#### Root and stem rots

## Sclerotium or southern blight

Pathogen: Sclerotium rolfsii.

### **Hosts include:**

Ajuga, Anemone, Aquilegia, Campanula, Coreopsis, Delphinium, Dianthus, Digitalis, Helianthus, Hosta, Lathyrus, Liatris, Lilium, Limonium, Lupinus, Monarda,



Collapse of lower leaves.

Penstemon, Phlox, Rudbeckia, Salvia, Scabiosa, Sedum and Veronica.

**Symptoms**: Wilting, water-soaked lesions on succulent stems and petioles, crown rot, plant collapse and death. Fluffy fungal mats may be present on the soil surface or on affected plant tissues. Light brown sclerotia, about the size of mustard seeds, may also be present in clumps on the affected plant tissue.

# Sclerotium/southern blight - continued

Typical chlorosis caused by Sclero-tium rolfsii infection on Hosta. Chlorosis develops as the petioles are degraded by the fungal pathogen.



**Spread**: This is a soil-borne pathogen. Moving soil or diseased plant material spreads the disease. The pathogen can persist for an extended time in soil as sclerotia. During hot, humid conditions, sclerotia germinate, producing fungal mats that can infect susceptible hosts. *Sclerotium rolfsii* rarely produces spores, so dispersal by air movement is not significant.

Hyphae and sclerotia are visible on this rotted hosta petiole.



# Sclerotium/southern blight - continued



Sclerotia look like mustard seeds on the soil surface surrounding the crown of a rotted plant.

Management: Good sanitation and pathogen exclusion are important steps in limiting disease. Carefully inspect incoming plant material for signs of disease. Remove and destroy affected plants, and avoid spreading soil from infected areas. Mulch used around field-grown plants or plants in the landscape may favor growth of *S. rolfsii*. Limit use of mulch in sites with a history of *S. rolfsii*. Fungicide applications (drenches or incorporated granular materials) can be used preventively to control crown rot.

Resource for additional information: Crown Rot, A Serious Disease of Hosta and Other Ornamentals, an Iowa State University Extension publication, February 2000.