

# Giant Ragweed

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## **Giant Ragweed** *Ambrosia trifida* L

Also known as great ragweed, horseweed, horse-cane, richweed, bitterweed, bloodweed, blood ragweed, tall ragweed, palmate ragweed.

### **Classification and Description:**

Giant ragweed is an erect summer annual that is native to the U.S. and it can be commonly found throughout many parts of the country. It can reach heights from 3 to more than 16 feet. Giant ragweed is a member of the Asteraceae, or sunflower, family of plants. Seedling giant ragweed has a purple hypocotyl and cotyledons that are round to oblong and thick. The first true leaves do not have lobes but do have toothed margins and are lanceolate (long and thin) in shape. Subsequent leaves are opposite, blades simple, hairy and large (4-10 inches long and up to 8 inches wide). Leaves occur on petioles and most often have three prominent lanceolate-shaped lobes, although they can occasionally have five lobes. The lobes originate from the same point (palmate). These large, three-lobed leaves make giant ragweed a very distinctive plant. Leaf

margins are serrated. Stems can be reddish and are erect, branching above, rough and sometimes hairy. Stems can be reddish. Giant ragweed has separate male and female flowers. Male flowers occur in slender racemes (columns) in the upper terminals. Female flowers occur in clusters in leaf axils below the male flowers. All flowers are small and greenish-yellow. Fruit is a large, black, woody achene that is egg-shaped, except the widest part is towards the end instead of in the middle. The widest end has one single short beak and other shorter projections, which make it resemble a crown. Seed is small and enclosed in the fruit. Reproduction is by seeds.

### **Weed Status and Injury:**

Giant ragweed can readily be found along fence rows of agronomic crop fields and pastures in Tennessee. Increasingly, it is becoming established in agronomic crop fields. Herbicides commonly used on agronomic crops, like glyphosate, only provide partial control, and so giant ragweed is becoming an increasing problem in row crops. It can also be found in pastures, low woods and young



*Seedling giant ragweed*



*Giant ragweed in a fence row*

forests, along creeks, railroads and in waste areas. It especially thrives in moist soils and under full sunlight. Giant ragweed is a prolific seed producer and can readily spread if left undisturbed.

### Interesting Facts:

Pollen from giant ragweed is one of the main causes of late-season hay fever, making it a nightmare for allergy sufferers. It is ironic that the word ambrosia means something with an especially delightful fragrance or flavor.

In ancient Greek and Roman mythology, the name of the genus *Ambrosia* meant “the food of the gods, reputed to impart immortality.” Because the flowers depend on wind pollination, few insects are attracted to them, although the caterpillars of several moths feed on the foliage and other plant parts. White-tailed deer will browse the leaves when little else is available, but the seeds are too large for many seed-eating birds to eat. Native Americans



*Giant ragweed in a soybean field*

used fibers from the stems to make thread. Some believed chewing the roots would alleviate fear at night. The Cherokee used giant ragweed for several medicinal uses, including as a pulmonary aid. They also crushed the leaves to rub on insect stings.

### Management Considerations:

Giant ragweed is an extremely competitive weed to row crops. Moreover, there are few herbicides in soybeans or cotton that provide good control. Recent research has found that giant ragweed seed collected from along fence rows, railroads, etc. will typically all germinate in about a two-week period from late March to early April. Giant ragweed seed collected from agricultural fields was shown to germinate from March through June. In effect, a biotype of giant ragweed has adapted to agricultural practices. Effective management of giant ragweed includes a comprehensive weed-management strategy. This strategy should include aggressive monitoring of fields and removal of the first individuals that emerge. Please refer to the **Weed Control Manual for Tennessee Row Crops** (Extension PB 1580) for management recommendations.

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