



Fusarium Wilt

About Fusarium Wilt

Fusarium wilt is caused by the soil inhabiting fungi. The Fungi enters through the plant roots and spreads up into the stems and leaves. As the infection spreads, the plant vessels becomes plugged and wilting occurs. Wet conditions and temperatures between 70 and 80 degrees favor disease development. The disease spreads by contact and by the movement of contaminated seeds, soil, plants and equipment when transplanting.



Damage

Initially, lower leaves turn yellow and then brown and then plants begin to wilt. Wilting begins on one side of the plants leaves and then spreads to the other side as the infection develops. The tomato plant may die if the disease is not controlled.

Infected plants may not produce any fruit, or may only produce deformed fruit that has no taste.

Note: Symptoms of Fusarium and Verticillium wilts are similar

Solutions

Cultural control

1. Use resistant tomato varieties.
2. Limit the spread of infested soil by cleaning farm equipment.
3. Avoid root knot nematode infestations because nematode feeding can overcome the plant resistance to Fusarium wilt.
4. Rotate crops for several years to reduce inoculum levels. However, Fusarium is long-lived.
5. If you suspect a plant is infected, destroy it immediately.



Fusarium wilt causes leaves on one branch of infected plant to turn yellow. Photo by J Clark.

Chemical control Currently there are no chemicals labeled for control of this disease.

Prepared by Frank Zalom, Mark A Bell and Masooma Azam, 2008

Reference: Statewide IPM Program, Agriculture and Natural Resources, University of California <http://www.ipm.ucdavis.edu/index.html>

For more information visit: International Programs <http://ipm.ucdavis.edu>

Copyright © UC Regents Davis campus, 2012. All Rights Reserved.