

SASKATOON

Amelanchier alnifolia (Nutt.)

Nutt. ex Roemer

Plant Symbol = AMAL2

Contributed By: USDA NRCS National Plant Data Center & the Biota of North America Program



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Alternate common names

Saskatoon service-berry, service-berry, juneberry, shadbush

Uses

Saskatoon is planted as an ornamental and to produce commercial fruit crops. Many cultivars are commercially available, selected for desirable plant and/or fruit characteristics. Much research and literature details the development of cultivars and cultivation techniques.

The fruits are used in pies, jams, and fruit rolls and for making jelly and syrup. Saskatoon wine is a regional specialty. Native Americans ate the berries fresh and dried, often mixed with other foods for sweetening and flavor. Dried and rehydrated berries were added to dried vegetables and cooked into soups and puddings.

Native Americans boiled branches to make a tea for treating colds. A drink was made from the bark for

stomach problems. Bark and twigs provided a medicine for recovery after childbirth. In

combination with other plants, it was used to make a contraceptive. The strong and straight-grained wood was used to make arrows, digging sticks, spear shafts, tool handles, and seed beaters. Young branches were twisted into a type of rope.

Saskatoon is attractive as an ornamental shrub or may be trimmed as a hedge. It is an important species for reclamation, wildlife, watershed, and shelterbelt plantings. It can be started from seed or vegetative cuttings.

Status

Please consult the PLANTS Web site and your State Department of Natural Resources for this plant's current status, such as, state noxious status and wetland indicator values.

Description

General: Rose Family (Rosaceae). Native shrubs or small trees growing to 7 meters high, variable in growth form, forming thickets, mats, or clumps, the underground portions including a massive root crown, horizontal and vertical rhizomes, and an extensive root system; bark: thin, light brown and tinged with red, smooth or shallowly fissured. Leaves are deciduous, simple, alternate, ovate to nearly round, 2.5-3 cm long, with lateral, parallel veins in 8-13 pairs, the margins coarsely serrate or dentate to below middle or sometimes entire or with only a few small teeth at the top. Flowers are in short, dense, 5-15-flowered, upright racemes, the petals white, 1-2 cm long and strap-like, sepals more or less long-hairy on the inside, reflexing in age, stamens about 20, styles 5, ovary persistently tomentose at the top. Fruit are 6-11 mm long, smooth, purple-black, slightly gray-blue waxy, the pulp fleshy and sweet; seeds 4-10. The common name refers to the city in Saskatchewan, Canada, in the heart of the species' range.

Variation within the species: Considerable variation is recognized. Var. *alnifolia* occurs over the whole range of the species, except for California, where only var. *semiintegrifolia* is found. Other varieties include the following: var. *cusickii* (Fern.) C.L. Hitchc. and var. *humptulipensis* (G.N. Jones) C.L. Hitchc.

Distribution

Saskatoon is distributed along the Pacific coast from Alaska to California, eastward to Utah, Colorado, Iowa, and Minnesota, and Ontario and Quebec, north through the plains and prairies into the Northwest Territories (Keewatin and Mackenzie) of Canada. For current distribution, please consult the Plant Profile page for this species on the PLANTS Web site.

Adaptation

Saskatoon is common in lower-elevation coniferous forests but grows sporadically up to timberline. It also occurs in montane chaparral, mountain shrub, and the upper limits of pinyon-juniper communities. In grasslands, it mostly occurs in wooded draws, woodland interfaces, and riparian zones. It occurs in open to lightly shaded disturbed sites such as thickets, fencerows, clearings, and edges of woods, and it is conspicuous after disturbances such as fire, logging, or insect outbreak. Found at elevations of 50-3000 meters; flowering April-June; and fruiting (June-)July-August.

Establishment

Saskatoon reproduces from seed but more commonly by sprouting from the root crown and rhizomes and by layering. Seedlings can take up to 5 years before they start to produce fruit, but other starts may begin at 2-4 years old and with proper management can yield 8-10 tons of fruit per hectare. Flowers are produced almost every year, but good seed crops may be produced only every 3-5 years because of drought, spring frost, and/or juniper rust. Seeds require cold stratification to break dormancy and may remain viable for 10 or more years. Natural dispersal is by birds and mammals. One individual of saskatoon is known to have reached 85 years but the average age apparently may be closer to 20 years.

Management

Saskatoon in forests is fire-dependent, occurring in forests with fire regimes varying from frequent, low-severity fire (low-elevation forests) to infrequent, severe fire. It may persist in the understory for decades but eventually dies out with fire exclusion and canopy closure. After top-kill by light- to moderate-severity fire, saskatoon sprouts usually arise from the root crown or from shallowly buried rhizomes; sprouts arise from deeply buried rhizomes after even the most intense fire. Saskatoon cover and biomass production in western Montana may generally increase after fires in Douglas-fir/ninebark habitats, but browsing pressure from big game may slow the recovery. Seed production may resume soon after fire.

Cultivars, Improved and Selected Materials (and area of origin)

Saskatoon has been artificially crossed with other species of serviceberry, and similar hybridization and intergradation also occurs in the field, particularly between saskatoon and low serviceberry (*Amelanchier humilis* Wieg.). Cultivars sold as *Amelanchier alnifolia* may actually be hybrids between *A. alnifolia* and other species of *Amelanchier*. *Amelasorbus jackii* is a hybrid of saskatoon and Cascade Mountain-ash (*Sorbus scopulina*).

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