Corn Diagnostics Quick Guide: Goss's Wilt vs. Northern Corn Leaf Blight

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Goss's Wilt



Symptoms and Signs

- 1. Bacteria: Clavibacter michiganensis subsp. Nebraskensis
- 2. Gray or yellow stripes on leaves
- 3. "Freckles" = brown or green irregular spots when held up to light
- 4. Symptoms can appear at the top of the plant first
- 5. Vascular tissue discolored Orange hue
- 6. Bacterial ooze, dried ooze, and/or bacterial streaming evident

Favorable Conditions

- 1. Overwinters in corn residue
- 2. Reduced tillage = increased risk
- 3. Continuous corn rotation
- 4. Susceptible hybrids
- 5. Hail, wind, or severe weather events that cause injury

Management

- 1. Use hybrids appropriate for your region with the highest rating for Goss's Wilt
- 2. Manage old corn residue
- 3. Rotate, rotate, rotate
- 4. DO NOT use a fungicide
- 5. Foliar products marketed for Goss's wilt control, have not proven effective in University research trials

Northern Corn Leaf Blight



Symptoms and Signs

- 1. Fungus: Exserohilum turcicum
- 2. Cigar-shaped leaf lesions parallel to leaf veins pale gray to tan
- 3. Dark gray spores within lesions when conditions are moist
- 4. Symptoms appear on lower leaves first
- 5. Infection while leaves are in the whorl= banding leaf lesion patterns
- 6. Lesions can form on outer husks of ears

Favorable Conditions

- 1. Overwinters in corn residue
- 2. Reduced tillage = increased risk
- 3. Extended rainy periods = increased risk
- 4. Favored by moderate temperatures (64 81F)

Management

- 1. Use resistant hybrids single and multigene resistance available
- 2. Resistance does not = immunity; lesions can still form
- 3. Manage old corn residue
- 4. Rotate, rotate, rotate
- Fungicide application for best economic return, apply at VT-R1 growth stage to protect ear leaves from infection



