Vine Mealybug

A Serious New Pest in the San Joaquin Valley

he vine mealybug, *Planococcus ficus*, is a new pest in California vineyards and potentially a very serious one. It causes more damage and is more difficult to control than the common grape mealybug, Pseudococcus maritimus. Vine mealybug first showed up in 1994 in the Coachella Valley, and growers have experienced significant economic losses as a direct result of crop loss and pest control cost. Unfortunately, in 1998 vine mealybug was discovered in a few southern San Joaquin Valley vineyards and has since spread to others, although only a relatively few vineyards have been infested to date. The vine mealybug hasn't been found in Tulare and Kings Counties, and hopefully it never will be. It is imperative that growers become vigilant and informed so that we can identify new infestations and minimize the spread of the vine mealybug.

Contact either the county Agricultural Commissioner or Cooperative Extension office for identification if you come across a mealybug infestation that looks suspicious. The vine mealybug is most easily distinguished from the common grape mealybug by the appearance, distribution, and amount of honeydew produced. The vine mealybug produces profuse amounts of honeydew that resembles candle wax, and it is found on fruit, leaves, canes and trunk (along with black sooty mold). More information on how to recognize vine mealybug and tips on minimizing the spread of this potentially serious new pest are listed below. **Remember:** Take the necessary precautions to keep your vineyard free of vine mealybug.

Vine Mealybug Identification

- Produces large amount of honeydew (much more than grape mealybug).
- Honeydew resembles candle wax and is found on leaves, canes, fruit and trunk (sooty mold associated with honeydew).

- Mealybug is present on roots all year long, whereas grape mealybug is rarely found on roots.
- Vine mealybug has a short tail, whereas grape mealybug has wax filaments forming a distinct V shape at tail end.
- Presence of ants may be an indication of vine or grape mealybug.

Additional Information

- Mainly transported on equipment and infested plant material.
- More destructive and difficult to control than grape mealybugs.
- Hosts include fig, date palm, apple, avocado, citrus and some ornamentals, but the preferred host is grape (Vitis).
- Eradication from a vineyard is difficult if not impossible.
- Several insects have been found parasitizing the vine mealybugs.
- Do not French-plow infested rows because insect can be spread by moving infested soil.

Avoid Spread to Your Vineyard

- Do not move equipment or crews from infested vineyards into clean vineyards (mechanical harvesters, shredders, cane cutters, discs, French plows, mowers, etc.).
- If you have to move equipment from an infested vineyard into a clean vineyard, steam clean equipment and wait as long as possible before entering vineyard.
- Do not take cuttings from vineyards suspected of being infested.
- If you suspect you have an infestation, call your county Agricultural Commissioner or Cooperative Extension office or IPM specialist at the Kearney Agricultural Center for identification.



Grape mealybug adults and immatures.



Vine mealybug adult female with eggs.



Vine mealybug adult female with egg mass.



Vine mealybug adults and crawlers.



Vine mealybug adult female with egg mass.



Vine mealybug crawlers on an adult female.

Authors: Bill Peacock, Kent Daane, Bob Beede, Dennis Haines, and Joe Kretsch. Bill Peacock and Bob Beede are Tulare and Kings County farm advisors, Kent Daane is a UC Berkeley entomologist at the Kearney Agricultural Center, Dennis Haines is the Tulare County Agricultural Commissioner biologist, and Joe Kretsch is the IPM/BMP program coordinator for Sun-Maid Growers of California. **Photos by:** Jack Kelly Clark. **Funding** for this publication provided, in part, by the California Table Grape Commission.

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