

Pruning herbaceous plants

A certain amount of maintenance is needed to keep a garden looking its best. This minimal effort may mean all the difference between a garden that is mediocre and one that evokes compliments from neighbors. Deadheading, disbudding, pinching back, heading back, cutting back and thinning are all necessary pruning techniques. These chores will encourage plants to bloom for longer periods of time and improve overall plant appearance and health.

Deadheading – Removing spent or old flowers

Annual plants will produce many flowers throughout the growing season without much maintenance, while perennial flowering plants only flower for a 2 to 3 week period. However, they will both bloom more profusely over a longer period of time if they are deadheaded regularly. Deadheading is removing old or spent flowers by cutting or pinching flowers off. This practice helps extend the flowering season by stimulating plants to continue flowering. Annual plants must complete their life cycle in one growing season, from seed germination and plant growth to flowering and seed production. Removing flowers from both annuals and perennials before seeds form, at least every five to seven days, will interrupt this natural progression, preventing them from setting seeds, and stimulating the plant to try again and complete the process. Be aware that only specific perennials will rebloom or have a prolonged bloom time when deadheaded and that sometimes the second flush will produce fewer, smaller blooms. Also, allowing a plant to go to seed, or form seeds, will drain energy from it, not only resulting in less flowers, but a decreased growth rate and smaller leaves.

- Annuals that should be deadheaded include Pot Marigold (*Calendula officinalis*), Bedding Dahlia (*Dahlia*

pinnata), Pansy (*Viola tricolor*), and Zinnia (*Zinnia elgans*). Annual varieties that are self-cleaning, plants that drop their flowers as they begin to fade and will not produce seeds if they are sterile, include Wax Begonia (*Begonia semperflorens*), Coleus (*Coleus blumei*), and Edging Lobelia (*Lobelia erinus*).

- Perennials that should be deadheaded include Bellflower (*Campanula* spp.), Bee-balm (*Monarda didyma*), and Pincushion Flower (*Scabiosa* spp.). Examples of self-cleaning perennials are Asteromoea, (*Asteromoea mongolica*), Coreopsis (*Coreopsis verticillata*), and Phlox (*Phlox divaricata*).

Disbudding – Removing side buds

Gardeners who want their plants to produce a limited number of large flowers rather than numerous small ones should disbud their plants. Instead of cutting off mature spent flowers, disbudding is the process of removing young side buds and leaving the one terminal bud. The purpose for this is to direct the plant's energy toward inducing one, or sometimes a few buds, to grow into very large flowers. This technique is often used for flowers entered into contests where flower size is judged such as Common Peonies (*Paeonia officinalis*) and Carnations (*Dianthus caryophyllus*), although it may be done in the home garden for a showy effect. Plants should be disbudded when lateral buds are large enough to handle, which is about the size of a pea.

Pinching

No matter if the plants are started at home or grown by a professional, they should be pinched back. Pinching removes the terminal bud, or the tip of the vegetative shoot, along with the first set of leaves. It is only necessary to use fingers or a fingernail to remove this portion of the stem since it is often soft and fleshy.

Although some potential blooms are sacrificed, plants that are pinched back will produce even more flowers during the growing season. Once a plant is pinched, new lateral stems will grow from the stem that was pinched and each of these lateral stems usually sets flower buds. Pinching also:

- Prevents some herbaceous plants from growing tall and spindly, by maintaining a compact form and increasing flower numbers, and can help shape plants if a few stems have grown longer than surrounding stems, Chrysanthemums (*Chrysanthemum* spp.), for example.
- Can be used to stagger bloom time and produce a constant bloom effect. To achieve this, it will be necessary to pinch 1/3 of the stems during one session and another 1/3 of the stems each week for two more weeks. Make sure that you do not pinch 1/3 of the stems on only one side of the plant, rather evenly pinch plants on all sides so that flowering is uniform.

Flowering annuals that should be pinched back are French Marigold (*Tagetes patula*), Annual Phlox (*Phlox drummondii*), Scarlet Sage (*Salvia splendens*), and Trailing Verbena (*Verbena hortensis*). Flowering perennials that should be pinched back include Peach Leaf Bellflower (*Campanula persicifolia*), Bee-Balm (*Monarda didyma*), and Coneflower (*Rudbeckia* spp.).

Heading Back

Plants that look straggly or overgrown are good candidates for heading back. Heading back should remove stems to just above a lateral bud (approximately 1/4 to 1/2 inch above the bud). The newly trimmed plant should have a natural appearance as opposed to a sheared, formal look. Since these buds will emerge at different points on the stems, the shape and size of the plant and the direction of new growth can be somewhat controlled by the location of the bud that is left at the end of the cut. Heading back can stimulate development of smaller shoots and buds lower on the stem, resulting in denser growth. To be effective, only a small percentage, for example 25 percent of the top growth, should be removed from perennials in a single season. Heading back in combination with thinning will also help control the stimulation of new, dense growth.

Thinning Perennial Plant Stems

Thinning perennial plant stems is the process of removing 1/3 of the plant's stems at ground level when the plant is 1/4 to 1/3 of its mature size. After plants are thinned, the space between stems increases,

and the overall plant is less dense. Thinning a plant has many benefits.

- Increase air circulation and light levels between stems to prevent mildew, other diseases, and insects from infecting and infesting plants. An increased light level and air movement will also promote better branching on interior stems.
- Remove weak or thin stems to make plants sturdier.
- Shape a plant to give it a more attractive and less crowded appearance.
- Thinning may increase flower size, as with disbudding, since more of the plant's energy will be directed toward fewer buds.
- Plants are rejuvenated by new stem growth replacing stems that were removed.

Cutting Back

Cutting back the entire top of a declining perennial to the ground or near ground level will promote vigorous new growth. This technique can even extend the life of certain perennials, for example Coreopsis (*Coreopsis grandiflora* 'Badengold' and *C. lanceolata*) that flower themselves to exhaustion, and rejuvenate them. Cutting back can even stagger flowering if stems are cut back at weekly intervals. This technique is also done at different times of the growing seasons for different purposes.

- Cutting back before flowering will help with height control and stagger flowering if 1/3 of the stems are cut back during one session and another 1/3 are cut back each week for two more weeks.
- Cutting back can also enhance the overall presence of a plant. For example, Canary Grass (*Phalaris* spp.) often looks tattered, discolored, and worn out by mid-summer. Cutting back will promote new, vigorous, healthy growth for a good late-season foliage show.
- Cutting back after flowering is used for maintenance, by preventing plants from becoming woody or lanky, and can encourage new growth and sometimes new blooms. Perennials that flower at different times during the spring and summer will have different requirements for cutting back after they flower.

Consult a pruning manual that is specific for herbaceous perennials for more information. For all perennials that are cut back, they should be fertilized and watered well to encourage new growth and flowers. Any new growth will be shorter than the stems that were cut back, and flowers may be smaller than previous one.

For annuals, stems are cut back so that only 3 to 5 inches remain with about four or five nodes or leaf axils where a new branch will grow. Annuals that become leggy during mid-summer and produce fewer flowers will benefit from this type of pruning. Many varieties of Petunias (*Petunia x hybrida*) and Impatiens (*Impatiens balsamina* and *I. wallerana*) respond well to this practice.

Sanitation

Whichever pruning activity is being used, flowers and other plant material should be picked up off the ground because they could eventually encourage diseases such as botrytis. Constant high humidity next to moist soil on warm days, lack of air movement around closely set plants, coupled with decaying of diseased plant material makes conditions favorable for the spread of disease. If gardeners neglect to clean up plant debris, fungus may begin to grow and plants may start to rot at the base from the infection. By then, it is usually too late to save the infected plant. Although, if the plant is removed immediately, along with any other infected leaves, stems, and flowers, then damage may be limited. So, to discourage disease and the problems that will surely follow, it is well worth the extra effort for gardeners to practice sanitation by keeping the ground free of debris and removing bad and damaged foliage and flowers from plants.

Source

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