



# TREES & SHRUBS

## Honeysuckle Witches' Broom Aphid no. 5.546

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### Quick Facts...

The honeysuckle witches' broom aphid is a recent Colorado invader.

During feeding in midspring, nymphs apparently introduce toxins into the plant, causing the leaves to distort and discolor.

"Clavey's Dwarf" and "Arnold Red" honeysuckle varieties appear to be resistant to damage by this aphid.

Insecticides with some systemic activity in the plant have provided the best control.

The honeysuckle witches' broom aphid is a recent invader of Colorado. Its presence was first confirmed in 1983. Often this insect is called the Russian aphid because of its area of origin.

Since the late 1970s, the honeysuckle witches' broom aphid has spread rapidly across the Midwest where it has caused extensive damage to honeysuckle. Honeysuckle in Colorado appears to be similarly susceptible. Routine control of the pest may become necessary in many ornamental plantings.

### Life Cycle

The honeysuckle witches' broom aphid overwinters in the egg stage on the tips of honeysuckle branches. Eggs hatch in midspring, and the young nymphs feed on succulent expanding leaves.

During the feeding process, the aphids apparently introduce toxins into the plant, causing the leaves to distort and discolor. The leaves fold up over the aphids, which protects the insects from insecticides. The new plant shoots also fail to elongate properly. The plant terminals produce an overabundance of side shoots that grow into the characteristic witches' brooms. Continued feeding causes buds below the original injury to break. The resulting new growth is then infested, causing progressive injury down along plant terminals.

Many generations of the aphid are produced on the plant throughout the growing season, including winged forms that disperse to other plants. Populations generally decline in July and August, followed by an increase in September. As cold weather approaches, eggs are laid in the witches' broom growth.

### Cultural Control

If a honeysuckle plant was infested during the previous season, prune out and dispose of the witches' broom in early spring before the eggs have hatched. This helps reduce early season populations. Pruned plants, however, become susceptible to damage from winged aphids moving to the plants. Pruning after egg hatch may result in a flush of additional new leaf growth, which may in turn increase the aphid injury.

Cultural practices that favor the production of new growth can aggravate the problem. Highest aphid populations are produced on plants that are pruned, irrigated and overfertilized during the year.

Some honeysuckle varieties appear to resist damage. For example, "Clavey's Dwarf" and "Arnold Red" are reported to be very resistant. Observations of common Colorado varieties may help identify others that are little injured by this insect.

## Biological and Chemical Control

Biological enemies include lady beetles, lacewings, syrphid flies and parasitic wasps. Although these natural controls will eventually eliminate many of the aphids, cosmetic damage to the plants often occurs before biological controls become effective.

For established honeysuckle that is susceptible to honeysuckle witches' broom aphid, insecticide applications often are necessary to limit injury. The frequency of spray applications depends on infestation severity and the acceptable amount of aesthetic injury to the plant.

Make the first application around June 1, then repeat at three- to five-week intervals, as needed. In many situations, one to two treatments per season can provide acceptable control.

Insecticides with some systemic activity in the plant have provided the best control. These include sprays of Orthene (acephate) and imidacloprid and soil applications of imidacloprid. Contact insecticides such as malathion, permethrin or insecticidal soaps have not been as effective but can provide some control if application coverage is very thorough.

**Always follow the labeled directions for use whenever making insecticide applications.**



Figure 1: "Witches broom" distortion caused by the honeysuckle witches broom aphid.



Figure 2: Honeysuckle witches broom aphid.