spread: seed only, mainly by

anthropogenic means, but also by animals and

limited movement in water

Similar <u>Native</u> Species: several white-flowering, including toothworts (*Dentaria* sp), sweet cicely (*Osmorhiza claytonii*), early saxifrage (*Saxifraga virginica*); rosettes resemble violets (*Viola* sp) NOTE: easiest way to distinguish garlic mustard

from similar plants is by the garlic odor from crushed stem and leaves





## WHERE DID GARLIC MUSTARD COME FROM?

Origin: Europe

North American Introduction: first record is from Long Island, NY, 1868

Reason: food, medicinal purposes

### WHERE AM I LIKELY TO FIND GARLIC MUSTARD?

Habitat Type: moist, shaded soils - forest understories (disturbed and undisturbed),

rich river valleys, disturbed areas, roadsides, ditches, gardens

Distribution in SC: unclear, listed on the USDA Plants Database, but not mapped in

EDDMapS or the SC Plant Atlas

Distribution in NC: Rockingham, Madison, Buncombe, Haywood, Swain Cos.



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Non-native Distribution: AK, AR, CO, CT, DC, DE, GA, IA, ID, IL, IN, KS, KY, MA, MD, ME, MI, MN, MO, NC, ND, NE, NH, NJ, NY, OH, OK, OR, PA, SC, TN, UT, VA, VT, WA, WI, WV and Canadian Provinces BC, NB, NS, ON, PE, QC

### WHY IS GARLIC MUSTARD A PROBLEM?

Environment: potential to invade forest understories and prevent regeneration of native species (herbaceous and woody); some studies indicate that this plant may produce chemicals that suppress the growth of other plants (allelopathy)

**Economy**: potential impacts to forest industry unknown



### WHAT SHOULD I DO IF I FIND GARLIC MUSTARD?

Report: take a photo, report the observation to EDDMapS: <a href="http://www.se-eppc.org/">http://www.se-eppc.org/</a> (location, size of infestation, etc.). *In SC*: Send digital photo to John Nelson at the USC Herbarium: plantman@herbarium.org for verification.

Control: hand-pull small populations; mow/cut to prevent seed production; glyphosate-based herbicides are effective; minimum 5 years follow-up required to deplete seedbank; NOTE: it is illegal to use a pesticide in any way that is not specified on the product label

**Disposal:** if plants have flowers or seed, do not compost (dry and burn or double-bag for regular garbage)

### **CURRENT LISTINGS:**

Federal: none

State Noxious Weed: AL, CT, MA, MI, NH, OR, VT, WA

SC-EPPC Ranking: Watch B/Herbs NC-EPPC/NCNPS: Rank 1 Severe Threat NCDOT: Threat - herbaceous plants

## **LEARN MORE!**

Invasive.org (images):

http://www.invasive.org/species/subject.cfm?sub=3005

UDSA Plants Database: http://plants.usda.gov/java/profile?symbol=ALPE4

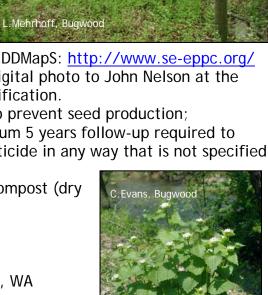
Natureserve:

http://www.natureserve.org/explorer/servlet/NatureServe?searchName=Alliaria%20p etiolata

Bugwood Wiki (Invasipedia): <a href="http://wiki.bugwood.org/Alliaria\_petiolata">http://wiki.bugwood.org/Alliaria\_petiolata</a>

Plant Conservation Alliance's Alien Plant Working Group (National Park Service):

http://www.nps.gov/plants/ALIEN/fact/alpe1.htm



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