

Pest Profile



Photo credit: Jim Kalisch, University of Nebraska-Lincoln; Keith Naylor, Bugwood.org

Common Name: Cabbage Looper

Scientific Name: *Trichoplusia ni*

Order and Family: Lepidoptera; Noctuidae

Size and Appearance: Cabbage looper larvae are a pale green color, but darken slightly as they age, with faint white stripes stretching the length of the body. Although larvae are hairy to begin with, as larvae mature the number of hairs decreases. Larvae move by arching their back, forming a loop, and then pushing the front section of their body forward. At maturity the larval body can measure three to four centimeters. Cabbage loopers can have four to seven instar stages, although the typical number is five.

The looper, in the pupal stage, will form a thin, white colored, fragile cocoon in one of three places: the underside of foliage, in plant debris, or in soil clods. Although the pupa begins as a green color, it turns dark brown or black shortly. The length of the pupa is approximately two centimeters.

Cabbage loopers are distinguished from other noctuid moths based on the forewing spots on the mottled gray-brown coloring. These silvery white spots are arranged in a U-shape with a circle or dot that are usually connected. The hindwings are not patterned like the forewings, but instead are light brown near the body, and dark brown nearing the edges. Adults have a wingspan of one and a half inches.

	Length (mm)	Appearance
Egg	0.6x0.4mm	Eggs have a hemispherical shape; yellowish to greenish in color; laid on foliage singly or in small groups; eggs have longitudinal ridges; females can lay 300-600 eggs.
Larva/Nymph	30-40mm	Pale green in color; have light white stripe along body; hairy at first but lose hairs as they grow; front of larva is narrower than the rear; 4-7 instars.
Adult	33-38mm	Mottled gray-brown color on forewings with silvery white spots in a U-shape with a circle that is connected; hindwings light brown fading to darker brown near the edge.
Pupa (if applicable)	20mm	Green changing to dark brown or black in color; forms thin white cocoon on foliage or nearby areas; pupa lasts 1-2 weeks.

Type of feeder (Chewing, sucking, etc.): Larvae: chewing; Adult: siphoning

Host plant/s: Although the name suggests that cabbage loopers feed on members of the Brassicaceae family, such as cabbage, they also feed on other plants. Vegetable crops that have also been damaged include tomatoes, peas, lettuce, spinach, squash, and peppers, along with many others. Flower crops, such as carnation, chrysanthemum, hollyhock, and snapdragon, can also be a host to the cabbage looper.

Description of Damage (larvae and adults): The larvae feed on the underside of outer leaves during the first three instars, and then chew large holes during the fourth and fifth instars. The pattern produced on thick-leaved plants looks like window-paning. Late stage larvae will sometimes tunnel into the heads of crops, damaging the yield.

References:

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