

**Arkansas Plant Evaluation Program  
2000 Plants/ 2002 Final Report**

[Program information (data, reports, photographs) can be found on the internet at:  
[http://www.uark.edu/campus-resources/cotinus/arboretum\\_html/planteval.html](http://www.uark.edu/campus-resources/cotinus/arboretum_html/planteval.html)]

December, 2002

**Plants initiated in Spring 2000:**

The current team of cooperators includes Dr. Jim Robbins, Dr. Jon Lindstrom, and Manjula Carter. The three test sites are the Hope Research Center (USDA cold hardiness zone 8a), the Little Rock/Cammack property (zone 7a), and the Fayetteville Horticulture Research farm (zone 6b). As much as possible the three test sites were prepared in a similar manner. Full sun plants were grown in row-type beds 3' wide with a 7' grass alley. Plant groups are planted together (i.e. trees are planted together). Trees are spaced 10' apart, shrubs 6' apart and herbaceous perennials 4' apart. Little Rock site was planted on April 21, 2000; Fayetteville was planted on April 27, 2000; Hope planted on April 20, 2000. Plants at all three sites are irrigated as needed using drip tape. Plants were fertilized and mulched after planting. Post-emergent herbicides were used at all three test sites. No disease or insect control was implemented in 2002. The *Acer* and *Eucommia* were pruned following final growth measurements to establish a tree-like habit. Pruning consisted of removing the bottom 1/3 of limbs. Shrubs are NOT pruned. Final growth measurements were taken at Little Rock on October 18; Fayetteville on October 24; and Hope on October 17.

Plants at the Little Rock site do receive a few hours of shade generally during the morning hours. Fayetteville and Hope are very exposed, full sun sites. The Fayetteville site is characterized by consistent winds.

Weather for 2002 at all three test sites is summarized (see attached graph).

***Rhaphiolepis indica* Eleanor Taber™**

**Flowerwood Nursery** donated 3-gal plants. The winter of 00/01 proved to be a good test for this plant. Both cultivars of Indian hawthorn suffered severely at Fayetteville (USDA zone 6) but are growing well at Hope and Little Rock. Flowering at Little Rock began on April 22 and ended in early May. Average plant size at Little Rock and Hope is 31" tall by 49" wide.

***Rhaphiolepis indica* Olivia™**

**Flowerwood Nursery** donated 3-gal plants. Based on mortality at Fayetteville (all three Olivia™ dead; all 1999 planted Bay Breeze dead; only one Eleanor Taber™ dead) one might conclude that Eleanor Taber™ is slightly more cold tolerant than Olivia™ and Bay Breeze™. Regardless, *Rhaphiolepis* are not suitable for use in Fayetteville.

Flowering period in Little Rock was nearly identical to the above except that a significant re-bloom was noted in September. Leaves on Olivia™ are distinctly different from Eleanor Taber™. Leaves on Olivia™ are almost round (rounded-ovate) and slightly coarser than Eleanor Taber™. Average plant size at Little Rock and Hope is 31" tall by 51" wide (almost identical to Eleanor Taber™).

***Ternstroemia gymnanthera* Bronze Beauty™**

**Flowerwood Nursery** donated 3-gal plants. Again, the 00/01 winter was a great test winter for broadleaf evergreens including *Ternstroemia*. All three plants were killed at Fayetteville.

The most significant increase in growth was observed at Little Rock. Plants displayed a beautiful burgundy color in the outer most foliage in late fall. Average plant size at Little Rock is 76" tall by 55"

wide.

### ***Illicium parviflorum***

One-gallon plants were purchased from Pine Ridge Nursery, London, AR. This plant is a real dilemma for the program. Plants are growing very vertical and would benefit from being severely cut back to encourage more branching, however, protocol for the trial does not allow for intervention pruning except for trees. We also feel that this plant would benefit from at least partial shade in Arkansas.

All three plants died at Fayetteville and now two of the three have died at Hope. Remaining plants at Little Rock and Hope are growing better in year #3. Flowers, which are obviously not showy, began to appear at Little Rock in mid-June and continued sporadically for the next 2 months. Average plant size in Little Rock and Hope is 44" tall by 52" wide. These dimension seem in contrast to our above comments that the plant has grown more in a vertical direction than wide. The explanation is simple. Plants, without pruning, grew mostly with one single vertical leader. This later flopped over and is beginning to develop some lateral branches. Again, our plants would have benefited from heading back the single central leader in the first year but this is not allowed in our program.

### ***Diervilla lonicera* 'Copper'**

One-gallon plants were initiated at UofA by cutting propagation from a plant purchased from Arborvillage, Holt, MO. Plants continue to grow well at all three sites. Flowering in Little Rock and Fayetteville began in late May and continued through early September. The flower display is slightly showy. Fall color at Hope and Little Rock is not striking probably as a result of our intense heat. Plants I observed in Oregon in late August displayed exceptional burgundy/red fall color. Average plant size is 50" tall by 83" wide.

### ***Lonicera nitida* 'Ernest Wilson'**

One-quart plants originated from UofA cutting propagation from a plant purchased from Wilkerson Mill Gardens, Palmetto, GA. Growth rate was greatest at Little Rock and least at Hope. Plants in Fayetteville were killed to the ground during the 00-01 winter, but new growth emerged from the base of the plant. Flowers were not observed at any location in 2002. The plant, with very small fine textured leaves, averages statewide 32" tall by 61" wide. Many plants continue to lose leaves in the center of the plant resulting in a less than desirable appearance. In general, we still like this plant.

### ***Viburnum awabuki* 'Chindo'**

**North Carolina State University** donated one-quart plants. Janet Carson had seen this plant used extensively during a visit to Raleigh in 1999. All nine plants were surprisingly killed during the winter of 00/01.

### ***Rhus aromatica* 'Gro-low'**

**Bailey Nursery** donated bare-root plants. Plants continue to grow at a very rapid pace. The most significant increase in size was at Fayetteville where the plants now average 47" tall by 120" wide. Due to a planting error on our part we had to move two plants from Hope to Little Rock rather late in 2000. This procedure set two of the three Little Rock plants back severely, and contributed to the death of one plant. Average plant size statewide is 45" tall by 102" wide. Plants in Little Rock flowered in early April and in late April in Fayetteville. Fall color is almost non-existent at Hope and Little Rock. Again, we suspect that, like *Diervilla*, better fall color develops the further north this plant is used.

### ***Viburnum* x ‘Conoy’**

One-quart plants originated from UofA cutting propagation from a plant purchased from Wilkerson Mill Gardens, Palmetto, GA. The plant was a recommendation by Ewa Nelson, Morningside Nursery. I have been impressed with its glossy foliage, nice flower display, and tight plant habit.

All three plants died at Fayetteville and two have died at Hope. However, it should be noted that larger plants, not in the official trial, that are planted on the Fayetteville campus did survive the winter of 00/01. Flowering began at Little Rock in mid-April and lasted for 2-3 weeks. Average plant size at Little Rock and Hope is 30” tall by 50” wide.

### ***Viburnum* x ‘Emerald Triumph’**

**Bailey Nursery** donated bare-root plants. Cameron Rees of Skinner Nursery, Topeka, KS recommended this plant. Cameron spoke highly of the dark green leaves and plant habit.

The plant is not proving to be a winner at any of the three sites. Plant habit is not as tight as expected and we have observed dieback possibly related to our summer heat. Flowering began in Little Rock on March 14 and lasted until early April. Flowers last one week in Fayetteville and are malodorous. Average plant size in 54” tall by 51” wide.

### ***Abelia chinensis***

One-gallon plants originated from UofA cutting propagation. The source plant was from Woodlanders Nursery, Aiken, SC. This species is one of the parents of *Abelia* x *grandiflora*. Plants are growing very well at all three sites.

The flower display is very noteworthy. The white or very soft pink flowers appear in late June and continued through at least late August. Attractive soft pink calyxes followed the flowers giving the impression that the plant is still in bloom. This lasts until a very hard freeze. It is hard to separate the overall effect of the flowers and the pink calyx. Flowering began in Little Rock on June 11 and continued for at least several months. In Fayetteville, the plants had been killed to the ground during the winter of 00/01 but have recovered nicely. Average plant size statewide is 56” tall by 74” wide.

### ***Acer buergerianum***

**J. Frank Schmidt Nursery** donated one-gallon plants. All three plants died at Fayetteville during 2001. Trees in Hope and Little Rock grew exceptionally well. An unusual thing happened in Little Rock in August. Some animal, probably squirrels, began feeding on the trunk and lateral branch bark. In some cases the entire trunk was girdled but the shoot showed no wilting symptoms. What is amazing is that in our random plots the animal picked out every trident maple tree.

Average tree height at Hope and LR is now 13’ with an average trunk caliper at 6” of 3.5”.

### ***Eucommia ulmoides***

**J. Frank Schmidt Nursery** donated bare-root trees (4-5’ BR). The tree is finally starting to establish itself at LR but is struggling at Hope and Fayetteville. We will likely not recommend this tree for Arkansas landscapes.

The Ornamentals team would like to express their sincere appreciation to the cooperating nurseries (**J. Frank Schmidt Nursery, Bailey Nursery, and Flowerwood Nursery**) for donating the plants for this season’s trial and to the **Arkansas Green Industry Association** for financial support.