



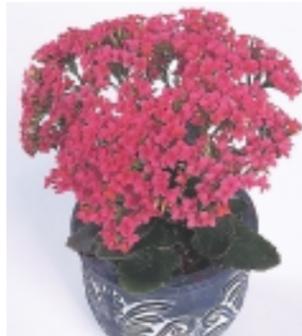
'Maxi Bright Red'

Intense breeding and selecting for the past 20 years by Dr. Lyndon Drewlow has resulted in vastly improved kalanchoes. With the Forever series, many of the production difficulties often associated with kalanchoes have been eliminated. No more time and labor for pinching, no more cost of multiple growth regulators sprays and no more guesswork in deciding which cultivars to grow in 4- or 6-inch pots. The Forever Midi series fits 4-inch pot cuttings and the Forever Maxi series fits 6-inch pots.

TRANSPLANTING

Transplant plugs into a well-draining medium with a pH from 5.5-6.2. Although one Forever Maxi fills a 6-inch pot, some growers still prefer to plant three per pot. For the initial establishment of the root system, maintain minimum night temperatures of 68° F and begin a constant fertilization program using a rate of 150 ppm.

Between September 1 and March 21, plants need to have night lighting to prevent premature flower bud initiation. Provide at least 10 foot-candles for two hours in the middle of the night. During the summer, grow the plants for one week before the start of short day treatment (SDT), and during the winter, grow for three weeks. Adjust this time to alter final plant height. Plants will generally produce three more nodes after the start of SDT. Use this fact to estimate the final height of the crop.



Top: 'Midi Sunset Pink';
Bottom: 'Maxi Antique Pink'

Culture Tips for Forever Kalanchoes

The Forever Kalanchoe series eliminates production difficulties while producing a top quality plant.

By Ed Mikkelson

FLOWER INITIATION

Kalanchoes are forced to flower by providing short days — 13 hours of darkness. This treatment must last six weeks to ensure the best flower initiation. Black cloth must be used from March 1 through October 15. Do not skip pulling black cloth, even one night, because this will delay the crop. Simply pull 4-mil black poly over the plants, and make sure the plastic is wide enough to drop just beyond the side of the bed. When the days are hot and bright, pull the plastic at 7 p.m. and remove at 9 a.m. to prevent heat delay. Since there is no need to black cloth after the end of six weeks, there will be no damage to the flower buds. Also, keep the plants pot tight in a tray during this treatment so they do not fall over while pulling the plastic on and off. During SDT, alternate feed with clear water. Temperatures can be dropped to 65° F.

FINISHING

After the completion of six weeks of SDT, kalanchoes may be grown under natural days without concern for flower bud abortion, but give the plants more space at this time. Four-inch pots should be on 5-inch centers and 6-inch pots on 9-inch centers. Return to a constant feed program of 150 ppm, except use clear water for the last two weeks of the crop.

The time to finish the crop from the start of SDT is very temperature dependent. It can range from nine weeks in the summer to 11 weeks in the winter. The finishing time is based on the European standard of one open flower on the plant. This is the ideal time to sell the crop; however, U.S. buyers often want one-third of the flowers open. Add about two weeks to reach this stage.

PESTS AND DISEASES

Aphids are the most predominant insect pest on kalanchoes, while mealybugs can also be a problem. Kalanchoes are not the first choice for thrips, but thrips will feed on them, and they can become infected with INSV. Scout for all of

these pests and treat accordingly, but do not use insecticides containing chlorpyrifos or EC formulations. Maintain good ventilation practices to help control Botrytis and powdery mildew. Many common fungicides may be used, but avoid using Rubigan or Karathane.

OTHER CULTURAL TIPS

To grow a finished crop of kalanchoes by directly sticking cuttings into the finished pot, increase the pre-SDT time by three weeks to allow for the rooting of the cutting.

To produce a very small finished plant (as small as 1-inch), direct stick a cutting in the finished container and immediately start SDT. Since a cutting does not perceive short day until it has initiated roots, the SDT should last eight weeks instead of six.

To produce a fast 4-inch crop, try direct sticking unrooted Maxi cuttings, and start SDT two weeks later. If height control of the flower stems is necessary, especially in the summer or in the South, use 2,500 ppm B-Nine four weeks after start of SDT. Kalanchoes respond well to inverted night temperatures (negative DIF). Use with caution. 

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'Midi Orange Glow'

True-colored azalea

'Bliss' is a showy, true pink florist azalea with large, single, fragrant flowers. A member of the Keepsake azaleas family, it has a compact spreading habit with some tiering and gaps in the head, which is mostly covered by its 4-inch flowers. The color is a true pink that is paler than 'Party Favor'

and 'Remembrance'. The color ages gracefully with minimal fading, and the large single flowers are 3¼-4 inches in diameter with a smooth petal margin. Flowers eventually drop when spent. The plant habit is a spreading type, and the foliage has attractive, medium-sized leaves with very good retention. Bliss' response and flowering uniformity have an average forcing time of 23 days, ranging from 15 days in spring to 37 days in the fall. Flowering uniformity is fair without gibberellic acid (Gib), but the use of Gib as required is highly recommended. The keeping quality of Bliss is 26 days. Yoder Brothers, Barberton, Ohio.

Write in 1400



Long-flowering campanula

'Bellringers' has unusual pendulous flowers (2-3 inches long) with eye-catching, maroon-spotted interiors in a color mix ranging from white to purple-red. Bellringers have stunning clusters of vibrantly colored flowers with a long flowering display from early summer until early autumn. Perfect in a background border with combination plantings, this campanula is a full, hardy plant that needs semi-shade to full sun. Plants are approximately 20-28 inches high. Use four seeds per plug. The sowing to flowering time is 11-12 months, and the sowing period is June and July. Temperature needs to be 68° F for 2-3 weeks during germination, with a growing temperature of approximately 53-57° F. Hardy in Zones 5-9. Kieft Seeds Holland, Venhuizen, The Netherlands.

Write in 1401



Clematis

Clematis 'Kivso Piilu' PPAF is a recent introduction from Estonia and the late plantsman/breeder Uno Kivistik. Piilu is a deciduous climber to about 6 feet high. It is a cross between clematis 'Hagley Hybrid' and clematis 'Mahrouyi'. The leaves are ovate, tapered and dark green. The flowers are light purplish pink with an eye-catching, wide dark purplish red bar. Piilu is considered a large flowering clematis with numerous flowers on one-year plants. Pride of Place Plants Inc., Sidney, BC, Canada.



Write in 1402

Rose

New Generation Roses are a line of hardy own-root roses that are easier to grow than grafted roses. The roses are bare-root hybrid teas, grandifloras, floribundas, English and climbers that perform best on their own roots. Planting is easier due to more pliable roots that need smaller holes and suffer less transplant shock. They have a winter hardiness that allows surviving roots to enable the plant to rejuvenate after a hard freeze. New Generation Roses are certified virus-free. Jackson & Perkins Company, Medford, Ore.



Write in 1404



Snapdragon

The Coronette series is suitable for landscape, garden and container uses. Stout stems make production easy and virtually eliminate the need for staking in the garden. In addition, Coronette's strong side branches hold blooms upright to stand from 1½-2 feet tall. Coronette is available in eight colors: Bronze, Cherry, Deep Red, Magenta, Pink, Scarlet, White and Yellow. A mix is also available. S&G Flowers, Downers Grove, Ill.

Write in 1403



Carex

Carex 'Lemon Zest' PPAF is a new foliage plant for the perennial market. This gold foliated plant tolerates moderate shade and prefers even moisture. It combines well with hosta and heuchera. Hardy in USDA Zones 6-9, it is deciduous, clumping and grows 12 inches tall and 18 inches wide. Terra Nova Nurseries Inc., Tigard, Ore. 

Write in 1405

Write in 759

Write in 757