

WATTLE

Acacias of Australia

Vachellia nilotica subsp. *indica* (Benth.) Kyal. & Boatwr.



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Vachellia nilotica subsp. indica occurrence map.
Occurrence map generated via Atlas of Living Australia (<https://www.ala.org.au>).

Common Name

Prickly Acacia, Babul

Family

Fabaceae

Distribution

Native of India but naturalised in tropical Qld from Bowen and Hughenden S to Rockhampton and Barcaldine, and to a lesser extent in northern W.A. (near Wyndham), N.T. and north-eastern S.A. on Clifton Hills Stn (fide D.J.E.Whibley & D.E.Symon, *Acacias S. Australia* 2nd edn 294, 1992). Specimens of cultivated or possibly escaped plants of *V. nilotica* have been collected from N.S.W., though some are atypical and require further investigation.

Description

Spreading, **dense shrub** or **tree** to 12 m high. Bark \pm smooth, becoming rough and longitudinally **fissured** at base. **Branchlets** sparsely to moderately **pubescent** especially when young, sometimes **glabrous**, often slightly **pruinose**. Stipular spines mostly 2–50 mm long, often diminutive and appearing absent on some **branchlets**. Leaves: **petiole** (0.4–) 0.9–2 cm long, **pubescent**, mostly with a **gland** at or just below base of lowest pair of **pinnae**; **rachis** (0.3–) 0.8–6.8 cm long, **pubescent**, with a small **gland** at apex, rarely with a **gland** at base of second pair of **pinnae** from apex; **pinnae** (1–) 2–6 (–10) pairs, 1–4.5 cm long; **pinnules** 9–30 pairs, **narrowly oblong** to **cultrate** or slightly **ob lanceolate**, 1.7–7 mm long, mostly 0.5–2 mm wide, **obtuse** to broadly **rounded** at apex, **concolorous**, with numerous **stomata**, **glabrous** or sparsely **ciliolate**, with midnerve not raised beneath and **lateral** nerves not visible. Inflorescences **simple**, 2–6 in axils; peduncles 7–32 mm long, with **involucel** of bracts mostly 1/2–3/4 way from base; heads **globular**, 30–53-flowered, yellow to bright yellow. Mature pods narrowly and \pm regularly constricted between seeds into \pm **orbicular** sections, flat, 6–25 cm long, 14–17 mm wide (2–4 (–9) mm wide at constrictions), **coriaceous**, grey- or white-**tomentose**, sticky inside, **indehiscent**.

Phenology

Flowers recorded Jan., Apr.–June., Aug.–Sept., probably throughout year; fruits recorded May., Sept. and Oct.

Habitat

May form dense thorny thickets, in grassland, woodland and sometimes open forest, common on cleared land, usually along roadsides and on open plains or floodplains, often near creeks, streams, dams or bores, in silty, heavy (cracking) clay or sometimes sandy alluvial soils.

Specimens

W.A.: Nulla Nulla, 30 km WSW [sphalm. SE] of Wyndham, *N.Wilson* KNRAg 0404 (MEL n.v., PERTH). N.T.: Darwin, *C.E.F.Allen* B30 (NSW). Qld: 4 miles [6.4 km] S of Bowen, *M.Fagg* 681 (CANB, NSW); near Hughenden Township, *M.Lazarides* 3518 (CANB, NSW, PERTH); 1 mile [1.6 km] NW of Winton, Landsborough Hwy, *I.V.Newman* 565 (NSW). S.A.: Cordillo Downs HS, *W.S.Reid* 120 (ADW).

Notes

There are 8 other subspecies of *V. nilotica* (fide J.H.Ross, *Mem. Bot. Surv. S. Africa* 44: 106, 1979, as *Acacia*) but only subsp. *indica* is currently recognized as adventive in Australia.. However, as discussed by T.J.Wardill *et al.*, *J. Biogeography* 32: 2145–2159 (2006), there is much genetic diversity among the plants that have been introduced to Australia indicating that more than one infraspecific taxon may be present here.

Vachellia nilotica was formerly the type of *Acacia* but the genus is now conserved with *A. penninervis* as the new type, see J.McNeill and N.J.Turland, *Taxon* 60(5) 1496 (2011). Much has been written about this controversial issue which was most likely finally resolved at the 2011 International Botanical Congress in Melbourne. The opposing views in this debate are best summarized in the following two papers that were published ahead of the Melbourne IBC, G.Moore *et al.*, *Taxon* 59(4): 1188–

1195 (2010) and K.Thiele *et al.*, *Taxon* 60(1): 194–198 (2011).

Based on molecular and other data *Acacia sens. lat.* is now considered as comprising a number of segregate genera, see J.T.Miller & D.S.Seigler, *Austral. Syst. Bot.* 25: 217–224 (2012) for overview. Taxa in the former *Acacia* subg. *Acacia* are now referable to the genus *Vachellia*, including the one presented here.

Description from P.Kodela's treatment of *Acacia nilotica* subsp. *indica*.

When its characteristic tomentose, necklace-like pods are not available, specimens of *V. nilotica* subsp. *indica* can usually be distinguished from *V. farnesiana* by its branchlets being ±hairy with less lenticels, and its pinnules without distinct lateral nerves raised beneath.

Initially introduced into Rockhampton, Qld, in the late 1800s as a source of gum arabic, *fide* R.W.Johnson, *Proc. Roy. Soc. Queensland* 105: 12 (1995). Subsequently cultivated as an ornamental and grown as a fodder and shade plant, particularly in parts of tropical Qld. Has a high weed potential in pastures. The pods of *V. nilotica* have been used in tanning and in folklore medicine. Gum exudates and stem bark extracts are also used for medicinal purposes. Notes on habitat, life cycle, origin and distribution, control, etc. are provided by H.E.Kleinschmidt & R.W.Johnson, *Weeds of Queensland* 196 (1977), A.N.Gracie, *Agnote No. 525* (1992) and W.T.Parson & E.G.Cuthbertson, *Noxious Weeds of Australia* 435 (1992).

FOA Reference

Data derived from *Flora of Australia* Volumes 11A (2001), 11B (2001) and 12 (1998), products of ABRS, ©Commonwealth of Australia

Author

Adapted from P.G. Kodela, *Acacia nilotica* subsp. *indica* (Benth.) Brenan, *Flora of Australia* 11A: 204–205 (2001). Updated by P.G. Kodela (May 2018).

This identification key and fact sheets are available as a mobile application:



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Australian
Biological
Resources
Study



URL: <https://keys.lucidcentral.org/keys/v3/wattle>

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