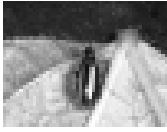


Sugarbeets XX-3-4

Flea Beetles

Gary L. Hein



flea beetle, adult

The most common flea beetle to damage sugarbeet in this region is the pale-striped flea beetle, *Systema blanda*. However, other species of flea beetles may be found damaging sugarbeet. Damage is sporadic, and flea beetle populations are often associated with other crops in the cropping rotation.

Identification (and life cycle/seasonal history)

The pale-striped flea beetle is about 1/6-inch long with a broad pale-white stripe on each wing cover. The most distinctive aspect of flea beetles is their ability to jump like fleas. This characteristic makes them rather difficult to see unless they are present in large numbers. Other flea beetles that could damage sugarbeet are somewhat smaller and are uniformly dark in color. Adult flea beetles are most likely to cause problems in May and June as the leaf area of the sugarbeet is limited and the impact of flea beetle defoliation is greatest.

Pale-striped flea beetle larvae overwinter in the soil and feed on seedlings in the spring. They are slender and white with a brown head. As soils warm in the spring they will begin to feed on root tissue.

Plant Response and Damage

Adult flea beetles produce characteristic shot-holing on the leaves of sugarbeet. These shot holes are round, uniform in size and may range from 1/16 to 1/8 inch in diameter. Damage is most severe during the early season when sugarbeet plants have small leaves. Extensive leaf feeding can eventually kill the leaves and perhaps the whole plant, especially if allowed to damage the growing point of the plant. As sugarbeet add foliage their susceptibility to damage by these insects is lessened.

Pale-striped flea beetle larvae feed on the roots of seedling sugarbeet. Their feeding damage appears like a darkened constriction on the roots, similar to black root.

Management Approaches

Flea beetle populations can be increased in certain rotations (following alfalfa and dry beans) or if host weed populations such as poverty weed, bindweed, and pigweed are

high. Avoid planting sugarbeet after alfalfa or in areas where flea beetle populations were high the previous year. Closely monitor beet fields planted near alfalfa fields or weedy areas as adults may move out of these areas into sugarbeet. In areas where flea beetle problems are more consistent, systemic insecticide treatments (e.g. soil-applied or seed treatment) can be used to reduce problems from these insects.

Product List for Flea Beetles:

Insecticide	Product per Acre	Preharvest Interval, remarks
Asana XL ^R	5.8-9.6 oz/A	Do not exceed 0.15 lb ai/A per season; PHI 21 days; REI 12 hours.
Lannate WSP ^R , LV ^R	WSP 0.25-1.0 lbs./A LV 0.75-3.0 pts./A	PHI 7 days; REI 48 hrs.
chlorpyrifos 4E ¹ (Lorsban plus generics)	2.0 pt./A	PHI 30 days; REI 24 hrs.
Methyl 4EC ^R (methyl parathion)	0.5-0.75 pts./A	PHI 20 days (60 days if tops fed to animals); REI 5 days.
Mustang MAX ^R Section 24c label in NE, CO, WY, MT	2.24-4.0 oz/A	Foliar applications. REI 12 hours; PHI 50 days.
Sevin ¹ (carbaryl, multiple formulation)	See labels for rates	PHI 28 days; REI 12 hrs.

^RRestricted use pesticide ¹Labeled for chemigation.

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Categories: Insects, Sugarbeets, Flea Beetles

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