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PLANTS PEOPLE  
POSSIBILITIES



**Peter Green** has studied jasmines for many years, as part of his work at Kew on the whole family Oleaceae. From 1948 he was assistant lecturer at Birmingham University, after which he was on the staff at the Royal Botanic Garden, Edinburgh from 1952 to

1960, followed by five years working as a horticultural taxonomist at the Arnold Arboretum, before joining Kew in 1966. He was appointed Keeper of the Herbarium and deputy Director in 1971, and was awarded the Kew Medal in 1984.



**Diana Miller** is a horticultural botanist and is now retired from the Royal Horticultural Society (RHS), where her career spanned well over three decades and for which she was awarded the RHS Associate of Honour. She was Keeper of the RHS

Herbarium, secretary for the Hardy Woody Plant Committee of the RHS and was a founding member and secretary of the Horticultural Taxonomy Group.

**Robert Calkin** studied botany at Cambridge and has a long standing career in the perfumery industry. He has a particular interest in gardens and gardening and in floral fragrances and has visited many areas of jasmine cultivation.

**Martyn Rix** has worked for the Royal Horticultural Society and has co-authored many books on horticulture with Roger Phillips. He is editor of *Curtis's Botanical Magazine* published by Kew. In 2002 he was awarded the Gold Veitch Memorial Medal for services to Horticulture.

#### BOTANICAL MAGAZINE MONOGRAPHS

The Botanical Magazine Monograph series was introduced by Kew in 2002 to re-establish the art and expertise of publishing definitive plant monographs.

Based on the tradition established by *Curtis's Botanical Magazine*, the aim of the series is to blend knowledge on research, cultivation and conservation of garden plants. Each volume provides the reader with a comprehensive guide to a particular group of plants that is authoritative and accessible.

The monographs are written by experts in their field, edited by world-leading horticulturalists and botanists, and are lavishly illustrated by the finest botanical artists. This makes the series influential and highly desirable to all those who love and nurture our garden plant heritage.

Other monographs include *The Genus Epimedium*, *The Genus Lavandula*, *The Genus Sorbus* and *The Genus Roscoea*.



THE GENUS JASMINUM IN CULTIVATION

Peter Green and Diana Miller

Kew



A BOTANICAL MAGAZINE MONOGRAPH

# THE GENUS JASMINUM IN CULTIVATION



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#### THE GENUS JASMINUM IN CULTIVATION

Jasmines have long been cultivated for their intoxicating scent, reminiscent of Arabian nights or warm summer evenings. The Egyptians were probably the first to grow jasmine on a large scale and it is recorded as an exotic perfume used by decadent Romans in the first century AD. Since then jasmines have been continuously grown both for their perfume and their outstanding qualities as winter flowering climbers.

This book describes in detail the species which are cultivated in gardens, their habitat and distribution in the wild, and their propagation. A chapter on the uses of jasmine scent in the perfume industry, contributed by Robert Calkin, explains its importance as a constituent of some of the world's most exclusive scents.

Nearly all the cultivated species are illustrated by contemporary or old botanical paintings, line drawings and photographs.

Key features:

- jasmines in culture – history, folklore and religious importance
- history and use of jasmines in perfumery, by Robert Calkin
- cultivation, propagation and use of jasmines in the garden
- taxonomic treatment of cultivated species with key
- over 30 colour botanical paintings

This is a book for gardeners, nurserymen, botanists and all those who love exquisite botanical art.



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#### 4. JASMINUM DISPERMUM

##### Section Jasminum

*Jasminum dispermum* is a scrambling plant with leaves with 3 or 5 leaflets on the same branch, and can be distinguished from *J. polyanthum* by its smaller white summer flowers with shorter more rounded corolla lobes. The name *dispermum*, two seeded, refers to the two seeds in the berry, a character of several species.

This species has two main areas of distribution in the wild in the Himalayas. Plants from the western ranges, from Pakistan, India, Bhutan and Nepal, have leaves usually of 3 to 5, or even 7, leaflets, the terminal one usually 7–9 × 3–4.5 cm. These may be referred to subsp. *dispermum*. Plants from the eastern regions, India, Burma, China and Thailand usually have only 1 to 3 larger leaflets with the terminal one 9–11 × 4–6 cm. These are referred to subsp. *forrestianum* P. S. Green. Plants with simple leaves have been described as distinct species, *J. simonsii* Sinha and *J. scalarinerve* Kobuski, and the suggestion has been made that they should be included in section *Unifoliolata*, but Green (1997) puts these species firmly in *J. dispermum*.

*Jasminum dispermum* may survive outdoors in the mildest and the most sheltered parts of Europe in sun or partial shade but cannot tolerate temperatures lower than around -5° C, so generally it needs cool greenhouse conditions. However, it has never been widely cultivated in western gardens despite the good fragrance of the very numerous white flowers. Its hardiness rating is G1, USDA zones 9–11.

Records of the Royal Horticultural Society note that this species was shown at a flower show in February 1937 when it received an Award of Merit. The exhibitor was A. E. Osmaston of Wisborough Green in Sussex who wrote *The Forest Flora of Kumaon*, India, and who introduced the plant from there. However it is also mentioned in *Paxton's Magazine* in 1848 as a climbing shrub from Nepal with white flowers, strongly scented especially in the evening. Presumably plants of the original collection were lost to cultivation sometime before 1937.



Fig. 14. *Jasminum dispermum*.



Plate 6. *Jasminum dispermum*. Painted by Lilian Snelling for *Curtis's Botanical Magazine*, t. 9567 (1939).



acuminate; petiole articulate, 3–10 mm long, often pubescent on the veins beneath. *Inflorescence* terminal on side shoots, sometimes hairy, dense, 3–17 flowered, pedicels 0.5–3 mm. *Bracts* 1–2 pairs of leafy bracts, 0.5–1 cm. *Flowers* white, fragrant, 2–3 cm diameter. *Calyx* finely hairy, tube 1.5–2 mm long, lobes filiform, 2–11 mm. *Corolla* tube 13–25 mm, lobes 7–9, narrow lanceolate to elliptic, acute, 6–12 × 2–4 mm. *Berries* black, ellipsoid, c.8 × 5 mm.

**DISTRIBUTION.** Northern Australia, Papua New Guinea, Indonesia, Phillipines, Malaysia, Thailand, Vietnam, China (Yunnan, Guizhou, Guandong), Burma, India (Assam), Bhutan, Sikkim.

**HABITAT.** Coastal woodlands, monsoon forests and open ground; from sea level to about 1,500 m.

**FLOWERING TIME.** Winter, spring and summer; April to December in Australia.

Related species:

**21a. *Jasminum perissanthum*** P. S. Green, *Kew Bull.* 50: 578 (1995). Type: Thailand, *Kerr* 4924 (holotype K, isotype L).

**ILLUSTRATION.** *Kew Bulletin* 50: 579 (1995).

This recently-named and beautiful jasmine was described from a specimen collected in 1921 by A. F. G. Kerr in northern Thailand. It was growing in evergreen forest at 1,600–1,700 m, at Nan, Doi Pu Ka, and flowering in late February. The leaves are simple, broadly lanceolate and pinnately veined, 4–5 cm long; the inflorescence consists of dense 10–20-flowered clusters of scented flowers, with the tube 25–30 mm long, the lobes 12–15 mm long. 'It is remarkable that this species, which must be very handsome in flower, is represented by only one collection amongst the very many specimens of *Jasminum* I have examined from Thailand' (Green, 1995). (Note: the specific name was derived from the greek perissos, meaning abundant. It was incorrectly spelled *perrisanthum* in the description, but, correctly, *perissanthum* in the caption.)



Fig. 30. *Jasminum perissanthum*. Line drawing by Judi Stone for *Kew Bulletin* 50: 579 (1995).



emarginate, 3–4 × 3–5 mm. *Berries* greenish-white, globose c.4 mm.

**DISTRIBUTION.** Southern India and Sri Lanka.

**HABITAT.** Mountainous regions; to around 2,000 m.

**FLOWERING TIME.** Intermittently from spring to early winter.

### 35. JASMINUM FLORIDUM

Section *Alternifolia* DC.

*Jasminum floridum* forms a shrub with alternate leaves and fragrant yellow flowers with long narrow calyx lobes and acute corolla lobes. Like *J. fruticans*, the calyx lobes are long, exceeding the calyx tube, but the shape of the leaflets is distinct being broader in *J. floridum* and with an acute apex. It also resembles *J. humile* and especially the cultivar ‘*Revolutum*’ but the leaves never have more than 5 leaflets, usually only 3, and the calyx lobes are considerably longer.

This species was discovered by A. von Bunge in 1831 and the earliest cultivated plants in Europe were known from northern China, but later Augustine Henry found it also in central China. It has long been cultivated in China but the first record in British gardens was the report in *Botanical Register* of 1842 as collected by the Hon. William Fox-Strangeways, later the Earl of Ilchester, and grown in his gardens at Abbotsbury in Dorset.

It is a frost-tolerant plant and easily grown in any soil. Hardiness H3: USDA zones 7–10. The specific epithet, *floridum*, refers to its profuse flowering.

***Jasminum floridum*** Bunge, *Enum. Pl. Chin. Bor.* 42: (1833). Type: N. China, Kantai 1831, Bunge (LE).

Syn. *J. giraldii* Diels, *Bot. Jahrb. Syst.* 29: 534 (1900).

*J. subulatum* Lindl., *Edward’s Bot. Reg.* 28 (Misc.): 57 (1842).

**ILLUSTRATIONS.** *Curtis’s Botanical Magazine* 109: 6719 (1883); Dirr, *Dirr’s Trees and Shrubs for Warm Climates*, p. 155 (2002).

**DESCRIPTION.** Evergreen or semi-evergreen shrub to 3 m. *Branches* 4-angled, green, glabrous or hairy. *Leaves* alternate, usually with 3 leaflets, occasionally 1 or 5, sometimes simple at base of shoots, petiole 2–10 mm long. *Leaflets* ovate to elliptic, rarely obovate, glabrous or hairy, veins obscure; base cuneate to rounded; apex acute, often mucronate; terminal leaflet 0.5–5 × 0.3–2.5 cm; lateral leaflets 0.4–3 × 0.2–1.4 cm. *Inflorescence* terminal on side shoots, usually 6–12-flowered, pedicels usually 10 mm or more. *Bracts* subulate, 3–7 mm. *Flowers* yellow, fragrant. 1.5–2 cm diameter. *Calyx* glabrous or slightly hairy, tube 1–2 mm long, lobes to 2 mm, linear. *Corolla* tube 9–15 × 3–4 mm, lobes 5, ovate or oblong, often acute at apex, 4–8 mm. *Berries* black, globose, 5–10 mm in diameter.

**DISTRIBUTION.** North and central China, and Japan where it is probably naturalised.

**HABITAT.** Slopes, valleys, woods, thickets; below 2,000 m.

**FLOWERING TIME.** Throughout the summer.



### 36. JASMINUM FRUTICANS

Section *Alternifolia* DC.

This species forms a twiggy shrub with alternate leaves and small, fragrant yellow flowers with narrow calyx lobes to 2 mm or more and rounded corolla lobes. It was one of first jasmines to be introduced to cultivation in Europe and the only species found wild there. It is a common shrub in Mediterranean garrigue and other dry shrubby communities.

Though it is mentioned by John Gerard in his *Herbal* in 1597, it was probably cultivated well before this date. It does not have a strong scent and the flowers are rather small so it has become less common in gardens than some of the more floriferous species. In colder regions, even if the leaves drop, the green stems give some winter interest. It may be grown as a shrub against a wall but would need support. Hardiness rating H4, USDA zones 6–10.

It is close to *Jasminum floridum* but has narrower leaflets and fewer flowers on shorter pedicels.

***Jasminum fruticans*** L., *Sp. Pl.* 1: 7 (1753). Type: *Jasminum* no. 3, Hort. Cliff. (BM).

**ILLUSTRATIONS.** *Curtis's Botanical Magazine* 13: 461 (1799); Huxley and Taylor, *Flowers of Greece and the Aegean*, t. 201 (1977); *The Plantsman* 10: 150 (1988); Ellison, *Cultivated Plants of the World*, p. 329 (1995).

**DESCRIPTION.** Evergreen or semi-evergreen glabrous shrub 1–2 m. Branches angled, green. Leaves alternate, trifoliate, occasionally simple; petiole c. 2–8 mm long. Leaflets elliptic or narrowly elliptic with slightly recurved margins, veins obscure, base cuneate; apex rounded; terminal leaflet 0.5–3 × 0.2–1.5 cm; lateral leaflets 0.2–2.5 × 0.1–0.8 cm. Inflorescence terminal on side shoots, 1 to 8 flowered; pedicels to 10 mm but usually much less. Flowers yellow, somewhat fragrant, to 15 mm diameter. Calyx tube 1.5–2.5 mm long, lobes 3–5 mm, linear. Corolla tube 8–15 mm, lobes 5, rounded, 5–10 × 3–6 mm, throat hairy within. Berries black, globose c. 7 mm.



Fig. 38. *Jasminum fruticans*.