

Acacia ausfeldii

NT

Taxonomic Authority: Regel

 Global Assessment Regional Assessment

Region: Global

 Endemic to region

Synonyms

Racosperma ausfeldii (Regel) Pedley

Common Names

AUSFELD'S WATTLE English (Primary)

WHIPSTICK CINNAMON English

Upper Level Taxonomy

Kingdom: PLANTAE

Phylum: TRACHEOPHYTA

Class: MAGNOLIOPSIDA

Order: FABALES

Family: LEGUMINOSAE

Lower Level Taxonomy

Rank:

Infra- rank name:

 Plant Hybrid

Subpopulation:

Authority:

The New South Wales plants differ from those in Victoria in having slightly broader phyllodes with a few, obscure, impressed lateral nerves (laterals normally absent in Victoria) (Orchard and Wilson 2001). In New South Wales it may be confused with *Acacia verniciflua*. In Victoria it may be confused with *A. leprosa*. Putative hybrids between *A. ausfeldii* and *A. Paradoxa* have been reported.

General Information

Distribution

Acacia ausfeldii is endemic to Australia with a disjunct distribution occurring in the Dubbo-Cassilis-Mudgee area in New South Wales and the Inglewood-Nagambie area north to Torrumbary in Victoria (Orchard and Wilson 2001). The population in Inglewood found in 1975 has not been since relocated (Orscheg 2006). The reported extent of occurrence (EOO) within New South Wales it is approximately 2300-2600 km² (NSW Scientific Committee 2005) whilst in Victoria the EOO of the available collections is ~5,200 km², excluding the collection in the Inglewood area.

Range Size

Area of Occupancy:

Extent of Occurrence:

Map Status:

Elevation

Upper limit: 600

Lower limit: 50

Depth

Upper limit:

Lower limit:

Depth Zones

 Shallow photic Bathyl Hadal Photic Abyssal

Biogeographic Realm

 Afrotropical Antarctic Australasian Neotropical Oceanian Palearctic Indomalayan Nearctic

Population

In New South Wales the total population size is thought to be 20,000 individuals, although it is not known how many of these are mature individuals; but of the total 11-14 locations a small number of locations (6-8) contain 90% of the total population (NSW Scientific Committee 2005). The number of known extant populations in Victoria was 39 in 2003, with only nine populations exceeding 1,000 individuals (Brown et al. 2003).

Total Population Size

Minimum Population Size:

Maximum Population Size:

Habitat and Ecology

A shrub or tree 2-4 m high that grows in eucalypt woodland in sandy soil often in remnant roadside patches of woodland in New South Wales, while in Victoria it grows in dry forest and mallee communities, generally restricted to box-ironbark (*Eucalyptus microcarpa* - *E. tricarpa*) open forest. *A. ausfeldii* is likely to have a dormant soil seedbank from which germination is stimulated by fire and established plants are likely to be killed by fire, as mature and juvenile plants have a single-stemmed growth form and there is no evidence of fire-resistant organs.

System		Movement pattern		Crop Wild Relative
<input checked="" type="checkbox"/> Terrestrial	<input type="checkbox"/> Freshwater	<input type="checkbox"/> Nomadic	<input type="checkbox"/> Congregatory/Dispersive	<input type="checkbox"/> Is the species a wild relative of a crop?
	<input type="checkbox"/> Marine	<input type="checkbox"/> Migratory	<input type="checkbox"/> Altitudinally migrant	

Growth From	Definition
Shrub - large	Perennial shrub (>1m), also termed a Phanerophyte (>1m)
Tree - small	Small tree, also termed a Phanerophyte (>1m)

Threats

In New South Wales most of the native habitat where this species occurs has been cleared for agriculture and substantial habitat loss for this species has occurred since settlement of the region. Half of the remaining populations are located within an agricultural landscape on road verges, whilst other occurs in pastoral land. The main threats identified are: roadside disturbance with half of the remaining populations located within an agricultural landscape on road verges; weed invasion, grazing and small-scale clearing resulting in population decline and population viability within conservation reserves, state forests and leasehold lands may be affected by adverse grazing regimes or adverse fire regimes. The largest populations located in conservation reserves are less likely to decline unless their viability is affected by adverse grazing or fire regimes (NSW Scientific Committee 2005). In Victoria this species is listed as "at Risk" in the Victoria Riverina and Victorian Midlands subregions with the main threatening processes being increased salinity, changes in fire regimes, weed invasion, grazing pressure and increase fragmentation and loss of habitat (Australian Natural Resources Atlas 2009).

	Past	Present	Future
1 Habitat Loss/Degradation (human induced)	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
1.1 Agriculture	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
1.1.1 Crops	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
1.1.4 Livestock	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
1.3 Extraction	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
1.3.6 Groundwater extraction	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
1.4 Infrastructure development	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
1.4.2 Human settlement	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
1.4.4 Transport - land/air	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
1.5 Invasive alien species (directly impacting habitat)	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
1.7 Fires	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
8 Changes in native species dynamics	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
8.1 Competitors	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
8.2 Predators	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
10 Human disturbance	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
10.5 Fire	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Conservation Measures

Known to occur within the Yarrobil National Park and Munghorn Gap Nature Reserve in New South Wales; and the Greater Bendigo National Park in Victoria. The species has been listed as Vulnerable in New South Wales as it is facing high risk of extinction in the medium term (NSW Scientific Committee 2005) and also listed as Vulnerable in Victoria (Department of Sustainability and Environment 2005), however it is not listed as threatened under the Environment Protection and Biodiversity Conservation Act 1999 (EPBC Act). The seeds for this species have been collected as part of the Millennium Seed Bank project. Seeds are located at: Mount Annan Botanic Garden, New South Wales (Australia) and Wakehurst Place, Royal Botanic Gardens, Kew (UK).

In Place Needed

1 Policy-based actions	<input checked="" type="checkbox"/>	<input type="checkbox"/>
1.2 Legislation	<input checked="" type="checkbox"/>	<input type="checkbox"/>
1.2.1 Development	<input checked="" type="checkbox"/>	<input type="checkbox"/>
1.2.1.3 Sub-national level	<input checked="" type="checkbox"/>	<input type="checkbox"/>
4 Habitat and site-based actions	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
4.4 Protected areas	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
4.4.3 Management	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
5 Species-based actions	<input checked="" type="checkbox"/>	<input type="checkbox"/>
5.7 Ex situ conservation actions	<input checked="" type="checkbox"/>	<input type="checkbox"/>
5.7.2 Genome resource bank	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Countries of Occurrence

	PRESENCE							ORIGIN				
	Year Round	Breeding Season only	Non-breeding season only	Passage migrant	Possibly extinct	Extinct	Presence uncertain	Native	Introduced	Re-Introduced	Vagrant	Origin uncertain
Australia	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
New South Wales	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Victoria	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

General Habitats

	Score	Description	Major Importance
2 Savanna	1	Suitable	Unset
2.1 Savanna - Dry	1	Suitable	Unset
3 Shrubland	1	Suitable	Unset
3.8 Shrubland - Mediterranean-type Shrubby Vegetation	1	Suitable	Unset

Species Utilisation

Species is not utilised at all

Purpose / Type of Use	Subsistence	National	International
17. Unknown	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Trend in the level of wild offtake/harvest in relation to total wild population numbers over the last five years:

Trend in the amount of offtake/harvest produced through domestication/cultivation over the last five years:

CITES status: Not listed

IUCN Red Listing

Red List Assessment: (using 2001 IUCN system) Near Threatened (NT)

Red List Criteria:

Date Last Seen (only for EX, EW or Possibly EX species):

Is the species Possibly Extinct? Possibly Extinct Candidate?

Rationale for the Red List Assessment

A. ausfeldii is endemic to Australia with a disjunct distribution between New South Wales and Victoria. The overall EOO exceeds the threshold for a threatened category but the species is listed as Vulnerable in both states separately since in either state its distribution is highly restricted (EOO in New South Wales is 2300-2600 km² whilst in Victoria it is ~5,200 km²). The habitat for this species has been significantly reduced since settlement and it is currently severely fragmented and in decline. The populations of this species are threatened by increased salinity, changes in fire regimes, weed invasion, grazing pressure and increase fragmentation and loss of habitat. It is therefore listed as Near Threatened.

Reason(s) for Change in Red List Category from the Previous Assessment:

- Genuine Change
 - Genuine (recent)
 - Genuine (since first assessment)
- Nongenuine Change
 - New information
 - Knowledge of Criteria
 - Incorrect data used previously
- No Change
 - Taxonomy
 - Criteria Revision
 - Other
- No Change
 - Same category and criteria
 - Same category but change in criteria

Current Population Trend: Decreasing

Date of Assessment: 26/04/2011

Name(s) of the Assessor(s): Malcolm, P.

Evaluator(s):

Notes:

% population decline in the past:

Time period over which the past decline has been measured for applying Criterion A or C1 (in years or generations):

% population decline in the future:

Time period over which the future decline has been measured for applying Criterion A or C1 (in years or generations):

Number of Locations:

Severely Fragmented:

Number of Mature Individuals:

Bibliography

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