



Alnus rhombifolia White Alder¹

Edward F. Gilman and Dennis G. Watson²

INTRODUCTION

A North American native commonly found along streams, White Alder is a quick-growing tree (to 30 inches per year) reaching 50 to 75 feet in height, sometimes up to 100 feet, and has a spread of 30 to 40 feet (Fig. 1). The deciduous four-inch-long, glossy leaves are dark green above and lighter below and appear just after the springtime display of the six-inch-long, greenish-yellow catkins. These flowers are followed by the appearance of brown, cone-like fruits which persist on the tree throughout most of the year and are quite popular for use in dried flower arrangements. White Alder creates an interesting specimen during the winter with a straight trunk, persistent fruits, attractive silver/grey bark, and slender, horizontal branches with pendulous tips. The crown takes on a pyramidal shape in youth becoming more oval with age. Any necessary pruning should be done in winter or early spring. Once chosen, the central leader dominates the tree forming a pyramidal crown shape.

GENERAL INFORMATION

Scientific name: *Alnus rhombifolia*

Pronunciation: AL-nus rom-bih-FOLE-ee-uh

Common name(s): White Alder

Family: *Betulaceae*

USDA hardiness zones: 8 through 11 (Fig. 2)

Origin: native to North America

Uses: large parking lot islands (> 200 square feet in size); wide tree lawns (>6 feet wide); residential street tree

Availability: grown in small quantities by a small number of nurseries

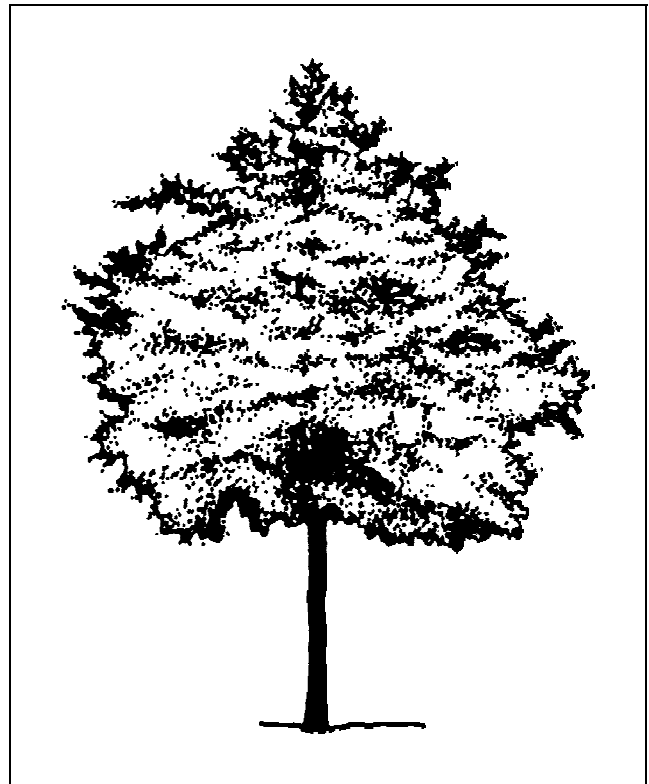


Figure 1. Middle-aged White Alder.

DESCRIPTION

Height: 50 to 75 feet

Spread: 30 to 40 feet

Crown uniformity: symmetrical canopy with a regular (or smooth) outline, and individuals have more or less identical crown forms

Crown shape: oval; pyramidal

Crown density: moderate

1. This document is adapted from Fact Sheet ST-72, a series of the Environmental Horticulture Department, Florida Cooperative Extension Service, Institute of Food and Agricultural Sciences, University of Florida. Publication date: November 1993.
2. Edward F. Gilman, associate professor, Environmental Horticulture Department; Dennis G. Watson, associate professor, Agricultural Engineering Department, Cooperative Extension Service, Institute of Food and Agricultural Sciences, University of Florida, Gainesville FL 32611.



Figure 2. Shaded area represents potential planting range.

Growth rate: fast

Texture: medium

Foliage

Leaf arrangement: alternate (Fig. 3)

Leaf type: simple

Leaf margin: serrate

Leaf shape: elliptic (oval)

Leaf venation: pinnate

Leaf type and persistence: deciduous

Leaf blade length: 2 to 4 inches

Leaf color: green

Fall color: no fall color change

Fall characteristic: not showy

Flower

Flower color: yellow

Flower characteristics: inconspicuous and not showy; spring flowering

Fruit

Fruit shape: elongated

Fruit length: .5 to 1 inch

Fruit covering: dry or hard

Fruit color: brown

Fruit characteristics: does not attract wildlife; inconspicuous and not showy; no significant litter problem; persistent on the tree

Trunk and Branches

Trunk/bark/branches: grow mostly upright and will not droop; showy trunk; should be grown with a single leader; no thorns

Pruning requirement: needs little pruning to develop a strong structure

Breakage: resistant

Current year twig color: brown

Current year twig thickness: thin

Culture

Light requirement: tree grows in part shade/part sun; tree grows in full sun

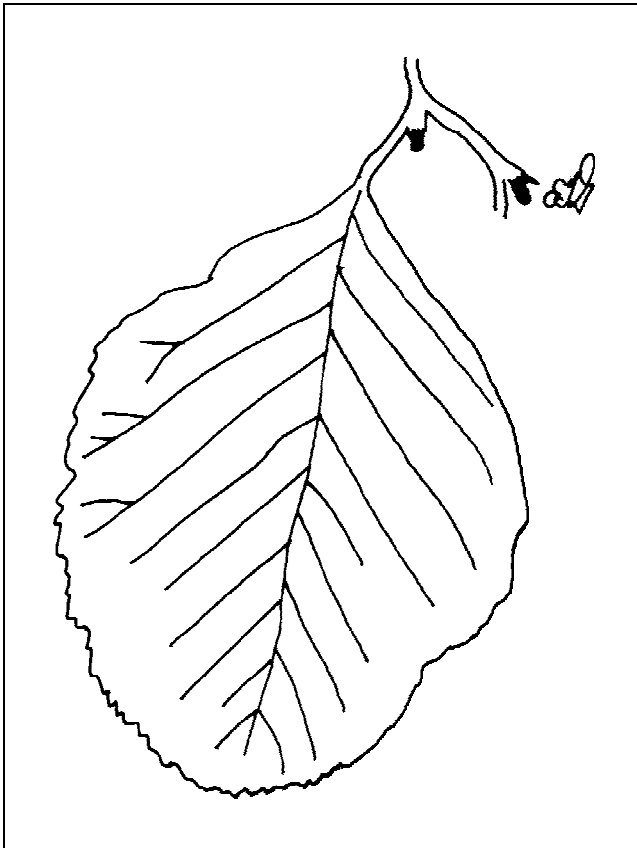


Figure 3. Foliage of White Alder.

Soil tolerances: clay; loam; sand; acidic; occasionally wet; alkaline; well-drained

Drought tolerance: moderate

Other

Roots: surface roots are usually not a problem

Winter interest: tree has winter interest due to unusual form, nice persistent fruits, showy winter trunk, or winter flowers

Outstanding tree: not particularly outstanding

Invasive potential: little, if any, potential at this time

Verticillium wilt susceptibility: not known to be susceptible

Pest resistance: very sensitive to one or more pests or diseases which can affect tree health or aesthetics

USE AND MANAGEMENT

White Alder will grow easily in full sun or partial shade in any moist soil and will happily tolerate the wettest conditions. It is usually not grown or offered by nurseries in the eastern U.S. but is common in some areas of California.

Propagation is by fresh seeds or by cuttings.

Pests

White Alder is attacked and killed by the flatheaded borer in California. This borer is closely related to the bronze birch borer. Prune infested branches during late summer and fall when the infestation is visible and easy to detect and the beetle does not fly. Avoid pruning in the spring.

Tent caterpillars.

Diseases

No diseases are of major concern.