

Yellow Hawkweeds

Hieracium spp.

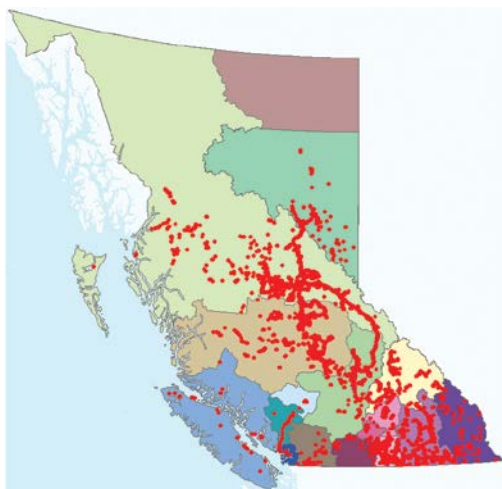
About Yellow Hawkweeds

There are 12 species of hawkweeds with yellow flowers in British Columbia. These species readily hybridizes which makes both identification and management complicated. For the purpose of this document, all species of exotic hawkweeds that produce yellow flowers and found in British Columbia will be collectively called “yellow hawkweed”.

Exotic hawkweed species found in BC: Meadow hawkweed (*Hieracium caespitosum*), whiplash hawkweed (*Hieracium flagellare*), kingdevil hawkweed (*Hieracium floribundum*), yellowdevil hawkweed (*Hieracium glomeratum*), pale hawkweed (*Hieracium lactucella*), mouse ear hawkweed (*Hieracium pilosella*), tall hawkweed (*Hieracium piloselloides*), smooth hawkweed (*Hieracium laevigatum*), common hawkweed (*Hieracium lachenalii*), European hawkweed (*Hieracium sabaudum*), spotted hawkweed (*Hieracium maculatum*), wall hawkweed (*Hieracium marorum*)

Legal Status

Yellow hawkweeds are not listed under the *BC Weed Control Act Regulation*. Mouse-eared hawkweed (*Hieracium pilosella*) is a priority provincial EDRR (Early Detection Rapid Response) species. Meadow hawkweed (*Hieracium pilosella*) is listed in the *Forest and Range Practices Act*, Invasive Plant Regulations lists.



Yellow Hawkweeds Distribution
(2011)

Distribution

These species are found scattered across the province and can be abundant in the various locations of the province. Various species are found in all regions of BC. Introduced yellow hawkweeds are a major concern in all regions of the province.

Identification

Flowers: Hawkweed species produce conspicuous yellow to pale yellow or white ray flowers borne singly or in clusters on top of stems.

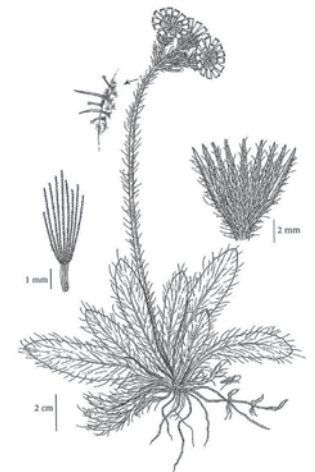
Stems: Hawkweeds produce upright and typically solitary and unbranched stems that can be smooth to moderately hairy. When broken, stems secrete a milky juice.

Leaves: Produce a basal rosette of leaves that vary from elliptical to ovate shaped, typically narrowed at the petiole. Upper stem leaves are absent or reduce in size along the stem.

Fruits: Achenes are dark ribbed, narrowed at the base, 2 mm in length and have a white to tawny pappus.

Similar Native Species: White hawkweed (*Hieracium albiflorum*), Canadian hawkweed (*Hieracium canadense*), hound’s-tongue hawkweed (*Hieracium cynoglossoides*), slender hawkweed (*Hieracium gracile*), Scouler’s hawkweed (*Hieracium scouleri*), woolly hawkweed (*Hieracium triste*), narrow-leaved hawkweed (*Hieracium umbellatum*)

Similar Non-Native Species: In British Columbia, there are 13 different species of introduced hawkweeds, however it is easy to distinguish *Hieracium aurantiacum* from other *Hieracium* species as it produces orange flowers instead of yellow flowers.



Yellow Hawkweeds
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Ecological Characteristics

Habitat: Hawkweeds have a preference for well-drained and coarse textured soils with low organic matter. There are many habitats in B.C. which have these soil types such as fields, meadows, forest clearings, pastures, farmland and other various habitats.

Reproduction: Hawkweed species are able to propagate through large seed production, long distance dispersal, high germinability and root fragments.

Dispersal: Small seeds and root fragments spread through intentional and unintentional human activity allowing this species to travel large distances and colonize new locations.

Impact

Economic: Hawkweeds compete with desirable native species and negatively impacts ranching and agriculture, resulting in decreased yields and reduced quality of forage and low stocking rates on grazing areas.

Ecological: Yellow hawkweeds can have a negative impact on biodiversity, native flora and fauna, and rare protected species.



Agriculture

IS NEGATIVELY IMPACTED
RESULTING IN DECREASED YIELDS

Integrated Pest Management

IPM is a decision-making process that includes identification and inventory of invasive plant populations, assessment of the risks that they pose, development of well-informed control options that may include a number of methods, site treatment, and monitoring.

A. Prevention

- » Educate gardeners and horticulturists to prevent active distribution and trading.
- » Do not move any soil that could possibly contain seeds or root fragments.
- » Clean vehicles, personal gear, boots, and animals that have been in contact with contaminated soil or in infested areas.
- » Purchase weed free feed for horses and cattle.
- » Minimize disturbance caused by human activities and maintain healthy ecosystems.

B. Mechanical Control

Mowing before flowers bloom will help reduce the seed production however soil disturbances may help this species to spread. Very small infestations can be hand-pulled however great care needs to be taken to ensure that roots and stolons are carefully bagged and not spread.

C. Cultural Control

Application of fertilizers may enhance the competitive abilities of desirable species such as perennial grasses, legumes and other forbs to reduce hawkweed infestations or resist against hawkweed invasion.

D. Chemical Control

Herbicide recommendations and use must first consider site characteristics and be prescribed based on site goals and objectives. Herbicide labels and other sources of information must be reviewed before selecting and applying herbicides.

- » Picloram alone and plus 2, 4-D, aminopyralid alone and plus 2, 4-D effectively provide longer term control when applied to actively growing plants (spring and early summer). Dicamba alone and plus 2,4-D provide effective shorter term control.
- » Treatment with fertilizer to stimulate growth of surrounding desirable species to facilitate competition is recommended.

Application of pesticides on Crown land must be carried out following a confirmed Pest Management Plan (*Integrated Pest Management Act*) and under the supervision of a certified pesticide applicator. www.env.gov.bc.ca/epd/ipmp/



Yellow Hawkweed; J. Leekie

Disposal

Note: *Disposal of invasive plants varies by region. Contact your local government for specific information on how to dispose of your invasive plants.*

- » Manually removed plants, plant parts and seeds must be bagged or tarped before transporting to a designated disposal site (e.g. landfill or transfer station).
- » It is recommended that transfer stations provide disposal bins intended solely for invasive plants. This will ensure the plant matter within the container is transported in a sealed unit and properly disposed of at the landfill. All cut plant parts should undergo deep burial (at least 5m deep) at a landfill.
- » Burning or composting at home is not recommended as extreme temperatures are required to completely desiccate the plant.



Yellow Hawkweed; Nicole Kimmel



References/Links

Alberta Government, Hawkweeds. [Accessed 2/22/2017; [http://www1.agric.gov.ab.ca/\\$Department/deptdocs.nsf/all/prm14063/\\$FILE/hawkweeds.pdf](http://www1.agric.gov.ab.ca/$Department/deptdocs.nsf/all/prm14063/$FILE/hawkweeds.pdf)]

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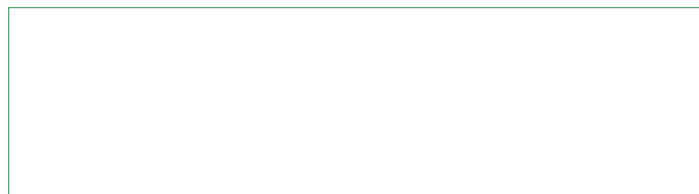
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<https://www.fs.fed.us/database/feis/plants/forb/hiecae/all.html>

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ADDITIONAL
CONTACT INFO