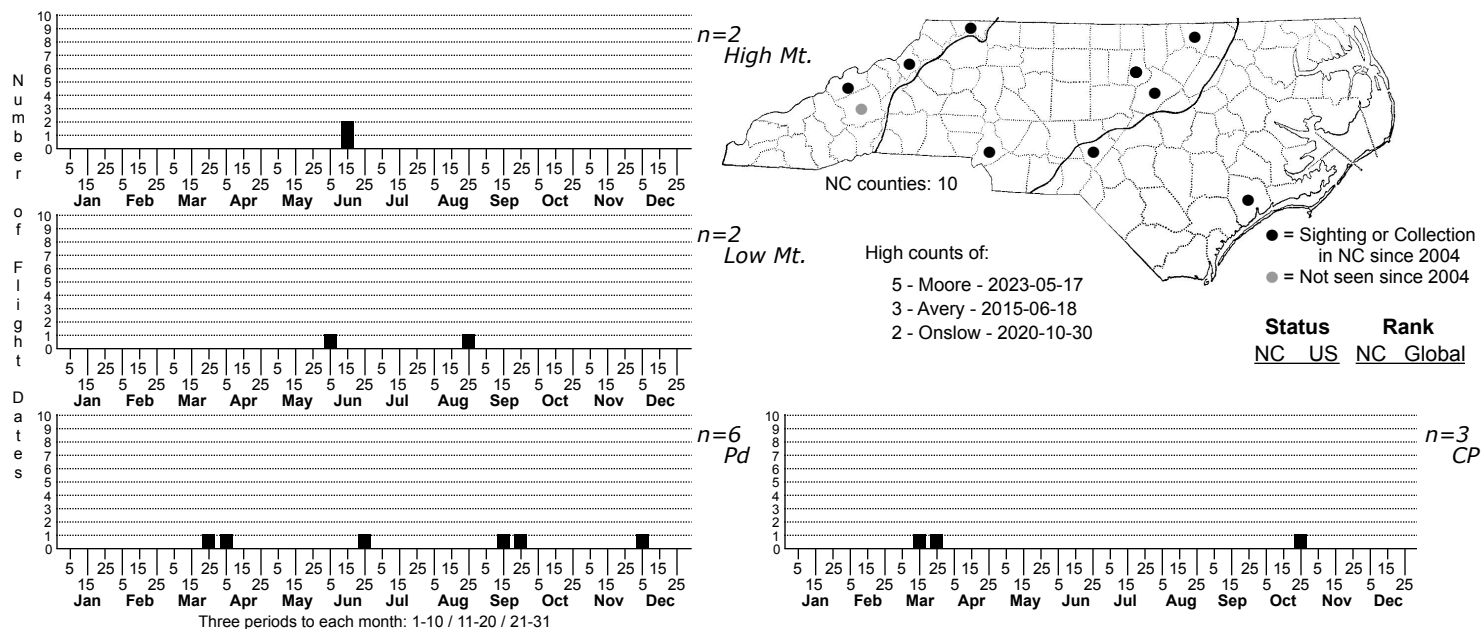


Caloptilia sassafrasella Sassafras Caloptilia Moth



FAMILY: Gracillariidae SUBFAMILY: Gracillariinae TRIBE: [Gracillariini]

TAXONOMIC COMMENTS: *Caloptilia* is a large genus with nearly 300 described species; 64 species have been described in North America north of Mexico. The larvae begin as leaf-mining sap-feeders, but the latter instars usually exit the mines and feed within a conical roll that begins at the leaf apex or at the tip of a leaf lobe. The frass is dark and granular.

FIELD GUIDE DESCRIPTIONS:

ONLINE PHOTOS:

TECHNICAL DESCRIPTION, ADULTS:

TECHNICAL DESCRIPTION, IMMATURE STAGES:

ID COMMENTS: The head, face, palps, and wings are all rather uniformly brown with a yellowish tinge. Two conspicuous dark spots occur on the costa -- one midway, and the other just before the apex. The femur and tibia of the front and middle leg are dark, while the tarsi are white with faint dots at the tarsal junctions. The rear leg is light tan with darker marks at the tarsal joints. This species resembles *C. rhoifoliella*, but the face and palps are dark, compared with the whitish face and palps of *C. rhoifoliella*. The two conspicuous dark costal spots also help distinguish this species from *C. rhoifoliella*. The forewings of *Caloptilia sassafrasella* are noticeably narrower than those of other *Caloptilia* species, which can be useful in identifying specimens.

DISTRIBUTION: *Caloptilia sassafrasella* occurs throughout much of the eastern US and southern Ontario. Our records for North Carolina are from the Blue Ridge and Piedmont, but this species likely occurs in the Coastal Plain as well since Sassafras occurs statewide.

FLIGHT COMMENT: This species is multivoltine. In North Carolina the adults become active following the spring leaf-out and can be found through November or early December.

HABITAT: *Caloptilia sassafrasella* is strongly associated with *Sassafras albidum*, which is the host species. Sassafras occurs in a wide variety of habitats in North Carolina. It is often an early successional species that occurs in old fields, field edges, roadsides and recently timbered sites. However, it also thrives in a variety of mesic or sub-mesic forest communities such as pine-oak forests or oak-hickory forests, particularly during early to mid-successional stages.

FOOD: Sassafras (*Sassafras albidum*) is the only known host for this species (Eiseman, 2019; Robinson et al. 2010)

OBSERVATION_METHODS: Adults are attracted to UV lights, and the larvae can be found by searching Sassafras leaves for the blotch mines or curled leaf shelters.

NATURAL HERITAGE PROGRAM RANKS: GNR S3S5

STATE PROTECTION: Has no legal protection, although permits are required to collect it on state parks and other public lands.

COMMENTS: