

Botanical name

Acacia erinacea Benth., London J. Bot. 1: 360 (1842)

The botanical name is derived from the Latin *erinaceus* (hedgehog), and refers to the spiny habit of this species.

Common name

None known.

Characteristic features

Harsh, much-branched low *shrubs* with spiny branchlets which are often devoid of phyllodes at their extremities. *New shoots* and *young pods* red. *Phyllodes* small, grey-green to glaucous, obscurely 1-nerved on each face. *Heads* globular on often red to red-brown peduncles. *Pods* oblong to narrowly oblong, flat but slightly biconvex, short and broad, usually hard and crustaceous.

Description

Habit. Diffuse, much-branched, rigid *shrubs* 0.3-1 m tall and up to about 1.5 m wide (outside the Kalannie region may reach 2.5 m tall or occur as ground-hugging prostrate mats); *branches* dividing into short, spreading, divaricate, spinose, finely ribbed, glabrous, often white-pruinose (can be non-pruinose in Kalannie region plants) branchlets which often lack phyllodes.

Bark. Light grey, smooth.

New shoots. Dull red to red-brown.

Phyllodes. Obliquely oblong to oblong-elliptic or oblong-oblongate, flat, 5-12 mm long, 2-4 mm wide, mostly ascending to erect, glabrous, grey-green to glaucous, sometimes whitish; with 1 obscure *longitudinal nerve* (midrib) on each face, lateral nerves obscure or absent; *apices* acute to obtuse, excentrically mucronate, not pungent.

Heads. Single within axil of phyllodes, globular, 9-10 mm in diameter when fresh, golden, 12-22-flowered; *peduncles* 4-12 mm long, glabrous, often red to red-brown.

Flowers. 5-merous, sometimes 4-merous; *sepals* united into a very short cup.

Pods. Oblong to narrowly oblong, flat but slightly biconvex, usually 1-3 cm long and 7-10 mm wide, usually crustaceous, straight, glabrous, red when young, without internal partitions between the seeds.

Seeds. Oblique in the pods, oblong-ovate to widely elliptic with one side often flattened, 3.5-4 mm long, 1-1.5 mm wide, shiny, dark brown; *aril* sub-terminal.

Taxonomy

Superficially similar species. *Acacia erinacea* is sometimes confused with *A. improcera*, *A. jacksonioides* or *A. spinosissima* and is superficially similar to *A. deficiens* and *A. kochii*; the prostrate forms (see below) may superficially resemble *A. intricata*. Of these species only *A. deficiens* occurs in the Kalannie region and it is most readily distinguished by its ascending to erect ultimate branchlets, free sepals (difficult to see without a microscope) and thinner, narrower pods.

Variants. Plants of *A. erinacea* from the Kalannie region show little variation, however, elsewhere some informal variants have been recognized. For example, around York the species may occur as ground-hugging prostrate mats while in the Kalgoorlie region there is a variant with long, thin-textured pods that are variably constricted between seeds (in flower this variant seems indistinguishable from typical *A. erinacea*).

Distribution

A widespread species which extends from the Kalbarri National Park south to Broomehill and east to Eucla in Western Australia, then extending across the border to the extreme south-west of South Australia.

In the Kalannie region *A. erinacea* is of scattered occurrence; it sometimes forms small localized colonies along degraded roadverges.

Habitat

Across its wide geographic range this species in a variety of soil type including clay, sandy clay, sand, laterite, gravel and loam on hills or in flat country.

In the Kalannie region *A. erinacea* has been recorded from range of soils including hard, light brown, sandy loam or clay on flats, sometimes in slightly to moderately saline areas near salt lakes.

Recorded from the following Kalannie region Land Management Units. Colluvial Flat-Earth; Red Brown Earth; Shallow Soil over Granite; Colluvial Flat-Solodic; Sandy Loam over Clay.

Conservation status

Not considered rare or endangered.

Flowering

Over its rather extensive geographic range *A. erinacea* flowers from (June-) July to October; however, sporadic flowers are often present on the plants in many other months of the year.

Fruiting

Over the geographic range of this species the main fruiting period is from November to December; however, few mature pods can also occur when the plants are in flower.

Plants from the Kalannie region failed to produce pods in 1996 (reduced seed set also occurred in many other acacias in the region that year).

Seed is difficult to collect due to spiny nature of the plants and because the pods generally do not occur in great profusion and are scattered over the plants; also, unless the pods are collected when fully ripe they are not easily opened to release the seeds.

Biological features

Growth characteristics. Moderate to fast growth rate; moderately frost tolerant according to Simmons (1987).

Propagation

It can be grown from seeds or cuttings according to Elliot and Jones (1982).

Revegetation

Suitable for inclusion in biodiversity plantings as part of the low shrub stratum, especially on medium- to heavy-textured soils.

Wilcox *et al.* (1996) recommend this species for revegetation in the Midlands and northern wheatbelt regions of Western Australia in areas of red sandy loam over clay or hardpan, sand over red or yellow clay and shallow soil over granite or gneiss. *Acacia erinacea* is also recommended by Lefroy *et al.* (1991) for regeneration of "White gum" country (i.e. shallow grey neutral to acidic sand over sandy clay with kaolinitic clay at depth) and "Salmon gum" country (i.e. alkaline loam over clay with distinctive white nodules of calcium carbonate at depth) and in the central wheatbelt region.

Utilisation

Erosion control. Suited to erosion control according to Elliot and Jones (1982).

Biodiversity plantings. See Revegetation above.

Wildlife refuge. On account of its intricately divided, spiny branches this species offers excellent protection for small birds and other small wildlife; it is particularly effective in this regard when individuals grow close to form dense, localized colonies.

Horticulture. This is an ideal ground cover species; suitable also for embankment planting and as a rock garden ornamental. It is attractive on account of its reddish new growth and young pods which are often present at the time of flowering.

References

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