NEW OR RARE ORNAMENTAL PLANTS RECENTLY DISTRIBUTED TO COMMERCIAL NURSERYMEN BY THE ARNOLD ARBORETUM

One of the functions of the Arnold Arboretum always has been to distribute new or rare ornamentals of high quality to the commercial propagators and so make them available to the plant-buying public. Many gardeners in the northeastern United States may not have had the opportunity to realize that the Arnold Arboretum has been doing this since it was established in 1872. Propagating material of plants not available in the trade in the form of seeds, cuttings, scions and budwood is frequently given commercial nurserymen who request specific items. Eight years ago a special program for the distribution of new or rare plants was started, and over 60 species and varieties of new or rare ornamental woody plants have been distributed to commercial sources as a result. It is always easy to lose sight of the fact that new plants are being made available to commercial sources (especially when no extensive advertising accompanies the program!). In 1941 a general program of propagation was started at the Arnold Arboretum in which particular new or rare ornamental woody plants were specifically grown for the nurseryman.

Our experience had shown (see ARNOLDIA, Series 4, Vol. VIII, No. 3, May 1940) that seeds, buds, cuttings and scions when given to nurserymen frequently "failed" for several reasons. As a result, rare specimens in the Arboretum were being heavily cut in order to provide commercial growers with propagating material. Too often young plants propagated by nurserymen from such material, easily obtained, were quickly sold or forgotten, and requests were repeatedly made to the Arnold Arboretum for more propagating material.

As a result of years of experience, it was decided to actually grow plants here in the Arboretum, and to offer these to the commercial growers under the agreement with the Arboretum that such plants could neither be sold nor patented, but could be used for propagating purposes by the nurseryman receiving them.
These plants are only sent to those nurserymen requesting them specifically, since it is reasonable to expect that all commercial propagators are not interested in all types of woody plant materials.

The plants noted in this issue of ARNOLDIA are either new or rare in American gardens, and are certainly worthy of greater use. They have been sent to one or more commercial propagators as plants, and the recipient nurserymen are noted in the following pages. Gardeners who are interested in obtaining any of the following plants should write the nurserymen receiving them. Plants sent out in 1947 and 1948 would not yet be available from the nurserymen, since there has not been sufficient time for them to propagate and grow adequate stock material.

The advertising benefits derived from taking out a "patent" on a plant are rather marked, but the Arnold Arboretum does not wish to limit the propagation of any of its introductions in this unique way. The following list of plants sent to commercial propagators and the probable sources from which they may be purchased will serve as a finding list, we hope, for those adventurous gardeners who may wish to acquire some of this material.

**Plants sent to cooperating nurserymen with notes accompanying them**

* = first introduced in the United States by the Arnold Arboretum.

Numbers refer to "List of Cooperating Nurserymen" (page 64), who have received the plant for propagating purposes.

*Acer campestre compactum* – small tree

First introduced in 1900

Distributed 1943 17, 18, 21, 22, 23

Here is a very good form of the hedge maple which is perfectly hardy in this area. Because it requires little clipping, it may be valuable in certain low, informal hedges. The ultimate yearly growth is only about six to ten inches.

*Acer palmatum atropurpureum* – small tree

Distributed 1943 8, 11, 17, 18, 19, 21, 22, 23, 25, 27

We offered seedlings from a tree which has been growing on grounds adjacent to the Arnold Arboretum for nearly fifty years. The color of the foliage is a dark red throughout the entire year, and it does not change to a greenish hue in the late fall. All of the seedlings have the identical characteristics of the parent plant, including the same good color. The original tree is probably no better than many other trees of the same name, except that its hardiness and constant color have been demonstrated. This maple also has the advantage of being parthenogenetic.

*Acer rubrum columnare* – 50' +

In the Arnold Arboretum since 1899

Distributed many times and 1943 19, 21, 22, 23, 25, 27

The oldest specimen of this columnar maple which we have growing in the
Arnold Arboretum is about sixty feet tall with an approximate twelve-foot spread of the branches. It is an easily-propagated, fast-growing maple which is valued for its columnar to narrow-pyramidal habit.

*Acer saccharum monumentale* - 50' +

In Arnold Arboretum since 1885

Distributed many times and in 1943 19, 21, 22, 23, 25

A slender, slower-growing form of the sugar maple which is dignified by the common name, "Sentry Maple." We have had many demands for this tree during the past thirty years because of its narrow, upright habit, and are now about to stop sending out large amounts of propagating material.

*Albizzia julibrissin rosea* - small tree

First introduced 1918

Distributed many times and 1948 4, 11, 13, 18, 19, 21, 25, 27, 29, 31

This variety, introduced into the United States by the Arnold Arboretum about 1918, is more hardy than the species, and does well in Boston except in the most severe winters. Seedlings twelve to eighteen inches tall were available for trial. The hardiness of these seedlings is still questionable, but all seed came from the original plant that has been growing here since 1918. Seedlings should be worthy of trial, but need further protection during the first few winters in the north. Seed is the best method of propagation at present, but root cuttings are worthy of a trial.

*Berberis triacanthophora* - 4'

First introduced 1908

Distributed many times and 1941 2, 17, 19, 22, 23, 25, 27

This is the hardiest and most useful of the evergreen barberries and the most attractive. The narrow leaves are a clear, bright green in color, and it is one of the few evergreen barberries which are immune or highly resistant to the wheat rust. As a result of this immunity, the Plant Quarantine Act allows for its purchase and sale by nurserymen in the United States. It is easily propagated by cuttings.

*Carpinus betulus compacta* - small tree

In the Arnold Arboretum since 1922

Distributed 1942 11, 14, 17, 18, 19, 21, 22, 25

Here is a shrub with all the good qualities of *Carpinus betulus*. In addition, it is densely compact, slow in growth, and gives the appearance of being clipped. This plant is hardy in Zone 5, and is chiefly propagated by grafting.

*Celastrus flagellaris* - Vine

First introduced 1905

Distributed 1942 4, 17, 18, 19, 20, 21, 22, 25

The bittersweet is the only one of those hardy in this area to have thorns. The thorns, however, are only about 1/4" long. We offered plants of the fruiting form (pistillate). This plant does not grow as fast as the other bittersweets,
but it does make a good ground-cover, and it forms a dense, impenetrable mass of vines and foliage when grown over a low fence. Cuttings are the best method of propagation.

*Celastrus orbiculata major - Vine

First introduced 1920

Distributed 1942 4, 17, 18, 19, 20, 21, 22, 23, 23

Plants of the fruiting or pistillate form of this variety were offered which had fruits nearly twice the size of the species. The Arnold Arboretum introduced this plant into the United States from China. This excellent vine is perfectly hardy and is easily propagated by cuttings.

Clethra barbinervis - 30'

In the Arnold Arboretum since 1886

Distributed 1941 2, 17, 19, 22, 23, 27

This shrub can be classed as picturesque because of its reddish bark which flakes off almost as much as the bark of Acer griseum. The flowers are fragrant, and the shrub sometimes reaches a height of twenty-five feet. Propagation is by cuttings and seed.

*Corylopsis platypetala - 10'

First introduced in 1908

Distributed 1941 8, 17

This shrub is only hardy south and west of Philadelphia. It is propagated by seed.

*Cytisus praecox - 4-6'

First introduced 1924

Distributed many times and in 1942, 1943 4, 11, 17, 18, 19, 20, 21, 22, 23, 25

When we first offered this plant for distribution, it was being sold only by two or three nurseries in the country. Last summer we had unusual success with an experiment in the propagation of this species, and we are therefore offering it again. Two series of cuttings were run, one with every care and moisture consideration a cutting required, and the other simply on an open greenhouse bench in the hot sun, where the rooting medium frequently dried out. The rooting of the "checks" on the dry greenhouse bench was nearly one hundred per cent, and so this can be recommended as the best practice. When something is as easily propagated as this, it should become popular. You will remember that the Warminster Broom is noted for its pale lemon-yellow flowers which are prolifically produced in May, and for its colorful twigs which are green all winter long. It is one of the hardiest brooms in the Arnold Arboretum collections, and it will recover quickly from heavy pruning.

Cytisus purpureus - 1-2'

In the Arnold Arboretum since 1878

Distributed 1942 4, 11, 17, 18, 19, 21, 22, 25, 27

This broom is a decided asset in any rock garden or in a foundation planting
PLATE XIV

Hardy form of the silk tree (*Albizia julibrissin rosea*): close-up of flowers and the tree itself as it blooms throughout the summer in the Arnold Arboretum.
where a low flowering plant can be used. It is not much over a foot high and has large purple and white flowers in May. It is perfectly hardy in this area and is propagated by cuttings.

*Deutzia candelabrum*
First introduced 1908
Distributed 1943 4, 17, 18, 19, 21, 22, 23

*Deutzia “Contraste”*
First introduced 1932
Distributed 1943 4, 17, 18, 19, 21, 23

*Deutzia “Magicien”*
First introduced 1932
Distributed 1943 4, 8, 17, 18, 19, 21, 22, 23

*Deutzia rosea eximia*
Distributed 1943 4, 17, 19, 21, 22, 23

These Deutzias might well be considered as a group. None of them are any hardier than the “Pride of Rochester” group. All are slightly taller than *D. gracilis*. *D. candelabrum* and *D. rosea eximia* bloom at the same time as *D. gracilis* and the other two bloom about a week later. In the large collection of Deutzias at the Arnold Arboretum, these four and *D. gracilis* are the most outstanding in flower. The flowers are all single and all but those of *D. candelabrum* are slightly pink. *D. candelabrum* has the largest flower clusters of this group. My suggestion would be, if you are interested in Deutzias other than those you now carry, to try out all four and make your own selection for propagating from this group, after you have observed them in flower.

*Forsythia “Arnold Dwarf” – 2*
Originated in the Arnold Arboretum 1942
Distributed 1946 and 1948 10, 13, 17, 19, 21, 25, 26, 29, 30

*Forsythia intermedia × japonica “Arnold Dwarf”* is a small dwarf forsythia, developed by the Arnold Arboretum, which should be of value as a border plant or as a ground cover. The original plant in the Arnold Arboretum nursery is about two feet tall and it had a spread of over seven feet at the age of six years. The drooping branches strike root readily and form a mat of foliage. The leaves are small, about an inch long, and are ovate or ovate-lanceolate with serrated margins, sometimes pinnatifid. Unfortunately this dwarf forsythia has not flowered even after eight seasons of growth and we are not sure that it will flower. Even without flowers, its vegetative habit is so attractive that it should be of value for certain types of planting.

*Ilex yunnanensis – 12*
First established in 1929
Distributed several times and 1942 11, 17, 18, 19, 21, 22, 27
This holly is evergreen even in New England. It has red berries and small
**PLATE XV**

*Prunus* "Hally Joviette," conspicuous for its double white flowers opening during a several-weeks period in early May.
leaves similar to those of *Ilex crenata* or boxwood. Plants of the pistillate form were offered and fruiting is obtained when pollen from other species is available. The pollen requirements of this form have not been worked out definitely, as yet, to insure fruiting, but it is hoped that we will be able to have staminate plants of the same species available in a few years. It is propagated by cuttings.

*Kalopanax pictus* – Tree 75' First introduced in 1892

Distributed many times and 1948 3, 16, 17, 22, 25, 26, 31

Although this tree has been growing in the Arnold Arboretum since 1892, it has been a neglected ornamental. One reason for this may be that it is difficult to propagate and the seeds take two years to germinate. It is a tree of striking tropical appearance, with large five-to-seven lobed leaves, sometimes fourteen inches across. Thorns are present on the young plants, and the flowers and fruits are akin to those of the Aralias. This plant is reported to be propagated by root cuttings as well as by seeds.

*Laburnum alpinum* – 30' In the Arnold Arboretum since 1874

Distributed many times and 1942 12, 17, 21, 23, 27

This species is considerably hardier than *L. vulgare*, and is, in fact, the hardiest of all the Laburnums. In addition, the flower clusters are longer than those of *L. vulgare*. It may be propagated by grafting, or by seed.

*Ligustrum vicaryi* – 6’ In the Arnold Arboretum since 1933

Distributed 1948 4, 10, 17, 18, 19, 21, 25, 27, 30

This privet probably originated some time before 1920 in the garden of Vicary Gibbs of Aldenham, Middlesex, England. It has been growing in the Arnold Arboretum since 1933, when it was obtained from the New York Botanical Garden. Its chief ornamental characteristic is its yellow foliage which remains a good yellow throughout the spring and summer, especially when grown in the full sun. In partial shade this coloring is not so pronounced. It is probably a cross between *L. ovalifolium aureum* and *L. vulgare*. The weaker and shaded leaves are fully green. If a bright yellow-leaved privet is desired for its color in the full sun throughout the growing season, this is it. Easily propagated by cuttings.

*Ligustrum vulgare pyramidale* – 8’ In the Arnold Arboretum since 1888

Distributed many times and 1941, 1942, 1946 17, 18, 21, 22, 25, 27

This is an unusual dense privet of narrow pyramidal habit, which is of considerable value from the standpoint of its form. Being a variety of *L. vulgare*, however, it is susceptible to the same serious twig blight, and should be grown only in areas where this disease does not prove serious. It is easily propagated by cuttings.
*Lonicera amoena arnoldiana – 8’ Originated in the Arnold Arboretum 1919
Distributed several times and 1941 17, 18, 22, 23, 25
The abundant, slender-stalked flowers of this hybrid honeysuckle are white, flushed with pink. The plant has an interesting arching habit and the foliage is a grayish-green color, making it one of the most distinctive of honeysuckles. It is easily propagated by cuttings.

*Lonicera maximowiczii sacchalinensis – 9’ First introduced 1917
Distributed many times and 1941 17, 19, 22, 23, 25
This is valued chiefly for its dark red flowers, which are the darkest of any among the honeysuckles. The fruit is bright red. It is easily propagated by cuttings.

*Lonicera praeflorens – 6’ First introduced 1917
Distributed 1941 17, 18
The flowers of this plant, which is the earliest of the honeysuckles to bloom, usually appear in early April before those of L. standishi. Except for this the plant is of little value, since the flowers open so early that in the latitude of Boston they are often killed by frost. Softwood cuttings are the best method of propagation.

*Magnolia kobus borealis First introduced 1876
Distributed many times and 1942 4, 8, 11, 12, 17, 18, 19, 21, 22, 23, 27
This plant is not new, but it is often hard to find in nurseries. The flowers of this tree-form are larger than those of M. kobus. Propagation may be done by grafting.

*Malus baccata columnaris – 50-75’ First introduced by the Arnold Arboretum in 1927
Distributed 1942 4, 12, 14, 17, 18, 19, 20, 21, 22, 25, 27
This crab apple is especially fastigiate when it is young. A twenty-five-foot specimen growing in the Arboretum had a branch spread of only about four feet in diameter. However, older and larger plants begin to lose this fastigiate habit, and this is of course true of other fastigiate crab apples. Hence its chief ornamental value is while it is still young. It is perfectly hardy and is propagated by grafting.

*Malus “Dorothea” – 15-20’? Originated in the Arnold Arboretum before 1943
Distributed 1948 2, 3, 4, 10, 11, 13, 16, 17, 18, 21, 25, 26, 27, 30, 31, 32
This was a chance seedling in the Arnold Arboretum and was first noticed in bloom when it was about five feet high, on May 17, 1943. It is probably a cross between M. halliana parkmani and M. arnoldiana, the foliage resembling
Malus "Dorothea," a new crabapple noted for large semi-double pink flowers which do not fade, and brilliant yellow fruits.
the former somewhat, and the fruits, the latter. The original plant and plants
grafted from it have bloomed very well. Flowers are semi-double (eleven to
sixteen petals) 1\(\frac{5}{8}\)" to 2" in diameter, and a pale crimson or Tyrian Rose (22/1
to 24/2 of the British Horticultural Colour Chart) with darker buds. The
flowers do not fade white. This is one of the very few crab apples with semi-
double flowers which also bear fruit, in this case \(\frac{1}{2}\)" in diameter and a golden-
yellow when exposed to direct sun. This combination of large semi-double
pink flowers, followed by colorful fruits, is rare among the ornamental crab
apples and should make this one of the best for two seasons of interest. It is
named for the eldest daughter of Dr. Donald Wyman who originally found it
growing in the Arboretum.

*Malus "Katherine" - 15-20'?
First introduced 1943
Distributed 1948  1, 2, 3, 4, 10, 13, 16, 18, 19, 25, 26, 27, 30, 31, 32
This is a seedling which was found growing in Durand Eastman Park, Roches-
ter, New York, and named in 1943 by Dr. Donald Wyman. The double flowers
are over two inches in diameter, with nearly twenty petals. The flower buds
are deep pink and the flowers gradually fade white. Even though the flowers
are double, they are followed by small red fruits, making this double-flowered
crab apple one of the best of its kind. It is propagated by budding and grafting.

*Malus "Prince Georges" - 15-20'?
First introduced 1943
Distributed 1948  1, 3, 4, 13, 16, 18, 21, 25, 30, 31
Originating in the form of seed in the Arnold Arboretum in 1919, this is prob-
ably a hybrid between *M. ioensis plena* and *M. angustifolia*. The flowers are very
double, two inches in diameter, and light pink. Blooming at the same time as
*M. ioensis plena*, the flowers have more petals, and the leaves are narrower. It
was originally grown by the Glenn Dale Station of the U.S.D.A. Division of
Plant Introduction and it is named for the county in Maryland in which the
Station is situated.

**Philadelphus grandiflorus** - 9'
Distributed 1941  17, 22, 23, 25
This is one of the best of the native mockoranges from the standpoint of habit.
It grows about six to twelve feet high and has drooping branches which face
well to the ground on all sides. The flowers are 1\(\frac{1}{2}\)" in diameter, slightly square
in shape and are not particularly fragrant. The shrub is perfectly hardy and is
easily propagated by cuttings.

**Philadelphus inodorus** - 6-8'
Distributed 1943  19, 20, 21, 22, 23, 25
The flowers of this native mockorange are single, 2" in diameter, and borne in
Malus "Katherine," also noted for double white flowers, followed by a wealth of small red fruits.
groups of one to three. They are pure white, but not very fragrant. What makes this one of the outstanding mockoranges in our collection of about 100 different kinds is its lustrous dark green foliage and its arching branches which face the ground on all sides, something which is not found in most Philadelphus species. The habit of growth makes up for the lack of fragrance in the flowers. When habit of growth is more important than flower production alone, P. inodorus could well be used.

**Philadelphus splendens** - 6'

Distributed 1941, 1948 2, 3, 16, 17, 18, 21, 22, 23, 25, 27, 30, 31, 32

Another excellent native mockorange from the standpoint of habit, a hybrid between two American types. Its excellent rounded habit of growth makes it a far better lawn specimen than either P. coronarius or P. virginalis. The flowers are not so square in shape as those of P. grandiflorus and it is easily propagated by cuttings.

**Populus maximowiczii** - 90'

First introduced 1878

Distributed many times and 1942 14, 17, 18, 22, 23

This tree is one of the handsomest of the poplars. It is hardy in New England, is a vigorous grower, and has leaves which are a dull dark green above and whitish beneath. Propagated by hardwood cuttings.

**Prinsepia sinensis** - 10'

First introduced 1903

Distributed many times and 1941, 1946 3, 4, 5, 17, 21, 22

This shrub is particularly thorny and it has considerable merit as a tall, dense, spiny barrier plant. The flowers are small and yellow and they appear very early in the spring. The leaf buds begin to open sooner than practically anything else. It is propagated by seed and possibly by cuttings.

**Prunus “Hally Jolivette”** - 15'

Originated 1941

Distributed 1948 3, 11, 13, 17, 18, 19, 21, 22, 23, 29, 30, 31, 32

This is an ornamental cherry of the Prunus subhirtella type which was originated and first introduced by the Arnold Arboretum in the spring of 1948. It is a small, graceful tree with semi-double flowers which are a delicate pink when first open and white when fully open. The continuous succession of bloom is distributed over a ten-day period to several weeks, depending on the season, and the plants begin to bloom when only two years old. This hybrid is a cross of P. subhirtella × yedoensis back-crossed with P. subhirtella. Dr. Karl Sax, who produced this hybrid, has given it the maiden name of his wife, “Hally Jolivette,” the translation of the French name meaning “pretty little one.”

**Sambucus canadensis maxima** - 8'

First introduced 1908

Distributed many times and 1943 18, 20, 21, 22, 23
This is the largest flowering and fruiting variety of the species. When properly grown, the flower clusters are over twelve inches in diameter. This variety might well replace the species which is grown from seed in most nurseries. Easily propagated by cuttings.

**Symphoricarpos orbiculatus leucocarpus - 3’**

Distributed 1942 17, 18, 21, 22, 25

This native plant is comparatively new and is only listed by one or two nurserymen. It is similar to the coralberry, except that the fruits are white and not red.

*Syringa vulgaris “Congo” - 15’*

First introduced in 1900

Distributed many times and 1942 17, 19, 21, 22, 25, 27

This is an old favorite, originating in the Lemoine Nurseries in France in 1896, and one of the best of the dark purples.

**Syringa “Evangeline” - 20’**

In Arnold Arboretum since 1936

Distributed 1942 4, 8, 17, 18, 19, 21, 22, 23, 25, 27

F. L. Skinner originated this plant in 1935. It is a cross between *S. vulgaris* and *S. oblata dilatata*.

**Syringa josiflexa “Guinevere” - 20’**

In Arnold Arboretum since 1935

Distributed 1942 4, 8, 17, 18, 19, 21, 22, 23, 25, 27

This is one of the newer lilacs which rates with the best and was originated by Miss Isabella Preston of Ottawa, Canada. It is a cross between *S. josikaea* and *S. reflexa*, and it blooms with the *S. prestoniae* types.

**Syringa “Hedin” - 20’**

In Arnold Arboretum since 1936

Distributed 1942 4, 8, 17, 18, 19, 21, 22, 23, 27

This is a cross between *S. villosa* and *S. sweginzowii*, and it was originated by F. L. Skinner of Manitoba, Canada, before 1936.

**Syringa “Mrs. W. E. Marshall”**

Distributed 1941 4, 17, 18, 19, 22, 23, 25, 27

This is one of the darkest purples of all the *Syringa vulgaris* hybrids and was originated by Mr. T. A. Havemeyer of Glen Head, Long Island, in 1924. It is easily propagated by softwood cuttings immediately after flowering.

**Syringa laciniata - 6’ (formerly *S. persica laciniata*)**

In Arnold Arboretum since 1881

Distributed many times and 1941 4, 17, 18, 19, 22, 23, 25, 27

The arching branches and the small, deeply-cut leaves of this plant probably make it the most graceful of all the lilacs. The foliage gives it particular merit.
It is rather difficult to propagate, but softwood cuttings and “Rootone” give fair success, and it comes fairly well from seed.

**Syringa prestoniae hybrids – 20’**

Here are some of the best of Miss Isabella Preston’s lilacs with several of the introductions of F. L. Skinner in Manitoba, Canada. Several are listed, but note the way they compare with each other. All, of course, are late-blooming, appearing a week or so after the *S. vulgaris* hybrids, and all are very hardy, even more hardy than many *S. vulgaris* hybrids. These plants must be tried out in a number of places in order to find which are best. Those nurserymen who are interested in them should try a few and see which do best under their own conditions. (For more complete information see ARNOLDIA, Vol. VIII, No. 7, 29-36, July 23, 1948.)

“Handel” originated by F. L. Skinner in 1932; in Arnold Arboretum since 1936
Distributed 1942, 1943 4, 8, 17, 18, 21, 22, 23, 25, 27

“Hecla” originated by F. L. Skinner 1932; in Arnold Arboretum since 1936
Distributed 1942 4, 17, 18, 21, 22, 23, 27

“Isabella” originated by Miss Isabella Preston, Ottawa, Canada, before 1927; in Arnold Arboretum since 1935
Distributed 1942, 1943 4, 8, 17, 18, 19, 21, 22, 23, 25, 27

“Nerissa” originated by Miss Isabella Preston; in Arnold Arboretum since 1938
Distributed 1942 4, 17, 18, 21, 22, 23, 27

“Octavia” originated by Miss Isabella Preston; in Arnold Arboretum since 1938
Distributed 1942 4, 17, 18, 21, 22, 23, 27

“Paulina” originated by Miss Isabella Preston; in Arnold Arboretum since 1938
Distributed 1942 4, 17, 18, 21, 22, 27

*Syringa pubescens – 20’*  
Distributed many times and 1942 4, 18, 19, 21, 22, 23, 25, 27

This is the most fragrant of all the lilacs and the color varies from pink to white. It is not outstanding in flower and is valued only for its fragrance. It is not new, but it is rather hard to find in nursery catalogues.

*Syringa swegiflexa – 20’*  
First introduced 1936
Distributed 1942 4, 17, 18, 21, 22, 23, 27
PLATE XIX

Upper: Viburnum dilatatum xanthocarpum. Lower: Viburnum setigerum aurantiarum.
This is a cross between S. streginzowi and S. reflexa, originating in the German Nursery of H. A. Hesse before 1935. The panicle of bloom is 8" tall by 6" wide at the base, pyramidal in shape, and loose and open in growth. The flowers are a deeper pink than those of "Isabella" but soon fade white. It does not have the purple tinge that most S. prestoniae types have, and for this reason the color is good, but the loose panicles of bloom may be too much of a deterrent. It certainly is worth a trial.

Taxus cuspidata aurescens - 2' In the Arnold Arboretum since 1919
Distributed many times and 1948 17, 20, 21, 22, 23, 24
This yew is of value because it is very low, not over 1 1/2' tall. The tips of the branches and their foliage are a golden yellow in the spring and early summer, changing to yellowish during late summer and continuing this color throughout the winter.

Taxus cuspidata expansa
Distributed 1943 4, 17, 18, 19, 21, 22, 23, 24, 25
Many nurserymen do not realize that T. cuspidata is normally a single trunk tree! This variety is the typical vase-shape so frequently sought as an ornamental.

Ulmus parvifolia - 50'-+ In the Arnold Arboretum since 1884
Distributed many times and 1946 1, 2, 5, 17, 19, 21, 25
This is a small tree about 50' tall with a broad, round head. It is the true Chinese elm and is one of the few elms to color red to purplish in the fall. Older trees are particularly outstanding for their mottled bark. It is also far less susceptible to attacks of the Japanese beetle than is Ulmus pumila. Like Ulmus pumila, it is fast-growing and has weak wood, but because of its autumn color and mottled bark may be of more ornamental value than is generally recognized at present. It is easily propagated by seeds or cuttings.

Viburnum dilatatum xanthocarpum - 9' In the Arnold Arboretum since 1919
Distributed several times and 1941 2, 4, 8, 17, 19, 22, 25
This shrub is similar to V. dilatatum except that it has yellow fruits.

Viburnum fragrans - 9' In the Arnold Arboretum since 1920
Distributed 1941, 1942 4, 11, 12, 17
This is the earliest of the Viburnums to bloom. The plant itself is perfectly hardy north of New York, but the flower buds appear so early in the spring that in the vicinity of Boston they are frequently killed entirely by cold weather. The flowers are somewhat similar to those of V. carlesi, though not as good. Propagation is by cuttings.
Viburnum opulus xanthocarpum - 12’  In the Arnold Arboretum since 1898
Distributed many times and 1943, 1948  3, 4, 10, 16, 17, 19, 21, 22, 25, 26, 27, 29, 31
This shrub is similar to V. opulus except that the fruit is a golden yellow. Although we have offered it for distribution several times, it still is not grown as much for landscape work as it should be. It is easily propagated by cuttings, and both it and V. dilatatum xanthocarpum add considerably to any situation in the fall because of their colored fruits.

*Viburnum sargenti flavum - 10’  First introduced 1904
Distributed 1948  3, 4, 16, 17, 18, 19, 29, 30, 31
The yellow-fruited Sargent viburnum is still very rare. Its golden-yellow fruit is its chief ornamental characteristic. As a result of a five-year experiment, I have found that, although the seeds will not yield 100% yellow-fruited plants, nevertheless the plants can be segregated as one or two-year seedlings according to the color of the leaf petiole. Red petioled leaves are borne on plants which later on will produce red fruits, and yellow or greenish-yellow petioled leaves are only borne on plants which later will produce yellow fruits. This is an accurate means of differentiation in the seed bed years before fruit is borne.

*Viburnum setigerum aurantiacum - 12’  First introduced 1908
Distributed many times and 1941  4, 8, 17, 18, 19, 22, 23, 25, 27
This is of considerable merit because of its reddish-orange fleshy fruits. It is easily propagated by cuttings. All of the viburnums on this list add materially to the color range of this group in the fall.

*Weigela “Bouquet Rose” - 8’  First introduced 1913
Distributed several times and 1943  4, 8, 11, 17, 18, 19, 21, 22, 23, 24
The flower of this weigela is about the same size as that of W. “Gracieux” but it is a pale pink, making it one of the best of the hybrids growing in our collection from the standpoint of conspicuous color.

*Weigela “Gracieux” - 8’  First introduced 1905
Distributed several times and 1943  4, 8, 17, 18, 19, 20, 21, 22, 23, 24
The flowers of this variety are white on the inside of the corolla and are streaked with purplish-pink on the outside. They are 1 1/4” in diameter. This and W. “Bouquet Rose” are among what might be considered the best of the French hybrids and might well be compared with varieties grown commercially.

Donald Wyman

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List of Cooperating Nurserymen

(Those nurserymen receiving the plants listed from the Arnold Arboretum have been listed according to number under each plant.)

4. Bobbink & Atkins, East Rutherford, N. J.
5. Bristol Nurseries, Inc., Bristol, Conn.
10. F & F Nurseries, Springfield, N. J.
12. Glen St. Mary Nursery, Glen St. Mary, Fla.
13. Hicks Nursery Co., Westbury, Long Island, N. Y.
15. Hillier & Sons, Winchester, England
18. Henry Kohankie & Son, Painesville, Ohio
20. Manitoba Hardy Plant Nursery, Dropmore, Manitoba, Canada
22. Rare Plants Nursery, Linwood, N. Y.
23. Rockmont Nursery, P. O. Box 266, Boulder, Colo.
24. Sherwood Nurseries, 141 S. E. 65th Ave., Portland, Oregon
25. Siebenthaler Co., Catalpa Drive, Dayton, Ohio
26. Snyder Bros., Inc., Center Point, Iowa (now called Linn County Nurseries)
28. Verhalen Nursery Co., Scottsville, Texas
29. Verkade’s Nurseries, Wayne, N. J.
30. Wayside Garden Co., Mentor, Ohio
32. Wyman’s Framingham Nurseries, Framingham, Mass.