FORCING BULBS AND FLOWERING BRANCHES

When you "force" bulbs you are actually fooling them so they bloom indoors and out of season. By simulating the natural conditions that bring them into flower, bulbs can bloom months before their usual cycle.

There are four stages of growth that must be duplicated for bulbs to bloom:

1. Dormancy (no growth). Plant the bulbs at this stage.
2. Root growth. Light is not necessary. Temperature should be around 45°F. Temperatures below 35°F stop root growth. Temperatures above 55°F encourage top growth too early.
3. Top growth begins. Provide light and temperatures between 55-65°F for two to three weeks.

Tips
• For planting medium, use 2/3 commercial potting soil and 1/3 sand.
• Use clean pots with drainage holes. Size depends on bulbs being grown. Allow at least 2 inches of soil below bulb. The top of the bulb(s) should be at the top of the soil surface.
• Several bulbs can be planted close together in the same pot for a very showy bloom.
• Different kinds of bulbs require different periods of time to root. Don't combine different bulbs in the same pot unless they have the same rooting times and cultural requirements.
• Label each pot with the variety name, planting date and approximate date to bring out of cold storage.
• Temperatures must be between 35-50°F to produce a good root system. If keeping bulbs indoors, choose a cellar, unheated garage or basement, refrigerator or ventilated crawl space. Exclude light with tarps or boxes. Outdoors, pots can be sunk in the ground on the east or north side. Cover with several inches of mulch to exclude light and protect from temperature extremes. Pots can also be buried in a cold frame. Spread about an inch of gravel in the bottom and set pots on top.
• Keep planting medium barely damp. Maintain for ten to sixteen weeks, depending on variety.
Check pots regularly as date approaches looking for roots and development of small shoots. Bring bulbs into the light in temperatures around 55-65°F when roots and shoots form. Water when soil is dry to the touch. In a week or two, when shoots are several inches tall, move into bright light and temperatures of 68°F or above. Bulbs will bloom in about two weeks. After blooming, most bulbs cannot be forced again, but hardy ones can be planted outdoors. Leave the foliage intact and plant out in the spring.

Here is a list of bulbs, ease of forcing, rooting period and special instructions:

**Paper-white narcissus**: Very easy. No cooling or rooting period. Grow in soil or gravel. Plant the third week of November for Christmas bloom. Not hardy.

**Amaryllis**: Very easy. No cooling or rooting period. Start mid-November for Christmas bloom. Not hardy.

**Crocus**: Easy. 14-16 week rooting period. Can be potted in soil or gravel and water. Hardy.

**Hyacinth**: Easy. 12-14 week rooting period. Can be potted in soil or forced in special hyacinth vase using water only. Very fragrant blooms. Hardy.

**Colchicum (Autumn crocus)**: Easy. Will even grow and bloom without soil or water. Placed on a windowsill, will bloom in two weeks or so. Hardy.

**Muscari (Grape hyacinth)**: Easy. 16 week rooting period. Put numerous bulbs in one pot since they are very small. Hardy.

**Iris**: Medium. Small irises force best. Need good drainage and about 15 weeks of rooting. Hardy.


**Daffodils**: Difficult. Small or miniature varieties do best. 12-14 week rooting period. Daffodils require very bright light during top growth and flowering period. With insufficient light, daffodils will be leggy with no flowers. Hardy.

**CUT BRANCHES**

Branches can be forced to bloom or leaf out prematurely. Try any deciduous tree, shrub or vine. Plants that do particularly well are Japanese maple, flowering quince, forsythia, dogwood, witch-hazel, hawthorn, daphne, saucer magnolia, mock orange, pussy willow, spiraea and wisteria.
Tips

- Cut branches mid-January to early spring. If done earlier, buds will not have had sufficient chilling time.
- Choose heavily budded, sturdy branches. Thicker stems produce more flowers. Cut fairly long because they will need to be recut a few times.
- Use a sharp blade and cut on the diagonal.
- Think about the shape of the plant when you remove branches as though you’re pruning.
- Peel bark back from the base of cut stem and split up two or three inches. Remove lower twigs.
- Sink stems into deep containers of room temperature water. Place containers in warm, humid area such as a kitchen or bathroom.
- Change water every few days and recut stems occasionally.
- Growth usually begins in one to eight weeks depending on type of plant.

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