Early-flowering Broad-leaved Evergreens. The most interesting of these plants in the Arboretum now is probably the Japanese Rhododendron Metternichii which, although it has been growing here in a shady position close to the Bussey Brook for five years, is flowering this spring for the first time. The rose pink flowers on one form have six or seven petals and on another only five petals (var. pentamerum). This last is the form growing in the Arboretum and probably the common form generally planted. This Rhododendron forms great masses from five to ten feet high on the borders of Lake Yumoto among the Nikko Mountains at an elevation of five thousand feet above the sea. Rhododendron venustum, which has been more generally cultivated under the name of R. Jacksonii, has been an inhabitant of the Arboretum since 1908. It is perfectly hardy here always and it is now covered with its expanding pink flowers. It is considered a hybrid of the of the Himalayan R. arboreum and R. caucasicum, and was raised in England by William Smith at Kingston in 1889. By English writers on Rhododendrons it is considered one of the most valuable early spring-flowering Rhododendrons for all gardens. It is perfectly hardy and will grow in an exposed position in the poorest soil. It is easily and cheaply raised from layers and probably when better known will be largely used in this country for the edging of beds of broad-leaved evergreen plants. The white-flowered form which is occasionally cultivated in Europe is not yet in the Arboretum. Pieris (Andromeda) floribunda, judging by an experience of over fifty years, is the only broad-leaved evergreen to which nothing happens in this climate. It is not attacked by borers, the leaves are never discolored, and the
flower-buds formed in autumn and almost as conspicuous in the winter as the flowers are not injured by the lowest temperature which has been recorded in southern New England. It is a round-topped shrub of compact habit sometimes eight or ten feet across and five or six feet high, with small, pointed, dark green leaves and short terminal clusters of pure white flowers. A native of the high altitudes on the southern Appalachian Mountains, it is rare as a wild plant, but for more than a century it has been valued in England and largely propagated by English nurserymen. It is certainly one of the most valuable early flowering spring plants which can be successfully grown in this climate, and although it flourishes in exposed positions the flower-clusters, when the plant is grown in comparatively dense shade, are sometimes twice as long and much handsomer than when the plant grows in the open. The Japanese Pieris japonica is less hardy and rarely flowers well in this climate. This year, however, a plant in the shade of Hemlock Hill is covered with flowers, showing like many other evergreen plants that shade is essential to its well being. Unlike the American species, the flowers are borne in a terminal cluster of slender pendulous racemes each from three to six inches in length. It is easily distinguished from the American species by the narrower leaves tapering at the base, by the pendulous inflorescence, and by the absence of hairs on the young wood and flower-stalks. Even in England it is often injured by frost. The American Mahonias in the Shrub Collection have not before been so full of flowers or in such good condition, thanks to a light covering of Hemlock branches, as they are this spring. The handsomest, although not the hardiest, is Mahonia Aquifolium, the Oregon Grape, an evergreen shrub sometimes reaching the height of six feet but usually not more than two or three feet high. The spineless stems are little branched, and spread by underground suckers. The leaves are six to twelve inches long, pinnate, consisting of five to nine leaflets which are sessile or nearly so, vary greatly in shape except the terminal one, an inch and a half to three inches and a half long, glossy dark green, turning purplish in the winter, and furnished with slender marginal spiny teeth. The racemes of flowers are erect, produced in a crowded group from just beneath the terminal bud, each two to three inches long, thickly set with golden yellow, slender-stalked flowers. The fruit is abundant, black, ornamental and covered with a fine violet-colored bloom. This handsome plant is a native of western North America from Vancouver Island southward. It is a common and very popular plant now in Great Britain, but to flourish in the eastern states like so many evergreens it should be grown in the shade. The other North American species, Mahonia repens, from the Rocky Mountain region is a hardier plant usually less than a foot high but spreading freely by underground stems. The pinnate leaves consist of three, five or seven leaflets which are ovate, pointed, one to two and a half inches long furnished with spiny teeth, and are of dull bluish green. The flowers are produced in racemes an inch and a half to three inches long in clusters at the ends of the branches. The deep yellow flowers are now opening, and the black fruit is covered with a dense bloom. An unnamed hybrid is growing with these two species in the Shrub Collection but has little to recommend it as an ornamental plant in comparison with its supposed parents.
Rhododendron (Azalea) reticulatum. This Japanese plant was introduced into the Arboretum by Professor Sargent who sent seeds from the Nikko region in the autumn of 1892. The plants have grown slowly but have proved hardy and each spring have flowered profusely. This handsome species does not appear to be very common in cultivation but is certainly worth a place in New England gardens. It is sometimes known as *Rhododendron dilatatum* or as *R. rhombicum*. In the Nikko region of Japan, on the lower slopes of Mount Fuji and on the Hakone Mountains it is extremely abundant in thickets, on margins of woods and in forests. The plants form a much-branched bush or bushy tree from three to twenty-five feet tall with numerous erect or spreading, slender but rigid branches, and the leaves do not unfold until the corymbs fall.

Rhododendron (Azalea) yedoense poukhanense. This Korean Azalea is usually a compact, densely branched shrub up to three feet in height. The leaves are quite or partially deciduous according to climate, and in the autumn are tinged from orange to crimson. The flowers are in clusters from two to several and remarkably fragrant, with a corolla rose to rosy purple. This is the common Azalea of Korea from about the latitude of Seoul, the capital city, southward. It is partial to open country and on grassy mountain slopes and in thin Pine-woods it forms dense mat-like masses from a few inches to a yard high. It grows from the sea-level up to nearly five thousand feet altitude. This Azalea was introduced into the Arnold Arboretum by Professor Jack who sent seeds from Poukhan-san in the autumn of 1905.

Some additional Asiatic Crabapples. *Malus Sargentii* from salt marshes in the neighborhood of Mororan in northern Japan, where it was discovered by Professor Sargent in 1892, has qualities which give it a field of usefulness peculiarly its own. It differs in habit from all other Crabapples. It is a dwarf with rigid and spreading branches, the lower flat on the ground, and the whole plant hardly more than two feet high. The flowers are in umbel-like clusters, saucer-shaped, round and of the purest white, and are followed by masses of wine-colored fruit which is covered by a slight bloom, and unless eaten by birds it remains on the plants until spring. It is possible that only the plants raised from the seeds collected in Japan represent the species as the plants raised from the seeds collected in the Arboretum and sold by nurserymen as *Malus Sargentii* are tall broad shrubs often ten or twelve feet high but bear flowers and fruit similar to the type.

*Malus Sieboldii* was introduced from the gardens of Japan into Europe by von Siebold in 1853. It is a low dense shrub of spreading habit with the leaves on vigorous branches three-lobed, small flowers tinged with rose and small yellow fruit. Von Siebold's Crab is really a dwarf form of a tree common on the Korean island of Quelpaert, and on the mountains of central Japan in Hokkaido, to which the name *M. Sieboldii var. arborescens* has been given. This is a tree often thirty feet or more tall with ascending wide-spreading branches, minute fruit yellow on some and red on other individuals. Although the flowers are small, they are produced in immense quantities, and this species
has the advantage of flowering later than the other Asiatic Crabapples. *M. atrosanguinea* is believed to be a hybrid of *M. Sieboldii* and the Parkman Crab. It is a low broad-branched tree with dull red showy flowers, and is now often seen in American gardens. *Malus sublobata*, which is believed to be a hybrid between *M. prunifolia rinki* and *M. Sieboldii*, is also in flower. The plants in the Arboretum are already thirty feet high and, unlike other Crabapples, form a tall trunk covered with pale bark and a narrow head. The large white flowers are chiefly produced on upper branches and are followed by bright clear yellow fruits about three-quarters of an inch in diameter.

**American Plum-trees.** North America is the real home of Plum-trees as it is of Hawthorns. They range across the continent from the valley of the St. Lawrence nearly to the Rio Grande. They are most abundant in eastern and southern Kansas, eastern Oklahoma, southern Arkansas, and Texas from the valley of the Red River to the Edwards Plateau. In this region Plum-trees are represented by more species than are found in all the world outside of North America. Some of the trees are of considerable size and others are large or small shrubs which frequently spread in sandy soil by means of shoots. From the fruit of nearly all the American Plums good jellies and preserves can be made, and selected seedling forms of several of the species have received the attention of Pomologists and are now cultivated as fruit trees in parts of the world where the varieties of the old world *Prunus domestica* cannot be successfully grown. The handsomest of the American Plums, *Prunus hortulana*, the most beautiful of all Plum-trees, is common from southeastern Illinois to eastern Kansas and Oklahoma. It is a tree from twenty to thirty feet high with a clean trunk and widespread branches, which form a round-topped shapely head. The leaves are unusually large for a Plum-tree, and smooth and lustrous on the upper surface. The fruit is scarlet, lustrous, and from three-quarters of an inch to an inch in diameter. A well-fruited tree of *Prunus hortulana* is more beautiful in October than any other small tree which can be grown in the northern states.

**Early Flowering Currants.** The two yellow-flowered American Currants are perhaps the most attractive of these plants. The better known of them, the so-called Missouri Currant (*Ribes odoratum*) is found in many old gardens and grows naturally from South Dakota to Texas. *Ribes aureum*, a smaller plant from the northwest and the Rocky Mountain region, with slender branches, smaller flowers and black or orange-colored fruit, appears to be extremely rare in cultivation. These two plants are growing in the Shrub Collection with another of the Rocky Mountain Currants (*R. cereum*) with small white flowers, and as usual is an attractive plant at this season.

**Early Flowering Lilacs.** Several hybrids of *Syringa affinis* var. *Giraldii* and the common Lilac are already in bloom. It is believed that Sunday, May 17, will be the best day for the Lilacs.