Japanese Knotweed
Polygonum cuspidatum

A SERIOUS THREAT
To
Iowa’s Wetlands

Management Techniques

1. (Spring) Dig up roots and associated runners. These need to be bagged and removed from the area. This should be followed with technique 3

2. (Summer) Cutting back the plant repeatedly may help slow its growth. This should be done multiple times during the growing season and followed with technique 5

3. (Late Summer, early Fall) Cut-Stem Application: cut the stems 2 inches above the ground, immediately apply herbicide to stumps. This should be done twice a year and followed with technique 5
   A. 0.25% Imazapyr solution and a 0.25% non-ionic surfactant

4. (Late Summer, early Fall) Foliar Spray. Apply herbicide to leaves using a sprayer, but not such a heavy spray that the leaves are dripping. In general, this technique will have a deeper root-kill if used in the fall, but can be used to top kill the plant in the spring and summer. This should be followed with technique 3
   A. 0.25% Imazapyr solution and a 0.25% non-ionic surfactant

5. (All year) Cover the infested area with tarps. Clear away the old plants, lay the tarps so they overlap, and weigh down the edges. Covering the plants smothers them and prevents growth. Any growth that does occur will be minimal, and should be trampled down. These should be monitored regularly and followed with technique 3 on any new growth.

For More Information Visit:
http://www.HawkeyeCWMA.org

ALWAYS READ AND FOLLOW PESTICIDE LABELS.

Proper training for prescribed fires is highly recommended.

Basic training can be found online at
http://training.nwcg.gov/courses/s130.html
and
http://training.nwcg.gov/courses/s190.html

Related Website:
http://www.iowadnr.com/forestry/invasive.html
http://plants.usda.gov
www.invasivespecies.gov
www.nps.gov/plants/alien

Credits:
Photographs: Kansas Department of Agriculture; Jan Samanek, State Phytosanitary Administration; Steve Manning, Invasive Plant Control; Leslie J. Mehrhoff, University of Connecticut; Philip Rusted, Thurlow Countryside Management; Ohio State Weed Lab Archive, Ken Chamberlain, Ohio State University; www.bugwood.org

Brochure Created By: Sarah Chmielewski, Karen Clauson
Last updated: 4/19/2011

The Hawkeye Cooperative Weed Management Area (HCWMA) is a collective group of county, state, and federal agencies, nonprofit organizations, and community associations who have come together to combat the invasive species problem in Eastern Iowa. The HCWMA serves Benton, Cedar, Iowa, Johnson, Linn, and Louisa Counties and is open to all interested parties. This Term CWMA, or Cooperative Weed Management Area, refers to a local organization that integrates invasive species management resources across jurisdictional boundaries in order to benefit entire regions.

Funding for this brochure provided by the US Forest Service through a Healthy Forest Initiative Grant.

All Hawkeye CWMA members (agencies, organizations, and individuals) are equal opportunity providers and employers.
What is Japanese Knotweed?

- A robust bamboo-like perennial
- Native to Eastern Asia
- Came to North America in the late 1800s
- Introduced as an ornamental and as a means for erosion control.

What is the threat to Iowa?

- Reduces native wildlife habitat.
- Can grow in a variety of ecosystems.
- Can clog waterways if it grows near a stream.
- Seeds are well suited for wind dispersal.
- Millions of dollars are spent annually to remove it in areas.
- Decreases biodiversity and natural vegetation by shading out everything in an area.

What does Japanese Knotweed Look Like?

**Identifying traits:** Japanese Knotweed can grow up to 10 feet tall. Has hollow brown stems. The flowers are greenish-white. Knotweed begins growing in April, and will reach its full height in June.

**Stems:**
The stems of Japanese Knotweed are hollow and green to reddish brown in color. They look similar to bamboo with ridges and joints.

**Leaves:**
The leaves are alternately arranged along the stem and are 6 inches long and 3 to 4 inches wide. They have oval shaped sides with squared off bottoms and pointed tips. The upper surfaces of the leaves are like fine sandpaper.

**Fruits:**
The fruits are 3-sided, black, shiny, and only 1/10 inch long. They are produced after the flowers die and are very light allowing them to be spread by the wind.

**Flowers:**
The small greenish-white flowers bloom in late summer. The flowers grow in a lacy cluster on 2 ½ to 6 inch long stems.

**Roots:**
The roots of Japanese Knotweed can grow up to 60 feet long and 6 feet deep. Along the roots new plants can sprout up. New plants can also sprout from cut pieces of roots.

Native Alternatives:

**Indigobush (Amorpha fruticosa)**

This flowering shrub can grow from 3 to 10 feet tall. The small purple to dark blue flowers bloom from April through June. Flowers come in a spike-like clusters at the ends of branches. Indigobush can grow in a variety of soils, and is cold tolerant. The shrub is a host plant for several butterfly and moth species.

**American Elder (Sambucus canadensis)**

This native shrub grows 6-12 feet tall. Small white flowers are arranged in umbels, and bloom from May to August. Blue or purple berries ripen in late summer and may be collected to make wines, jellies, and pies. Do not pick red berries, they are poisonous! Medicinal tea may be made from the flowers.

Other varieties of Knotweed to keep an eye out for:

**Giant Knotweed (Polygonum sachalinense)**

This variety has leaves that are 6 to 16” long with a deeply heart shaped base. The stems can reach 17 feet tall. The flower clusters are on a stem that’s much shorter than the ones on Japanese Knotweed.

**Bohemian Knotweed (Polygonum bohemicum)**

This is a hybrid between Giant and Japanese Knotweed. The leaves are either spade or heart shaped and are thicker and rougher than the Giant variety, but not as thick/rough as Japanese Knotweed. The branches that the flower clusters grow on are generally as long as the leaves.

Japanese Knotweed growing in the gutter attached to a roof.