Agriculture, Life & Veterinary Sciences & Cooperative Extension

Agave Plant Bugs

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Agaves are valuable ornamental plants for arid-adapted landscapes. No other landscape plant can match the form and colors available from the larger agave species. Several wholesale nurseries in the Phoenix area produce agaves for landscape use in the Southwest. Specialty nurseries in Tucson raise smaller and rare agave species for collectors and hobbyists. Agaves have a conspicuous presence in Arizona landscapes.

Agaves face relatively few pest problems, compared to other landscape plants. The most significant pest is the agave snout weevil, *Scyphophorus acupunctatus* (Vaurie, 1971). Another important, but often overlooked pest is the agave mite or grease mite. This is a tiny eriophyid mite in the genus *Oziella* (Parker, 2018).

Agave plant bugs are easier to observe and less damaging than the former two agave pests. The insects are sometimes referred to as running/runner bugs or run-around bugs because of their rapid movement to hiding places when they are approached or disturbed. They may also be called 'caulotops' in reference to their Latin name *Caulotops barberi*. This name has been recently changed to *Agaveocoris barberi* (Henry and Menard, 2020).

Description and ID: Agave plant bugs are true bugs belonging to the insect order Hemiptera, and family Miridae, which includes many plant-feeding species.

Agave plant bugs are minute, dark grayish-brown colored insects, slightly over ⅛ inch in length (Figure 1). Nymphs are smaller in size, and look similar, but have wing stubs (Figure 2a) instead of fully formed wings. The adults have dark wings, prominent eyes (Figure 2b) and a distinct triangular shape (which might need magnification to view) on the back, formed by the folding of their wings over the body. Although they have wings, the bugs prefer to run into hiding rather than fly when approached.

How do agave plant bugs damage agaves?

The adults and nymphs (immatures) suck sap from the leaves of agaves (Figure 3) using their fine, needle-like mouthparts, leading to minute yellow or tan scars at the point of feeding (Figure 4). Large populations can cause entire leaves to dry up and wither, and sometimes the entire plant can be affected. The bugs can be present in large numbers and will feed on both the upper surface and undersides of leaves.

Life history: Populations build up during mid to late summer. Eggs are laid on the undersides of the leaves of the host plants. Adult and nymphs feed voraciously by sucking sap. They will seek new plants when one host is exhausted. Agave plant bug populations can grow rapidly and easily spread to nearby agaves.

Figure 1. Adult agave plant bug showing body size. Photo: Michael Chamberland.


Figure 2. Left (a)-agave plant bug nymph showing wing stubs (Photo: Michael Chamberland). Right (b)-adult showing fully developed wings (Photo: Rebecca Senior).


Figure 3. Adult agave plant bug feeding on an agave leaf. Photo: Michael Chamberland.

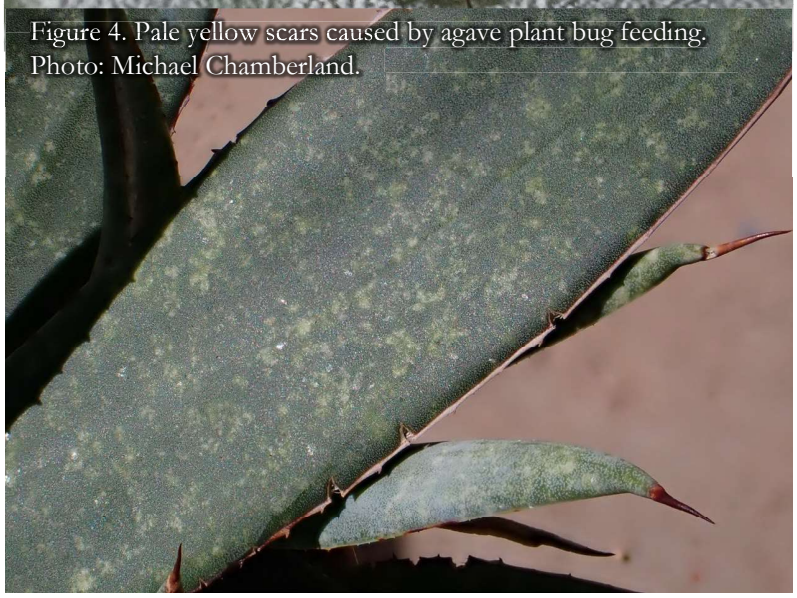
Figure 4. Pale yellow scars caused by agave plant bug feeding. Photo: Michael Chamberland.

Do I need to treat my agaves to get rid of agave plant bugs?

Agave plant bugs are occasional pests of agaves and similar succulents. Severe infestations can cause significant damage or even death of a plant. The scars left by feeding decrease the aesthetic appearance of plants (Figure 5). Scarred plants may be unsuited for sale even after the pests are eliminated. The leaves will not lose their scarring. The damaged appearance goes away only as scarred leaves are overtopped by healthy new leaves, which may require years of growth.

Figure 5. Extensive stippling on leaves of a potted agave plant. Photo: Shaku Nair.

Management:

- Monitor plants regularly, starting from late spring and watch for signs of agave plant bug infestation (scarring or stippling).
- If large numbers of bugs or scars are noticed, spraying with insecticidal soap or neem oil emulsion is helpful.
- Ensure that the spray solution reaches and covers all parts of the leaves, including the undersides because the bugs tend to hide there.
- Spray during cooler times of the day to avoid burning of leaves, especially in summer.
- Severely infested leaves or entire plants should be removed and discarded, or isolated (potted agaves) and treated until the infestation disappears.

Native biocontrol

Agave plant bugs are preyed upon by several naturally-occurring beneficial insects that keep their populations under check. These include garden spiders (Figure 6), damsel bugs, assassin bugs and predaceous stink bugs. Predators that specifically prey on agave plant bugs have not been recorded.

Figure 6. Several natural enemies such as garden spiders prey on agave plant bugs. Photo: Lince 6417, pxhere.com

Arizona is home to many agave species with a wide distribution in the state. Agave plant bugs are native to Arizona where they feed on native and cultivated agave species. Controlling agave plant bugs in landscapes does not eliminate the possibility of bugs returning from infested plants in cultivation or in the wild. However, wild agaves do not occur very close to Phoenix or Tucson. They occur mostly at higher elevations.

References, further information:

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