



Growing and Overwintering Garden Geraniums

Garden geraniums (*Pelargonium × hortorum*) are popular flowering plants for beds, borders, containers, hanging baskets, and window boxes. Geraniums are easy to grow and provide color in the garden from May to frost. Flower colors are red, pink, salmon, orange, white, lavender, and bi-colors. Several fancy-leaf geraniums possess silver, white, gold, red, or purple markings on their leaves. In past years, most geraniums were grown vegetatively from cuttings. Today, many plants are grown from seeds.



Culture

Geraniums should be planted outdoors when the danger of frost is past. Generally, mid-May is a safe planting time for geraniums in central Iowa. Gardeners in northern counties should wait one additional week, while southern Iowans may be able to plant a week earlier.

Geraniums perform best in fertile, well-drained soils in full sun. Plants will grow in partial shade, but will not bloom well. For optimum flowering, geraniums should receive at least 6 hours of direct sun each day.

Geraniums respond well to applications of fertilizer. Prior to planting, apply and incorporate 1 to 2 pounds of an all-purpose garden fertilizer, such as 10-10-10, per 100 square feet of garden area. Geraniums growing in containers should be fertilized every 2 to 4 weeks with a dilute fertilizer solution.

During dry periods, a deep soaking once a week is sufficient for plants in beds and borders. Plants in containers require more frequent watering. Water geraniums in containers

when the soil surface becomes dry to the touch. If possible, avoid overhead watering as wet foliage encourages disease development. To keep plants blooming continuously throughout the summer, remove spent flowers (deadhead) on a regular basis. Deadheading prevents seed development and encourages the plants to produce additional blooms. It also improves plant appearance.

Overwintering

The first hard frost will destroy geraniums growing outdoors. However, it is possible to overwinter geraniums indoors. Before frost, pot up individual plants, take cuttings, or store bare-root plants in a cool, dry place. For all methods, select only plants that are healthy and disease-free.

Potted plants

Carefully dig up each plant and place in a large pot. Prune the geraniums back by one-third to one-half, then water each plant thoroughly.

Place the geraniums in a bright, sunny window or under fluorescent lights placed no more than 6 to 8 inches above the plants.

The lights should be turned on for 11 to 12 hours daily.

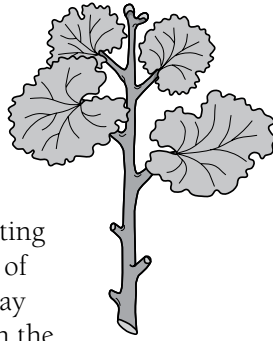
Geraniums prefer cool indoor temperatures. Daytime temperatures of 65° to 70°F and night temperatures of 60° to 65°F are ideal. (Geraniums become tall and spindly when grown in warm, poorly lit areas.)

During their stay indoors, water the plants thoroughly when the soil becomes dry. Occasionally pinch geraniums to produce stocky, well-branched plants.



Cuttings

Using a sharp knife, take 3- to 4-inch stem cuttings from the terminal ends of the shoots. Pinch off the lower leaves, then dip the base of each cutting in a rooting hormone. Stick the cuttings in a rooting medium of vermiculite or a mixture of perlite and sphagnum peat moss. Clay or plastic pots with drainage holes in the bottom are suitable rooting containers. Insert the cuttings into the medium just far enough to be self-supporting.



After all the cuttings are inserted, water the medium thoroughly, then allow it to drain. Place a clear plastic bag over the cuttings and container to prevent wilting of the foliage. Then place the cuttings in bright light, but not direct sun. The cuttings should root in 6 to 8 weeks.

When the cuttings have developed good root systems, remove them from the rooting medium and plant each rooted cutting in its own pot. Place the potted geraniums in a bright, sunny window or under fluorescent lights. Water plants thoroughly when the soil becomes dry.

Bare root plants

Dig the geraniums and carefully shake all the soil from their roots. Then place 1 or 2 plants in a large, brown paper bag and store in a cool (45° to 55°F), dry location. An unheated bedroom or indoor porch might be a suitable storage location. An alternate method is to hang the plants upside down in a cool, dry location.

In mid-March, prune or cut back each plant. Remove all shriveled, dead material. Prune to firm, green, live tissue. After pruning, pot up each plant and water thoroughly. Place the potted geraniums in a sunny window or under fluorescent lights.

Geraniums that are pruned and potted in mid-March should develop into attractive plants that can be planted outdoors in May.

Growing geraniums from seeds

Geranium seeds should be sown in early to mid-February to produce flowering plants by spring. Suggested seed-grown geraniums for Iowa include varieties (cultivars) in the Orbit, Maverick, Multibloom, and Elite series.



Using a germination medium, such as Jiffy Mix, fill a flat or other container to within 1 inch of the top and press lightly to firm. (If the medium is dry, moisten it before filling the container.) Sow the seeds in rows 2 to 3 inches apart and cover with $\frac{1}{8}$ inch of medium. After sowing, thoroughly moisten the medium by placing the container in a pan of warm water or by applying a fine spray to the surface. Then cover the container with clear plastic food wrap or a plastic dome. Geranium seeds germinate best at a temperature of 70° to 75°F.

Remove the plastic covering as soon as germination occurs. Place the seedlings in a sunny window or under fluorescent lights. Transplant seedlings into individual containers when their first true set of leaves is present.

For more information

For more information on selection, planting, cultural practices, and environmental quality, contact your Iowa State University Extension county office, or visit one of these ISU Web sites:

<https://store.extension.iastate.edu/>
<http://www.yardandgarden.extension.iastate.edu>
<http://www.reimangardens.iastate.edu>

If you want to learn more about horticulture through training and volunteer work, ask your ISU Extension office for information about the Iowa Master Gardener program.

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