SPOTTED KNAPWEED

Prohibited - Control

Centaurea stoebe L. subsp. micranthos (Gugler) Hayek

Go to Knapweed Comparison (pg 101) for key differences.

Common Names

Bushy Knapweed

Life Cycle

Herbaceous biennial or short lived perennial

Native Range

Eurasia

Look-a-Likes

Brown Knapweed (pg 10)

Canada Thistle (pg 25)

Diffuse Knapweed (pg 14)

Meadow Knapweed (pg 30)

Yellow Starthistle (pg 24)

Habitat

Prefers disturbed sites with gravely or sandy dry soils. Roadsides, abandoned lots, old fields and gravel pits are habitat that support infestations.

Means of Spread

Seeds are the primary means of reproduction and a mature plant produces thousands of seeds that may remain viable. Allelopathic properties (chemicals exuded by the plant) can suppress the germination of seeds of other plants nearby.



Identification

Plant - Herbaceous, short-lived perennial living 1 to 4 years. Initial stage is a rosette before the plant produces 1 to 6 stems ranging from 1 to 4 feet tall.

Leaves - Simple, alternate, greyish-green basal rosette leaves up to 6 inches long have deep sinuses. Alternate leaves on mature stems vary from smaller, 1 to 3 inch, versions of the basal leaves to very small linear leaves near the top.

Flower - Pink to purple color (rarely white) and multi-parted texture. Below the petals, flowers are held together by bracts that are stiff and tipped with darkened hairs.

Bloom Time - July to September

Seed and Fruit - 1/4 inch long, brownish, tufted seeds.

Root - Stout taproot with secondary roots.

Management

Appropriate protective clothing including gloves and long sleeves should be worn.

Mechanical - Cutting or mowing will not kill populations. Hand pulling small populations can be effective but will leave bare disturbed soil.

Chemical - Foliar spraying in early spring and late fall, targeting rosettes, can be effective.

Biological - Approved biological control agents used in Minnesota are seedhead weevils (*Larinus minutus* and *L. obtusus*) and a root-boring weevil (*Cyphocleonus achates*). Weevils are collected July through September and released. A combination of seedhead and root boring weevils work together, infestations can be reduced over years.









Above: Larinus minutus.

Below: Cyphocleonus achates.







Fire - Fire will not kill spotted knapweed, but improve surrounding plant communities. Spring burns are compatible with biological control efforts.

Effective herbicide formulations: aminocyclopyrachlor, aminopyralid, clopyralid, glyphosate, imazapyr, picloram.