Corn blight

Scientific name; *Southern corn leaf blight (SCLB) is a fungal disease of maize caused by the plant pathogen Bipolaris maydis (also known as Cochliobolus heterostrophus in its teleomorph state).*

Southern corn leaf blight is caused by the fungus Bipolaris maydis. There are two races of the pathogen. Race O normally attacks only leaves. Lesions are tan, somewhat rectangular in shape, and have reddish-brown margins. Race T attacks leaves, husks, stalks, leaf sheaths, shanks, ears, and cobs. Race T lesions are rectangular to elliptical (¼ to ½ inch wide by ¼ to ¾ inch long) with a reddish-brown border that may be surrounded by a chlorotic zone. Stalk and leaf infections initially appear as purple spots that develop tan-gray centers. Ear infections result in a gray-black lesion on the husk that extends into the kernels, appearing as a black felt-like mold. Seedlings from infected kernels are often blighted.

Resistant hybrids and inbreds are available. Foliar fungicides labeled for southern corn leaf blight are available.

Symptoms

Typical symptoms of northern corn leaf blight are canoe-shaped lesions 1 inch to 6 inches long. The lesions are initially bordered by gray-green margins. They eventually turn tan colored and may contain dark areas of fungal sporulation. The length or size of lesions may vary with in different corn hybrids reactions with different resistance genes. Lesions begin on the lower leaves and then spread to upper leaves. Severe symptoms can progress rapidly, resulting in blighted leaves. The disease can be confused with symptoms of Goss's leaf blight on some hybrids, and perhaps with Stewarts wilt where this disease occurs.

Conditions and timing that favor disease

The disease is most prevalent during moderate temperatures (64 to 80 degrees F) with prolonged periods of moisture. It typically appears at or after silking, but the disease is usually more severe when infection occurs earlier.

Disease management

Use resistant hybrids. Fungicides may be warranted on inbreeds for seed production during the early stages of this disease. Crop rotation and tillage practices may be helpful in some cases.