UPCOMING EVENTS

Mushroom Cultivation Workshop
March 21, 2019

John C. Pair Horticulture Research Cntr., Haysville
Discover easy, low-cost methods for growing delicious gourmet mushrooms such as shiitake, wine cap, and oyster. Learn how to inoculate logs and wood chip beds so that you can harvest and sell your own mushrooms year after year! For more information, go to https://hnr.k-state.edu/extension/info-center/newsletters/Mar5_2019_9.pdf

VEGETABLES

Controlling Weeds in Home Garden Asparagus Beds

The best time to control weeds in asparagus is early spring before the asparagus emerges. A light tilling (or hoeing) that is shallow enough to avoid the crowns will eliminate existing weeds. Many gardeners like to mix in organic matter during the same operation.

Herbicides can be used before asparagus emerges. Glyphosate (Roundup, Killzall) will kill weeds that are actively growing, and the preemergence herbicide trifluralin can be used to kill weed seeds as they germinate. Trifluralin is found in several products, but not all of them list asparagus on the label. Those that do have asparagus on the label include Miracle-Gro Weed Preventer Granules and Monterey Vegetable and Ornamental Weeder. Mulch can also be used to keep weeds from invading.

No herbicides can be used during harvest. The end of harvest presents another opportunity. Remove all fern and spears and apply glyphosate (Roundup) to control virtually all of the weeds present. Past the harvest season and after regrowth of the asparagus, options are limited. Products that contain sethoxydim can be applied to asparagus to kill grassy weeds. Sethoxydim has no effect on broadleaves including asparagus. Two sethoxydim products available to homeowners and labeled for asparagus are Monterey Grass Getter and Hi-Yield Grass Killer. With broadleaves, the only option is to pull them and look forward to next year. (Ward Upham)
Remove Fern and Fertilize Asparagus

If you haven’t removed last year’s growth from asparagus plants, now is the time. Asparagus comes up around the first of April in Manhattan but will be earlier in southern Kansas and a bit later further north.

Asparagus benefits from a fertilizer application in early spring. Fertilize according to a soil test or add 1 to 2 pounds of a 10-20-10 or 11-15-11 fertilizer per 20 feet of row before growth starts. If a soil test shows that only nitrogen is needed, apply 1 pound of a 16-0-0 product or ½ pound of a 30-4-5, 27-3-3 or similar fertilizer per 20 feet of row. Most of these high nitrogen fertilizers are lawn fertilizers but will work well for this purpose if they do not contain a weed preventer or weed killer. Incorporate lightly with a tiller or rake in fertilizer before spears emerge. Fertilize again with a high nitrogen fertilizer at the same rate suggested above after the last harvest. The fertilizer should be watered in with 1/4 inch of water. (Ward Upham)

FRUIT

Frost Tolerance of Apricots and Peaches

Growers of apricots and peaches often wonder at what temperature fruit buds are killed especially in years where we have an early spring. These two tree fruits bloom very early and are often caught by a late frost. The following will give you some guidelines but remember that the actual damage is going to be influenced by the weather before the temperature drops. An extended warm spell before the cold snap may result in more damage due to a loss in cold hardiness. The stages listed are for the fruit buds.

<table>
<thead>
<tr>
<th>Apricot</th>
<th>10% Kill (°F)</th>
<th>90% Kill (°F)</th>
</tr>
</thead>
<tbody>
<tr>
<td>First white</td>
<td>24</td>
<td>14</td>
</tr>
<tr>
<td>First bloom</td>
<td>25</td>
<td>19</td>
</tr>
<tr>
<td>Full bloom</td>
<td>27</td>
<td>22</td>
</tr>
<tr>
<td>In the Shuck</td>
<td>27</td>
<td>24</td>
</tr>
<tr>
<td>Green Fruit</td>
<td>28</td>
<td>25</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Peach</th>
<th>10% Kill (°F)</th>
<th>90% Kill (°F)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Swollen bud</td>
<td>18</td>
<td>2</td>
</tr>
</tbody>
</table>
Half-inch green | 23 | 5  
Pink | 25 | 18  
Bloom | 27 | 24  
Petal fall | 28 | 25  
Fruit set | 28 | 25  

To check for low temperature injury to fruit buds or blossoms, use a sharp knife and cut them in half longitudinally (from top to bottom). If the tiny seed in the center is white to cream color no damage has been done. But if the seed in several buds or blossoms is dark brown or black, it has been killed.

It is possible to give some protection to blossoms from freezing by covering the tree with a bed spread, blanket or similar fabric. It is best of the material reaches the ground so that heat given off from the soil is captured. Old-fashioned Christmas lights distributed through the tree will help to give added protection. The newer, smaller Christmas lights do not give off enough heat and are not recommended. Of course the practicality of this method of protection depends upon the size and number of trees and access to electricity.

Sprinkling the tree with water throughout the freezing period can also protect the blossoms. Sprinklers should be started before the temperature drops to freezing to be sure ice does not block the garden hose or water line. Continue until the temperature warms. With this protection method, there is the potential of creating an ice storm. If temperatures remain below freezing for several hours, ice will accumulate on the branches and limbs. The weight from the ice may cause branches and limbs to break causing severe, and possibly permanent, damage to the tree structure. Also, if water drainage from the soil is slow and the water displaces oxygen from the roots, damage to trees may result. (Ward Upham)

**TURFGRASS**

**Why Seeding Cool-Season Grasses in the Spring is Difficult**

People often wonder why we recommend seeding cool-season grasses such as tall fescue and Kentucky bluegrass in the fall. It would seem that the spring would be the more natural time for seeding because the entire growing season is available for the grass to become established before the turf has to deal with winter. Actually there are a number of reasons that tend to make fall seedings more successful.

*The soils are warmer in the fall.* Warm soils mean less time required for germination and growth so the grass becomes established more quickly. I have seen tall fescue seeded in the last week of August come up in four days. Now, you had to be on your hands and knees to see it but it was up. Tall fescue seeded in the spring may take well over a week to come up and the time required to become established is much longer.

*Weeds are less of a problem in the fall.* The major weed problems in the fall tend to be the
broadleaves such as chickweed, henbit or dandelion. Turf seeded in early September is usually thick enough by the time these broadleaves germinate that often there is not much weed invasion. Even if there is some invasion by broadleaves, the turf is usually mature enough by early November that mild broadleaf herbicides can be applied.

In the spring, our major weed problems are the annual grasses such as crabgrass. Since the spring-seeded turf is slow to mature, there are often thin areas that are easily invaded by these grassy weeds. If this invasion occurs, the weeds are better adapted to our summer conditions than our cool-season grasses and so the weeds tend to take over. The number of chemicals that can be used on young turf is limited, and so these grasses become more of a problem. One of the preemergence herbicides that can be used on young grasses is dithiopyr (Dimension). It is found in Hi-Yield Turf and Ornamental Weed & Grass Stopper and Bonide Crabgrass & Weed Preventer and can be used on tall fescue, Kentucky bluegrass, and perennial ryegrass two weeks after germination.

Summer is the hardest time of the year for cool-season grasses; not the winter. Summertime is very difficult because our cool-season grasses do not have the heat or moisture stress tolerance that our warm-season grasses such as buffalo, zoysia and Bermuda have. Therefore they tend to become weakened in the summer which makes them more susceptible to disease and other stresses. Spring-seeded cool-season grasses are less mature and therefore less able to tolerate these stresses.

Seeding cool-season grasses in the spring can be successful but is more difficult to pull off than fall seedings. If you have a choice, always opt for seeding cool-season grasses in the fall. (Ward Upham)

Managing Turf in Shade

Turfgrasses differ in their capacity to grow in shade. Among Kansas turfgrasses, tall fescue is the best adapted to shade though it isn’t all that good. Although the fine fescues (i.e., creeping red, chewings, hard and sheep fescues) have better shade tolerance, they lack heat tolerance and typically decline during hot Kansas summers. The warm-season grasses have the poorer shade tolerance than cool-season grasses, although zoysia does better than Bermuda or buffalo. Where shade is too heavy for fescue, there are other courses of action. The most obvious is to either remove trees, or to prune limbs and thin the tree canopies. Grass will do better under openly spaced trees than under closely spaced trees. Pruned limbs and thinned canopies will allow more sunlight to directly reach the turfgrass. If possible, raise the mowing height in the shade to compensate for the more upright growth of the leaves, and to provide more leaf area for photosynthesis.

The thin, weak turf in the shade may tempt you to fertilize more. Remember the problem is lack of light, not lack of fertility. Too much nitrogen in the spring causes the plant to grow faster and may result in weak plants. The nitrogen rate for shaded grass should be cut back to at least half of that for grass in full sun. Late fall fertilization after tree leaves have fallen, on the other hand, is important for shaded cool-season turfgrasses and should be applied at a full rate. Irrigate infrequently but deeply. Light, frequent irrigation may encourage tree feeder-roots to stay near the surface, which increases competition between the trees and the turf. Restrict traffic in the
shade.

Another option is to reseed areas with heavy shade each fall. The turf will look good during the fall and spring and then likely fall apart when the stresses of summer hit.

None of these options is very attractive. This is one of those problems in which there is not a good answer. Many times, the best choice for shaded areas is switch from a turfgrass to a more shade-tolerant plant. For example, periwinkle (*Vinca minor*) is much more shade tolerant than any turfgrass adapted to our area. Another option is simply to mulch the area where turf doesn’t grow well. The trees will love the cool, moist soil and the absence of competition. (Ward Upham)

**ORNAMENTALS**

Ten Rules for Planting Trees

Before you begin spring landscaping, here are some tips on planting trees.

1. Select the right tree for the site. To avoid serious problems, choose trees that are adapted to your location. Consider whether the tree produces nuisance fruit or if there are disease-resistant varieties available. For example, there are a number of crabapple varieties that are resistant to apple scab and rust diseases. Also consider the mature size of a tree to be sure you have enough room. See [http://hnr.k-state.edu/extension/info-center/recommended-plants/index.html](http://hnr.k-state.edu/extension/info-center/recommended-plants/index.html) or ask a local nurseryman for suggestions for trees adapted to your area.

2. Keep the tree well watered and in a shady location until planting. When moving the tree, lift it by the root ball or pot and not by the trunk.

3. Before planting, remove all wires, labels, cords or anything else tied to the plant. If left on, they may eventually girdle the branch to which they are attached. The root flare (point where trunk and roots meet) should be visible. If it isn’t, remove enough soil or media so that it is.

4. Dig a proper hole. Make the hole deep enough so that the tree sits slightly above nursery level. Plant the tree on solid ground, not fill dirt. In other words, don't dig the hole too deep and then add soil back to the hole before placing the tree.

The width of the planting hole is very important. It should be three times the width of the root ball. Loosening the soil outside the hole so it is five times the diameter of the root ball will allow the tree to spread its roots faster.

5. Remove all containers from the root ball. Cut away plastic and peat pots; roll burlap and wire baskets back into the hole, cutting as much of the excess away as possible. If you can remove the wire basket without disturbing the root ball, do it. If roots have been circling around in the container, cut them and fluff them out so they do not continue growing so that they circle inside the hole and become girdling roots later in the life of the tree.

6. Backfill the hole with the same soil that was removed. Amendments such as peat moss likely do more harm than good. Make sure the soil that goes back is loosened - no clods or clumps. Add water as you fill to ensure good root to soil contact and prevent air pockets. There is no need to fertilize at planting. Note: Adding organic matter to larger area than just the planting hole can be
beneficial, but it must be mixed in thoroughly with the existing soil and should “feather out” toward the outside edge of the area. Adding amendments to just the planting hole in heavy soil creates a “pot” effect that can fill with water and drown your new tree.

7. Don't cut back the branches of a tree after planting except those that are rubbing or damaged. The leaf buds release a hormone that encourages root growth. If the tree is cut back, the reduced number of leaf buds results in less hormone released and therefore fewer roots being formed.

8. Water the tree thoroughly and then once a week for the first season if there is insufficient rainfall.

9. Mulch around the tree. Mulch should be 2 to 4 inches deep and cover an area two the three times the diameter of the root ball. Mulching reduces competition from other plants, conserves moisture and keeps soil temperature closer to what the plants' roots prefer.

10. Stake only when necessary. Trees will establish more quickly and grow faster if they are not staked. However, larger trees or those in windy locations may need to be staked the first year. Movement is necessary for the trunk to become strong. Staking should be designed to limit movement of the root ball rather than immobilize the trunk. (Ward Upham)

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