# **Garlic Mustard**

Alliaria petiolata Mustard Family

## **Identification Tips**

- Typically 2 to 3 feet tall, can grow up to 6 feet
- Usually produces one flowering stalk with small, four-petal white flowers clustered at the top of leafy stems
- In spring the roots and new leaves smell like garlic
- The root usually has a distinct 'S' or 'L' shape just below the base of the stem
- Lower leaves have scalloped edges and are kidney-shaped
- Upper leaves are more triangular with pointier teeth on leaf edges
- Leaves are smooth, not fuzzy
- Seed pods are long and narrow

## **Biology**

Non-native biennial or winter annual herb. Seedlings develop into basal rosettes by midsummer; they overwinter to bolt the following spring. Flowers in early April to May. Spreads by seed; can self-pollinate or cross-pollinate. Stands can produce over 60,000 seeds per square yard. Seeds viable in the soil for at least 10 years.

## **Impacts**

Produces chemicals that inhibit the growth of other plants, fungi and butterfly larvae. Displaces native plants due its rapid spread, dense growth pattern, and long seed viability.

#### Distribution

Originally from Europe. Found in Seattle, Bellevue, on the Cedar River, and a few other areas around King County. Seeds fall close to the parent plant where they are moved by people, animals and vehicles. Known to quickly spread from paths and trails to wooded areas. Thought to have been spread through wood chip piles, on boots, or carried on people, pets or equipment moving between parks. Can grow in dense shade or sunny sites.

### **What You Can Do**

Contact the Noxious Weed Control Program if you see garlic mustard on public lands or neighboring properties. Since this noxious weed is not widespread in King County, eradication is possible. The key is preventing its spread and removing plants from all known sites. Help us by familiarizing yourself with this plant and the habitat where it grows. Monitor sites regularly and whenever possible remove plants prior to seed set.

# Class A Noxious Weed: Eradication Required



Flowers are small and white with four petals.



Leaves are shaped like a kidney or heart with wavy, toothed edges.



Dense patches of garlic mustard crowd out native plants.

#### **Control Methods**

Control methods need to be applied over a number of years to be successful due to the long-lived seeds in the soil.

#### **Prevention:**

Monitor areas where you've brought in wood chips, fill dirt, landscaping bark or gravel from outside your area; clean vehicles and equipment regularly. Check for rosettes (young plants) in the spring. Brush off boots when leaving an infested area.

#### Manual:

Mature plants—hand pull before seeds form. Make sure to remove the roots; plants will sprout from the crown if it breaks off. Rosettes—hand pulling is NOT recommended. Rosettes tend to snap off at the root, allowing the plant to resprout. Dig up rosettes or use an herbicide (see below). Bag up and discard all plant matter. Do not put in yard waste.

#### **Mechanical:**

Tillage may be effective for large areas but may initially expose more seeds for germination. Mowing can stimulate crown growth and side roots. **Take note: plants will flower again after mowing. Any cut or pulled garlic mustard plants must be bagged and discarded, even if only in bud.**They can still form viable seeds.



Prevention is within your grasp. Hand pull mature plants whenever possible.

#### Chemical:

Follow labels exactly as written and only use herbicides appropriate and legal for the site. Herbicides are effective on rosettes. Spraying in spring or autumn with glyphosate (such as Round-up) or triclopyr (such as Garlon 3A or Brush Killer) has shown to be the most effective chemical control. Products containing 2,4-D (such as Weed-B-Gone and Crossbow) do not significantly control garlic mustard.



Money plant is often confused with garlic mustard.

# Could be confused with:

In its rosette stage, garlic mustard looks similar to several native plants and some common weeds.

Those include wild violets (*Viola* spp.), fringecup (*Tellima grandifora*), mallow (Malva sp.) and piggyback plant (*Tolmiea menziesii*). When garlic mustard grows taller, it is sometimes confused with nipplewort plants (*Lapsana communis*), which have yellow flowers instead of white. Money plant (*Lunaria annua*) is similar in its appearance and sometimes has white flowers, but has round, flattened seed pods. Another way to tell the difference between garlic mustard and lookalikes is to feel the leaves. Most similar looking plants have fuzzy or hairy leaves whereas garlic mustard leaves are smooth and mostly hairless.