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Gardening,  
Manage Their  
Landscape  
Investment &  
Protect the  
Environment

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## JC Raulston Arboretum Plant Focus

### Crinums Add Tropical Splendor

Crinums are great summer-flowering bulbs that have graced Southern landscapes for years. They lend a bit of nostalgia and add a delightful tropical touch to gardens. Their coarse sword-like foliage is lustrous and statuesque, providing a pleasing contrast to finer textured ornamentals.

The flowers of the more common crinums resemble those of the Easter lily. Many choices are available, however, and the flowers range from bell shaped to spiderlike in appearance. Colors range from deep reds, pinks and whites to bicolors. The white form 'Album' and the wine-red 'Rubra' are choice garden plants.

This member of the amaryllis family is one of the more cold-hardy bulbs, and it can be safely planted in the eastern regions of our mountains. Those living in the far western regions of North Carolina can grow crinums in containers that can be brought inside for the winter.

Plant crinums in April and continuing through late October. They thrive in sunny locations, provided the soil is moist, or in filtered shade. When looking for plants that grow well in woodland shade gardens, consider *C. moorei*.

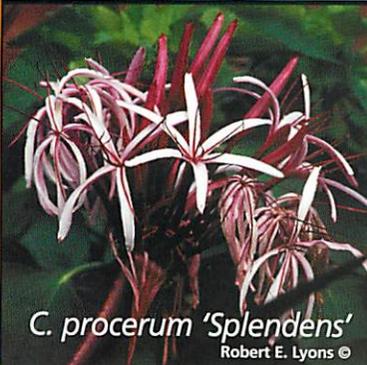
Newly planted crinums need to settle in for a season or two before they begin blooming freely. They do not like to be disturbed. After the first flowering season, apply a high-phosphorus fertilizer in mid-May each year. Provide plenty of water during the bloom period if there is a drought. After 4 to 5 years, remove the offsets and replant to enlarge your collection or to share with a gardening friend.

Many of the crinum cultivars are age-old hybrids. Most are crosses of *C. bulbispermum* and *C. moorei*, such as *C. x powellii* and *C. x scabrum*. Cultivars include white-flowering 'Schmidtii' and 'White Queen', pink 'Cecil Houdyshel' and 'Roseum', red 'Carnival' and bicolor 'Milk and Wine'.

Hardy crinums and their related hybrids are prominent members of the perennial border at the JC Raulston Arboretum. Tender species like the lovely purple leaf form, *C. procerum* 'Splendens', have been planted in containers for their seasonal beauty. **Darrell Blackwelder**

'Ellen Bosanquet'

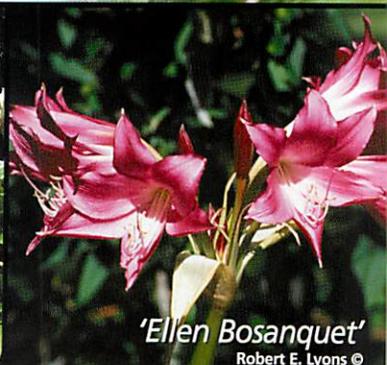
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*C. procerum* 'Splendens'  
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*Crinum moorei*  
Robert E. Lyons ©



'Ellen Bosanquet'  
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*Hibiscus 'Kopper King'*

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*Musa basjoo*

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*Colocasia esculenta  
'Black Magic'*

## Bring an Exotic Touch to Your Garden

Ah, the tropics. Vibrant colors, bold foliage, exotic blooms, warm breezes and easy, relaxing living. Tropical gardens hold an exotic appeal and the image may have you wanting one of your own. The question is, "Is it possible?" The tropics are the zones close to the equator and we're several zones away. Our temperatures drop below 40 degrees F, which they never do in tropical zones.

Thousands of strange and wonderful species of plants and flowers grow in the humid and warm to hot climate of the tropics and subtropics. The tropical rain forests of Central and South America have the greatest variety of tropical flowers while other species of flowering tropical plants are native to Hawaii, southern regions of China and South Africa and even southern Florida. Many of these plants are stunning but are these plants the ones to grow in North Carolina? Many dedicated gardeners grow tropical species in the warm summer months and drag them indoors or into a greenhouse in the winter. How many of us have the time, energy or space for tropical container gardens?

The good news is that there are alternative plant choices that look like the exotic plants in the tropics but are hardy here in North Carolina. This is a journey that can go as far as your imagination will take you.

Imagine a 4-foot ginger lily with 4-inch fragrant flowers accented by 6-foot elephant ear plants swaying in a sea of feather reed grass under the shade of a beautiful yucca.

Let's take a look at planting such a garden, step by step.

1. Start with your choice of a flowering perennial or woody plant that really has some spunk. Consider the ginger lily, *Hedychium sp.*; a butterfly bush, *Buddleia sp.*; one of the standard purple coneflowers, *Echinacea purpurea*; rose mallow, *Hibiscus mutabilis*; or go way out and try a voodoo lily, *Amorphophallus sp.*
2. Next, behind the flowering centerpiece add the big, bold foliage of the elephant ears, either the old-fashioned *Colocasia sp.* or the newly introduced *Alocasia sp.*; the strap-like foliage of the cast iron plant, *Aspidistra*; or one of those big fat hostas like 'Sum and Substance'. Other choices might include Canna lilies or *Fatsia japonica*, with its shiny green palmate leaves that look like a supersized schefflera. If you are willing to provide a little winter protection go ahead with a banana plant from either the genera *Musa* or *Musella*.
3. Add to the background with a mass planting of the feather reed grass, *Calamagrostis sp.*, one of many varieties of *Miscanthus sinensis* or the lovely fountain grasses, *Pennisetum sp.* You can achieve the same effect with mass plantings of dwarf pampas grass, *Cortaderia*, or even seeding love grass, *Eragrostis*.
4. The final cap might be a specimen yucca or agave (century plant). Agaves are delightful but anti-social Southwest native tropical plants. These spiny but beautiful plants are great in a rock garden or otherwise sited in a hot, sunny area. They might put you or your neighbors over the top. But if you like the idea of tropical gardens, this might be just the plant to add the finishing touch.

*Carl Matyac*

## Reduce Lawn Diseases

Fescue, bluegrass, ryegrass, Bermuda, centipede, zoysia and Saint Augustine grasses create green carpets for landscapes. These grasses are commonly mowed, fertilized, irrigated, dethatched, aerated and treated for weeds and insects, but diseases are generally an oversight or misdiagnosed in the residential landscape.

Lawn diseases need the proper environment, pathogen (spore) and host (grass) to develop properly and cause harm. There are about 10 diseases that are common to both warm- and cool-season lawns. Some of these include dollar spot, fairy ring, brown patch, rust and slime mold. Managing diseases in the lawn requires some knowledge about the time when pathogens are most likely to occur as well as the environmental conditions necessary for development. By knowing these, you can plan a treatment program. The condition or

environment that causes rapid development can be excess soil and foliage moisture, excess fertilizer, late fertilization, thatch and surface debris, mowing height, dull mower blades and drought.

While fungicides are available with a 7- to 21-day range of control, keep in mind that more than one application will likely be needed. They can be very costly, and the



Robert E. Lyons ©

see Lawn Diseases on page 3 ▶



## Why are the leaves on my cannas rolled up or riddled with holes in a straight line?

Sounds like the lesser canna leafroller is the culprit.

This leafroller is found throughout the southeastern United States. Canna leafroller caterpillars fasten the edges of leaves before the leaves unroll or they roll up one side of an open leaf. Within this shelter, the caterpillars feed on the leaves, sometimes chewing enough to bore through the rolled leaves. Infested leaves become ragged and shot through with holes. Heavily infested leaves may never open and die. Infested plants become unsightly and fail to bloom.

Adult moths appear in March and April in North Carolina. Females lay eggs in small patches. Tiny new caterpillars mine into the leaves until they outgrow the tun-

nels, then chew a circular hole in the upper surface and begin to roll the leaves. When fully grown, the caterpillars pull the surface of the leaf firmly together and spin a filmy cocoon. The second generation emerges in June. During the summer, lesser canna leafrollers may be found in any stage. Because lesser canna leafrollers overwinter as larvae in rolled canna leaves, collecting and destroying the above-ground portions of cannas after the first frost will remove much of the population. Early in the growing season, spray insecticides containing bifenthrin, pyrethrin or acephate downward to force the chemical into the open tops of the rolled leaves. *Mike Wilder*

## ENVIRO-TIP

### Decay-Resistant Hardscape Material

The wood many homeowners once bought for landscape projects is no longer on the market. Treated with chromated copper arsenate (CCA), the wood raised suspicions that the wood industry could never quell about arsenic. Even though no research-based evidence ever proved arsenic used in this manner caused a problem, the industry voluntarily removed CCA from the market.

Wood is now treated with alkaline copper quat, copper boron azole or acid copper chromate. Gardeners building an arbor, retaining wall or any other project with wood treated by these newer products won't see much difference. You may notice a different initial color. A buyer may also notice a slightly higher cost.

The higher cost of treated wood has steered some gardeners to stone, concrete or block. Even metal is being used in some applications. Plastics, particularly the recycled plastics, are also more competitive. There also are plastic resin compos-

ites. Some of the plastic products, however, are not suitable for structural components. In addition to plastic resin composites, there also are wood resin composites available in some markets.

Some local trees have decay- and insect-resistant wood. For ground contact, the best local woods are red cedar (heartwood only), bald cypress (heartwood) and black locust. There are more options for outdoor uses of wood when it doesn't come in contact with the ground. Oak has some decay resistance when used above ground, although it is a rare gardener who can afford it. A few ornamentals such as osage orange, yews, honey locust and photinia have natural decay-resistant wood.

There are some tropical woods that are naturally insect and decay resistant but avoid these woods unless you are sure your purchase doesn't encourage environmentally unsound or unsustainable forestry practices. *David Goforth*

## Lawn Diseases

*continued from page 2*

availability is often limited. The best advice is not to become totally dependent on fungicides to get conditions back to normal. Instead, take an integrated approach with other best management practices.

Try proven approaches as recommended by university specialists. These are:

1. Use of best adapted grasses.
2. Water deep and infrequently rather than shallow and regular.
3. Mow at the proper height and fertilize on schedule.
4. Don't place grass under stress by damaging it with herbicides (weed killers).
5. Detect problems early and seek advice on options through your local Cooperative Extension Center.

For more details on turf diseases, visit [www.turffiles.ncsu.edu](http://www.turffiles.ncsu.edu). Go to Publications. Scroll down to Disease-Like Problems on Turfgrasses in North Carolina.

*Donald Breedlove*



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## gardentalk



*"I love the tropics. It's a balmy part of the world where all life seems mellower and more exuberant and plants and creatures of all types show off their dazzling and outlandish color combinations."*

— Steven A. Frowine



Garden Spot

**Roan Mountain,** located in Mitchell County, is a spectacular natural wonder and one of the state's most valuable treasures. It is not a single mountain but is a five-mile-long ridge ranging from a height of 6,286 feet at Roan High Knob down to 5,500 feet at Carver's Gap. Located in the Pisgah National Forest, it is home to a section of the Appalachian trail, many mature spruce and fir trees and a 600-acre rhododendron garden, its most visited site. The rhododendrons draw thousands of visitors each June when the mountain is in full bloom with masses of red, pink and lavender flowers.

Another unusual sight at Roan Mountain is its grassy balds. These grassy meadows have been maintained for thousands of years, though their origin is not clearly understood. Some scientists believe the balds were grazed by prehistoric animals. This was followed by elk and bison and, in the last century, goats, hogs, mules and horses.

Learn more at [www.cs.unca.edu/nfsnc/recreation/roanmtn.pdf](http://www.cs.unca.edu/nfsnc/recreation/roanmtn.pdf).

**Donna Teasley**

## Gardening in June and July

### Lawns

- Do not allow children to ride or drive riding lawn mowers.
- Check lawn mower blade for sharpness and sharpen as needed.
- Water the turf sparingly to increase drought tolerance during summer heat.
- Raise the lawn mower blade on fescue; 3 to 3 1/2 inches is best for the summer.
- Let clippings fall for nutrient recycling.
- Be on the lookout for brown patch disease.

### Ornamentals

- Feed roses and continue fungicide applications to keep black spot to a minimum.
  - Keep chrysanthemums pinched to a height of 6 inches. This creates fuller plants that will bloom in the fall.
  - Propagate softwood cuttings of plants such as spireas, boxwoods and azaleas.
    - Watch for bagworms on evergreens and pick as necessary.
    - Keep newly planted trees and shrubs well mulched to conserve moisture when it's hot and dry.

### Edibles

- Remove sucker growth from the base of fruit trees.
- Keep vegetable garden looking neat by applying a layer of mulch which will hold weeds in check while keeping the moisture in the soil.
- Continue to side dress (fertilize) vegetables that have just begun to set crops.
- Pinch herbs to keep bushy and fresh with new growth.
- Remove black knot galls on plum stems.
- Remove the fruiting canes of raspberry and blackberry plants after harvest is over.

**Karen Neill**



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