

Colorado Insect of Interest

Rubber Rabbitbrush Beetle

Scientific Name: *Trirhabda nitidicollis* LeConte

Order: Coleoptera (Beetles)

Family: Chrysomelidae (Leaf Beetles)

Identification and Descriptive Features: The iridescent dark blue larvae, which chew the foliage of rubber rabbitbrush (*Ericameria nauseosa*), are the most distinctive life phase. Adults are pale yellow beetles with black stripes and superficially resemble several other leaf beetles found in Colorado.

Distribution in Colorado: Statewide in prairie and foothills locations in association with its host plants, primarily rubber rabbitbrush (*Ericameria nauseosa*).

Life History and Habits: The rabbitbrush beetle spends the winter as eggs in small masses under ground. Eggs are stimulated to hatch by spring rains, and often egg hatch occurs in April or May. The larvae crawl up the plant to feed on the new foliage. Emergence is often scattered over a period of several weeks resulting in a range of larval stages.

When feeding is completed, the larvae move to the soil and pupate. Adults subsequently are present in June through the end of the summer. The adult beetles feed on the leaves at this time but cause little defoliation. Eggs are laid from July through September.

Occasionally severe outbreaks result in complete defoliation of rubber rabbitbrush plants, and some dieback/mortality may result. However, outbreaks are rarely sustained several natural enemies have been observed to feed on larvae, including lady beetles and predatory stink bugs.



Figures 1. Larva of the rubber rabbitbrush beetle.



Figures 2. Adult of the rubber rabbitbrush beetle.

Similar Species: Six other *Trirhabda* species are found in Colorado (Table 1). Three feed on goldenrod (*Solidago* spp.); the remaining species occur on rangeland shrubs.

Table 1. *Trirhabda* spp. leaf beetles found in Colorado

| Species | Host plants: |
|---------------------------------------|---|
| <i>Trirhabda borealis</i> Blake | <i>Solidago</i> spp. |
| <i>Trirhabda canadensis</i> (Kirby) | <i>Solidago</i> spp. |
| <i>Trirhabda convergens</i> LeConte | <i>Solidago</i> spp. |
| <i>Trirhabda geminata</i> Horn | <i>Encelia</i> spp. (brittlebush) |
| <i>Trirhabda lewesii</i> Crotch | <i>Chyrsothamnus</i> <i>viscidiflorus</i> (yellow rabbitbrush), <i>Ericameria nauseosa</i> (rubber rabbitbrush) |
| <i>Trirhabda nigriventris</i> Blask | <i>Artemesia tridentata</i> (big sagebrush) |
| <i>Trirhabda nitidicollis</i> LeConte | <i>Chyrsothamnus viscidiflorus</i> (yellow rabbitbrush), |



Figure 3. *Trirhabda lewesii* adult.