

POWDERY MILDEW / RUSTY SPOT

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Two species of powdery mildew fungi, rose mildew, *Sphaerotheca pannosa* (Wallr. ex. Fr.) Lev., and apple mildew, *Podosphaera leucotricha* (E & E) Salm, are minor diseases of peach in the Southeast. Rose mildew is more common and damaging on peach in the Southeast. The disease, sometimes referred to as rusty spot, is primarily seen on the fruit. Leaf and shoot symptoms may occur on nursery stock. When young peach fruit become infected, white powdery areas appear (Figure 1). As fruit maturity advances, the spots turn dark red to brown and the surface of the fruit becomes rusty. By harvest, the rusty spot becomes less distinct. Peach fruit are susceptible to mildew only during the early stages of development. Just prior to pit-hardening, the fruit becomes resistant to mildew infection.



Figure 1. Powdery mildew on green peach fruit.

The mildew fungus overwinters in dormant peach buds and on alternate hosts. In spring, peach shoots arising from infected buds become infected. The mildew grows and sporulated-conidia (spores) are carried by wind to young green leaves where secondary infections are initiated. Wild roses around peach orchards can serve as the source of disease. Powdery mildew is favored by moderate temperatures (66° to 72°F) and moderate to high relative humidity (43% to 100%).

Avoiding mildew-susceptible varieties where choices are available can reduce this disease, as can removing rose plantings near orchards and spraying with an effective fungicide.

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