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SHORT COMMUNICATION

Indigofera psammophila (Fabaceae), a new species from arid Australia

This species is described here to make the name available for the Flora of New South Wales. It has often been referred to as *I. brevidens* but is not closely related to that species. *I. brevidens* sens. str. is a shrubby species that occurs in the central west of Queensland and in a few places in the north of the North Western Slopes and Plains of N.S.W., generally in drier areas on gravelly soils; it is most closely related to *I. australis* and *I. adesmiifolia*. The new species, on the other hand, is a perennial herb or subshrub of deep sands and is more closely related to *I. georgei*.

Indigofera psammophila Peter G. Wilson, sp. nov.

[*I. brevidens* auct. aust. non Benth.: Jacobs & Pickard, Plants of New South Wales (1981); Cunningham et al., Plants of Western New South Wales: 397, photo (1981); Weber, Flora of South Australia: 579, fig. 307A (1986).]

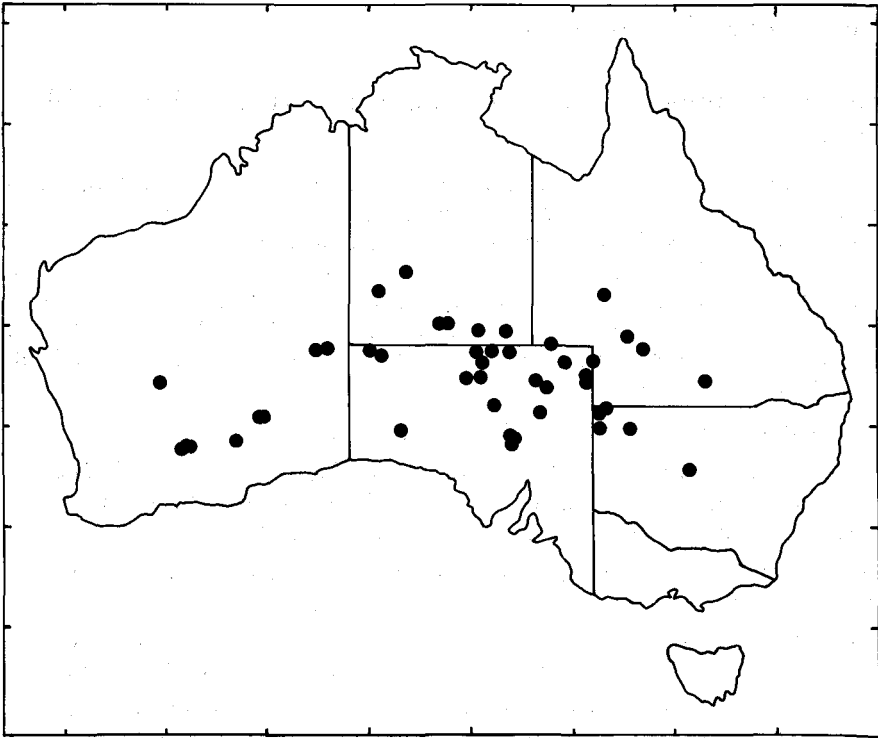
I. georgei affinis sed ramis procumbentibus, foliolis plus numerosis, cinerascens (vice canis) et petalis subroseis vel malvinis differt.

HOLOTYPE: NEW SOUTH WALES: North Far Western Plains: 15.1 km E of Fortville Gate, Sturt National Park, *Wilson 115*, 29.10.1986 (NSW). ISOTYPES: AD, BRI, CBG.

Perennial herb or subshrub to 0.5 m high with a woody root-stock; young stems and leaves grey with fine, appressed to spreading equally biramous hairs. Leaves pinnate, (5–)7–11(15)-foliolate, 3–8 cm long; rachis grooved above; stipellae small, c. 0.5 mm long; leaflets opposite or subopposite, obovate to cuneate, obtuse and mucronate or emarginate, 3–15 mm long, 1.5–7 mm wide, green to grey, discolorous but more or less equally hairy on both surfaces. Stipules narrowly triangular to linear, 1–3.5 mm long. Inflorescence exceeding the leaves, an axillary raceme 10–29 cm long when fully developed; bracts linear, 1.5–3 mm long; pedicels 1–2 mm long. Calyx 2.5–3 mm long, grey-pubescent, the lobes approximately equal to the tube. Corolla pink to mauve, sparsely hairy on the back of the standard and the distal end of the keel; standard broadly elliptical, 5.5–7 mm long, 3.5–5 mm wide, apex obtuse and emarginate or mucronate; wings spatulate, 5–8.5 mm long, 1.5–2 mm wide; keel 5.5–7 mm long, 1.5–2 mm deep, margins ciliate, apex often beaked. Stamens 9+1, tube 3–4.5 mm long; anthers apiculate. Ovary pubescent; style glabrous; stigma capitate. Pod terete, 1.5–3 cm long, 2–3.5 mm wide, white-pubescent; endocarp with light to dark brown spots. Seeds 4–10, cuboid, 1.5–2 mm long.

HABITAT AND DISTRIBUTION: widespread throughout central Australia in desert regions, mainly in the Simpson and Great Victoria Deserts, on sand dunes, but with outliers in other areas on sand-plains or alluvial deposits. (Map 1)

SELECTED SPECIMENS EXAMINED: NEW SOUTH WALES: North Western Plains: Sandy Creek, 'Lachlan Downs', *Cunningham & Milthorpe 1475*, 17.11.1973 (NSW). North Far Western Plains: 'Tero Creek' Station, *Martensz 67/107*, 1.4.1967 (NSW). QUEENSLAND: Gregory North: 10 km SSW of 'Brighton Downs', *Purdie 1323*, 17.6.1978 (BRI); Gregory South: 24 km SE of Betoota, *Purdie 1145*, 18.9.1977 (AD, BRI). SOUTH AUSTRALIA: North-western: c. 18 km NE of Mt Kintore summit, *Donner 6626*, 10.9.1978 (AD); Lake Eyre Basin: Warburton River, near new Kalamurina, *Jackson 1975*, 9.3.1972 (AD); Nullarbor: Golf Course, Maralinga, *Turner s.n.*, 23.9.1960 (AD97604554); Gairdner-Torrens Basin: 7 km NE of Twelve Mile Dam, *Fatchen 246*, 4.3.1981 (AD). WESTERN



Map 1. Distribution of *Indigofera psammophila*.

AUSTRALIA: Giles District: 2 miles (c. 3.2 km) W of Cavenagh Range, *George 8738*, 16.7.1967 (CANB, PERTH); Coolgardie District: Cundeelee, *Boswell R69*, 9.1967 (PERTH). NORTHERN TERRITORY: Central South: Ehrenberg Range, *Butler 69*, 5.1967 (PERTH); 4 miles (c. 6.4 km) N of Connor Well, *Chippendale 4678*, 22.7.1958 (AD, NSW).

This species has been confused with *I. brevidens* but differs from that species in having inflorescences exceeding the leaves, calyx teeth all distinct, different habit and indumentum, and in habitat. In these features it more closely resembles *I. georgei*, but it differs from that species in having more numerous grey-green, rather than canescent, leaflets, a more procumbent habit and paler corolla.

There are a number of specimens collected from coastal sand-masses in Western Australia near Carnarvon and Exmouth. These approach *I. psammophila* in general aspect but differ in indumentum and fruit shape; their status is yet to be determined.

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Peter G. Wilson
National Herbarium of New South Wales
Royal Botanic Gardens
Sydney, Australia, 2000