Care of Spring Flowering Bulbs

by Richard Jauron,
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Iowans are currently enjoying the beauty of tulips, daffodils, and other spring-flowering bulbs. Proper care of these plants through the remainder of spring and early summer helps to insure repeat performances in succeeding years.

Remove the flower heads on tulips and daffodils as soon as the flower heads fade. This prevents the plants from expending large amounts of energy in fruit (pod) development. The weakened bulbs need the food manufactured by the plant foliage.

After blooming, two to three pounds of a 5-10-5 or similar analysis fertilizer may be applied to 100 square feet of bed area. To prevent burning of the foliage, wash off any fertilizer which remains on the leaves. Control weeds which compete with the plants for water and nutrients. Often hand weeding is most practical.

The foliage of spring-flowering bulbs should not be removed until it has turned yellow and begun to die back. The length of time it takes the foliage to die back depends on bulb type, weather, and cultural practices. Most tulips and daffodils don't die back until late June or early July. Premature removal of plant foliage reduces plant vigor and bulb size, resulting in fewer flowers next spring. After the foliage has yellowed, it can be safely cut off at ground level and discarded.

If spring-flowering bulbs need to be moved, carefully dig up the bulbs when the foliage has died back. The bulbs can be separated and replanted immediately. If the bulbs can't be planted until fall, allow them to dry for 2 to 3 weeks then store the bulbs in a cool, dry place. Periodically inspect the bulbs during the summer and discard any which show signs of decay.

Perennial Bed Renovation

By Sherry Rindels,
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The perennial garden is a continuous source of tinkering. Gardeners will move plants from one area to another, replace those plants that didn't perform up to expectations, and thin those whose performance was more than ever dreamed possible. Sometimes the perennial bed needs more than just a cosmetic make-over. There are times when a complete renovation is in order. Perennial weeds such as quackgrass may be more numerous than the desired perennials, the soil may need improvement, or the gardener may have a new design in mind.

Renovating a large perennial garden is a big job. It can be done in either spring or fall. In the spring, try to complete the project before the arrival of hot, dry weather. The months of April and May are excellent. In the fall, late August through September is optimal. Begin the renovation process by digging up all the plants in the bed (with a few exceptions). Cut a circle around the crown of the plant with a trowel or spade, then pry the roots up and out. For large perennials it is easier to cut the plants into manageable pieces when they are still in the ground. Don't remove shrubs unless their presence isn't part of the new plan.
Some perennials prefer a certain season for division or transplanting. If you are renovating at the wrong time for these plants, it is better to work around them. After digging set the plants on a plastic tarp spread out in a shady, protected location. Keep the same plants together in groups and label them (even the best of minds forget where they put things). Water the plants as weather conditions warrant to prevent them from drying out. Under good conditions, most plants will survive out of the ground for a few days without any problems.

After the plants have been removed from the bed, carefully remove all weeds, and rake the soil level. If necessary, amend the soil by spreading a 2 to 3 inch layer of organic matter such as compost or peat moss. Sprinkle on the needed fertilizer and other amendments. Then using a shovel or fork, turn over the soil to mix in the amendments. Work backwards to avoid walking on and compacting the prepared soil. When you're finished digging in the materials, rake the area level again and clean the overflow soil from around the edges.

Once the soil is properly prepared the plants can be replanted in their proper locations. Many perennials will not require division; however, this is an excellent opportunity to do so if necessary or if you are looking for more plants of that particular variety. Remove soil from the roots by shaking vigorously or washing the roots off with water. Removal of the soil allows a better view of the crown and roots for division. It is also the only way to remove grass and weeds from within the perennial clump. Perennials require different techniques and tools for division. Some plants can be pulled apart by hand, others require a sharp knife, still others a sharp spade.

After division, set out the plants on the soil and arrange them according to your garden plan and taste. Make sure to allow adequate space between plants for good growth, maintenance paths, and annual flowers you want to use. Once the arrangement is to your liking, begin planting. If the sun is shining and temperatures are warm, make decisions on plant placement and planting quickly to prevent the plants from drying out. Actual planting goes quickly once you start. Set the plant in the planting hole so the crown of the plant is even with the soil level of the bed. If you are adding new container grown material, break up the root ball or if badly pot bound make vertical cuts in the sides of the root ball with a knife before planting. This helps the plant roots grow out into the new soil quickly.

The final step is the addition of mulch and water. Add 2 to 3 inches of organic mulch such as wood chips, shredded leaves, or compost to conserve moisture and prevent weed growth. Water each plant thoroughly immediately after planting. Water the entire bed weekly if rainfall isn't adequate. Before you can call the job complete, there is always clean up to do. Extra plants will need to find a new home, either in another garden in your yard or the gardens of friends and relatives. Compost unwanted plants and debris.

Renovating a perennial bed is a big project. However, the improved appearance of both the plants and flower bed are worth the effort.

### Dividing Herbaceous Perennials

By James Romer, Department of Horticulture Iowa State University

Herbaceous Perennials are commonly divided to control size, retain vigor, encourage more blooms and increase the number of a particular perennial in the landscape. The best time to divide perennials varies with the different plant species. Below is a list of common perennials that should be divided in spring.

- Aster (*Aster* species) divide every 2 or 3 years.
- Astilbe (*Astilbe* species) divide every 3 or 4 years.
- Baby's Breath (*Gypsophila paniculata*) division is difficult.
- Bee Balm (*Monarda didyma*) divide approximately every third year.
- Blanket Flower (*Gaillardia x grandiflora*) Blazing Star (*Liatris species*)
- Chrysanthemum (*Dendranthema x grandiflorum*) divide every 2 or 3 years.
- Coral Bells (*Heuchera* species)
- Coreopsis (*Coreopsis* species)
- Cornflower (*Centaura species*) requires frequent division every 2 or 3 years.
- Daylily (*Hemerocallis* species)
- Gooseneck Loosestrife (*Lysimachia clethroides*) plants spread aggressively. Divide every 2 or 3 years.
- Hardy Geranium (*Geranium species*)
- Hardy Zinnia (*Heliopsis helianthoides*) divide every other year.
- Hosta (*Hosta species*) plants can be left undisturbed for years.
- Lily-of-the-Valley (*Convallaria majalis*) plants spread rapidly.
- Obedient Plant (*Physostegia virginiana*) plants spread rapidly. Divide plants every 2 or 3 years.
- Orange Coneflower (*Rudbeckia fulgida*) divide every 3 or 4 years.
- Ornamental Grasses
- Perennial Salvia (*Salvia hybrids*)
- Phlox, Garden (*Phlox paniculata*) divide every 3 to 4 years.
• Phlox, Moss (*Phlox subulata*) divide immediately after blooming.
• Purple Coneflower (*Echinacea purpurea*) divide every 3 or 4 years.
• Shasta Daisy (*Leucanthemum x superbum*) may be short-lived.
• Speedwell (*Veronica* species)
• Spiderwort (*Tradescantia virginiana*) plants spread rapidly. Divide every 2 or 3 years.
• Stonecrop (*Sedum* species)
• Yarrow (*Achillea* species) many of the yarrows spread rapidly. Divide every 3 or 4 years.

**Box Elder Bug**

By Entomology Department
Iowa State University

The boxelder bug (BEB) is a common and well-known insect in Iowa that is most abundant after summers when the month of May is very warm and July is very dry. However, the abundance varies greatly from place to place as well as from year to year. There are some BEB problems even in years when a widespread outbreak does not occur.

During the summer months, BEBs live, feed and reproduce on trees, shrubs and other plants (including boxelders, maples, ashes and others). They feed on sap from their host plants but do not cause significant damage. BEBs become nuisance pests in the fall when they leave the plants to find hiding places for the winter.

During their random search, they congregate in the sunshine on the south sides of buildings, trees and rocks. From there they stray into houses through cracks in the foundation and siding, gaps along windows and doors, and other small openings. BEBs within walls or attics remain inactive while they are cold. The nuisance occurs when the ones warmed by heat from the furnace or the sun become active during the winter and crawl into the rooms.

BEBs do not reproduce indoors. They only lay eggs on trees and other plants. BEBs do not feed indoors. They are sap feeding insects with a beak that can only suck liquid food (sap) from the twigs and seeds of selected species of trees and shrubs. BEBs are harmless as they can not damage the house, its furnishings or occupants.

They can be, however, a considerable nuisance. There is no easy way to determine when and where there will be a problem until it starts. By then it may be too late for effective treatment. Bugs could be controlled on the trees in mid summer with insecticides labeled for use against boxelder bugs on trees, but the effectiveness is limited. Spraying large trees is difficult and tree spraying is usually impractical.

The best deterrence against BEBs and similar invaders (e.g., crickets and attic flies) is to prevent entry by caulking and sealing possible entry sites (cracks and gaps). Secondly, spraying to reduce the number outdoors may limit the number that will get into the house. A lawn and garden insecticide or soapy water spray (5 tablespoons of liquid detergent per gallon of water) can be used outside on masses of bugs perched on and along the foundation in the fall. Additional insecticides are available to professional pest control operators for exterior treatment in the fall. Repeated applications are usually necessary especially when

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**Opening Day!**

Glenwood’s Giving Garden – May 4th

Did you know Glenwood’s Giving Garden donated over 6,800 pound of fresh produce to people in need in our community in 2012?

Volunteers are needed in all areas! Come see what is happening in the Giving Garden on Opening Day and learn how you can help. Activities include:

- Explanation of garden and volunteer opportunities
- Planting of flowers and vegetables
- Raised planting bed construction demo
- Healthy refreshments
- Master Gardeners on site
- Ribbon cutting by Chamber of Commerce

**When:** Saturday, May 4th, 9:00 – 12:00 noon

**Where:** Glenwood’s Giving Garden, behind McCormick Station, 24955 Ingrum Ave, Glenwood, IA

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Gardening is cheaper than therapy...

and you get tomatoes. ~Author Unknown
using a soapy water spray. Unfortunately, there is no easy cure for eliminating BEBs already inside the house. They are generally not killed by the aerosol household insecticide products, and most residual insecticides are not of much benefit. A sure control for bugs already in the house is to remove them as they appear by vacuuming, sweeping or picking them up and discarding. Treatment by professional pest control operators may be more effective than what homeowners can do using generally-available household insecticides.

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**Upcoming Horticulture Events of Interest:**

**Mills County Master Gardener Recognition Banquet**

**Date:** Saturday, April 13th  
**Time:** 5 PM (Social Hour), 6 PM (Dinner)  
**Place:** Toby Jack’s Mineola Steak House, Mineola

This is the 9th annual recognition banquet. The recognition ceremony and business meeting will start at 7 PM followed by a farewell party for Denise and Tracey Fikes.

**Mills County Local Foods Meeting**

**Date:** Thursday, April 18th  
**Time:** 5:00 PM  
**Place:** Mills County Engineers Building  
403 Railroad Road, Glenwood

Come join a diverse group of community members interested in making locally produced food more accessible, educating children about fresh local food, and creating a local grower’s network. Do you have ideas for a grown local group? We would love to hear them. All are welcome!

**Opening Day at Glenwood’s Giving Garden**

**Date:** Saturday, May 4th  
**Time:** 9:00 AM - 12:00 Noon  
**Place:** Behind McCormick Station  
24955 Ingrum Ave., Glenwood

Tour the garden, plant some flowers and vegetables, enjoy healthy refreshments, and see how you can be a part of this exciting community project! Volunteers are needed in all aspects of running the Giving Garden!

**Mills County Master Gardeners Plant/Bake Sale**

**Date:** Saturday, May 12th  
**Time:** 8:30 – 11:30 AM  
**Place:** Parking lot west of Glenwood State Bank

(See Page 6 for details)

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**Planting Potatoes in the Home Garden**

By Richard Jauron  
Horticulture Department  
Iowa State University

One of the most popular vegetables in the home garden is the “Irish” Potato. A native of South America, the potato didn’t become an important food crop until it was introduced to Ireland in the sixteenth century.

Potatoes prefer loose, fertile, slightly acid soils. Don’t apply large amounts of organic matter, such as manure, to the soil where potatoes are to be grown. The addition of organic matter may increase the occurrence of potato scab.

Since potatoes are susceptible to several serious diseases, buy certified disease-free potatoes from a reliable garden center or nursery. Home-grown potatoes saved from the previous year’s crop may carry undetectable diseases. Potatoes purchased at supermarkets may have been treated to prevent sprouting. Best results (excellent quality and high yields) are obtained with certified seed potatoes.

Large potatoes should be cut into sections or pieces, each containing 1 or 2 “eyes” or buds. Small potatoes may be planted whole. Seed piece decay may be a problem in cool, wet soils. This problem may be prevented by treating the cut seed pieces with a fungicide or by storing them at a temperature of 60 to 70 F and 85% relative humidity for several days. These storage conditions allow the cut surfaces of the seed pieces to heal or callus over before they are planted. Potatoes should be planted as soon as the ground can be worked in the spring. This is usually late March or early April in the central part of the state, a week earlier in southern Iowa and a week later in northern Iowa. Set seed pieces, cut side down, and small whole potatoes about 1 foot apart in a furrow 4 inches deep. Rows should be spaced 2 or 3 feet apart.

Suggested potato varieties for Iowa include:  
**Norland** is an early maturing red variety that produces oblong, smooth potatoes with shallow eyes. They are excellent boiled or mashed, but are only fair when baked.  
**Irish Cobbler** is an early maturing white variety. Potatoes (tubers) are round to blocky with deep eyes. Possesses excellent table quality. It is very susceptible to scab.  
**Superior** is a mid-season white variety with round to oblong tubers and medium deep eyes. The potatoes are very good baked, boiled, or mashed. It is resistant to scab.  
**Yukon Gold** is a mid-season yellow-fleshed variety. They are excellent baked, boiled, or mashed. The potatoes also store well.  
**Red Pontiac** is a late maturing red variety. Potatoes are oblong with deep eyes. It produces high yields with many large
grown in the state. European and hybrid plum varieties can be successfully not reliably cold hardy in Iowa. However, several plum varieties for home gardens. Japanese plums are Cold hardiness is an important factor when selecting What are some good plum varieties for Iowa?

Ask the ISU Extension Gardening Expert

When should bare-root trees be planted?

Bare-root trees and shrubs must be planted in early spring before growth begins. If rainy weather or other circumstances prevent planting within a few days of purchase, store bare-root material in a cool location, such as a garage or root cellar, until planting is possible.

What is the proper way to plant a bare-root tree?

Prior to planting, soak the tree’s roots in a bucket of water for one to two hours. Also, prune off damaged or broken roots.

When ready to plant, dig a hole that is 2 to 2.5 times wider than the spread of the tree’s root system. The depth of the hole should be equal to the distance from the tree’s trunk flare to the bottom of its roots. The trunk flare is the point where the trunk begins to spread out as it meets the roots. Build a cone-shaped mound of soil in the center of the hole. Place the tree on top of the mound. The trunk flare should be even with the surrounding soil surface. Spread the roots evenly over the mound. Then begin backfilling with the original soil. As you backfill, firm the soil in the hole with your hands. Place soil to the trunk flare. Finally, water the tree thoroughly.

Many shade and fruit trees are propagated by grafting. The graft union is located near the base of the tree’s trunk and is denoted by a bulge or crook in the trunk. The graft union is typically 1 to 3 inches above the trunk flare. When planting bare-root trees, be careful not to confuse the graft union with the trunk flare.

What are some good plum varieties for Iowa?

Cold hardiness is an important factor when selecting plum varieties for home gardens. Japanese plums are not reliably cold hardy in Iowa. However, several European and hybrid plum varieties can be successfully grown in the state.

European plum varieties that perform well in Iowa include ‘Mount Royal,’ ‘Stanley’ and ‘Damson.’ ‘Mount Royal’ produces small fruit with bluish black skin and greenish yellow flesh. ‘Mount Royal’ can be grown throughout Iowa. ‘Stanley’ (dark blue skin, greenish yellow flesh) and ‘Damson’ (blue skin, yellow flesh) are not reliably cold hardy in northern Iowa, but can be successfully grown in the southern two-thirds of the state.

Several hybrid plum varieties (introduced by the University of Minnesota) possess excellent cold hardiness and can be successfully grown throughout the state. Hybrid plums include ‘Alderman’ (burgundy red skin, yellow flesh), ‘Pipestone’ (red skin, golden yellow flesh), ‘Superior’ (red skin, yellow flesh) and ‘Underwood’ (dull red skin, yellow flesh).

European plums are self-fruitful. A single tree will bear fruit. Hybrid plums are self-unfruitful. Two or more hybrid plum varieties must be planted to ensure cross-pollination and fruit set. ‘Toka’ is an excellent pollinator for ‘Alderman,’ ‘Superior,’ ‘Underwood’ and other hybrid plums.

Which apricot varieties can be successfully grown in Iowa?

Cold hardiness is an important factor when selecting apricot varieties for home gardens. Many apricot varieties are not reliably cold hardy in Iowa. However, a few varieties can be successfully grown in the state. ‘Moorpark’ is reliably cold hardy in the southern two-thirds of Iowa. ‘Moorpark’ is self-fruitful. A single tree will bear fruit. ‘Moongold’ and ‘Sungold’ (University of Minnesota introductions) possess excellent cold hardiness and can be successfully grown throughout the state. ‘Moongold’ and ‘Sungold’ are self-unfruitful. Plant at least one tree of each variety for cross-pollination and fruit set.

Are there any peach varieties that can be successfully grown in Iowa?

Peaches are not reliably cold hardy in most parts of Iowa. It is possible to grow ‘Reliance’ (yellow flesh, freestone) and ‘Polly’ (white flesh, clingstone) in the southern one-third of Iowa.

Growing peaches in Iowa is challenging. Cold winter temperatures may destroy the flower buds on peach trees. A late frost or freeze in spring can damage or destroy the flowers. As a result, peach trees often bear few, if any, fruit. Gardeners in southern Iowa can anticipate a good crop about once every three or four years. Peaches are also short-lived in Iowa, often dying within eight to 10 years.
I would like to plant some raspberries this spring. Is it best to purchase plants from a garden center or can I transplant some from a neighbor’s garden?

Purchase virus-free raspberry plants from a reliable garden center, nursery or mail-order company. Plants obtained from an old raspberry planting are often diseased. Virus-infected plants may appear healthy, but grow and yield poorly.

Resources for Horticulture information
ISU’s Hortline at (515) 294-3108
(Monday-Friday, 10 AM-noon, 1-4:30 PM)

Iowa State University Publications
PM 874 Starting Garden Transplants at Home (free)
PM 683 Composting Yard Waste
PM 820 Garden Soil Management
RG 319 When to Divide Perennials
PM 0453 Fruit Cultivars for Iowa
PM 819 Planting a Home Vegetable Garden

Horticulture Publications on-line
https://www.extension.iastate.edu/store/ListCategories

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