

Missouri Environment & Garden

June 2009

Volume 15, Number 6

Bacterial Spot on *Prunus* Unappealing But Not Noxious

Bacterial spot is a common disease of peach, nectarine, apricot, and plum. This disease is caused by the bacterium *Xanthomonas pruni*. Bacterial spot is most severe after a wet spring. Rainfall during the three-week period following petal fall generally results in early-season fruit infection and the establishment of inoculum on new foliage and twigs of susceptible cultivars.

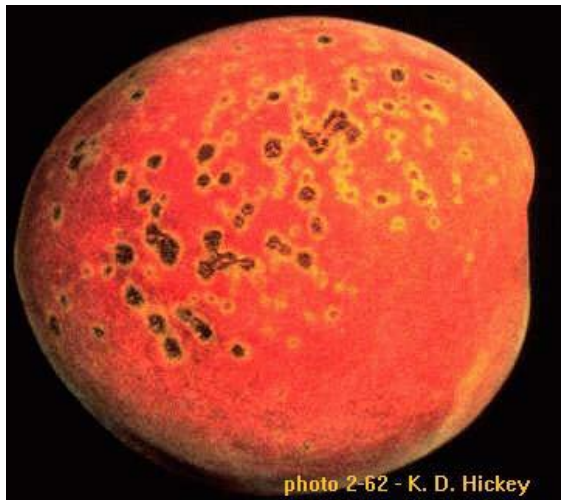


photo 2-62 - K. D. Hickey

Figure 1. Bacterial Spot found on peach. (Courtesy of K.D. Hickey)

Fruit infections appear as small purple or black flecks on the fruit surface of peaches and apricots, and as water-soaked spots on nectarines and plums. Later, pitting and cracking may occur around the spots. While infections adversely affect the appearance of the fruit, the flesh is safe to eat. Removing the peel will eliminate the lesions and make the fruit more attractive when serving it as a fresh dessert.

Spring infections develop into darkened blisters near the tips of the twigs of last season's growth. In some years, twig tip injury is so severe that the terminal bud fails to open, resulting in dead shoot tips on the tree. Summer infections cause irregularly-shaped dark sunken lesions on the current season's shoots.

The best way to avoid this disease is to plant cultivars with the highest resistance. For peach, these cultivars include Belle of Georgia, Biscoe, Candor,

The first signs of bacterial leaf spot are water-soaked angular spots on the leaves, which may only be visible when viewed with a light source behind the foliage. These spots are generally found near the tips of the foliage, but they may also be present along the mid-vein or margin of the leaves. Within a few weeks, the spots darken. Eventually lesions drop out of the leaves, leaving a "shot hole" appearance. Severe infections may result in defoliation and a gradual tree decline.



photo 2-63 - J. Springer

Figure 1. Bacterial Spot found along tips and vein of leaf. (Courtesy of J. Springer)

Comanche, Dixired, Earliglo, Encore, Garnet Beauty, Harbelle, Harbinger, Harbrite, Harken, Loring, Redhaven,

Continued on page 44

In This Issue

**Bacterial Spot on *Prunus*
Unappealing But Not Noxious**
Page 39

Irrigating Home Lawns
Page 40

In Praise of Peas
Page 42

**Clinic Update: May Samples at
the Diagnostic Clinic**
Page 44

**Guttation: A Pressure Relief for
Plants**
Page 45

July Gardening Calendar
Page 46

Bacterial Spot on *Prunus* Unappealing But Not Noxious continued from page 39

Redkist, Redskin, and Sunhaven. Some of the most susceptible peach cultivars are Autumn glo, Elberta, Halehaven, July Elberta, Jersey Queen, Kalhaven, Redcrest, Rio-Oso-Gem, Suncrest, and Sweet Sue. Most apricot and many nectarine cultivars are susceptible to bacterial spot. However,

Harcot and Harglow apricots and Flamin' Fury PF-11, Stark Summer Beaut, and Hardired nectarines have good resistance to this disease. Foliar sprays of zinc sulfate plus lime, or fall applications of copper with or without lime do not provide reliable control, and can sometimes cause foliar and

twig damage. Antibiotic products are available for commercial producers.

*Michele Warmund
Professor of Horticulture
Division of Plant Sciences
WarmundM@missouri.edu*