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Kudzu In Indiana

History:

Kudzu (*Pueraria montana*) is as close to a celebrity that a plant can become. It has become a part of the culture in the southern United States. It's so popular that it has been referred to in the names of music bands, sport teams, and mentioned in much of the southern United States literature.

Originally from Asia, it was presented at the Centennial Exposition in Philadelphia in 1876. Kudzu's fine smelling blooms, large leaves, and climbing nature lent appeal as an ornamental. It was used as forage in the 1920s. In the 1930s and 1940s the Soil Conservation Service promoted its growth as an erosion control tool. Unfortunately, due to its aggressive ability to overtake the landscape and actually kill large trees, we have been fighting it ever since as an invasive weed. Kudzu is one of the weed species that can serve as an alternate host to soybean rust, a serious soybean disease that has the potential to devastate U.S. soybean varieties not resistance to this pathogen.

Description

Once you see kudzu, you probably will not forget it. Like a green living quilt, it covers everything in its path (Figure 1). This perennial climbing vine can grow up to 30 feet and at the astonishing rate of one foot a day in optimum growing conditions in the southeastern states.

Vines are covered with fine tan to bronze bristly hairs making it slightly uncomfortable to the touch. Leaves are alternately arranged on an herbaceous to woody stems. The leaves are pinnately tri-foliolate (Figure 2). The leaves are broad and 2 to 5 inches long. Leaves may have 2 to 3 lobes or none at all.



Figure 1. Kudzu growing on the side of highway 37, Morgan County

Figure 2. Pinnately tri-foliolate leaf showing lobes

Flowers are violet-purple, to reddish-purple with a small yellow patch (Figure 3). This yellow patch is quite conspicuous when blooming. The flowers are arranged in a raceme. Being a member of the family Fabaceae, the seed are found in pods. Pods are 1.5 to 2 inches long, somewhat flattened, covered with brown to bronze hairs.

Indiana

Kudzu is in Indiana. Kudzu has been reported in southern Indiana to as far north as Morgan county. In *100 Years of Change in The Distribution of Common Indiana Weeds*, Dr. William and Edith Overlease reported spotting kudzu in 15 Indiana counties. The Indiana Department of Natural Resources (IDNR) has identified more than 70 sites. Although most sites in Indiana are in the southern region, the northern county of La Porte has been reported to have one site that contains kudzu.



Figure 3. Kudzu flower in bloom

Control

Much of the research on the control of kudzu has been done in the southeastern states, where it is much more prevalent. Controlling kudzu will take persistence and patience. Mowing, grazing, and herbicides are options available to control kudzu. Persistence and patience will definitely be a virtue in the case of its control.

Continuous mowing and grazing over several years will weaken and eventually control kudzu. J.W. Everest, J.H. Miller, and D.M. Ball (1999**) reported that control could be obtained in young patches of kudzu by close grazing for four years, assuming 80 percent or more was continuously consumed. Several kinds of livestock, from goats to cattle, will eat kudzu. However, in many cases, this may not be possible due to location and terrain.

There are a limited number of herbicides that are effective on kudzu. The herbicides that have an effect may also damage the surrounding vegetation and woody plants. For any herbicide to be effective on kudzu, it must be systemic, killing the underground portions of the plant.

Examples of herbicides labeled for kudzu management include the following. In Indiana, Banvel alone, Banvel + 2,4-D, or Garlon 4 can be used on ditch banks, roadsides, and non-cropland areas. However, do not use these products on irrigation ditches and avoid spraying directly to surface water. Spike 20P can be used along highways, industrial sites, right-of-ways and pastureland; however, Spike can not be used on ditches or any site that slopes towards water. In the case of a home property, glyphosate products (Glyphosate VMF, Roundup Pro, Touchdown Pro) have efficacy on kudzu.

Information listed here is based on research and outreach extension programming at Purdue University and elsewhere.

The use of trade names is for clarity to readers of this site, does not imply endorsement of a particular brand nor does exclusion imply non-approval. Always consult the herbicide label for the most current and update precautions and restrictions. Copies, reproductions, or transcriptions of this document or its information must bear the statement 'Produced and prepared by Purdue University Extension Weed Science' unless approval is given by the author.

Always read product labels carefully before buying and using. Similar products may have specific labeled uses that may not be suitable for your specific need.

Photo credit: Chris Parker, Morgan County Educator; Purdue University Cooperative Extension Service.

**For more information on kudzu and its control, please see "Kudzu in Alabama History, Uses, and Control" by John W. Everest, James H. Miller, and Donald M. Ball. (Accessed 2001) www.aces.edu/dept/extcomm/publications/anr/ANR-65.html