

Pest Profile



Photo credit: Jack T. Reed, Mississippi State University, Bugwood.org

Common Name: Western Flower Thrips

Scientific Name: *Frankliniella occidentalis* (Pergande)

Order and Family: Thysanoptera, Thripidae

Size and Appearance:

	Length (mm)	Appearance
Egg		<ul style="list-style-type: none">• Small, kidney shaped• Translucent• Laid within emerging vegetation and buds
Larva/Nymph		<ul style="list-style-type: none">• Pale to dark yellow in color• Dark red eyes• Wingless
Adult	< 1.5 mm	<ul style="list-style-type: none">• Very Small• Long, thick bodies• Yellow to brown in color with dusky markings on the side of the abdomen• Males are smaller and light colored• Have 4 small feathery wings• Have an asymmetrical mandible
Pupa (if applicable)		<ul style="list-style-type: none">• Pupation occurs in the soil

Type of feeder (Chewing, sucking, etc.): Adults and larvae both have rasping-sucking mouthparts.

Host plant/s: Greenhouse plants, ornamentals, grasses, weeds, field crops, fruits, and vegetables.

Description of Damage (larvae and adults): Both larvae and adults feed on host plants, causing a variety of problems. The direct feeding of the thrips causes a silvery stippling pattern on the surface of the leaves and flower petals that greatly reduces the overall appearance of the plant. Thrips often prefer to feed on the young, tender growth, which may lead to deformation of expanding leaves and flowers from the dead patches. Also, adult females can cause major damage due to puncture wounds caused during egg-laying. Thrips also leave small flecks of dark frass on the leaf surface.

Additionally, western flower thrips can be very damaging to crops due to the variety of plant pathogens they vector. Several diseases are vectored by these insects, including tomato spotted wilt, impatiens necrotic spot, and iris yellow fleck. These diseases affect a number of greenhouse and other ornamental crops, and can quickly be spread by the thrips. Also, since there are no cures for the viruses, crops may become unsellable.

References:

Cloyd, R. A., & Sadof, C. S. (2011, October). *Landscape & Ornamentals: Western Flower Thrips* [PDF]. West Lafayette, IN: Purdue University.

Cranshaw, W. (2004). *Garden insects of North America: The ultimate guide to backyard bugs* Princeton University Press.

Frank, S. D. (2009, July). NCSU: ENT/ort-72 Western Flower Thrips. Retrieved March 10, 2016, from <https://www.ces.ncsu.edu/depts/ent/notes/O&T/flowers/ort072e/ort072e.htm>

Terry, I., Beers, E. H. & Cockfield, S. (2007). *Western Flower Thrips*. Retrieved February 10, 2016, from <http://jenny.tfrec.wsu.edu/opm/displaySpecies.php?pn=240>