Amelanchier laevis 'R.J. Hilton'

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Amelanchier laevis Wieg. is widely distributed in Canada and the northern United States. Its range extends throughout the southern portion of the Boreal, and the Great Lakes-St. Lawrence forest regions from Newfoundland in the east to Lake Superior in the west. 'R.J. Hilton' is a small tree that bears abundant white/pink-flecked flowers in the spring, exceptionally sweet fruit in the summer, and attractively colored foliage in the fall. It is named in honor of the late R.J. Hilton, former head of the Dept. of Horticulture, Univ. of Guelph, and director of the university's arboretum. The plant will be valuable to the landscape industry for naturalizing or as a specimen tree.

Origin

Plant collectors explored the forests of Nova Scotia and Newfoundland for 5 years (from 1984 to 1988) in search of *Amelanchier* sp. with potentially outstanding or unique ornamental characteristics. Cuttings were collected in late June or early July each year, rooted under fog in a greenhouse, and planted in test plots at the Agriculture Canada Research Station at Kentville, N. S., in the spring of the following year. Clones of *Amelanchier laevis* comprised 31 of the 49 selections from the wild (Hilton, 1987). Ten plants of each clone were established in test plots and have been evaluated for flowering; fruiting, fall color, and general plant form and adaptability in each subsequent year.

'R.J. Hilton' was selected from the first group planted in 1985. The parent plant was growing in a hedgerow in eastern Kings County, N.S. In 1986 and 1987, further propagation was conducted from the parent plant, and the resulting plants were established in test plots at the Memorial Univ. Oxon Pond Botanical Garden in St. John's, Newfound-

land, and the Univ. of Guelph arboretum, Guelph, Ont.

Description

The parent plant of 'R.J. Hilton' was 5 m high and 1.5 m wide at the crown. Foliage, at time of leaf unfolding, is a copper/bronze color (RHS 167A; Royal Horticultural Society, 1986) and matures to a deep, lustrous green (RHS 132B) in midsummer. Flower buds are blood red (RHS 46A) during the swelling period. Inflorescences, consisting of up to nine florets borne in lax racemes, open before leaves are fully unfolded. Each floret consists of five petals that average 19 mm in length and 6 mm in width (average flower diameter is 38 mm; Fig. 1) and are distinctly pink (RHS 58B) on the dorsal side before opening to a white/pink-flecked display. Profuse flowering occurs on young (3-year) and on mature plants. The nearly spherical, pome fruit averages 10 mm in diameter and is purple (RHS 79A) when ripe in mid-August. The mean fruit sugar content is 18%. Fall leaf color is variable from red (RHS 46A) to orange (RHS 28A); veins and small areas of the lamina (flecks) become orange/yellow (RHS 23B). The bark of the young tree is nearly smooth and gray-green (RHS 196B). Moderately deep striations develop as the tree ages.

'R.J. Hilton' shares attractive characteristics, such as copper-bronze, early spring foli-

age; edible fruit and red-orange fall color, with other *A. laevis* cultivars (Dim, 1987). However, the retained pink flower coloration has previously been described only once (*A. × grandiflora* 'Rubescens'; Rehder, 1956). 'R.J. Hilton' is hardy in U.S. Dept. of Agriculture (USDA, 1990) zone 6a where it was tested; *A. laevis* is reported hardy to zone 4a (Sherk and Buckley, 1972). No susceptibility to disease has been observed in 7 years of evaluation in test plots; however, aphid infestations can occur, especially on newly expanded foliage. Birds are attracted as fruit ripens in the summer and can cause some damage (branch breakage) to young plants.

Propagation

Best results are obtained when plants are grown on their own roots from stem cuttings of current-season growth taken in late June or early July (Hicklenton and Cairns, 1994). Bench grafting of plants on *Sorbus aucuparia* L. in January or February has been successful, but suckering from the root stock in subsequent seasons is a disadvantage of this propagation method. Shoot tips of 'R.J. Hilton' have been cultured successfully in vitro using established techniques (Lineberger, 1981), and the resulting plantlets have been rooted under high-humidity conditions in plug trays in the greenhouse.

Availability

'R.J. Hilton' is registered with the International Amelanchier Registration Authority (maintained by the Royal Horticultural Society) and the Canadian Ornamental Plant Foundation (COPF), 652 Aberdeen Ave., North Bay, Ont. P1B 7H9. A limited supply of propagating material is available to COPF members and to research or extension organizations for test purposes and for establishing stock plants.

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Fig. 1. *Amelanchier laevis* 'R.J. Hilton' flower raceme.

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