

**Clearing of approximately 180 hectares of native
vegetation for agriculture: Lots 2 & 3 Victoria
Locations 7967, 6686, 7979 & 10446, 25 km north
west of Binu, Shire of Northampton**

Mr D Cripps

**Report and recommendations
of the Environmental Protection Authority**

**Environmental Protection Authority
Perth, Western Australia
Bulletin 1110
September 2003**

ISBN. 0 7307 6746 9
ISSN. 1030 - 0120
Assessment No. 1478

Summary and recommendations

This report provides the Environmental Protection Authority's (EPA)'s advice to the Minister for the Environment on the proposal by Mr D Cripps to clear approximately 180 hectares of native vegetation on his farming property (Lots 2 & 3 being portions of Victoria Locations 7967, 6686, 7979 & 10446) 25 kilometres north west of Binnu. This proposal was assessed at the level of 'Proposal Unlikely to be Environmentally Acceptable' and a brief statement of reasons for this level of assessment was released in May 2003 at the time that the level of assessment was determined.

Section 44 of the Environmental Protection Act 1986 requires the EPA to report to the Minister for the Environment on the environmental factors relevant to the proposal and on the conditions and procedures to which the proposal should be subject, if implemented. In addition, the EPA may make recommendations as it sees fit.

Relevant environmental factors

The EPA decided that biodiversity conservation is the environmental factor relevant to the proposal which required detailed evaluation and discussion in the report.

Conclusion

The EPA has concluded that the proposal by Mr D Cripps to clear approximately 180 hectares of native vegetation on Lots 2 & 3, being portions of Victoria Locations 7967, 6686, 7979 & 10446, cannot be demonstrated to meet the EPA's objective for biodiversity conservation and is therefore environmentally unacceptable and should not proceed.

Recommendations

The EPA submits the following recommendations to the Minister for the Environment:

1. That the Minister notes that the proposal being assessed is for clearing of approximately 180 hectares of native vegetation on Lots 2 & 3, being portions of Victoria Locations 7967, 6686, 7979 & 10446, 25 kilometres north west of Binnu.
2. That the Minister considers the report on the relevant environmental factor of Biodiversity Conservation as set out in Section 3 of this report.
3. That the Minister notes that the EPA has concluded that the proposal cannot be demonstrated to meet the EPA's objective for biodiversity conservation and is therefore environmentally unacceptable and should not proceed.
4. That the Minister notes that the EPA has not included in this Bulletin "conditions and procedures to which the proposal should be subject, if implemented" because the EPA holds the view that the proposal should not be implemented.

Contents

	Page
Summary and recommendations.....	i
1. Introduction.....	1
2. The proposal.....	1
3. Relevant environmental factors.....	5
3.1 Biodiversity conservation	5
4. Conclusions and Recommendations.....	9

Table

Table 1: Key Proposal Characteristics

Figures

Figure 1: Locality and regional context of proposal

Figure 2: Proposal area and local context

Appendices

1. References

1. Introduction

This report provides the advice and recommendations of the Environmental Protection Authority (EPA) to the Minister for the Environment on the environmental factors relevant to the proposal by Mr D Cripps to clear approximately 180 hectares (ha) of native vegetation on his farming property (Lots 2 & 3, being portions of Victoria Locations 7967, 6686, 7979 & 10446) 25 kilometres (km) north west of Binnu.

The proposed clearing was notified to the Commissioner of Soil and Land Conservation as required under the *Soil and Land Conservation Act 1950* in October 2002. Following consideration by the Inter Agency Working Group under the '*Memorandum of Understanding (MOU) for the protection of remnant vegetation on private land in the agricultural region of Western Australia*,' (Agriculture WA, 1997) the proposal was referred to the EPA by the Commissioner of Soil and Land Conservation in January 2003.

Following discussion of the proposal with the proponent, the level of assessment was set at Proposal is Unlikely to be Environmentally Acceptable (PUEA) in May 2003. At the time that the level of assessment was set, the EPA released a brief statement of reasons for the EPA's determination. There were no appeals against the PUEA level of assessment.

Section 44 of the *Environmental Protection Act 1986* requires the EPA to report to the Minister for the Environment on the environmental factors relevant to the proposal and on the conditions and procedures to which the proposal should be subject, if implemented. In addition, the EPA may make recommendations as it sees fit.

Accordingly, Section 3 discusses environmental factors relevant to the proposal and Section 4 presents the EPA's conclusions and recommendations. References are listed in Appendix 1.

2. The proposal

The proponent and landowner, Mr D Cripps, proposes to clear approximately 180 ha of native vegetation for farming. The property (Lots 2 & 3, being portions of Victoria Locations 7967, 6686, 7979 & 10446) is located south of the Ajana-Kalbarri Road, approximately 25 km north west of Binnu within the Shire of Northampton.

Figure 1 shows the locality of the proposal and the regional context and Figure 2 shows the boundaries of areas proposed for clearing of native vegetation in relation to property boundaries and other features. The key characteristics of the proposal and impacts on vegetation are described in Table 1.

The proposal would reduce the area of native vegetation on the property from approximately 410 ha (16% of the property area) to approximately 230 ha (9% of the property area).

Table 1. Summary of key proposal characteristics:

Notice of Intent to Clear Registration No 29/02 : Mr D Cripps

Lots 2 & 3 being portions of Victoria Locations 7967, 6686, 7979 & 10446

Element	Description
Total area of property	Approximately 2,490 hectares
Area of property currently uncleared	Approximately 410 hectares (16% of the property area)
Area proposed to be cleared (area estimated by the DoA)	Approximately 180 hectares (7% of the property area)
Area of native vegetation estimated remaining after proposed clearing	Approximately 230 hectares (9% of the property area)
Area of native vegetation protected under an Agreement To Reserve or other mechanism	0 hectares
Stated purpose of clearing	farming
Condition of vegetation	not known
Mapped description of the vegetation type to be cleared	' <i>Shrublands; scrub heath on coastal association, yellow sandplain</i> '; (NLWRA)
Total representation in reserves (IUCN Category I to IV) of the NLWRA vegetation type to be cleared	Approximately 96,847 hectares or 25% of the estimated pre-European extent (Shepherd <i>et al</i> , 2002)
Total mapped extent of NLWRA vegetation type now supporting woody vegetation (any condition)	Approximately 154,708 hectares or 40% of pre-European extent (Shepherd <i>et al</i> , 2002)
Proportion of vegetation cover remaining within the local authority area	Northampton Shire 19% (within the ILZ) (Shepherd <i>et al</i> , 2002)
Proportion of vegetation cover remaining in the local catchment/s	Murchison River : 3.9% within the ILZ Hutt River: 5% within the ILZ (Shepherd <i>et al</i> , 2002)

Abbreviations: DCLM: Department of Conservation & Land Management
DEP: Department of Environmental Protection
DoA: Department of Agriculture

NLWRA National Land and Water Resources Audit
IUCN International Union for the Conservation of Nature
ILZ Intensive Land Use Zone (see Shepherd *et al*, 2002)

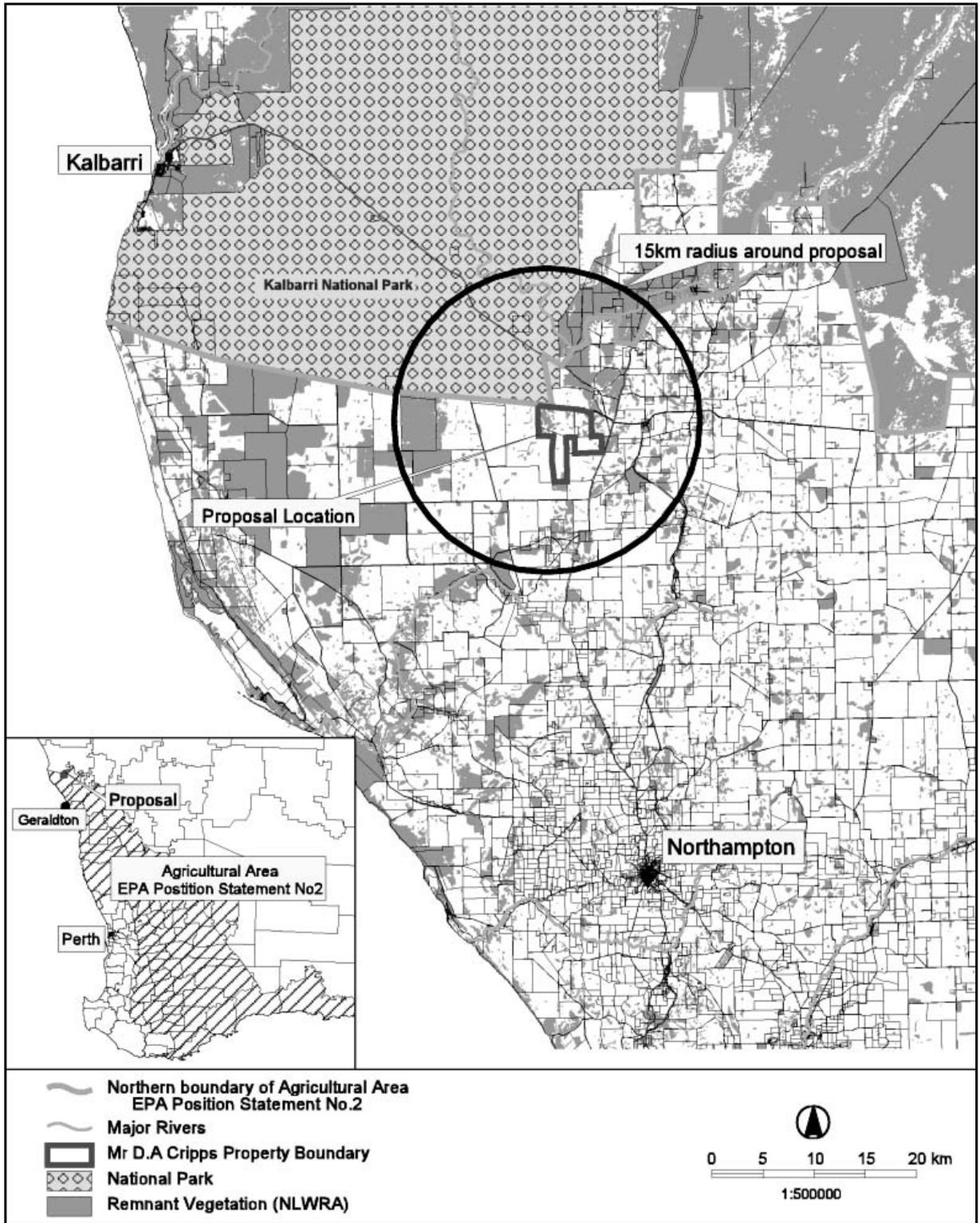


Figure 1: Locality and regional context of proposal

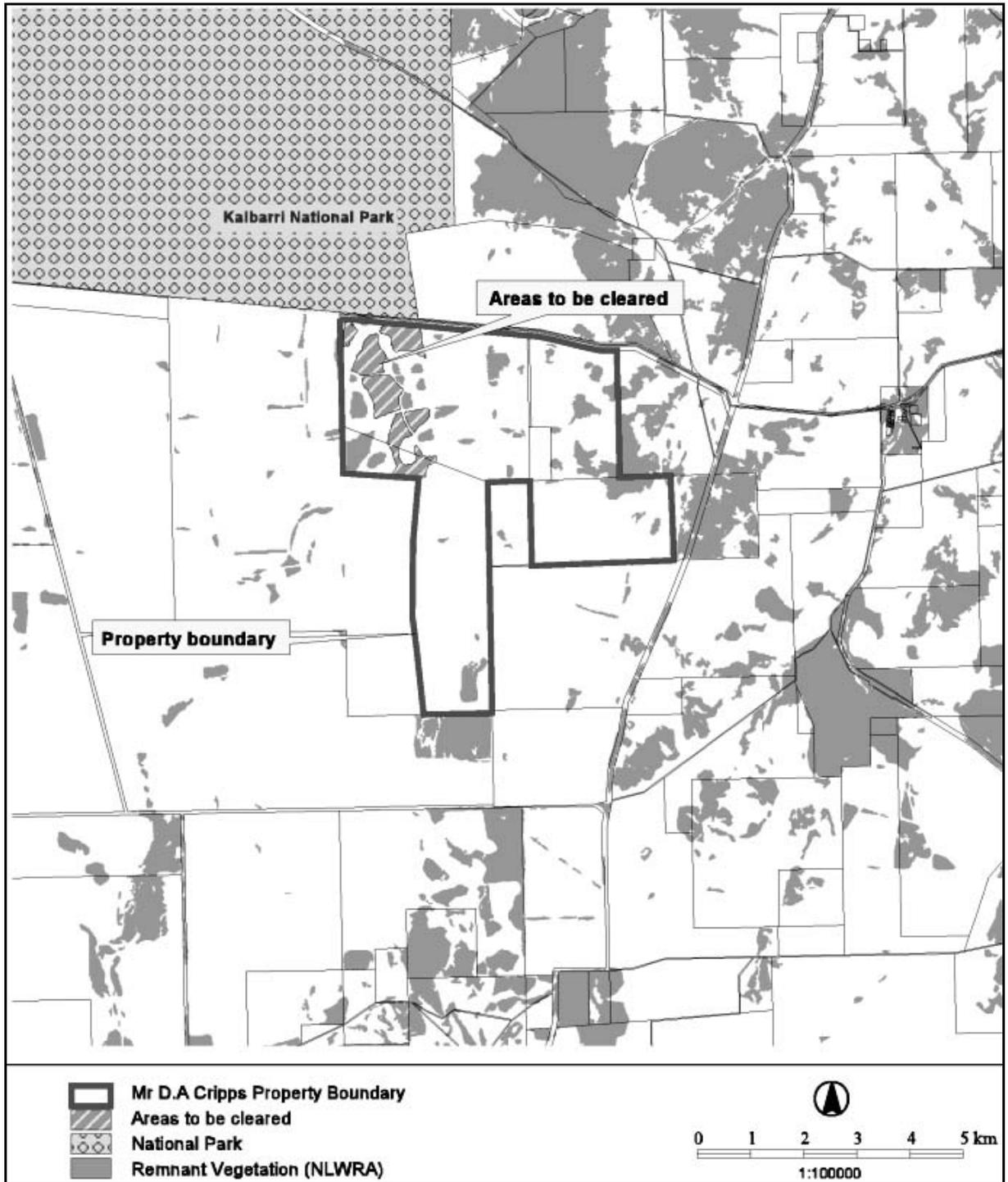


Figure 2: Proposal area and local context

3. Relevant environmental factors

The proposal is inconsistent with EPA Position Statement No. 2 *Environmental Protection of Native Vegetation in Western Australia* and EPA Position Statement No. 3 *Terrestrial Biological Surveys as an Element of Biodiversity Conservation*. The EPA has therefore decided only to report in detail on the key environmental factor relevant to the proposal.

It is the EPA's opinion that biodiversity conservation is the relevant environmental factor for the proposal and this factor is discussed in Section 3.1 of this report.

3.1 Biodiversity conservation

Description

EPA Position Statement No. 2

The EPA has assessed a number of land clearing proposals in Western Australia over recent years.

Based on:

- the issues arising from information presented during these assessments;
- the strategic framework provided by government policy positions and programs such as the National Strategy for the Conservation of Australia's Biodiversity (Commonwealth of Australia, 1996); and
- general scientific information which has become available on the potential cumulative impacts of broad scale clearing on the environment,

the EPA has developed a Position Statement (Position Statement No. 2) regarding *Environmental Protection of Native Vegetation in Western Australia* (EPA, 2000).

Section 4.1 of Position Statement No. 2 sets out the EPA's position on broad scale clearing of native vegetation within an area described as the 'Agricultural Area' illustrated in Figure 1 of the Position Statement.

Specifically in relation to the 'Agricultural Area' the EPA's current position on clearing in the region includes the following:

1. *"Significant clearing of native vegetation has already occurred on agricultural land, and this has led to a reduction in biodiversity and increase in land salinisation. Accordingly, from an environmental perspective any further reduction in native vegetation through clearing for agriculture cannot be supported.*
2. *All existing remnant native vegetation should be protected from passive clearing through, for example, grazing by stock or clearing by other means such as use of chemicals including fertilisers.*

3. *All existing remnant native vegetation should be actively managed by landholders and managers so as to maintain environmental values.*
4. *Because of the extent of over clearing in the agricultural area, development of revegetation strategies at a landscape level, including the provision of stepping stones, linkages and corridors of native vegetation should be a priority.*
5. *Clearing of deep rooted native vegetation for replacement with non native deep rooted crops (eg Tagasaste or bluegums) is generally not regarded as acceptable and these alternative deep rooted crops should be planted on already cleared land.” (EPA, 2000)*

The EPA considers that the cumulative impacts from clearing native vegetation in the Agricultural Area, as described in the EPA’s Position Statement No. 2, are such that the present proposal, involving broad scale clearing of native vegetation within this area, should be regarded as environmentally unacceptable.

While landholders continue to raise equity issues in relation to individual decisions preventing clearing, the EPA has previously indicated (within EPA Position Statement No. 2 and since that time) that it holds strongly to the view that the challenge for government is to establish a response to issues raised by these landholders on matters of equity as soon as possible, rather than to continue to allow further clearing of native vegetation.

Bioregional Context

South-western Australia is widely recognised as one of the richest plant habitats on earth (eg. Burbidge *et al*, 1990).

The proposal area is located within the 2,460,225 ha Geraldton Sandplains Interim Biogeographical Region of Thackway & Cresswell (1995). Approximately 663 290 ha or 27% of the area of the Bioregion within the Intensive Land-use Zone (ILZ) is estimated to support native vegetation (Shepherd *et al*, 2002).

The Geraldton Sandplains Bioregion is recognised as containing significant areas of very high biological diversity in the context of South-western Australia. The ecological significance of the area is related to the number of regionally endemic plant species, the high level of species richness of vascular plants and the diverse vegetation associations and communities (George *et al*, 1979).

Regional and local context

The proposal area is located adjacent to Kalbarri National Park and lies close to the boundary between the Intensive Landuse Zone (Shepherd *et al*, 2002) and the pastoral zone.

However to the south of the property within a 15 km radius of the proposal area, approximately 20 % of the landscape now supports native vegetation.

Although the native vegetation on the property has been fragmented by previous clearing for agriculture and is located in proximity to the Kalbarri National Park, the

EPA is of the view that further incremental loss of native vegetation on private land at the interface between protected areas and over-cleared landscapes is undesirable as it may:

- encourage further clearing in the Agricultural Area, particularly in areas adjacent to conservation reserves, leading to continued loss of biodiversity within this area;
- negate and discourage efforts by other landholders currently involved in revegetation; and
- reduce the potential to achieve improved conservation outcomes in over-cleared landscapes through revegetation in the future.

The vegetation remnants affected by the proposal, while relatively small, provide a stepping stone for potential ecological linkage between the Kalbarri National Park and larger vegetation remnants located in proximity to the Hutt River to the south west. These potential linkages could be strengthened by future revegetation between existing remnants.

Site specific values

No site-specific biological surveys have been carried out for the proposal area. However based on broad scale regional mapping of vegetation by Beard and the National Land and Water Resources Audit (Shepherd *et al*, 2002), the vegetation is described as *Shrublands; scrub heath on coastal association, yellow sandplain*.

An estimate of the remaining extent of woody vegetation of this vegetation type overall, and occurring within conservation reserves, as a proportion of its estimated original extent, is provided in Table 1. This estimate was obtained through computer overlay and analysis of digital datasets of the National Land and Water Resources Audit 'Remnant Vegetation' and 'Vegetation Association' datasets and the Department of Conservation and Land Management managed conservation estate using a Geographic Information System (GIS) (Shepherd *et al*, 2002). The estimate indicates that approximately 40% of the pre-European extent of the affected Vegetation Association remains and that approximately 25% of the original extent exists within dedicated conservation reserves.

The EPA recognises that the information provided through computer analysis of Vegetation Associations identified in the National Land and Water Resources Audit is of a broadscale and general nature. It is therefore not possible, in the absence of detailed site specific information for the proposal area, to conclude definitively from the above analysis that the proposal will not impact adversely on depleted or poorly reserved vegetation types at the plant community level. However, based on the figures provided by the analysis and the proximity of the proposal area to the Kalbarri National Park (which contains large areas of the affected vegetation association), this appears unlikely.

Interim advice from the Department of Conservation & Land Management to the Inter-Agency Working Group indicated that a large number of threatened flora occur in the region of the proposal and that a floristic survey would be needed to identify any species protected under the *Wildlife Conservation Act 1950*.

The EPA's Position Statement No. 3 on *Terrestrial Biological Surveys as an Element of Biodiversity Conservation* sets out (on page 5 of the Position Statement) the principles that are taken into account by the EPA in considering proposals with potential impacts on biodiversity. The second of these principles states that where development proposals will impact on biodiversity, it is for the proponent to demonstrate that the impact of their proposal will not result in unacceptable loss. The eighth principle states that in the absence of information that could provide the EPA with assurance that biodiversity will be protected, the EPA will adopt the precautionary principle.

Assessment

This proposal is for clearing of a large area of native vegetation within the predominantly cleared Agricultural Area identified in EPA Position Statement No. 2 and the biodiverse Geraldton Sandplains Bioregion. No information of a property-specific nature has been gathered about the precise environmental significance of the affected vegetation, flora or fauna.

Based on available information, the proposal area contains vegetation that, while apparently adequately conserved at the broadscale regional level, provides significant benefit to conservation of biodiversity in the local area.

Overall the EPA recognises that available information at a broad level indicates that plant communities impacted by the proposal may be adequately conserved and represented in conservation reserves such as Kalbarri National Park. However the location of the proposal and the biodiversity values impacted are such that the EPA considers that from an environmental perspective, there would be no benefit, and potential for substantial negative consequences, if the proposal were allowed to proceed. Additionally the proposed clearing would add further to the already high level of loss of biodiversity in the Geraldton Sandplains Bioregion and the Agricultural Area and may negate and discourage positive efforts of landholder actively engaged in revegetation.

It is therefore the EPA's view that the proposal cannot be demonstrated to meet the EPA's objectives for the biodiversity conservation.

4. Conclusion and Recommendations

The EPA has concluded that the proposal by Mr D Cripps to clear approximately 180 hectares of native vegetation on Lots 2 & 3, being portions of Victoria Locations 7967, 6686, 7979 & 10446 cannot be demonstrated to meet the EPA's objective for biodiversity conservation and is therefore environmentally unacceptable and should not proceed.

The EPA submits the following recommendations to the Minister for the Environment:

1. That the Minister notes that the proposal being assessed is for clearing of approximately 180 hectares of native vegetation on Lots 2 & 3, being portions of Victoria Locations 7967, 6686, 7979 & 10446, 25 km north west of Binu.
2. That the Minister considers the report on the relevant environmental factor of Biodiversity Conservation as set out in Section 3 of this report.
3. That the Minister notes that the EPA has concluded that the proposal cannot be demonstrated to meet the EPA's objective for biodiversity conservation and is therefore environmentally unacceptable and should not proceed.
4. That the Minister notes that the EPA has not included in this Bulletin "conditions and procedures to which the proposal should be subject, if implemented" because the EPA holds the view that the proposal should not be implemented.

Appendix 1

References

References

- Agriculture Western Australia (1997) *Memorandum of Understanding between the Commissioner of Soil and Land Conservation, Environmental Protection Authority, Department of Environmental Protection, Agriculture Western Australia, Department of Conservation and Land Management and the Water and Rivers Commission for the protection of remnant vegetation on private land in the agricultural region of Western Australia*. Agriculture Western Australia, Perth, Western Australia.
- Burbidge, A., Hopper, S.D. and Van Leeuwin, S. (1990) *Nature Conservation, Landscape and Recreation Values of the Lesueur area: A Report to the Environmental Protection Authority from the Department of Conservation and Land Management*. EPA Bulletin 424, January 1990.
- Commonwealth of Australia (1996) *National Strategy for the Conservation of Australia's Biological Diversity*. Canberra.
- Environmental Protection Authority (2000) *Environmental Protection of Native Vegetation in Western Australia, Clearing of native vegetation with particular reference to the agricultural area. Position Statement No. 2*. Environmental Protection Authority, Government of Western Australia.
- Environmental Protection Authority (2002) *Terrestrial Biological Surveys as an Element of Biodiversity Protection. Position Statement No. 3*. Environmental Protection Authority, Government of Western Australia.
- George, A.S., Hopkins, A.J.M., and Marchant N.G. (1979) 'The Heathlands of Western Australia'. In R.L. Specht (ed) *Ecosystems of the World 9A Heathlands and related Shrublands*. Descriptive Studies. pp 211-230. Elsevier Amsterdam.
- Shepherd, D.P., Beeston, G.R. and Hopkins, A.J.M. (2001) *Native Vegetation in Western Australia. Technical Report 249*. Department of Agriculture, Western Australia, South Perth.
- Thackway, R. and Cresswell, I.D. (Eds) (1995) *An Interim Biogeographic Regionalisation for Australia: A Framework for Establishing the National System of Reserves Volume 4*. Australian Nature Conservation Agency, Canberra.