Spring came early this year, as did the bare spots in my lawn and around trees. Although it may be a challenge to a lawn enthusiast, one solution to these bare spots is a ground cover as well as mini flowerbeds.

Ground covers are efficient and useful for several reasons: low maintenance, trouble spots, erosion control and sheer variety. Most ground covers require little to no care once established. They are a great solution for areas that are hard to mow, such as steep slopes or around trees that have roots above the ground. They require little attention and require little water yet they continue to look great from spring through late fall. Ground covers are also terrific for an alternative to mulch by discouraging weeds.

Although ground covers may have preferential soil requirements, they usually thrive where planted. Vinca (Vinca major), for example, grows well just about anywhere. It is quite prolific. It will thrive in shade or sun and has dense foliage which discourages weeds and is actually quite invasive if not cut back. I have used vinca in pots and hanging baskets for its cascading effect. It is excellent for window boxes, over stone walls and good cover for bulbs. It is effective on slopes or banks to stabilize soils and prevent erosion.

I have planted perennial creeping phlox that will pop beautiful pinkish purple flowers each spring and provide a deterrent to the soil erosion. Phlox will also spread as they grow for a thicker ground cover and turn green later in spring and throughout summer. They require full sun and little to no care. These look beautiful at the feet of spring flowers like tulips and daffodils, as well as around the base of flowering dogwoods and redbuds.

Another ground cover that is beautiful and fills in nicely is ajuga or bugleweed. It comes in many varieties and does well in sun or shade. Ajuga is a dense, rapidly spreading, mat-forming ground cover with shiny, dark green leaves. It has

Creeping Phlox or Phlox subulata (Mo Botanical Garden)
Groundcovers
by Shari Bartyzel, Master Gardener

Tiny, blue-violet flowers that appear in mid to late spring on spikes rising above the foliage to 10 inches. Primarily used as a ground cover, it can also be grown in containers with other plants. It can fill in large, shady areas where lawns are difficult to establish. It may be planted on banks or slopes, under trees and around shrubs or planted over bulbs.

Other sun loving ground covers to consider include dianthus, creeping juniper, candytuft and creeping phlox. Shade tolerant ground covers include hostas, English ivy, and lungwort. The groundcovers that can take shade or sun include vinca, ajuga, bloody cranesbill and liriope.

There are plenty of low maintenance ground covers from those that thrive in shade to sun worshiping and everything in between. For a thorough listing of options, check out www.mobot.org as well as your local nursery.

You can also check out these guides on the internet.
- MU Guide G6835 Selected Ground Covers for Missouri http://extension.missouri.edu/p/g6835

Pest of the Month: Pigweed
by Katie Kammler

As we are starting to have warmer temperatures, we are seeing the emergence of warm season weeds that can become a problem in our gardens and landscapes during the summer months.

There are several pigweeds that are problems in our area. They include redroot pigweed, smooth pigweed, prostrate pigweed, Palmer amaranth and waterhemp. They are all Amaranthus, which also include the garden cockscomb or celosia flowers.

These are erect summer annual weeds with small flowers enclosed by spined bracts that give it a bristly appearance. All of the reproduction is by seed; they produce thousands of tiny black seeds on one plant. The seeds reach maturity from late summer into fall, until a severe frost. Pigweed species are much easier to control when they are small, as they can reach 6 feet in height.

In a garden, the best way to get rid of them is tilling or hoeing. A covering of mulch will also help prevent germination. This weed is also a problem in field crops because some species have developed multiple herbicide resistance.
May Gardening Calendar
By Donna Aufdenberg

Ornamentals
- Pinch azaleas and rhododendron blossoms as they fade, not necessary for double flowered varieties. Fertilize with acid loving fertilizer.
- Begin planting gladiolus, caladiums, dahlias, cannas, and elephant ears.
- Plant hardy water lilies in tubs or garden pools.
- Scale crawlers are active now. Infested pines and euonymus should be treated now.
- Pinch back mums to promote bushy growth.
- Bulbs can be moved or divided as foliage dies.

Vegetables
- Place cutworm collars around young transplants. Collars are easily made from cardboard strips.
- Plant dill to use when making pickles or cooking salmon.
- Isolate sweet, super sweet and popcorn varieties of corn to prevent crossing.
- Set out tomato plants as soils warm. Place stakes at planting time.
- Remove rhubarb seed stalks as they appear.
- Place a stake by seeds of squash and cucumbers when planting hills to locate the root zone watering site after vines have run.
- Set out peppers and eggplants after soils have warmed. Plant sweet potatoes now.

Fruits
- Mulch blueberries with pine needles or sawdust.
- Don’t spray any fruits while in bloom.
- Prune unwanted shoots.
- Follow the MU Extension fruit spray schedule for homeowners.

Lawns
- Apply post-emergence broadleaf weed controls now if needed.
- Zoysia lawns may be fertilized now. Apply no more than 1 lb. actual N per square foot.
- Move bluegrass to 1.5—2.5 inches and tall fescue to 3.5 inches.

Miscellaneous:
- Herbs planted in average soils need no extra fertilizer. Too much will reduce flavor and pungency at harvest.
- Sink houseplants up to their rims in soil or mulch to conserve moisture. Fertilize regularly.
- Take houseplants outdoors when nights will remain above 50 degrees. Most prefer only direct morning sun.

Attracting Bees to the Garden
Rethink your lawn—plant more flowers!

Plant Native Flowers!

Limit the hybridized plants - they usually have little pollen.

Plan for continuous bloom through Spring, Summer and Fall.

Limit pesticides or use only natural pest remedies.

Use natural or organic fertilizers.

Create a bee bath - shallow container with pebbles or twigs in the water.

Top flowers for attracting bees:
Bee Balm, Cosmos, Echinacea, Snapdragons, Floxglove, Zinnia, Asters, Basil, Verbena, Cleome, Liatris and Sunflowers
Woodpeckers
by Sarah Denkler

Missouri is home to seven woodpecker species. The Hairy (Picoides villosus), Downy (Picoides pubescens), Pileated (Dryocopus pileatus) and Red-bellied woodpeckers (Melanerpes erythrocephalus) are here year round. The Northern Flickers (Colaptes auratus) and Red-headed woodpeckers (Melanerpes erythrocephalus) migrate south for the winter. The Yellow-bellied Sapsucker (Sphyrapicus varius), also a true woodpecker, migrates to Missouri for the winter but breeds elsewhere.

The woodpecker diet is composed of insects, nuts, seeds and fruit. These birds will locate and feed on insects by site on bark or in some cases on the ground or in holes or cavities of dead trees or rotting wood. Woodpeckers drum on bark to locate moving insects. Once located the bird will peck a hole and retrieve the insect using a bristle tipped tongue.

These natural feeding habits help to maintain healthier trees and improve hardwood forests (the birds native habitat) by removing insect pests.

When woodpeckers become pests it is often to houses or buildings made of wood which are placed near the birds natural habitat. Woodpeckers will drum for food but also to establish a territory or attract a mate. This type of drumming is done on an object that resonates loudly. If this happens to be your house it is best to deter the birds as soon as they try to establish the drumming behavior.

Birds may be repelled using scare tactics such as visual or sound devices. Such techniques include banging on pots or metal containers, playing loud music or firing a cap gun, hanging shiny ribbon or mylar tape, spraying the birds with a hose or attaching a net screen to the area they seem to be attracted to.

It’s feeding habits are a bit different than other woodpeckers in that it pecks holes in a straight line on tree trunks in hopes of attracting insects to the sap. It will feed on the insects trapped by the sap and on the sap itself. These birds can cause damage to trees if enough holes are drilled in a continuous line around the tree or if they continue to return to the same tree over time. Sapsuckers often have favorite trees that they will continue to return to. Trees can be wrapped with screen, burlap or chicken wire to function as a barrier to the bird however these techniques are not full proof and would need to be removed once the migratory period has passed to ensure proper tree growth.

All woodpeckers are protected by the Federal Migratory Bird Treaty Act and therefore non-lethal methods of control should be used.

(Adapted from MU Guide 9449 and Missouri Woodpeckers by Amy Salveter, Missouri Department of Conservation. Nov. 1999.)
Many plants can be grown successfully in containers. People who live with limited space can grow plants this way on their balcony, windowsill, or patio. This is also a great method for those who have poor soil or lack the physical strength or mobility to do conventional gardening.

Container gardening can provide enjoyment with all types of flowers and decorative plants, but we can also utilize containers to supply us with an abundance of wonderful tasting vegetables. We must keep in mind that just like in a garden, in order for garden plants to be productive, we must have a well drained growing medium, adequate water and fertilizer, and plenty of sunlight.

Select containers that are large enough to hold the plants and their root systems. Plastic pots, clay pots, buckets, wash tubs, wooden planters, or hanging baskets are just a few suggestions. Almost any kind of container can be used if it provides good drainage through holes in the bottom or in the sides. If holes need to be made, drill four or more holes evenly spaced around the bottom of the container.

The size of containers needed depends on the vegetables you intend to grow. Six to ten inch diameter pots are fine for herbs and some of the miniature type varieties but for most crops, such as tomatoes and peppers, a 3 to 5 gallon container is best. The depth of the container is important. Soil 6 to 8 inches deep is the minimum for most vegetables.

Container gardens require a growing medium that is well drained but holds enough water to support the plants. It is important to pick a light-weight soil-less growing mix. Avoid using garden soils that will have weed seeds and disease pathogens in it. Avoid using bagged potting soil because it tends to be heavy and hard to dry out. Soil-less potting mixes are free from weed seeds, disease organisms and are less likely to compact, hold moisture and are light weight.

Vegetables best suited for containers include tomatoes, peppers, eggplants, onions, carrots, radishes, lettuce, squash, cucumbers and herbs. Select varieties that have more compact growth, are bush varieties or have dwarf growth habits.

Sunlight is important for growing quality plants and produce. Nearly all vegetables need at least 6 hours of direct sunlight. Leafy vegetables can tolerate more shade but still require some direct sun. Plants that bear fruit, such as tomatoes, peppers, cucumbers and eggplant require the most sun.

Since the roots of the plants are limited and the soil mixes do not contain many minerals, it is essential that fertilizer be applied to the container soils. A soluble fertilizer (15-30-15 or 20-20-20) applied once a week is recommended. Slow release fertilizers can also be used.

Plants grown in containers require frequent watering because they dry out quickly from sun and wind. Some plants may require daily watering. Water thoroughly so that the water can reach the bottom of the container and allow the excess to drain through the drainage holes. Do not let the soil dry out completely. This may cause the plants to wilt or drop their fruits and flowers. On the other hand, do not overwater. Water the soil and avoid getting the leaves wet. Wet leaves encourage disease.

If you would trellis or stake the plant in the garden, then trellis or stake it in the container. It is very important to train tomatoes, squash, vining cucumbers to allow better air circulation and prevent disease problems from starting.
Raised Bed Gardening Basics
by Donna Woolard, Poplar Bluff Master Gardener

Raised bed gardening, especially for those of us who are time challenged, is an easy method of growing a few tasty vegetables for our families.

The “raised” part simply means that the soil level is higher than the surrounding soil, and “bed” refers to a size small enough to work without stepping into the bed. It is suggested that the beds be kept to no more than 4 feet wide and match their length and location to the available sunlight and watering system. A north-south bed is best for low growing crops, allowing direct sunlight to reach the entire surface of the bed. Beds with taller crops that could shade out other low-growing crops, for example caged tomatoes in a bed with cucumbers, might do better in a bed running east to west allowing the lower-growing cucumbers to be planted on the south side of the bed and still get full sun.

If framing the bed with wood, avoid the use of creosote treated lumber as it can leach out and injure plants. Use pressure–treated lumber, redwood, cement blocks or brick, and be aware that the cement in blocks will raise soil pH over time. Consider placing a layer of poultry wire in the bottom of the bed if burrowing rodents (moles and voles) are an issue. A bed elevated 2 feet or more offers an opportunity to garden with little bending and reaching. Also, because the bed warms up quicker than the ground, it can double as a cold frame by covering it with a lightweight clear plastic cover. Supports for poles, cages and trellises can be mounted to the frame.

Raised bed gardening allows for modification of less than stellar planting soils. Good quality topsoil can be used; however the addition of organic matter to soils with a high clay or sand content will be beneficial. This type of gardening lends itself to higher yield per square foot over traditional gardens due to higher density planting and more intensive improvement of the soil. Intensively planted beds provide greater foliage coverage, shading out many weeds.

Consider using a soaker hose or drip-type irrigation system when watering. In addition to conserving water, they also reduce disease by directing water into the soil, instead of wetting leaf surfaces as with overhead irrigation.

The University of Missouri Extension Guide G6985 has additional information on how to make your raised bed garden a success.

Local Happenings!
by Donna Aufdenberg

- **Cape Girardeau County Master Gardeners Garden Festival** on May 5, 2012 from 9 am—3 pm at Conservation Shelter in Arena Park in Cape Girardeau. There will be demonstrations as well as plants for sale.

- **Kress Farm Garden Preserve 14th annual Plant Sale** will be May 5, 2012 from 9:00 am to 3:00 pm, rain or shine. We will have a wide variety of plants available, including Forrest Keeling native trees, shrubs and perennials and Stark Brothers fruit trees. There will also be a class at 10:30 presentation Edible Landscaping by Ozzie Ostdiek, a Jefferson Co. Master Gardener. Also, Robert Weaver, editor of THE GATEWAY GARDENER, will be available to answer questions. Contact Jo Ferguson, 636-296-9306, or Gail DeGunia, 314-420-8141, for additional information.

- **St. Genevieve Garden Walk 2012** sponsored by the Ste. Genevieve Master Gardeners will be May 19 and 20, Saturday 10 to 4pm and Sunday 11 to 4pm. Tour private and public gardens, plant sale, birdhouse contest, and farmer’s market (Saturday only). For more information contact the Ste. Genevieve Welcome Center at 1-800-373-
## Group News - What’s Happening

### May 2012

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#### Upcoming Events

**June**

- June 2 - Day with Natives; Hamilton Native Outpost, Elk Creek, MO 9:00am
- June 5 - Poplar Bluff MGs 1st Tuesday at 6:00pm, Butler County Ext. Center
- June 4 - Parkland MGs 1st Monday at 6:30pm, Botkin Lumber Co, Farmington Industrial Park
- June 5 - Missouri Grape Growers Association Annual Field Day at University of Missouri in Columbia and Les Bourgeois Vineyards.
- June 14 - Delta Area MGs 2nd Thursday at 7:00pm, Medical Arts Building, Sikeston, MO
- June 21 - Cape Girardeau County MGs 3rd Thursday at Cape County Ext. Center at 7pm
- June 25 - Perry Co. MGs 4th Monday at the Perry County Ext. Center at 6:30pm

#### Contact your local Extension Center if you have questions about any event on the calendar.

**Upcoming Events**

- July 7 - Warm Season Grass Pasture Walk; Hamilton Native Outpost, Elk Creek, MO 3-8pm
- September 14-16 - State Master Gardener Conference; Sedalia, MO

if you have a horticultural related event for the calendar call 573-686-8064 to add it.
Editor’s Corner

The Garden Spade is published monthly by University of Missouri Extension staff for individuals and families living in Southeast and East Central Missouri. This newsletter is provided by your local extension council.

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We welcome and encourage Master Gardener groups and individuals to submit items to the newsletter. We encourage the submission of any news such as upcoming volunteer opportunities, community events related to gardening, warm wishes or congratulations to fellow gardeners. We also encourage Master Gardeners sharing experiences and writing articles on timely topics.

All entries into the group news sections must be received by 4:30 on the 15th of each month for the following months news.

Email News to: kammlerk@missouri.edu, denklers@missouri.edu, or aufdenbergd@missouri.edu

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