

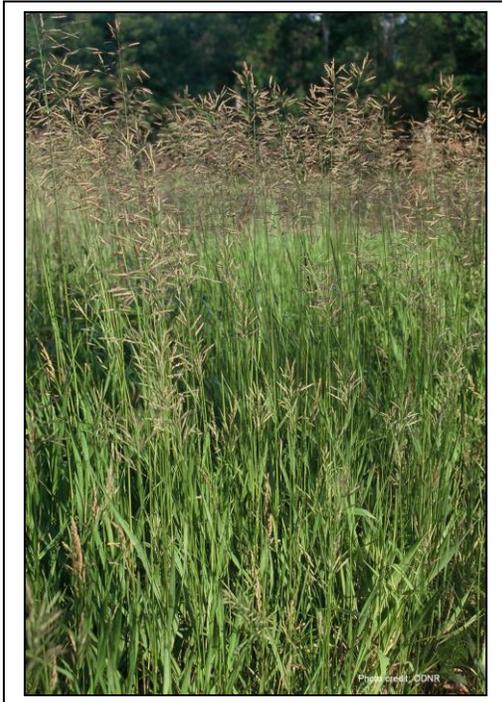


INVASIVE PLANTS OF OHIO

Fact Sheet 13

Smooth Brome

Bromus inermis



DESCRIPTION:

Smooth brome is a rhizomatous, cool-season perennial grass which can attain a height of 4 feet. The numerous basal and stem leaves are smooth, under ½ inch wide and up to 8 inches long. The flower panicles are characterized by having 4-10 erect branches. Spikelets are up to 1.5 inches long and comprised of up to 10 florets. Spikelets are tinged with purple-bronze color as they mature and set seed. Reproduction is by seed and aggressive rhizome growth.

This drought-resistant Eurasian species was deliberately introduced into the United States in 1884 as forage crop for livestock and for erosion control along streams. Smooth brome continues to be used because it is relished by many kinds of livestock and makes fine forage. It is found throughout the United States, except in the southeast, and is most common in

agricultural areas where it has escaped from its intended use. This species occurs throughout Ohio.

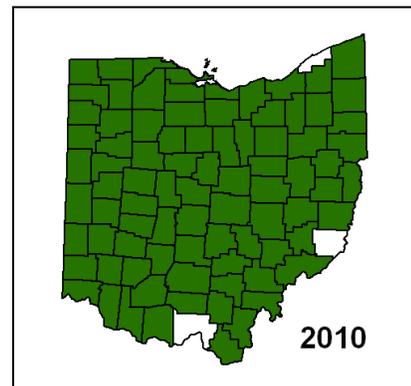
Map based on records as of 2010.

HABITAT:

Smooth brome grows in open areas such as roadsides, riverbanks, open fields, prairies, and woodland edges. It can withstand droughts and periodic flooding. Grasslands, savannas, and meadows are typically susceptible to invasion.

INVASIVE CHARACTERISTICS:

Smooth brome emerges from dormancy in March, before the native warm season grasses and spreads aggressively through its rhizomes forming dense monocultures. Its deep roots make it an excellent soil binder; it protects against erosion, but prevents other species from emerging. Seeds may be viable for up to 10 years in the soil.





CONTROL:

Mechanical:

A single, well-timed, low mowing early in the spring may be an effective control method for smooth brome. However, repeated mowing is usually necessary to deplete the rhizome system. Fire may control the grass from spreading, if burned in late spring, but will not kill the rhizomes. Smooth brome, a cool-season grass, is often found mixed with native warm-season grasses. Caution should be used in timing of any mowing to avoid damage to warm-season grasses and other native species.

Chemical:

Foliar application of systemic herbicides, such as Roundup, AquaNeat, Rodeo, or a grass-specific herbicide such as Fusilade DX, can be effectively applied to dense populations in April or May. Care must be taken to avoid non-target species. If

smooth brome is found mixed with native grasses, herbicide application may be done in early spring or late fall when native species may be dormant. To be most effective, many herbicides require a penetrating or sticking agent such as Nu-Film-P.

Biological:

Currently there are no biological controls for smooth brome.



Credits and additional information:

Plant Conservation Alliance-Alien Plant Working Group
Ohio Department of Natural Resources, www.ohiodnr.gov
The Nature Conservancy, Ohio Chapter
OIPC website, www.oipc.info