The genus *Humulus* (Cannabidaceae) contains two species. Both species are dioecious (that is, male and female plants exist). *Humulus lupulus* is the Hop plant used in beer manufacture. Although it is a sturdy, perennial, vining species it is of little horticultural value. In contrast, *Humulus japonicus* is known to gardeners as an attractive annual (or occasionally weakly perennial) vine with variegated forms being common. *Humulus japonicus* does not contain the various “lupulin” compounds that are sought by brewers. It is a very fast grower.

*Humulus japonicus* vines are covered with hooked hairs which makes working with them painful. Dermatitis and blistering may occur with *H. lupulus* and possibly *H. japonicus*, so it is best to use appropriate protection (gloves, etc.) when working with these plants.

Control

Being desirable gardening and commercial species, not much information is available on the control of these species. However, the following control plans are recommended.

**Mechanical:** If *H. japonicus* is acting as an annual, pulling the plants any time of the year should be effective. The plants should be pulled before they set seed (they flower August–September). When pulling the plants, attempt to remove as much of the rootstock as possible. It is likely that resprouts could occur from both the rootstock and the bines (the leafy portion of the plant), so the pulled plants should be removed or left where they cannot reroot. If the plants are acting as perennials, experiment with pulling either during May–June when the rootstock is most exhausted and small, or just prior to flowering when the rootstock should be plump and robust.

**Herbicides:** When farmers wish to eradicate *H. lupulus*, they spray with glyphosate (i.e., Roundup). Both Dr. Alfred Haunold (USDA Hops Research Geneticist, Corvallis Oregon) and the horticulturists at Legendary Ethnobotanical Resources (Homestead, Florida) agree that glyphosate should be deadly against *H. japonicus*. If the plant is behaving as an annual, spot applications of glyphosate any time during the year (prior to flowering) should damage the plant enough so it will not be able to flower and set seed. If it is growing as a perennial, the best time to apply glyphosate would be when the rootstock is most rapidly accumulating carbohydrates, that is July–September. Applying glyphosate earlier in the year would not be effective as it would not be translocated into the rootstock.

**Biocontrol or Burning:** Because of the commercial value of *H. lupulus*, biocontrols are unlikely to be developed against *H. japonicus*. Burning would be unwise since the fire might be carried into the crowns of trees.

**Seedbank:** The seedbank of *H. lupulus* is typically exhausted in approximately three years. Similar longevity should be expected for *H. japonicus*. The first two years of Hop control will be the most time-consuming. After that, the number of plants will drop dramatically.