Help Protect California Landscapes

Invasive Weed to Watch for:

Hoary alyssum



Hoary alyssum (Berteroa incana)

What is a Noxious Weed?

A noxious weed is a category of invasive plant. Invasive plants are not native to the area, and tend to be very aggressive by outcompeting native plants for nutrients and water. By crowding out native plants, noxious weed infestations result in decreased plant diversity and decreased forage and habitat for native animals. Noxious weeds degrade fish and wildlife habitat, clog waterways, turn pastures into wastelands, disrupt forest regeneration, and overrun our forest and park areas. Although usually brought in accidentally, sometimes noxious weeds are introduced intentionally, especially when homeowners are looking for new and exotic landscaping specimens.

Did you know? Noxious weeds are the second greatest threat to species conservation—second only to land development!



Mature Hoary alyssum plant

Facts about Hoary alyssum

- Don't feed hay containing Hoary alyssum to horses. This weed is toxic in fresh pasture or dried in hay and can cause lower leg swelling also known as "stocking up", fever, diarrhea, and founder. Toxin is currently unknown.
- Annual or short-lived perennial herb and is a member of the mustard family (Brassicaceae).
- Adapted to the temperate continental climate characterized by cold winters and hot, dry summers.
- Most abundant in disturbed habitat such as pastures, hayfields, roadsides, rangelands and embankments due to its adaptability to dry conditions on sandy or gravely soils.
- Prefers direct sunlight but is also shade-tolerant.
- Believed to have been originally transported to North America as a contaminant of clover and alfalfa seed. Native to East-Central Europe and Western Asia. Presently found in 4 different California counties (Fresno, Lassen, Placer, and San Bernardino)
- Reproduces only by seed.
- Seeds can germinate from early spring to late fall, limited mainly by sunlight and water. Seedlings establishing in early July or sooner can flower and produce seed by early fall, thus reproducing as annuals. Seedlings establishing in late July or later will remain as rosettes and produce flowers and seeds the following year, reproducing as winter annuals or biennials.
- Initiation of flowering requires a day-length of more than 14 hours, and plants that are most likely to complete a flowering and fruiting cycle would have flowered in late spring or early summer when days are long, and will continue producing flowers and fruits until frost. In some areas of California this could occur for 3 months or more.

What to Look For:

- ◆ **Stems**: Grayish-green covered with star-shaped hairs, 1-3 feet tall, with several branches near the top. Multiple stems are common.
- ◆ Leaves: Grayish-green. Oblong-shaped and covered with fine hairs. Stem leaves are alternately arranged. Leaf margins are entire (smooth to slightly wavy) with no teeth or lobes. The basal rosette has oval to lanceshaped leaves that are broadest at the tip and I-2 inches long.
- Flowers: White with four deeply-notched petals. 4-6 mm long.
- Seed pods: Hairy with flattened oval-shape. 5-8 mm long, with star-shaped hairs. Each seedpod contains 4-12 dark reddish-brown, small lensshaped seeds.
- Dispersal: The most likely means of longdistance dispersal is contamination of seed used for lawns and forage crops. Harvesting of weedcontaminated hay can also contribute to local spread.



Hoary alyssum: Note the notched, 4-petal white flowers

Control Methods:

Mechanical:

- Hand pulling to extract the root crown is an effective method to reduce hoary alyssum density on small-scale infestations and scattered plants that are either newly invading or persisting after herbicide treatments
- Mowing is ineffective on hoary alyssum and may increase infestations by spreading seedpods.

Chemical:

 Hoary alyssum can be controlled using herbicides such as glyphosate, metsulfuron-methyl, aminopyralid + metsulfuron-methyl, and flumioxazin. Retreatment may likely be necessary to kill new plants growing from the seed bank.

Biological:

 Currently, No biological control agents are available.

Cultural:

 Revegetation: Sustainable suppression of hoary alyssum populations is more likely with desirable plants that will compete for light, water, and nutrients. Competing vegetation can greatly reduce Hoary alyssum seed production.



Hoary alyssum rosettes

Invasive weeds displace native plants and destroy healthy forests and parks.

<u>Please</u>

Help protect our native forest and park lands from weed invasion and preserve wildlife habitat.

What You Can Do:

- Become familiar with local noxious weeds
- Report any weed sightings
- Do not plant invasive plants in gardens where they potentially could become a problem.
- If traveling from weed infested area, remove seeds and plant parts on clothing, pets, car/bike tires, etc. before returning to an un-infested area to prevent weed spread.

To report suspected noxious invasive weeds in your area, please contact:

El Dorado/Alpine County
Department of Agriculture,
Weights and Measures

311 Fair Lane, Placerville, CA (530)621-5520 eldcag@edcgov.us



