

(revision date:3/10/2017)

## *Rose: Powdery mildew*

*Use Integrated Pest Management (IPM) for successful plant problem management.*

### ***Biology***

Powdery mildew is a fungus attacking leaves, stems, and flower parts. Usually young growth is most severely affected. Reddish, blister-like areas on the upper side of leaves are followed by powdery white growth, which can appear on either side of the leaf. Infected young leaves are often distorted. Flowers and stems also display the white growth. Some varieties of roses may drop infected leaves, while others are more resistant to powdery mildew. The disease is most active during cool, dry, cloudy weather.

### ***Management Options***

#### **Non-Chemical Management**

- ~ Plant disease-tolerant or disease-resistant varieties. (See list in PNW Disease Management Handbook.)
- ~ Watch for signs of infection during appropriate weather conditions.
- ~ Pick off infected leaves to prevent spread of disease.
- ~ Gather and destroy all fallen leaves.
- ~ Prune out and destroy infected canes at end of season to prevent overwintering of disease.
- ~ Space plantings and prune to provide good air circulation.
- ~ Avoid overfertilizing, which encourages susceptible new growth. If necessary, switch to a slow-release or lower-nitrogen formula.

*Select non-chemical management options as your first choice!*

#### **Chemical Management**

***IMPORTANT: Visit Home and Garden Fact Sheets for more information on using pesticides***

Apply foliar fungicides during the growing season, starting in early season when young growth first appears. Do not apply oil products with or near a sulfur application. Sulfur is effective especially between 65 and 85 F, but may cause injury to plants if applied when temperatures are above 85 F.

**Listed below are examples of pesticides that are legal in Washington. Always read and follow all label directions.**

- ~ Bi-Carb Old-Fashioned Fungicide [Organic]
  - active ingredient: *potassium bicarbonate*
  - EPA reg no: 54705-10
- ~ Bonide Infuse Systemic Disease Control
  - active ingredient: *propiconazole*
  - EPA reg no: 100-773-4
- ~ Bonide Infuse Systemic Disease Control Lawn & Landscape
  - active ingredient: *thiophanate methyl*
  - EPA reg no: 53883-183-4
- ~ ferti-lome Liquid Systemic Fungicide II R-T-Spray
  - active ingredient: *propiconazole*
  - EPA reg no: 53883-184-7401
- ~ Hi-Yield Snake Eyes Dusting Wettable Sulfur
  - active ingredient: *sulfur*
  - EPA reg no: 7401-188-34911
- ~ Lilly Miller Sulfur Dust Fungicide/Insecticide Dust or Spray
  - active ingredient: *sulfur*
  - EPA reg no: 802-16
- ~ Monterey Horticultural Oil [Organic]
  - active ingredient: *mineral oil/pet distillate light*
  - EPA reg no: 48813-1-54705

- ~ Safer Brand Garden Fungicide/Flowers, Fruit & Vegetables Conc
  - *active ingredient: sulfur*
  - *EPA reg no: 42697-37*
- ~ This list may not include all products registered for this use.

*Rose: Powdery mildew*

*Images*



*~ Caption: Powdery mildew on rose  
~ Photo by: R.S. Byther*



*~ Caption: Powdery mildew on rose stems and  
buds  
~ Photo by: R.S. Byther*



*~ Caption: Powdery mildew on rose leaves  
~ Photo by: R.S. Byther*