

# A WINTER MINI-WALK IN KENDAL CROSSLANDS ARBORETUM, KENDAL CAMPUS

It is only in winter that one can appreciate every twist and turn of trunks and branches, notice a tree's dominant architectural habit, and be impressed by its colorful and ornamental bark; flowers sensing winter's end emerge in fragrant bloom.

To fully appreciate the beauty of trees in winter, take a short walk in the arboretum (via covered walkway) between the Kendal Center and Parking Lot #4 Winter characteristics are underlined and tree locations can be found on the attached map.



The ornamental bark of Acer griseum, the Paperbark Maple

# #46 Fagus sylvatica

European Beech

# Central Europe

**Notable Feature**: The European beech has been described by many experts as the finest specimen tree available. Give it plenty of space and it will provide you with year-round beauty: shimmering green leaves unfurling in the spring, dense shade in the summer, striking autumn foliage, and a pleasing winter silhouette that boldly shows off its smooth, grey bark.

**Habit:** Densely pyramidal to oval or rounded; very formal in outline with a stocky trunk. A deciduous tree that will grow 50 to 60 feet high with a spread of 35 to 45 feet. Bark is smooth, thin, and dark bluish grey in color; it remains smooth even on the largest of stems.

**Flower:** Species is monoecious (male and female flowers are borne on the same tree); male flowers on rounded heads hanging from a slender stalk, female flowers on shorter spikes. Flowers are small and inconspicuous and appear just after leaf emergence in spring.

**Fruit:** Triangular nuts. Usually two nuts enclosed in a hard, woody, four-lobed husk covered with spines. Husk is 1" long and borne singly on an erect pedicel (stem). Matures in fall.

**Foliage:** Lustrous dark green in summer followed by russet and golden bronze colors in fall. Leaves slow to emerge and do not fully develop until sometime in May. The alternate, simple, elliptical leaves are 2 to 4" long, with smooth to somewhat toothed or wavy margins.

Interesting Fact: Smooth, gray bark develops an elephant hide-like appearance on old trunks. Some of the most beautiful forms can be found at Longwood Gardens and the Scott Arboretum of Swarthmore College.

# #47 Acer griseum

Paperbark Maple

Central China

Notable Feature: Its distinctive, cinnamon-colored bark curls and peels into thin, papery flakes. When backlit by the sun, it glows as if on fire. Snow acts as a perfect foil for the bark in accentuating its uniqueness.

**Habit:** This handsome, upright, deciduous tree with its oval crown rarely reaches more than 30 feet high and 25 feet wide. Typically low-branching.

**Flower:** Non-showy, yellowish white flowers, borne in 1-inch long, pendulous clusters appear with the unfurling leaves. Flowers are androdioecious (having male flowers and bisexual flowers on separate trees).

**Fruit:** In autumn papery, two-winged fruits (samaras), 1 to 1 ½" long, with unusually large seeds hang decoratively from the twigs and branches. Paperbark maple is extremely hard to propagate. Male trees produce no seeds and trees with perfect (bisexual) flowers often have seed that is not viable. Propagation from cuttings is also difficult.

**Foliage:** The opposite, dark bluish green leaf (3 to 5" long) with silvery and woolly undersides consists of three leaflets, each coarsely toothed or lobed. Fall foliage glows with pumpkin oranges and crimson reds.

**Interesting Fact**: Discovered in the forests of Central China by the famed plant hunter E. H. Wilson, the paperbark maple was brought to England in 1899 and to the U.S. in 1901. These specimens are alive and well today and can be seen at Westonbirt Arboretum in the U.K. and the Arnold Arboretum in Boston.

# #49 Lagerstroemia sp. Pink-flowered Form

Crapemyrtle

Southeast Asia

**Notable Feature:** Crapemyrtle ranks among the longest blooming trees with flowering periods lasting from 60 to 120 days; it blooms during the hottest part of summer and adds beauty at a time of year when most trees are not in bloom. **Habit:** A small, vase-shaped, deciduous, multistemmed tree reaching 6 to 15 feet high and about as wide. <u>Its attractive tan bark exfoliates when young revealing a smooth, pale creamy inner bark which is most prominent in the winter landscape.</u> **Flower:** Showy clusters of 6- to 10-inch long, pink flowers with crimped petals (appearing as if made of crepe paper) bloom in summer at the ends of upright branches. Flowers are perfect (bisexual).

**Fruit:** The fruit is a 6-chambered, brown capsule occurring in popcorn-like clusters in upright spikes. Each capsule is ½" long and persists through the winter; it contains many small, winged seeds.

**Foliage:** Thick and leathery, elliptical leaves (to 3" long) emerge light green often with a tinge of red, mature to dark green by summer, and finally turn attractive shades of yellow-orange-red in fall.

**Interesting Fact:** An additional common name is "Lilac of the South" in reference to its overwhelming popularity in southern gardens.

## #50 Lagerstroemia sp. White-flowered Form

Crapemyrtle Southeast Asia

**Notable Feature**: The crapemyrtle is an outstanding ornamental that rewards with a long blooming season of showy flowers, and a <u>winter season highlighted with distinctive exfoliating bark.</u>

**Habit:** A small, vase-shaped, deciduous, multistemmed tree reaching 6 to 15 feet high and about as wide. <u>Its attractive taupe bark exfoliates when young to reveal a smooth, pale creamy inner bark which becomes quite prominent in the winter landscape.</u>

**Flower:** Showy clusters of 6 to 10-inch long white flowers with crimped petals (appearing as if made of crepe paper) bloom in summer at the ends of upright branches. Flowers are perfect (bisexual).

**Fruit:** The fruit is a 6-chambered, brown capsule occurring in popcorn-like clusters in upright spikes. Each capsule is ½" long and persists through the winter; it contains many small, winged seeds.

**Foliage:** Thick and leathery, elliptical leaves (to 3" long) emerge light green often with a tinge of red, mature to dark green by summer, and finally turn attractive shades of yellow.

**Interesting Fact:** Crape (sometimes spelled crepe) myrtles are not myrtles at all; the myrtle in their name looks similar to the leaf shape that resembles true myrtle. The word 'crape' is obvious once you see one in bloom -- the flowers are crinkly and look like they are made of crepe paper.

# # A Chimonanthus praecox

Fragrant Wintersweet

**Notable Feature:** In the late warmer days of winter yet well before the leaves emerge, flower buds swell and then open to reveal pale yellow, translucent blossoms that permeate the air with an allspice-like fragrance.

**Habit:** A deciduous, upright, multistemmed shrub that typically grows 10 to 15 feet tall and 8 to 12 feet wide. Fragrant flowers bloom in winter on bare branches.

China

Flower: The outer petals (tepals) are waxy, almost transparent in appearance, while the inner tepals are smaller and purplish. The highly fragrant flowers (to 1 ½" across) bloom on bare branches from the prior year.

Fruit: Capsule-like fruits follow the flowers but they are not ornamental.

**Foliage:** Rough, glossy green, elliptic to lanceolate leaves (to 6" long) emerge in spring after the flowers have bloomed. Leaves turn yellow in fall.

**Interesting Fact:** Long esteemed in China and Japan for its fragrance, many parts of the plant are rich in essential oils and are also used for culinary and medicinal purposes. Sadly, the native populations of this plant are threatened as land is being developed and their habitats disappear.

# #53 Acer palmatum 'Sango Kaku'

Coral Bark Japanese Maple Japan/Korea/China

Notable Feature: The bark of the first and second year's woody growth
remains a bright coral-orange-red through winter offering color to the drab winter
landscape. The pink coloration is less pronounced to almost absent in summer.

Habit: A slow-growing, upright, vase-shaped form with twiggy stems. This
deciduous tree will reach heights of 20 feet or more with a narrower spread.

Flower: Small, reddish purple, cutely attractive flowers emerge in May with the
new leaves; borne in stalked clusters. Species is monoecious (male and female
flowers occur separately on the same tree).

Fruit: Two-winged seed pods (samaras) that ripen in fall.

**Foliage:** Two-inch long, ferny, and deeply lobed, palmate leaves are a medium green all summer; in fall they turn a yellow-orange.

**Interesting Fact:** Shows to best advantage if properly sited, and against a pale background it is especially effective. The cultivar name means coral tower (sango meaning sea coral and kaku meaning towering) suggesting this pink-barked cultivar resembles coral rising upward from a reef.

#### #54 Cornus kousa

Kousa Dogwood Japan/Korea/China

**Notable Feature**: The Kousa is often used to extend the sense of spring, as it blooms late (a month or so after *Cornus florida*) and over a long period.

**Habit**: When this deciduous tree is young, its branches grow upright but form horizontal layers as it matures. When mature, at about 20 feet high, the crown is dense, round, and wider than the tree's height. The bark is initially smooth and light brown, later exfoliating into small patches forming a tan and brown camouflage pattern.

**Flower**: Flowers are perfect (bisexual). Surrounding the small, greenish yellow, true flowers are showy, pointed, white bracts, 2 to 3" across, remaining attractive for at least a month.

**Fruit**: Very unusual, raspberry-like, edible drupe. Light red to pink in color, round, 1 to 1  $\frac{1}{2}$ " across, yellowish orange inside with stony pits, and borne on a 1  $\frac{1}{2}$ - to 2-inch stalk. Ripens in late summer to early fall.

**Foliage**: Opposite, 2 to 4" long, ovate leaves turn from a shiny dark green in summer to purple and red in fall.

**Interesting Fact**: The Kousa Dogwood can be distinguished from its closely related Flowering Dogwood (*Cornus florida*) by its more upright habit, flowering about a month later, its pointed rather than rounded flower bracts, and its raspberry-like fruit.

## # B Corylopsis spicata

Spike Winterhazel Japan

**Notable Feature:** <u>In late winter to early spring pendulous clusters of fragrant yellow flowers decorate the shrub.</u>

**Habit:** This deciduous, large, wide-spreading shrub grows to 6 feet tall with at least an equal spread. The smooth, pale tan bark has a velvet-like appearance. **Flower:** Tiny, fragrant, pale yellow flowers, 6 to 12 in a cluster, occur in hanging racemes, 1 to 2" long; appear before the leaves in early spring.

Fruit: Non-ornamental, consisting of a small, dry, 2-valved capsule.

**Foliage:** Emerging leaves are a rich purple and eventually change to a bluish green.

Interesting Fact: Take in a trip to Winterthur to see a different species of Winterhazel, Corylopsis pauciflora. It provides a magnificent display in combination with the lavender-flowered Rhododendron mucronulatum on Winterthur's Witchhazel Walk. Many gardens combine these plants but none can match the size and scope of the show at Winterthur.

### #56 Tsuga canadensis

Canadian Hemlock

E. North America

**Notable Feature:** The Canadian or Eastern Hemlock is slow-growing, long-lived, and unlike many trees, grows well in shade. It may take 250 to 300 years to reach maturity and may live for 800 years or more. The oldest recorded tree, found in Tionesta, Pennsylvania, is believed to be at least 554 years old. **Habit:** A medium-sized, evergreen tree with a dense, conical crown, fine branching, and a drooping terminal shoot; matures to 80 feet tall. <u>Because it is evergreen, it visually adds the warmth and comfort of green to the winter landscape</u>. <u>It offers a sustainable winter habitat for birds and small mammals by providing shelter from harsh winds and cold temperatures</u>.

**Flower:** Species is monoecious (both male and female flowers occur on the same tree). Male flowers – yellow, small, round conelets, arising from the leaf axils; female flowers – light green conelets at the branch tips. Bloom in spring.

**Fruit:** Ruddy brown cones, 5/8 to 1" long with rounded scales, and borne on slender stalks which hang decoratively from the branches. <u>In winter the seeds are</u> eaten by birds and small mammals.

**Foliage:** Flat needles ½" long, flat, green above and whitened beneath, attached in one horizontal plane to opposite sides of the twigs.

**Interesting Fact:** Canadian hemlock is the state tree of Pennsylvania. This species is under attack throughout eastern North America by an insect introduced from Japan called the hemlock woolly adelgid. It can be identified by its egg sacs which resemble small tuffs of cotton on the undersides of the hemlock's needles. Kendal's trees however have shown no signs of this threatening pest.

#### #58 Platanus x acerifolia

London Planetree

Garden Origin

Notable Feature: The signature ornamental feature of this tree is its brown bark that exfoliates to reveal its creamy white inner bark. Mature trees typically display this mottled white bark, facilitating identification from great distances.

**Habit:** A deciduous tree that is pyramidal in youth, developing a large, open, wide spreading outline with massive branches. Grows 70 to 100 feet in height with a spread of 65 to 80 feet.

**Flower:** In April flowers are borne in one to three, dense spherical inflorescences on a pendulous stem, with the yellowish male flowers and the reddish female flowers on separate stems (monoecious).

**Fruit:** Tan, 1" wide, furry ball, typically found in pairs. Ripening in October and persisting late into winter when it breaks apart dispersing its seeds, often in downy tufts, floating in the wind.

**Foliage:** Alternate, 5 to 9" long and just as wide, 3- to 5-lobed, coarsely toothed and leathery. Flat medium to dark green above, paler beneath. Turns a yellow-brown in fall.

**Interesting Fact:** This tree is the result of a cross between *Platanus orientalis* (Oriental Planetree) and *Platanus occidentalis* (American Sycamore). First record of the tree was in 1661 when the hybrid was found growing in London. A magnificent allée can be seen at the Jardin des Plantes in Paris.

#### #59 Zelkova serrata

Japanese Zelkova

Japan/Korea/China

Notable Feature: Strong, vase-shaped growth habit with many fine-textured, zigzag twigs. Rapid growth rate in youth and ornamental bark with age.

Habit: A low-branched, vase-shaped, deciduous tree and in old age maintaining a similar form with many ascending branches. Grows 50 to 80 feet high and not quite as wide. Young bark is cherry-like and reddish brown; matures to a

**Flower:** Monoecious: male flower – yellow-green and clustered in the axils of the lower leaves; female flower – yellow-green, clustered in the axils of the upper leaves. The non-showy flowers open in April as the foliage emerges.

colorfully mottled bark of greens, oranges, and browns.

**Fruit:** A small, triangular drupe, 1/6" long, green and later turning brown, maturing in mid to late summer.

**Foliage:** Alternate, simple, ovate with pointed tips and 1 ½ to 2 ½" long. The serrated leaves are dark green above and much paler below, turning a yellow-orange-brown in fall, to an occasional deep red to reddish purple.

**Interesting Fact:** Zelkova is often listed as a replacement for the American elm since it is highly resistant to Dutch elm disease and has roughly the same vase-shaped habit and ultimate size. But no tree will ever truly match the grace and elegance of the American elm.



# **KENDAL**

# at Longwood



