

Forest Health Extension Notes

Fall Cankerworm

Alsophilia pometaria

The fall cankerworm is a common native pest of nearly all kinds of deciduous forest, shade, fruit trees and shrubs. The larvae are often referred to as loopers or inch worms because of the distinct way they arch their bodies when moving along. The fall cankerworm is often confused with the spring cankerworm with the difference being that fall cankerworm adults (moths) emerge in the fall and spring cankerworm adults (moths) emerge in the spring. Outbreaks of this pest can last from 1 to 4 years, during which time the larvae can completely defoliate trees.



Fig. 1 Fall cankerworm larva.¹

Description

Adults:

Male cankerworm moths have a wing span of 25-35 mm and are dull gray-brown in colour. They are only active at dusk until nightfall. Female moths are about 12 mm in length, wingless, dull gray-brown and crawl from the ground up tree trunks where they emit pheromones to attract a mate. Each female will lay about 100 eggs on branches and twigs in the upper canopy.



Fig. 2 Adult male.²



Fig. 3 Adult female.³

Eggs:

The eggs are laid in flat, neat rows that encircle twigs or small stems. Individual eggs are barrel-shaped, shiny-gray in colour with a light brown ring circling a dark brown spot.



Fig. 4 Adult female laying eggs.⁴

Larvae:

Fall cankerworm larvae are about 3 cm long when full grown and range in colour from light and dark green to light brown or black. Darker colours are often indicative of a heavy infestation. They can be distinguished from the spring cankerworm by the three pairs of prolegs found at the end of their abdomen, as the spring cankerworm only has two pairs of prolegs. Larvae use their prolegs to "inch" along, as they arch their mid body and bring up the prolegs to meet the front (thoracic) legs, and then stretch their body flat again. Larvae also tend to have three small stripes on either side of the abdomen.



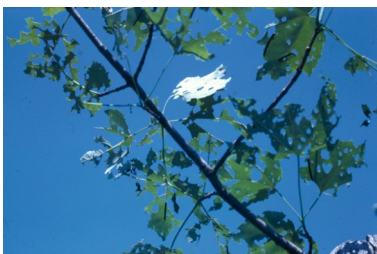
Fig. 5 Green and brown coloured larvae.⁵

Fig. 6 Larvae.⁶**Pupae:**

The pupae are dark brown in colour, 6-10 mm in length, and are wrapped in a cocoon of silk and soil particles. They can be found 2 to 10 cm below the soil surface.

Fig. 7 Pupa in open cocoon.⁷**Damage**

Fall cankerworm eggs hatch in late April or early May when the trees are beginning to leaf out. The young larvae chew 'shot-gun' holes in the leaves (similar to gypsy moth damage) or they feed on the tissue between the small leaf veins. As the larvae grow in size, they will feed on all leaf tissue except the midrib and major veins, essentially skeletonising the leaf. During severe outbreaks of this pest, entire trees may be defoliated. The damage caused by fall cankerworm, when combined with drought and other stressors can cause a rapid decline in the health of the tree, and even lead to tree mortality.

Fig. 8 Damage.⁸Fig. 9 Defoliation cause by fall cankerworm.⁹**Control**

Fall cankerworm damage can be controlled by placing sticky band or barrier around the trunks of trees in the fall to prevent the female moths from crawling up the trunks to lay their eggs. There are also several natural agents that control cankerworms including parasites, ground beetles, birds, as well as cold, wet weather in the spring.

Fig. 10 Banded trees.¹⁰Fig. 11 Moths on sticky trap.¹¹**References**

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Murray, Marion S., Hodgson Erin W. (2008). Cankerworms. *Utah Pests fact sheet – Utah State University Extension and Utah Plant Pest Diagnostic Laboratory*, 119, 1-4.

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Photo Sources:

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¹⁰ Image courtesy of G. Keith Douce, University of Georgia

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