Horticulture Tips
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Oklahoma Cooperative Extension Service
Division of Agricultural Sciences and Natural Resources
Oklahoma State University

GARDEN TIPS FOR JUNE!
David Hillock

General Landscape
- Find someone to water plants in the house and garden while on vacation. Harvesting vegetables and mowing the lawn are a must and imply that someone is home.
- Mulch ornamentals, vegetables, and annuals to reduce soil crusting, and to regulate temperatures and moisture during hot summer months. Mulching will reduce about 70 percent of the summer yard maintenance.
- Remain alert for insect damage. Add spider mite to the list. Foliage of most plants becomes pale and speckled; juniper foliage turns a pale yellowish color. Shake a branch over white paper and watch for tiny specks that crawl. Watch for first generation fall webworm. (F-7306)

Turfgrass
- Fertilize warm-season grasses at 1 lb. N per 1,000 square feet. Don't fertilize fescue and other cool-season grasses during the summer.
- Dollar spot disease of lawns can first become visible in mid-May. Make certain fertilizer applications have been adequate before applying a fungicide. (F-7658)
- Seeding of warm-season grasses should be completed by the end of June to reduce winterkill losses. (F-6419)
- Brown patch disease of cool-season grasses can be a problem. (F-6420)
- White grubs will soon be emerging as adult June Beetles. Watch for high populations that can indicate potential damage from later life cycle stages as grubs in the summer.

Fruit and Nut
- Renovate overgrown strawberry beds after the last harvest. Start by setting your lawnmower on its highest setting and mow off the foliage. Next thin crowns 12-24 inches apart. Apply recommended fertilizer, preemergence herbicide if needed and keep watered.

Trees and Shrubs
- Vigorous, unwanted limbs should be removed or shortened on new trees. Watch for forks in the main trunk and remove the least desirable trunk as soon as it is noticed. (F-6415)
- Pine needle disease treatments are needed again in mid-June. (7618)
- Remove tree wraps during the summer to avoid potential disease and insect buildup.
- Softwood cuttings from new growth of many shrubs will root if propagated in a moist shady spot.
- Protect trees from lawnmowers and weed eaters by mulching or using protective aerated covers.

Flowers

- Pinch back leggy annuals to encourage new growth. Fertilize and water appropriately.
- Feed established mums and other perennials.
- When picking fresh roses or removing faded ones, cut back to a leaflet facing the outside of the bush to encourage open growth and air circulation.
- Stake tall perennials before toppling winds arise.

Plant Profile – Ginkgo

David Hillock

Ginkgo biloba is 40-70 feet at maturity and has unique fan-shaped leaves. It has beautiful golden fall color and is extremely adaptable. It is slow growing and may be awkward in growth habit when young, but develops a picturesque, pyramidal to wide-spreading habit at maturity. Ginkgo is pest free. It is well adapted to many soils and pH levels though it may develop some chlorosis in extremely high pH soils. Choosing a male selection to avoid foul smelling fruit is important. Purchasing an unnamed clone is risky as they do not fruit until they are 20 years old or older so you won't know that you have a female until it is too late. It is hardy to zones 3 to 9. Ginkgo is very urban tolerant and thus makes a good street tree. The medicinal aspects of ginkgo have been known for years and the extracts from the tree are known to aid in memory loss, depression, headaches and tinnitus.

Backyard Composting!

David Hillock

In Oklahoma, yard trimmings and grass clippings can make up 15 to 25 percent of a community's waste. The costs of collecting and transporting yard waste and the subsequent landfill tipping fees may be a considerable portion of a community's waste management budget. These costs may be reduced if communities encouraged and practiced backyard yard waste composting.

Yard wastes, especially grass clippings, are usually high in nutrient content. When yard waste is composted, bacteria use air and water to break down plant materials into nutrient-rich compost. These nutrients can be beneficial to soils, plants, and trees in the yard when applied as mulch or a soil amendment.

Compost systems can be simple and slow as a heap or pile, which is turned occasionally during the year. A more structured and complex system requires containers, more turning, and produces finished compost in a few months. In compost piles, water is added to green and brown vegetation layers.

As decomposed plant material, compost is an excellent soil amendment. Compost can loosen clay soils, help sandy soil retain moisture and nutrients, and retain soil moisture when used as mulch. Beneficial bacteria and organisms in compost assist plants in absorbing nutrients. Thus, natural materials are recycled in a home yard environment.

What is Compost?
Compost is a natural dark brown humus-rich material formed from the decomposition or breakdown of organic materials such as leaves, grass clippings, vegetation, vegetable food scraps, and twigs. Bacteria, worms, fungi, and insects need water and air to use the organic materials as food and decompose them.

What is the Procedure to Make Compost?
Organic materials are placed in alternating green and brown layers in a container, bin, or pile. Alternating green and brown layers of material help assure the correct carbon and nitrogen amounts. With water and air, bacteria and insects use the materials as a food and energy source. The bacteria need water to live and grow. This process generates heat from 140 to 160 degrees F. Aeration is done by turning the container or pile of material. The more turning, the more air the bacteria have available, and the faster the process works. When the temperature decreases, the process is complete.

How is a Compost Bin Made?
Bins may be made in various sizes and with a variety of materials. The following easy steps describe compost pile construction:
1. Construct a confining perimeter with 3' to 5' diameter and 4' high. Materials may be concrete blocks, railroad ties, wire mesh, boards, old pallets, other fencing material, barrel, or garbage can with holes for air
2. Layer green (wet) and brown (dry) vegetable matter (1 part green to 3 parts brown)
3. Wet thoroughly, then sprinkle with water periodically
4. Turn every week to speed the decomposition process

How Long Does it Take Compost to Form?
The time of completion will vary according to the type and amount of materials used, the climate, the size and type of bin or pile used, and the amount of aeration or turning of the pile. With the correct carbon to nitrogen ratio, water, and air, compost should be ready to use in 4-6 months. If the pile is turned more frequently, the compost should be ready more quickly. The smaller the individual pieces of material in the pile, the more surface area the microorganisms have to work on and the faster the materials will decompose. Shredding or chipping branches decreases the decomposition time.

When is the Compost "Done?"
Compost is ready when the temperature of the pile falls to ambient levels, the material is dark, crumbles easily, pieces are small and there is no odor.

How can the Process be Sped Up?
Mixing frequently provides more air for the bacteria. Keep the material moist with soaking about once a week. Break the materials into smaller pieces.

What can be Composted?
- Most yard waste such as grass clippings, leaves, twigs, excess vegetation
- Non-fat containing food scraps
- Twigs or chipped branches

• Coffee grounds, tea leaves

What cannot be Composted?
• Large branches
• Fatty foods and grease, meats, dairy products, fish
• Bones
• Synthetic products such as plastics
• Diseased plants
• Weeds and vegetables that produce abundant seeds
• Pet or human waste

Why Make Compost?
• Recycle natural materials
• Reduce amount of chemical fertilizer used
• Reduce amount of material going to landfills
• Reduce landfill tipping fees for individuals or communities
• Prolong landfill life

What can Compost be Used For?
• Improve soil structure and texture
• Increase water-holding capacity of sandy soil
• Loosen clay soil and improve drainage
• Add nutrients to improve soil fertility
• Aid erosion control
• Potting soil
• Mulch around shrubs to retain moisture

Compost Bin Styles
1. Garbage can or barrel – with holes in bottom and in rows about 4-6 inches around sides.
2. Commercial – many varieties usually about the size of a 30-gallon garbage can, found at home supply stores.
3. Three bin turning units are made so that the compostable material can be easily transported from one bin to another, thus reducing the time to produce the compost. They can be made out of a variety of materials.
a. Concrete blocks
b. Wood with wire sides
c. All wood
4. Holding units (for easy passive composting) can be made from many materials, require no turning and are thus slower to produce compost.
a. Wood pallets
b. Concrete blocks
c. Posts and chicken (or other type) wire
d. Posts and snow fence

Considerations for Using Postemergence Herbicides in Vegetable Crops

Jim Shrefler

Adapted from *Postemergence Herbicide Crop Tolerance* by Bradley A. Majek, Ph.D., Specialist in Weed Science, Rutgers Cooperative Extension.

Chemical weed control options that are available for some commercial vegetable crops include postemergence herbicides. Postemergence generally refers to herbicides that control weeds that have emerged from the soil and have actively growing green tissue. Often these products are applied in such a fashion that the herbicide will be applied to weeds and to the approved crop plant to enable complete coverage of weeds. Due to physiological properties of the particular crop, the crop is not affected when the herbicide is applied at normal use rates. In other cases a "directed" spray application is used, which means that spray nozzles are adjusted to maximize herbicide application to the weeds and prevent direct application to the crop plants. Information on suggested postemergence herbicide products for vegetables can be obtained from Oklahoma Cooperative Extension Service County offices. *Growers should always consult the actual product labels before using these herbicides on vegetable crops*.

Postemergence herbicides are generally most effective for controlling weeds, and safest on approved vegetable crop plants, if applied to actively growing plants. However, under periods of extended cloudy weather and high soil moisture, certain crops grow rapidly and develop a thinner than "normal" wax layer, called the cuticle, on the leaves. This thinner cuticle is more easily penetrated by postemergence herbicides and may make the crop plant more susceptible to phytotoxicity, which is crop injury not normally expected. Warm temperatures during cloudy, moist periods will increase the plant growth and contribute to cuticle thinness.

To reduce the risk of crop injury from postemergence herbicides under such conditions, the following suggestions may be beneficial:

1. Reduce the amount of spray additives used to the minimum labeled amount.
2. Use nonionic surfactants instead of oil concentrates when the herbicide label gives you a choice.
3. Do not add any surfactant, oil concentrate, or other additive if the label allows application alone.
4. Do not add liquid fertilizer to the spray solution, even if the herbicide label suggests it as an option.
5. Delay treatment of crops that are marginally large enough to treat according to the herbicide label until weather conditions change. Also consider the size of weeds that can be controlled with the herbicide to avoid allowing weeds to exceed controllable size.
6. Delay treatment until the crop has experienced 3 to 5 days of bright, clear, warm, and sunny weather before applying postemergence herbicides. The cuticle thickens when the weather turns warm, sunny, and dry, reducing the chance of crop injury.

Again, always follow specific product label instructions vary carefully. Proper equipment selection and calibration is also critical. Your County Extension Office can provide information on pesticide sprayers for herbicide application.

Oklahoma Gardening Summer GardenFest

Come join us on Saturday, June 11 at the OSU Botanical Garden for the 4th Annual Summer GardenFest. We are celebrating 30 years of *Oklahoma Gardening*. Our keynote speaker is Felder Rushing from Jackson, Mississippi. The event starts at 10:00 a.m. with Ray Campbell, past host of *Oklahoma Gardening*, giving a history of *Oklahoma Gardening's* 30 years followed by Felder Rushing's presentation. The afternoon activities will start at 12:15 p.m. with demonstrations on vegetables, perennials, berries, containers and annuals. Edison the Bus will be there for the children's activity. They will have several environmental activities for the children to do. This event is free to the public and will provide an opportunity for *Oklahoma Gardening* viewers across the state to come visit the studio set and garner some expert gardening information. For more information about the Summer GardenFest, please check our web site at www.oklahomagardening.okstate.edu or call 405-744-5404.

Final Reminder for the Lane Ag Center Field Day!

Jim Shrefler

The Lane Agriculture Center Field Day will be held on Saturday, June 11, 2005 from 9 a.m. until 3 p.m. The event will offer something for everyone to enjoy including Tours of Research and Demonstration Projects, Fried Catfish, Cold Watermelon, Antique Tractor displays and competitions, and Live Entertainment. Check the Lane Ag Center website at www.lane-ag.org or call (580) 889-7343 for more details. The Center is located on Highway 3, 10 miles east of Atoka on the north side of the road.

Upcoming Horticulture Events

Electrical Hazards and Trees Workshop
June 7, 2005, OSU Botanical Garden, Stillwater

An Electrical Hazards Workshop will be conducted in Stillwater on June 7 for professional arborists, landscapers and allied tree care professionals. Register online at www.treecareindustry.org/ehap or call 1-800-733-2622.

Oklahoma Pecan Growers' 75th Annual Conference
June 19-21, 2005, Holiday Inn, Stillwater

Registration materials and meeting agenda are available on the OPGA website at http://www.hortla.okstate.edu/pecan/opga/index.html.

Oklahoma Greenhouse Growers' Association Greenhouse Short Course
June 28-30, 2005, OSU-Oklahoma City

A greenhouse short course will be conducted with speakers addressing needs of both seasoned as well as new growers. For information contact Wendy Gerdes at 405-942-5276 or OklahomaONLAOGGA@aol.com.

Grape Field Day
July 23, 2005, Oklahoma Fruit Research Station, Perkins and Woodland Park Vineyard, Stillwater

OSU Fruit Research Station and the Woodland Park Vineyard, owned by Ivol and Jeanette Hane, will host a field day on wine grape production and wine making. The event is free. For more information, please visit the Kerr Center web site at www.kerrcenter.com or call 918.647.9123.

Greenhouse Growers' Bus Tour
September 7, 2005

The Oklahoma Greenhouse Growers' Association will offer a one-day greenhouse production tour originating in Oklahoma City and finishing in the Park Hill/Tahlequah area. Interested growers or those contemplating the profession should contact Wendy Gerdes at 405-942-5276 for registration information.

Nursery, Landscape and Greenhouse Trade Show and Convention
September 30-October 1, 2005, Tulsa Convention Center
Contact Wendy Gerdes – Oklahoma ONLAOGGA@aol.com

Greenhouse Growers' Fall Update
October 26, 2005, Holiday Inn, Stillwater
Contact Mike Schnelle at mike.schnelle@okstate.edu or 405-744-7361

60th Annual Oklahoma Turfgrass Conference & Trade Show
November 16-18, 2005, Wes Watkins Center for International Trade Development, Stillwater

"Stillwater, Where Oklahoma and the Oklahoma Turfgrass Conference began." The conference and show will provide a broad array of educational presentations. Education is being planned for the sports turf, landscape, lawncare, sod production and golf course management industries. Pesticide Applicator CEUs will also be available. Unlike previous years, participants will choose from one of several designated hotels. Early booking of rooms will be required of attendees since the various sporting events in Stillwater results in competition for lodging. More information on the conference will be available shortly.

6th Annual Oklahoma/Arkansas Turf Short Course
January 11-12, 2006, OSU Botanical Garden, Stillwater

The event is an introductory short course that targets those practitioners in the landscape and lawncare industries who have not had the opportunity to take an introductory turf course. However some attendees are those who are new to the AR/OK region or those simply wanting to brush up on regional turf recommendations. The course covers turf identification, selection,

establishment and the maintenance practices common to the region. The focus of the short course is on the "why" behind the "how" turf is managed in the region. More information on the conference will be available in October.

For more information about upcoming events, please contact Stephanie Larimer at 405-744-5404 or stephanie.larimer@okstate.edu.