
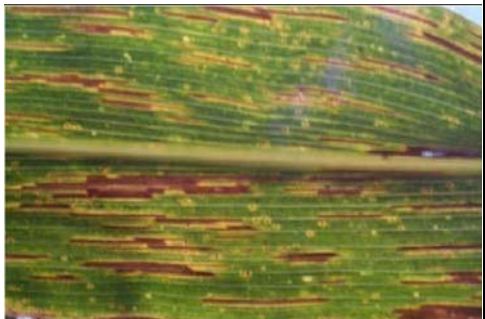






**Disease name:** Maize grey leaf spot

<p><b>Description</b></p>	<p>Grey leaf spot (GLS) is a fungal disease that can greatly lower maize yields since it reduces the photosynthetic leaf area. In Kenya, the disease is caused by <i>C. zeina</i> but there are a few instances in which <i>C. sorghi var. maydis</i> (another different fungus) has been isolated from typical GLS lesions on maize.</p>	
<p><b>Diagnosis/Identification</b></p>	<ul style="list-style-type: none"> <li>• Initial symptoms appear as small, tan spots often with a yellow halo when viewed through transmitted light.</li> <li>• Pale brown or grey to tan, long narrow streaks as a result of elongation of spots.</li> <li>• Dark, greyish-brown rectangular lesions as streaks expand. Both secondary and tertiary leaf veins limit the lesion width, making the lesions run parallel to the leaf veins; this is a characteristic feature of GLS.</li> </ul> <p>The symptoms develop from the lower leaves and progress up the plant as environmental conditions favour secondary infections. Extensive leaf blighting may occur until all the leaves are killed, finally resulting in stalk breakage and lodging.</p>	
<p><b>Photo Gallery</b></p>	 <p>Initial necrosis of lesions</p>	 <p>Brown necrotic lesions</p>

	 <p>Tan-coloured necrotic lesions</p>	 <p>Blighting of leaves due to severe GLS infection</p>
<p><b>Management</b></p>	<p>Effective management of GLS involves the integration of a number of disease control measures. The following management options are recommended:</p> <ol style="list-style-type: none"> <li>1. Destroy diseased plant remains (e.g. by ploughing soon after harvesting dry maize to bury the residues in order to reduce the survival of the fungi, thereby preventing attacks on a subsequent season’s crop. Removal of lower leaves (if they are heavily attacked) is also useful in reducing disease spread.</li> <li>2. Practise rotation with crops such as soybeans, tobacco, cotton, groundnuts, wheat and barley to delay initial infections by grey leaf spot.</li> <li>3. Plant tolerant varieties e.g. H614D, H625F, H627.</li> <li>4. Use fungicides containing azoxystrobin and difenoconazole (e.g. AMISTAR TOP 325 SC or Ortiva Top 325 SC).</li> </ol> <p><b>Note: Agro-chemicals should be used in consultation with professional practitioners and considering existing cautionary/safety measures, particularly the manufacturer’s instructions.</b></p>	
<p><b>References</b></p>	<ul style="list-style-type: none"> <li>• Kinyua, Z.M., J.J. Smith, G.N. Kibata, S.A. Simons and B.C. Langat (2010). Status of grey leaf spot disease in Kenyan maize production ecosystems. African Crop Science Journal 18: 183 – 194. (Google for PDF of the paper).</li> <li>• <a href="http://www.researchintouse.com/nrk/RIUinfo/PF/CPPO4.htm">http://www.researchintouse.com/nrk/RIUinfo/PF/CPPO4.htm</a></li> <li>• <a href="http://www.bioline.org.br/request/cs10022">http://www.bioline.org.br/request/cs10022</a></li> </ul>	
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