Passionvine Hoppers & Sooty mould

Scolypopa australis

Sooty Mould develops on the honeydew excreted by the Passionvine Hopper, this mould causes large stains spreading from the top shoulder area of kiwifruit which result in the fruit being rejected at packing.

Note that sooty mould can also be caused by cicadas, though this marking is distinctive spotting usually on the side of the fruit.

Passionvine Hopper (PVH) have one cycle per year.

Adult Passionvine Hopper lay eggs in rows on and inside the dead canes/stems of a range of host plants (commonly ferns, bracken and blackberry) and on timber structures in the orchard.

In the Bay of Plenty the nymphs emerge from late October until early January. Nymphs cannot fly but hop, they take around 8 weeks, growing to be 5–6mm long before they mature into adults in early January.

Adult PVH can fly short distances and may disperse over an area up to tens of meters in distances.

Both nymphs and adults feed on the sap of host plants, secreting sugary honeydew, which develops into sooty mould.

A frosty winter may help kill eggs, while a late dry spring and summer encourage eggs to hatch and nymph survival.

Typical Symptoms of Plant Damage

Only the fruit is affected, not by the Passionvine Hopper directly, but rather from the mould that develops on its honeydew excretion.

Nests of PVH eggs may be visible on dead woody plant material of host plants surrounding the orchard.

Life Cycle Stages and Control

In winter eggs can be sprayed with contact chemicals and super-penetrants.

During mid-December, before the orchard becomes infested, systemic or contact sprays can be used outside the orchard on host plants.

In summer pyrethrum sprays can be used if monitoring indicates the presence of PVH in the orchard above threshold levels.

Often repeat applications will be necessary, although this may only be necessary in perimeter areas where PVH populations tend to congregate.

The cultural control option of managing and removing host plants is the best way to control PVH.

Host plants

In addition to their namesake, the passion fruit vine, PVH feed on a wide range of exotic and native plants.

Large populations can occur on citrus, kiwifruit, hydrangea, privet, tecomaria, jasmine, wisteria, tutu, mahoe, pigeonwood, kawakawa, flax and ferns.