REPORT UNDER THE NATIVE VEGETATION ACT 2003 IN RELATION TO ACCREDITED EXPERT'S ASSESSMENT IN ACCORDANCE WITH CLAUSE 27 OF THE NATIVE VEGETATION REGULATION 2005 FOR PVP REFERENCE NUMBER 2999

Report prepared by: Accredited Expert 30617

PVP reference number: 2999

SUMMARY

This Accredited Expert report relates to the assessment of the clearing proposed by PVP request number 2999.

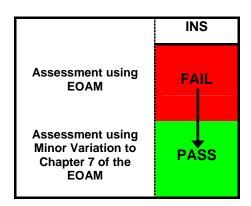
Under s. 29(2) of the *Native Vegetation Act 2003* a PVP cannot be approved unless the clearing concerned will improve or maintain environmental outcomes.

Clause 26 of the Native Vegetation Regulation 2005 prescribes the circumstances in which approval of a PVP that proposes broadscale clearing can be granted. In most cases an assessment and determination of whether the clearing will improve or maintain environmental outcomes is conducted in accordance with the environmental outcomes assessment methodology (EOAM).

In some circumstances the EOAM does not adequately allow for the specific and unique circumstances associated with the proposal. In these circumstances the assessment can use Special Provisions for Minor Variation (Clause 27 of Native Vegetation Regulation 2005).

In this assessment Special Provisions for Minor Variation have been used to allow for inclusion of *Geijera parviflora* (Wilga) for Western CMA - BBS (Brigalow Belt South) in Table 7.1 in the EOAM, where the proposed clearing with the minor variation will improve or maintain environmental outcomes and strict adherence to the Assessment Methodology is unreasonable and unnecessary.

Figure 1: A conceptual outline of the assessment process for PVP 2999



This reports details the accredited expert's opinions formed in relation to cl. 27 of the Native Vegetation Regulation 2005 when assessing the PVP.

The minor variation is a variation to the Table 7.1 of the EOAM.

The accredited expert is of the opinion that minor variation to the EOAM (Assessment Methodology) will result in a determination that the proposed clearing will improve or

maintain environmental outcomes and strict adherence to the Assessment Methodology is in this particular case unreasonable and unnecessary because:

(i) Wilga (*Geijera parviflora*) meets the criteria of being an Invasive Native Scrub Species in the area to be managed; (ii) dense regeneration of Wilga has resulted in high density and hence change of structure of the species in the area to be managed; and (iii) the landform in the area to be managed is similar to the landforms in other areas where Wilga is listed as an Invasive Native Scrub Species in Table 7.1 in the EOAM.

At least 20 stems per hectare under 20cm dbh (or patches of 10% of the area per 100 hectare area) and all stems above 20cm dbh will be retained in the managed areas as required by the Assessment Methodology.

Thus the biodiversity and other environmental gains from the proposal far outweigh the losses and as a result the clearing improves or maintains environmental outcomes.

1. INTRODUCTION

Legislative background

The property vegetation plan (PVP), proposes broadscale clearing within the definition of the *Native Vegetation Act 2003*.

Under s. 29(2) of the *Native Vegetation Act 2003*, the Minister is not to approve a PVP that proposes broadscale clearing unless the clearing concerned will improve or maintain environmental outcomes.

Clause 26 of the Native Vegetation Regulation 2005 prescribes the circumstances in which approval of a PVP that proposes broadscale clearing can be granted. Normally such a PVP can only be granted where there has been an assessment and determination in accordance with the environmental outcomes assessment methodology (EOAM) that the proposed clearing will improve or maintain environmental outcomes. However, a PVP can also be granted where an accredited expert has assessed and certified in accordance with clause 27 of the Native Vegetation Regulation 2005 that the accredited expert is of the opinion that the proposed clearing will improve or maintain environmental outcomes.

This reports details the accredited expert's opinions formed in relation to cl. 27 of the Native Vegetation Regulation 2005 when assessing the PVP reference number.

Initial assessment of broadscale clearing proposed by the PVP

When the broadscale clearing proposed by this PVP was initially assessed in accordance with the EOAM it did not result in a determination that clearing improved or maintained environmental outcomes.

The following section of this document provides detail of the accredited expert's assessment and certification in accordance with clause 27 of the Native Vegetation Regulation 2005 and contains the information required in order to comply with clause 29 of the Native Vegetation Regulation 2005.

Subsequent (change subsequent to "Final") assessment of broadscale clearing proposed by the PVP with a minor variation

The broadscale clearing proposed by this PVP was then assessed and certified by an accredited expert that, in the accredited expert's opinion, the proposed clearing will improve or maintain environmental outcomes. PVPs that are approved on the basis that an accredited expert has, in accordance with clause 27 of the Native Vegetation Regulation 2005 assessed and certified that in the accredited expert's opinion the proposed clearing will improve or

maintain environmental outcomes must comply with clause 29 of the Native Vegetation Regulation 2005.

Section 2 of this document provides detail of the accredited expert's assessment and certification in accordance with clause 27 of the Native Vegetation Regulation 2005 and contains the information required in order to comply with clause 29 of the Native Vegetation Regulation 2005.

2. MINOR VARIATION.

Table 7.1 in the EOAM contains the species in the Invasive Native Species Database. Species listed in Table 7.1 to meet the following criteria:

- (a) the species invades plant communities where it has not been known to occur previously, or the species regenerates densely following natural or artificial disturbance, and
- (b) the invasion and/ or dense regeneration of the species results in change of structure and/ or composition of a vegetation community, and
- (c) the species is within its natural geographic range.

The Environmental Outcomes Assessment Methodology (EAOM) defines invasive native species as follows:

Invasive native species for the purposes of this Chapter means a plant species that satisfies the following criteria:

- 1) The species is listed in Table 7.1 in respect of the Catchment Management Authority Area or the Catchment Management Authority Area and IBRA region to which the clearing proposal relates; and
- 2) In the opinion of the relevant Catchment Management Authority (or an officer of that Authority who is responsible for making this assessment), the species satisfies the following criteria for acting invasively:
- (a) the species is invading plant communities where it has not been known to occur previously, or
- the species is regenerating densely following natural or artificial disturbance, and
- (b) the invasion and/ or dense regeneration of the species is resulting in change of structure and/ or composition of a vegetation community, and
- (c) the species is within its natural geographic range.

The minor variation for this PVP is the inclusion of *Geijera parviflora* (Wilga) for Western CMA - BBS (Brigalow Belt South) in Table 7.1 in the EOAM.

3.1 Legal provision for minor variation

The legal provision for this minor variation is in Clause 27(1) 'Special provisions for minor variation' of the Native Vegetation Regulation 2005m which states:

- 27 Special provisions for minor variation
- (1) An accredited expert may make an assessment that proposed clearing will improve or maintain environmental outcomes only if there has been an assessment in accordance with the Assessment Methodology of whether the proposed clearing will improve or maintain environmental outcomes (not resulting in a determination that the proposed clearing will improve or maintain environmental outcomes) and the accredited expert is of the opinion that:
 - (a) a minor variation to the Assessment Methodology would result in a determination that the proposed clearing will improve or maintain

- environmental outcomes (other than a variation that is not allowable under this clause), and
- (b) strict adherence to the Assessment Methodology is in the particular case unreasonable and unnecessary.
- (2) A variation to the Assessment Methodology is not allowable under this clause if it is a variation of any of the following aspects of the Assessment Methodology:
 - (a) riparian buffer distances or associated offset requirements,
 - (b) classification of vegetation as likely habitat for threatened species,
- (c) classification of a plant species as a threatened species or a component of an endangered ecological community,
- (d) classification of the condition of vegetation,
- (e) classification of the vegetation type or landscape type as overcleared,
- (f) the assessment of the regional value of vegetation.

3.2 How the EOAM was varied

The EOAM was varied to (i) include *Geijera parviflora* (Wilga) for Western CMA - BBS (Brigalow Belt South) in Table 7.1 in the EOAM; and (ii) include '20' as the number of plants per hectare to be retained, 'Yes' for retention required under criterion 18A (clearing types d-f) only move bracket to encompass "only", '20cm' as the maximum dbh to be cleared, and 'All' for the INS type of clearing permitted. Table 7.1 was varied as set out in the table below.

Catchment Management Authority	Invasive Native Species	Retention requirements			INS type of clearing permitted
- IBRA region		Number of plants per hectare to be retained	Retention required by criterion 18A (clearing types d-f only)	Maximum dbh allowed to be cleared	
WesternBBS	Geijera parviflora (Wilga)	20 (Total under 20cm dbh)	Yes	20cm	All

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3.3 Description of the proposed clearing

The proposed clearing involves the management of Invasive Native Scrub Species on a property in the Brigalow Belt South IBRA region in Western CMA. Wilga is invasive in the region, and the species is acting invasively at the site (see table below for details). Wilga is listed as an Invasive Native Species in Table 7.1 in the EOAM in the Western CMA for the Cobar Peneplain IBRA regions. It is also listed for the Central West CMA. The property where Wilga will be managed is located in the Brigalow Belt South IBRA region in Western CMA. It has a similar landform and vegetation type as those in the Cobar Peneplain IBRA region where Wilga is listed as an Invasive Native Species.

The proposed clearing involves management of INS using the following clearing types available under the Environmental Outcomes Assessment Methodology

- a) burning;
- b) clearing of individual plants with no disturbance to groundcover;
- c) clearing of individual plants with minimal disturbance to groundcover;
- d) clearing of plants at paddock scale with nil to minimal disturbance to soil and groundcover;
- e) clearing of plants at paddock scale with temporary disturbance to soil and groundcover; and

Aall Wilga plants over 20cm dbh will be retained, and additional retention is as required under criterion 18A (for clearing types d-f).

3.5 Reasons for recommending the proposed minor variation

Prior to this minor variation the determination was that the proposed clearing did not improve or maintain environmental outcomes because Wilga is not listed as an Invasive Native Species for the BBS IBRA region for Western CMA in Table 7.1 of the EOAM.

The Wilga in this case is acting invasively. It has caused a change in vegetation structure, which has resulted in a dense, homogenous habitat that does not provide the range of habitats required for native biodiversity. The density of Wilga at the site is more than 650 stems per hectare. Flora and fauna require a range of densities to provide a diversity of habitats they require. Homogenous, dense areas of invasive native scrub lack habitat diversity and do not provide a range of habitats for native flora and fauna (Hassall & Associates et al., 2006) Managing the the Wilga in this case provides beneficial environmental outcomes by creating a mosaic of vegetation types across the landscape and restoring vegetation structure and composition.

Wilga is currently listed as an Invasive Native Species in the Cobar Peneplain IBRA regions of the Western CMA and in the Central West CMA area. The vegetation at the site where Wilga will be managed is of a vegetation type and species composition and density common on the Cobar Peneplain.

The table below describes the reasons why Wilga is an Invasive Native Scrub Species in the BBS IBRA region (consistent with the criteria for listing an Invasive Native Scrub Species in Table 7.1 in the EOAM).

SPECIES

The species invades plant communities where it has not been known to occur previously <u>OR</u> the species regenerates densely following natural or artificial disturbance

GEIJERA PARVIFLORA (WILGA) FOR BRIGALOW BELT SOUTH

- Wilga is usually found as a well-spaced tree in mixed woodland communities, however, it is now commonly found growing under a major portion of trees and/or shrubs where birds have perched and distributed the seeds in their droppings (Cunningham et al.,1981). As a result, Wilga spreads over large areas where it was not known to occur previously
- Sometimes occurs in dense local stands (Cunningham et al.,1981) of uniform age in previously open areas.
- Wilga is listed as INS for IBRA regions in the Western Catchment Management Authority area and listed in the Central West Catchment Management Authority area.

SPECIES	GEIJERA PARVIFLORA (WILGA) FOR BRIGALOW BELT SOUTH		
The invasion and/ or dense regeneration of the species results in change of structure and/ or composition of a vegetation community	Wilga is usually found as well-spaced trees in mixed woodland communities, however, it is now commonly found growing under a major portion of trees and/or shrubs where birds have perched and distributed the seeds in their droppings (Cunningham et al., 1981). This results in a dense understorey of Wilga under the major portion of trees/shrubs, changing the structure of the vegetation community.		
the species is within its natural range or distribution	Wilga occurs throughout the region, except for the far northwest; very infrequent in the south of the Western Division (Cunningham et al., 1981). Brigalow Belt South Bioregion within the Western Catchment Management Authority area is in the north of the Catchment area running along a small north to south area east of Walgett. It is not in the far north west of the Western Division or the south.		

References

Cunningham, GM, Mulham, WE, Milthorpe, PL and Leigh, JH (1992) Plants of Western New South Wales, Inkata Press.

Hassall & Associates, Briggs, S. and Norman, P. 2(006) Documenting the Science Behind the Invasive Native Scrub Tool. A report prepared for the Central West Catchment Management Authority, Dubbo.

4. Supplementary information

The table below describes how Wilga is acting invasively in the area to be managed..

SPECIES	GEIJERA PARVIFLORA (WILGA) FOR BRIGALOW BELT SOUTH		
The species is invading plant communities where it has not been known to occur previously OR the species is regenerating densely following natural or artificial disturbance	 The area proposed to be cleared has regenerated densely with over 650 stems per hectare of Wilga with other invasive species at similar densities. The area was originally woodland with sparse Wilga trees. The Wilga is now very dense and has most plants have not matured due to the density of stems. The Wilga at the site is in a dense stand of uniform age. 		
the invasion and/ or dense regeneration of the species is resulting in change of structure and/ or composition of a vegetation community	 The area proposed for management was once open woodland and is now a thick shrubland with a high density of small stems of Wilga and Bimble Box. The dense stand of Wilga at the site has resulted in substantial changes in structure (loss of structural diversity) and composition (loss of groundcover) of the vegetation community. Data collected from the site shows there is an average of more than 650 plants per hectare under 20cm. The data collected indicated the regeneration of Wilga is much more dense than what was there previously. 		
the species is within its natural range or distribution	Wilga occurs throughout the region, except for the far northwest; very infrequent in the south (Cunningham et al., 1981). The area of the PVP is in the north of the region (Western Catchment Management Authority area) and not the far northwest of the region.		

5. Certification by the accredited expert

As accredited expert I am of the opinion that minor variation to the EOAM (Assessment Methodology) will result in a determination that the proposed clearing will improve or maintain environmental outcomes and strict adherence to the Assessment Methodology is in this particular case unreasonable and unnecessary because:

- (i) Wilga (*Geijera parviflora*) meets the criteria of being an Invasive Native Scrub Species in the BBS IBRA region in Western CMA;
- (ii) dense regeneration of Wilga has resulted in the species acting invasively with a change in structure to high density of the species in the area to be managed; and (iii) the landform in the area to be managed is similar to the landforms in other areas where Wilga is listed as an Invasive Native Scrub Species in Table 7.1 of the EOAM.

At least 20 stems per hectare under 20cm dbh (or patches of 10% of the area per 100 hectare area) and all stems above 20cm dbh will be retained in the managed areas as required by the Assessment Methodology.

Thus the biodiversity and other environmental gains from the proposal far outweigh the losses and as a result the clearing improves or maintains environmental outcomes.