Some Exciting New Woodies and Perennials for Zones 7, 8, and 9©

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INTRODUCTION

Nurseries Caroliniana, Inc. is a retail garden center and wholesale nursery located in east-central South Carolina in the Savannah River Valley midway between the mountains and the coast in Zone 8a. The nursery was begun as a retail garden center providing unusual and hard-to-find plant material not readily available. In the early 1980s we began to grow plant material for our own consumption, and in the early 1990s began to sell to other nurseries, landscapers, and garden centers. We usually evaluate 100 to 200 new accessions each year to determine the best new material to be brought into production. We presently produce about 1500 taxa with a distribution of roughly two-thirds woody material and one-third herbaceous perennials. The following are some examples of what we have found to be some new and exciting plants which have piqued customer interest.

***Michelia maudiae* (Magnolia maudiae).** Probably within the decade, the genus *Michelia* will be classified as *Magnolia* according to Richard Figlar who is on the team writing the new classifications. This is an outstanding plant with foliage somewhat resembling *Magnolia virginiana* with its silvery undersides; whereas, the top of the leaf has a slightly blue-green tint. Its greatest asset however is its intoxicatingly fragrant white flowers which will range in size from 10 to 15 cm (4 to 6 inches) in diameter. Its mature height in China is reported to be 20 m (66 ft) but will probably be somewhat less in Western culture. The first few years it will anually grow 0.6 to 0.9 m (2 to 3 ft) with good nutrition and water. Its native habitat in China is equivalent to our Zones 9 and 10, but it has proven hardy to –18°C (0°F). Flowering is from early winter to early spring, depending on the plant, and we are trying to make selections for late winter flowering to enhance its acceptance by American gardeners. Even when in bloom during the winter, flowers do not usually succumb to light freezes like many oriental deciduous magnolias. We have made one selection which will be named 'Strawberry Parfait' because of its maroon center which tends to streak out through the petals. Propagation is best during the winter months using mist and bottom heat. Wood taken earlier is usually too soft and succulent and does not root as well.

***Michelia yunnanensis* (*Magnolia dianica*).** This species has leaves only 4 to 5 cm (1.5 to 2 inches) long and produces 5 cm (2-inch) white flowers in such abundance that they actually mask the foliage. Here in our Zone 8, they usually flower in early April. While fragrance is not one of its greatest assets, cold hardiness is. The growth habit is more shrub-like than tree-like with a slightly spreading habit. We have not had a high percent rooting compared to other species of this genus.

***Michelia skinneriana* (*Magnolia skinneriana*).** To the untrained eye, one would think that this is *M. figo*, which it closely resembles. I do not know what botanical characteristics this species has that makes it a separate species, but it

performs in our culture far better than *M. figo*. It appears to be slightly more cold hardy with flowers just as fragrant as *M. figo*, if not more so, but it has the added characteristic of flowers opening more widely than *M. figo*. With overhead irrigation, we had problems with leaf spotting with *M. figo*, which we do not have with this species. It is probably the easiest of all michelias to propagate using semi-hardwood cuttings almost any time of year.

***Manglietia insignis* (*Magnolia insignis*).** This magnolia has slender lanceolate evergreen leaves 15 to 18 cm (6 to 7 inches) long and produces flowers in terminal buds. Its mature height in its native China is 30 m (98 ft), but in Western culture, one could probably expect half that or less. The magnolia-like flowers on the selections we grow are a deep rose-pink which show interest for 3 days. Flower color apparently varies from cream-white with blush-pink outer portions to deep rose, depending on its geographical source of origin. As a young plant, this species is a very fast grower with more than 0.6 m (2 ft) annual growth for the first several years. It has taken temperatures as low as –18°C (0°F) with no damage. It propagates best from firm fall cuttings treated with 4000 ppm K-IBA under mist and responds well to bottom heat.

***Melia azedarach* 'Jade Snowflake'**. This variegated Chinaberry was from the J. C. Raulston Arboretum, NCSU, Raleigh, North Carolina and sports a stunning mottling of cream, green, and white variegation to its foliage. This selection was found on a farm near San Antonia, Texas in 1989. After temperatures reach over 32°C (90°F) in June, the new growth loses its variegation, but the older leaves retain their variegation. It has always attracted more customer interest than almost any plant in our garden, with our original plant reaching approximately 7.6 m (25 ft) in height. It is possible to root this selection from softwood cuttings under mist, but not in commercial quantities. Our original plant produces seed with variegated seed coats, and these seed come almost 100% true to form. The first year from seed, plants will grow a good meter (3 to 4 ft). I have heard reports of plants not coming true from seed, but our plant is probably almost completely self pollinated, with the closest species of this plant almost a mile away.

***Ulmus alata* 'Lace Parasol'.** Another introduction from the J.C. Raulston Arboretum, this native winged elm has an attractive weeping habit which shows to its best advantage during the winter when it has no foliage, displaying a very dramatic "winged" characteristic on all of its limbs. It does get powdery mildew, but not as severely as many plants in the wild. We have rooted this plant from softwood growing tips, but it grows off very slowly on it own roots; hence, we have resorted to grafting it, using *U. alata* understocks. We get up to 95% take with a side veneer or cleft graft using a 3 to 4 bud scion; first year growth will usually be 0.6 to 0.9 m (2 to 3 ft). We have also grafted it onto *U. parvifolia*, but growth does not seem to be nearly as good. We have grafted it onto *U. alata* standards, but we feel that the best effect is low grafts, 5 to 8 cm (2 to 3 inches) from soil line.

***Osmanthus fragrans* f. *aurantiacus*.** This orange-flowering tea olive puts on a spectacular display of tangerine-colored blossoms in September and October, with its best display of flowers coming in mid-October. The flowers seem to be more fragrant than its white flowering counterpart, but it lacks the intermittent flowering characteristic during the winter. I have seen this species in a garden in Clemson,

South Carolina, withstand –22°C (–8°F) with 64 kph (40 mph) winds with no damage. This selection appears to be far more cold hardy than others in the species. Its flowering and cold hardiness characteristics actually resemble *O. armatus* more closely than it does *O. fragrans*. I truly believe that its taxonomic classification needs to be reconsidered, maybe even giving it species status. Unfortunately, this plant does not commence flowering until it reaches 1.5 m (5 ft) or larger in height. The first flowers observed was in 7-gal containerized tree in the nursery. Propagation is by cuttings taken during early to mid-May and treated with 8000 ppm K-IBA. Rooting is usually quite slow.

Osmanthus fragrans* f. *thunbergii. This subspecies has all of the characteristics of the above form except that it has soft yellow flowers. Its leaves are slightly wider and somewhat more wavy, but its flowering time and cold hardiness seem to be identical to the above. Propagation is the same as for *o. fragrans* f. *aurantiacus*.

***Osmanthus fragrans* 'Fudingzhu'.** This rather new introduction from China puts on the most spectacular display of flowers that I have ever witnessed with any *Osmanthus* species. Its 1-year-old stems are actually encircled for 4 cm (1.5 inch) with white-fragrant flowers. It is most showy during mid-October flowering, but continues to flower by the old adage "in every month with an 'r' in it" even with 1-year-old plants flowering heavily. Its cold hardiness is similar to the species, but not as good as the previous two forms. Propagation is the same reported for *O. fragrans* f. *aurantiacus*.

***Stachyurus praecox* 'Issai'.** This species produces hanging racemes of soft yellow flowers in late winter and early spring on a deciduous shrub which will reach 3 to 3.7 m (10 to 12 ft) with an equal spread. The racemes are formed during late summer and fall before flowering. This plant is best grown under broken shade. This cultivar, 'Issai', means "first" or "number one" in Japanese, and was first introduced from Japan by Barry Yinger, and sports racemes of up to 30 cm (12 inches) long. On older growth, racemes will tend to divide and will usually produce 3 to 5 branches, making a spectacular display of flowers. Propagation is by semihardwood cuttings treated with 2000 ppm K-IBA under mist. This selection is such a precocious flowerer that it is difficult to get enough propagation wood. There is no vegetative bud at a node where a raceme is produced, so even though cuttings made from this wood root quite well, they will not grow off. One must be careful to acquire cutting wood only from stems with vegetative buds. A liner will produce a saleable 2- to 3-gal plant with flower buds in one growing season.

***Edgeworthia chrysantha* (rice paper plant).** This genus has three recognized species, *E. gardneri* (a tender evergreen plant flowering in the fall), *E. papyrifera* (see. *E. chrysantha*), and *E. chrysantha*. The last two are the ones commonly found in commerce. *Edgeworthia papyrifera* has much smaller leaves, smaller flower heads, less fragrance, and is far more prone to root rot. *Edgeworthia chrysantha* is superior in all respects, producing leaves up to 30 cm (12 inch) long and 8 cm (3 inch) wide, large flower heads of over 5 cm (2 inch) in diameter with great fragrance and more cold hardiness. It is in the Daphne family *Thymelaeaceae* and subsequently produces daphne-like flower heads in late summer and fall, which are displayed quite prominently throughout the winter months on the tips of almost every branch. In mid-February the flower buds open to a medium yellow with a narcissus-like fragrance and remain for several weeks. Fall color is a soft yellow. We propagate this

species from semihardwood cuttings taken from June to August and treated with 2000 ppm K-IBA placing them in 7.6-cm (3-inch) pots under mist. They are potted in 1- or 2-gal cans the following spring.

***Leucothoe racemosa* (sweetbells leucothoe).** One of the best native shrubs for wet locations and is probably the best *Pieris* substitute for the Deep South. We grow a selection from Woodlanders, Aiken, South Carolina, which is practically evergreen for us. It is very compact in growth habit, eventually reaching 1.2 m (4 ft) with an equal spread. Its *Pieris*-like racemes flower in April with such profusion that they tend to mask the foliage. It roots well from summer wood under mist. Little known, this plant will grow from Zones 5 to 9, but will probably be deciduous in colder areas. If given adequate moisture, it does well in full sun.

***Hydrangea serrata* (Wilson 7820).** This low spreading hydrangea is a great "tall" groundcover and was introduced by Ernest Wilson early in the last century, still bearing his introduction number. It has a lax, spreading habit producing soft pink to soft blue (depending on the aluminum availability) 7.6-cm (3-inch) lacecap flower heads in May.

***Hydrangea quercifolia* 'Montmorenci Rose'.** This selection of oakleaf hydrangea was found in a garden in Aiken Co., South Carolina, and has the characteristic of opening white and then almost immediately turning a deep rose. The flower heads are 25 cm (10 inches) and hold up quite well. It propagates conventionally like any other *H. quercifolia*.

Indigofera amblyantha. This species of indigo has a tall wispy habit and mixes well in shrub or perennial borders. It begins flowering in Zone 8 in early April and continues until mid-October. Its racemes are indeterminate, with the same raceme which begins flowering in April continuing to elongate and flowering until fall. It roots quite well from softwood cutting taken any time during the growing season, but because of its precocious flowering characteristics, vegetative wood is difficult to find. We have found that the best propagation wood comes from suckers around the base of the plant. Seed is also a viable alternative.

Rostrinucula dependens. According to Dan Hinkley of Heronswood Nursery, Kingston, Washington, this plant was collected by the Sino British Expedition into Guizho Province, China in the mid 1980s and was thought to be in the family Buddleiaceae. It has since been identified as *Rostrinucula dependens*. It produces cottony racemes during mid to late summer and then in late August lavender-pink bottlebrush-like flowers begin to open at the base and continue for 6 weeks to the tip. Some racemes have been measured up to 33 cm (13 inches) in length, with most of them ranging from 20 to 25 cm (8 to 10 inches). It has flowered for us in sun or shade, with the ultimate height not known, but thought to be in the 4 to 5 ft range. It is an extremely easy rooter anytime during the warmer months.

***Albizia julibrissin* 'Summer Chocolate'.** This Japanese selection of the more familiar mimosa produces deep burgundy foliage which retains its color without turning until its leaves drop in the fall. We are working to graft this selection onto wilt-resistant understocks since the ubiquitous wilt will usually strike this plant a few short years after planting. We are using a wilt-resistant clone from the National Arboretum as well as the species *A. kalkora*. Even though some of the latter have

been planted for up to 20 years in the South, none have been know to succumb to the "wilt" problem, so it is thought to be wilt-resistant.

***Agapanthus* 'Bressingham Blue'.** This cultivar is reported by the British to be the most cold-hardy clone of African lily. We have known it to withstand –22°C (–8°F) in Raleigh, North Carolina. It has rather narrow foliage with flower stems to 76 cm (30 inch) tall with very dark blue flowers heads. We propagate this cultivar by division, but many varieties are propagated by tissue culture. Performs best in full sun and yearly applications of lime will enhance flowering.

***Eucomis comosa* 'Sparkling Burgundy'.** This is a pineapple lily selection of Tony Avent of Plant Delights Nursery, Raleigh, North Carolina. It has deep burgundy strap-like foliage up to 61 cm (24 inches) long with a 76-cm (30-inch) flower stalk in mid summer. Flowers are a pale creamy-pink. Best foliage color is produced in full sun. Though native to South Africa, this selection is quite cold hardy, withstanding temperatures where the container completely froze throughout. It is easily propagated by leaf cuttings by taking 8- to 10-cm (3- to 4-inch) sections of a leaf and placing the basal end in the rooting medium with no hormone treatment. Roots will form along the basal cut followed by small bulbils which then sprout foliage forming new plants.

***Wisteria sinensis* 'Augusta's Pride'.** This is purported to be the original Asian wisteria introduced into America by the Berckmans family of Fruitland Nurseries in Augusta, Georgia in the early 1800s. Fruitland Nurseries is known to be the oldest nursery in the Southeast. Upon examining the old catalogs of Fruitland, one is immediately impressed by their offerings of cultivars which are even hard to find today. This original wisteria is still growing at the back corner of the clubhouse of the Augusta National Golf Club, which was the former manor house of the Berckman's estate, until it was purchased by Bobby Jones and Clifford Roberts in the 1920s for their now famed course. It has a trunk of nearly 51 cm (20 inches) in diameter, but over the past several years it has developed a decaying area at its base. To save this plant, I was asked to propagate from this original vine so smaller plants could be planted around the mother plant and eventually approach grafted into it for extra support. We were given several plants of our original rooted cuttings. Since this plant has never been given a cultivar name, we are calling it 'Augusta's Pride'. The double flowering Carolina jessamine, *Gelsemium sempervirens* 'Pride of Augusta' was also an original Fruitland introduction. This plant has become extremely popular, not only because of its historical significance, but because of its horticultural qualities as well. It is one of the most fragrant wisterias that I have ever smelled, but its best distinction is its precocious flowering characteristics. From rooted cuttings, it will flower from its first year on, with an abundance of lavender-purple racemes of 25 to 30 cm (10 to 12 inches). It was thought that flowering from an old plant might be a juvenility factor, but when taking cuttings from other established flowering wisterias, they reverted to the vegetative state for a number of years before resuming their flowering again. So the flowering characteristic of this selection seems to be an inherent genetic trait. Propagation is from semihardwood cuttings in June and July using 2000 ppm K-IBA.