ARNOLD ARBORETUM HARVARD UNIVERSITY

BULLETIN

OF

POPULAR INFORMATION

SERIES 3. VOL. II MAY 24, 1928 NO. 7

Cornus florida. Rarely has there been such a display of Flowering Dogwood in the Arboretum and the vicinity of Boston as at the present moment. On Long Island and southward the abundant blossoms of this tree are an annual spectacle but hereabouts it is only when favored by a mild winter that it flowers freely. Entitled to rank among the most beautiful of the lesser trees of northern forests, Cornus florida has an immense range of distribution, being found from eastern Massachusetts to southern Ontario and southwestern Missouri, southward to central Florida and the valley of the Brazos River in Texas, and reappearing on the mountain ranges of eastern and southern Mexico. Comparatively rare in northern Massachusetts, the Flowering Dogwood is one of the commonest and most generally distributed inhabitants of the deciduous forests of the middle and southern states, forming an under story under the shade of taller trees in rich, well drained soil from the coast well up toward the summits of the Alleghany Mountains. It is a slender tree from 15 to 40 feet tall and has a light, airy, flattened crown with the branches often in tiers. If examined in the autumn or winter the branches will be found to be dotted with gray rounded studs. As spring advances these swell and expand each into a cross, from 4 to 6 inches across at maturity, composed of four snow-white bracts which become stained with pink as they age and fall. So freely are the white crosses produced that the woodlands when viewed from vantage points are filled with seemingly floating drifts of purest white. The leaves, which develop as the showy bracts fall, are in opposite pairs and in the autumn they become brilliantly tinted, red or crimson passing to pink, with the under surface pale gray-white. The fruit is erect, scarlet and teat-like, and clustered several together add much to the beauty of the tree in the fall. The real flowers are small and inconspicuous and are crowded together in the centre of the cross. The Flowering Dogwood is at once the envy and despair of our cousins across the Atlantic. Although introduced into the British Isles so long ago as 1730 all efforts to grow it successfully

prove unavailing. Here and there a flowering specimen is known but insufficient summer heat more than the changeful spring weather is the cause of its failure under English skies.

Cornus florida rubra with rosy red bracts is a great favorite and this year its bracts seem to be more highly colored than usual. Rightly placed, say on a slope above a pond where it can be viewed across the water in which the flowers are reflected, it is particularly striking. It is often stated that all the Red Dogwood plants in cultivation originated by vegetative propagation from one individual tree discovered in the seventies of last century. As a matter of fact it is beautifully figured on plate 27 of Catesby's "Natural History of Carolina" published in 1754. There is a variety (pendula) with stiff pendulous branches, discovered about 1890 in the forests of Maryland, and another (pluribracteata) in which the number of bracts is increased to six or eight and a few small bractlets in the center replace the flowers which are nearly all aborted. This form was discovered in Orange County, North Carolina and propagated by Mr. J. D. Van Lindley, Greensboro, who in 1914 sent a plant to the Arboretum which, however, has not yet flowered. There is also a variety (xanthocarpa) with yellow fruits but none of these are likely to equal in popularity the type and the variety rubra.

Cornus kousa. The wonderful C. Nuttallii of western North America, the Chino-Himalayan C. capitata, and C. kousa, which is distributed from central China eastward through southern Korea into Japan, are three other tree species of Flowering Dogwood. The first two are not hardy in the Arboretum but C. kousa and its Chinese variety, fortunately, are. Unlike the native C. florida, these three species flower after the leaves expand and their buds being enfolded within the leaves enjoy a greater measure of protection. In the Arboretum the flowers of C. kousa and its variety chinensis are of greater bud hardiness than the native C. florida, and in consequence are even more valuable garden plants. C. kousa does not flower until mid-June or later, and its upstanding heads of rigid slender stalks have a foil of rich green leaves below. The floral heads, each from 5 to 6 inches across, are abundantly produced and last for fully a month finally becoming pink before they fall. The form from Japan to which the specific name belongs has been sparingly in cultivation in the Occident since about 1830. The form from China (var. chinensis) was introduced for the Arborteum by Wilson in 1907. The bracts are larger and broader than is usual in the Japanese type and often overlap to form a closed, flattened involucre around the button-like mass of real flowers. Some experts acclaim this the finest gift of China to western gardens; certainly it ranks high in the realm of beauty among hardy flowering trees. The fruit of Cornus kousa is red and strawberry-like, from 1/2 to 3/4 of an inch in diameter, and is very attractive in the autumn suspended amid the vari-tinted often vinous purple foliage. It is edible and the orangecolored sweetish pulp is quite palatable though in it are imbedded several large, hard, stony seeds. The native Flowering Dogwood has



been freely planted about the Arboretum but the Japanese species is confined to Centre Street Path and its Chinese variety to Bussey Hill. Not before mid-June will the Oriental Dogwoods be in blossom.

Bunchberries. It would seem a far cry from trees 30 to 80 feet tall to lowly herbs a few inches high. But a glance at the flowers shows that the relationship is very close between the Flowering Dogwoods and the Bunchberries of North America (*Cornus canadensis*) and of Europe and northern Asia (*C. suecica*). For shaded rockeries, woodlands and sheltered nooks there are no prettier little plants than these, howbeit they are rather coy unless they find soil and situation exactly to their liking.

Fothergillas. Why are the Fothergillas so little known in gardens? So long ago as 1765 one species (F. Gardenii) was in cultivation and in 1780 a second species, now known as F. major, was growing in England. These are figured in the Botanical Magazine for 1810 (tt. 1341, 1342). The genus itself commemorates an old time worthy, one Dr. John Fothergill, who in the 18th century had a garden at Stratford-le-Bow famous for its collection of American plants. Fothergillas are purely American shrubs, being native of the Alleghany Mountains and adjacent parts of the southeastern states. Three species are now recognized though the difference between two of them (F. major and F. monticola) are admittedly s'ight. F. Gardenii, the first known, is really the poor relation of the group. All three are very hardy shrubs, freely sending up erect shoots from the base which branching plenteously form dense bushes. They are relatives of the Witch-Hazels and resemble them closely in foliage. The flowers, however, are very different in appearance consisting of long, erect white stamens tipped with yellow anthers crowded together in ovoid, rounded, 2-inch high clusters at the ends of the innumerable The whole inflorescence is fragrant and very connaked branchlets. spicuous, resembling a bottle-brush and quite different from that cf any other hardy northern shrub. The shrubs are very free-flowering and in the autumn the leaves assume a brilliant crimson in the case of F. Gardenii and red, orange and yellow in the other two species. In habit F. major is a sturdy compact shrub, oval in general outline and 10 feet and more tall. F. monticola is looser, more spreading and less tall though equally vigorous. The other species (F. Gardenii) is a more slender plant, seldom more than a yard high, with weak, often lolling stems, and smaller flower-clusters. In the Arboretum these Fothergillas flourish, F. major and F. monticola especially, in any soil and situation though a sandy peat soil and a cool situation best meet their needs. They fruit freely but violently eject their seeds, so careful watching is necessary if these be needed. They may also be increased by cuttings of ripened wood under glass, by layering and by suckers. E. H. W.