Commercial: Fall Orchard Chores

October 7, 2016



Click Here to view the pdf version

JUST THE BASICS: Commercial

GENERAL:

- Mow fallen fruit to reduce pest pressure for next year.
- Mow tall weeds around trees to reduce rodent problems and deer rubbing.
- Make sure all new plantings get white paint (50% latex/50% water) from the base of the tree to scaffold limbs, to prevent sunscald.
- Irrigate this fall before the ground freezes.

APPLE AND PEAR

• To reduce codling moth for next year, remove bins and debris from the orchard after harvest

PEACH/NECTARINE

• Prevent new coryneum blight (shothole infections this fall by applying copper to trees when 50% of the leaves have fallen. Use enough pressure to blow off existing leaves.

Commercial Information

APPLE/PEAR

Pear Psylla Hosts: pear Early fall is a good time to treat for pear psylla before the adults migrate to protected areas in leaf litter or on tree bark for the winter.

To determine whether a post-harvest treatment is necessary, examine one shoot on at least 20 trees in your orchard (or 20 shoots on 1 to 2 trees) for the presence of nymphs (usually sitting in a drop of honeydew). If activity is seen on at least 5 shoots, a treatment is warranted. Oil or carbaryl are options.



Pear psylla adults are hardly visible to the naked eye. The nymphs (young) feed in a bubble of sap (honeydew), and cause the leaf to die at the feeding area.

Fire Blight Hosts: apple, pear

Thankfully, this spring was not a heavy fire blight season. But as fall approaches, it is still important to inspect orchards for fire blight cankers. They are easy to spot because the leaves remain attached to the dead shoots.

The infected shoots should be pruned out when you conduct your normal late winter pruning. At that time (when trees are dormant), it is not necessary to sterilize your pruners between cuts, and affected shoots and branches should be removed 10-12 inches below the visibly diseased tissue. If you are diligent about removing as much fire blight as possible, you are lessening the chances of an outbreak for next season.



Fire blight-affected shoots are easy to spot in fall and winter because the leaves remain attached.

PEACH/NECTARINE/CHERRY

Coryneum Blight

Hosts: peach/nectarine, plum, apricot

The time to treat coryneum blight this fall is when 50% of leaves have dropped. Use a high-pressure sprayer to knock the rest of the leaves off the tree. Options include:

- fixed coppers or copper sulfate (Kocide, C-O-C-S, etc.)
- chlorothalonil or Ziram

When leaves drop, they leave a small open scar, and if any spores land on those scars under the right weather conditions, the fungus will invade the tissue and kill the bud. It is these infections that then lead to new leaf and fruit infections the following spring.

If any orchards have severe infections, it will take at least three years of diligent fall, spring, and summer treatments to suppress the disease incidence.

Bacterial Canker (*Pseudomonas syringae*)

Hosts: sweet cherry; rarely on peach

Like coryneum blight, new bacterial canker infections can enter trees through leaf scars in the fall. Research out of Oregon State University has shown that an application of fixed copper or Bordeaux Mixture in mid to late October can help reduce the incidence of this disease the following spring.

Bacterial canker is a disease of young sweet cherry trees, or mature cherries affected by winter injury or other factors that cause wounds. The bacteria invade bark and phloem tissue, causing cankers that can grow to eventually kill large branches or the entire tree.

Sweet cherries that show oozing sap from dead buds and twigs, along with clusters of dead leaves or dead shoots, typically means an infection by bacterial canker.



Bacterial canker on sweet cherries enters through wounds, such as winter injury, causing gumming and death of buds, twigs, and large limbs. Spray affected trees with copper in the next week or two.

Production Information

FALL ORCHARD CHORES

Keep roots moist: At this time of year, leaves on trees are changing color and dropping, while underground, major root growth is occurring. So it is important to maintain adequate but not excessive soil moisture from now until the soil freezes for winter.

Do not fertilize now: Roots will continue to grow all through fall, but nutrient uptake essentially ceases after the leaves have dropped. It is too late for any fall fertilizer applications, as whatever is applied will leach out of the soil.

Tree removal: Trees suffering from significant insect, disease, or other problems should be removed now. There is still time to install a replacement planting this fall.

Protect from mice, voles: Create or maintain at least 3 feet of clear space from around the base of each tree to help minimize rodents from feeding on bark and roots. Young trees are particularly susceptible to girdling because their trunk circumference is so small. Consider installing a physical barrier around the trunk and down into the soil up to 6 inches.

Prevent winter sunscald: In late winter, bark can be warmed by intense sunlight. If this warming is followed by a cold spell that night, the bark can be killed. Sunscald is one of the primary problems affecting young trees in Utah and is a major factor in the incidence of cytospora canker or flatheaded borers. Protect trunks by applying white tree wrap or painting the trunk and lower scaffold limbs with a 1:1 mixture of white latex paint to water. If using tree wrap, remove it in early April.



The upper scaffold limbs of this peach tree were affected by sunscald many years ago. This type of injury often is not apparent until a few years late. It can serve as an entry for canker-causing diseases.





<u>Precautionary Statement</u>: Utah State University Extension and its employees are not responsible for the use, misuse, or damage caused by application or misapplication of products or information mentioned in this document. All pesticides are labeled with ingredients, instructions, and risks. The pesticide applicator is legally responsible for proper use. USU makes no endorsement of the products listed herein.

Utah State University is an affirmative action/equal opportunity institution.