



# Pine Wilt Identified in Cheyenne



Pine wilt was recently confirmed within the city limits of Cheyenne and threatens non-native pine species, such as Austrian pine, Scotch pine and mugo pine. Colorado State University's plant diagnostic clinic positively identified the pinewood nematode (PWN) in a mugo pine sample submitted by the Cheyenne Urban Forestry Division.



Pine sawyer beetle holes and blue stain

PWN is native to North America and does not affect the health of native pines, however when introduced into exotic pines the PWN colonizes the sapwood and causes a fatal wilt disease. The PWN is a microscopic organism that is transported from tree to tree by the pine sawyer beetle which is also called a long-horned beetle due to its abnormally long antennae. The needles of infected trees typically turn from gray-green to tan and eventually brown in late summer to early fall. The dead needles remain attached to the tree throughout the winter. When cut, diseased wood is very dry and blue-stain fungi and pine sawyer beetle galleries are prevalent. Although these are strong indicators of infection, the only way to diagnose

pine wilt, is to submit a sample to a plant diagnostic lab.

Diseased trees should be cut down before the pine sawyer beetle emerges, which is usually in late May. Diseased trees should be chipped, burned or buried. Logs from diseased trees should not be sold, transported outside the area or held past the spring. Pine sawyer beetles are strong flyers, therefore have great potential to spread the disease.

Two insecticides labeled for pine wilt prevention have shown good effectiveness in protecting trees from the disease. Abamectin and emamectin benzoate must be injected into the stem by mid to late April, before the flight of the pine sawyer beetle. Professional arborists have the injection systems and the appropriate training and licensing to carry out tree injections. A list of licensed arborists in Cheyenne can be found at [www.cheyennetrees.com](http://www.cheyennetrees.com). Residents are encouraged to call the Cheyenne Urban Forestry Division at 637-6428 with any questions regarding pine wilt.



Adult pine sawyer beetle



Dead Austrian pine holding its needles through the winter