

Koelreuteria paniculata 'Fastigiata': 'Fastigiata' Goldenraintree¹

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Introduction

This cultivar of Goldenraintree probably grows 30 feet tall with a four to six-foot spread. Although the species has a reputation for being weak wooded, this selection may stay together due to the tight, compact growth habit. It is rarely attacked by pests and grows in a wide range of soils, including high pH soils. Goldenraintree tolerates dryness and casts little shade because of the narrow growth habit. It would make a good tree particularly where overhead or soil space is limited, due to its narrow crown and adaptive abilities. The tree grows moderately and bears few flowers. It is not as showy as *Koelreuteria bipinnata* but is much more cold-tolerant. However, it is less cold tolerant than the species.

General Information

Scientific name: *Koelreuteria paniculata*

Pronunciation: kole-roo-TEER-ee-uh

pan-ick-yoo-LAY-tuh

Common name(s): 'Fastigiata' Goldenraintree

Family: Sapindaceae

USDA hardiness zones: 5B through 9B (Fig. 2)

Origin: not native to North America

Invasive potential: According to the IFAS Assessment of the Status of Non-Native Plants in Florida's Natural Areas (Fox *et al.* 2005), *Koelreuteria paniculata Fastigata* (Fastigata goldenraintree) may be used with caution in the



Figure 1. Middle-aged *Koelreuteria paniculata* 'Fastigiata': 'Fastigiata' Goldenraintree

central and southern zones of Florida, but should be managed to prevent its escape (counties are listed by zone at: <http://plants.ifas.ufl.edu/assessment>); and is not considered a problem species and may be used in north Florida.

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Uses: street without sidewalk; specimen; sidewalk cutout (tree pit); tree lawn 3-4 feet wide; tree lawn 4-6 feet wide; tree lawn > 6 ft wide; urban tolerant; highway median

Availability: not native to North America



Figure 2. Range

Description

Height: 20 to 30 feet

Spread: 4 to 7 feet

Crown uniformity: symmetrical

Crown shape: columnar, upright/erect

Crown density: moderate

Growth rate: moderate

Texture: coarse

Foliage

Leaf arrangement: alternate (Fig. 3)

Leaf type: even-pinnately compound, odd-pinnately compound

Leaf margin: lobed, incised, serrate

Leaf shape: ovate, oblong

Leaf venation: pinnate

Leaf type and persistence: deciduous

Leaf blade length: less than 2 inches, 2 to 4 inches

Leaf color: green

Fall color: yellow

Fall characteristic: showy

Flower

Flower color: yellow

Flower characteristics: very showy

Fruit

Fruit shape: oval, elongated

Fruit length: 1 to 3 inches

Fruit covering: dry or hard

Fruit color: green, brown

Fruit characteristics: does not attract wildlife; showy; fruit/leaves not a litter problem

Trunk and Branches

Trunk/bark/branches: branches don't droop; not showy; typically one trunk; thorns

Pruning requirement: needed for strong structure

Breakage: resistant

Current year twig color: brown

Current year twig thickness: thick

Wood specific gravity: unknown

Culture

Light requirement: full sun

Soil tolerances: sand; loam; clay; acidic; alkaline; well-drained; extended flooding

Drought tolerance: high

Aerosol salt tolerance: moderate

Other

Roots: not a problem

Winter interest: no

Outstanding tree: yes

Ozone sensitivity: unknown

Verticillium wilt susceptibility: susceptible

Pest resistance: resistant to pests/diseases

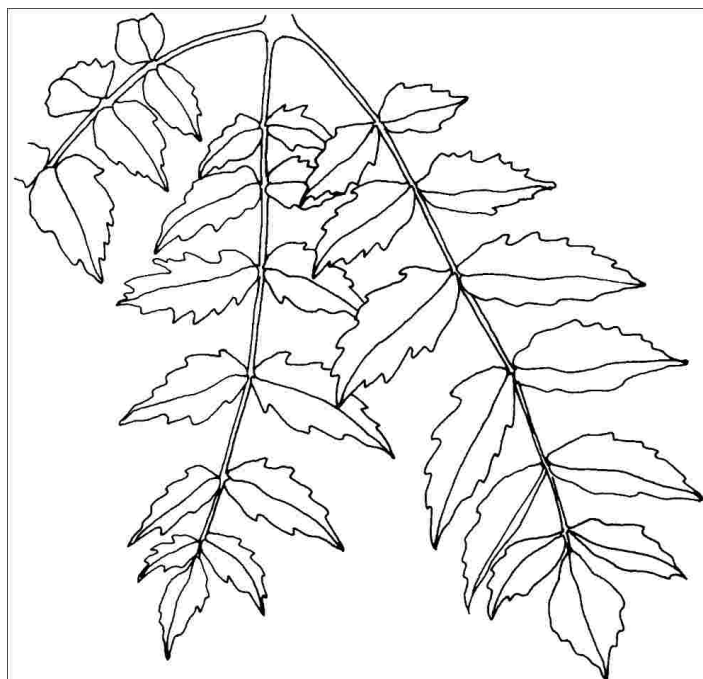


Figure 3. Foliage

Use and Management

The root system is coarse with only a few but large roots, so transplant when young or from containers. Do not transplant in the fall as success rate is reportedly limited. Considered a city tolerant tree due to tolerance to air pollution and ability to withstand drought, heat and alkaline soils. It also tolerates some salt spray but requires well-drained soil.

Pests

Occasional attacks by scale may be seen. Sprays of horticultural oil help control overwinter stages. Boxelder bug can be a menace.

Diseases

Koelreuteria is subject to few diseases. A canker causes dead and sunken areas on the bark. Coral pink fruiting bodies develop on the diseased bark. Prune out infected branches and fertilize to maintain tree health.

Verticillium wilt attacks *Koelreuteria*. The disease causes wilting and death of leaves on infected branches. Eventually the entire tree may be killed. Fertilize to stimulate growth. There are no chemical controls.