

European bird cherry

Prunus padus L.

Synonyms: None
Other common names: None
Family: Rosaceae

Invasiveness Rank: 74 The invasiveness rank is calculated based on a species' ecological impacts, biological attributes, distribution, and response to control measures. The ranks are scaled from 0 to 100, with 0 representing a plant that poses no threat to native ecosystems and 100 representing a plant that poses a major threat to native ecosystems.

Description

European bird cherry is a shrub or small tree that can grow up to 9 meters tall. Bark is purple-gray to green-gray. Leaves are long-petiolated, up to 10 cm long, elliptic to obovate, and sharply serrate. Numerous, showy flowers are arranged in elongate, cylindrical, terminal racemes. Petals are white or cream-colored and usually 4 to 6 mm long. Fruits are black and ovoid (Welsh 1974).



Foliage and flowers of *Prunus padus* L.

Similar species: European bird cherry can be distinguished from other *Prunus* species by the presence of flowers arranged in long, cylindrical spikes.

Ecological Impact

Impact on community composition, structure, and interactions: European bird cherry can create tall shrub layers, eliminating native willow layers and all layers underneath. This species may delay the germination and growth of shade intolerant trees. European bird cherry can reduce the quality of willow-dominated foraging sites for moose. Fruits are desirable to birds (M.L. Carlson – pers. obs., M. Shephard – pers. obs.). This species contains a cyanogenic glycoside and can be toxic to mammals with segmented stomachs (rumens),

including moose, deer, sheep, goats, and cattle (Mulligan and Munro 1981, Johnson 2000, Harms 2011). European bird cherry, a closely related non-native species, has been responsible for poisoning moose calves in Anchorage. Poisoning from *Prunus* species usually occurs after the plants freeze (Harms 2011).

Impact on ecosystem processes: European bird cherry likely reduces light, moisture, and nutrient availability for other species (J. Conn – pers. com.). Little is known about the impact of European bird cherry on ecosystem processes.



Infestation of *Prunus padus* L. along a trail in Anchorage, Alaska.

Biology and Invasive Potential

Reproductive potential: European bird cherry reproduces by seeds and bare roots. It can be propagated by cuttings. Each plant produces many seeds (USDA 2002). Seeds remain viable for less than 1 year (Granström 1987).

Role of disturbance in establishment: Unknown.

Potential for long-distance dispersal: Fruits of European bird cherry can be dispersed by birds.

Potential to be spread by human activity: European bird cherry is commonly cultivated as an ornamental plant (Welsh 1974).

Germination requirement: Seeds require cold stratification to germinate (USDA 2002).

Growth requirements: European bird cherry grows in coarse- and medium-textured soils with pH between 5 and 7. It is not tolerant of drought, shade, anaerobic conditions, or high salinity. It is tolerant of high calcium carbonate (CaCO₃) content. This species can withstand temperatures down to -36°C, and it requires 110 frost-free days for reproduction (USDA 2002).

Congeneric weeds: Chokecherry (*Prunus virginiana*) is a tracked non-native species in Alaska (AKEPIC 2010).

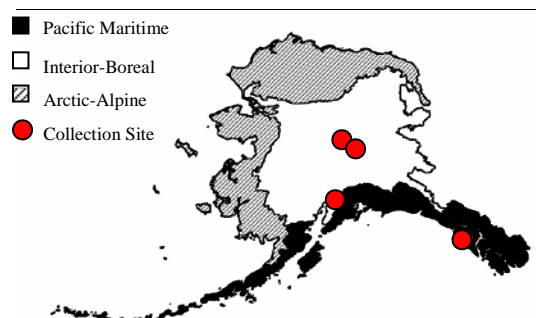
Legal Listings

- Has not been declared noxious
- Listed noxious in Alaska
- Listed noxious by other states
- Federal noxious weed
- Listed noxious in Canada or other countries

Distribution and Abundance

European bird cherry is commonly cultivated as an ornamental plant in southern Alaska (Welsh 1974, UAM 2003).

Native and current distribution: European bird cherry is native to Europe, temperate Asia, and northern Africa. It has been introduced into North America and grows in Alaska, Delaware, Illinois, Montana, New York, New Jersey, and Pennsylvania (USDA 2002). This species has been documented from the Pacific Maritime and Interior-Boreal ecogeographic regions of Alaska (UAM 2003, AKEPIC 2010).



Distribution of European bird cherry in Alaska

Management

Control options have not been investigated.

References:

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