



CLEARING PERMIT

Granted under section 51E of the Environmental Protection Act 1986

Purpose Permit number:	CPS 5629/1
Permit Holder:	Shire of Trayning
Duration of Permit:	28 September 2013 – 28 September 2023

The Permit Holder is authorised to clear native vegetation subject to the following conditions of this Permit.

PART I – CLEARING AUTHORISED

- 1. Purpose for which clearing may be done**
Clearing for the purpose of gravel extraction.
- 2. Land on which clearing is to be done**
Lot 11940 on Plan 225370, South Trayning
- 3. Area of Clearing**
The Permit Holder must not clear more than 0.77 hectares of native vegetation within the area cross hatched yellow on attached Plan 5629/1.
- 4. Application**
This Permit allows the Permit Holder to authorise persons, including employees, contractors and agents of the Permit Holder, to clear native vegetation for the purposes of this Permit subject to compliance with the conditions of this Permit and approval from the Permit Holder.
- 5. Type of clearing authorised**
This Permit authorises the Permit Holder to clear native vegetation for the activities described in condition 1 of this Permit to the extent that the Permit Holder has the power to carry out works involving clearing for those activities under the *Local Government Act 1995* or any other written law.
- 6. Period in which clearing is authorised**
The Permit Holder shall not clear any native vegetation after 28 September 2018

PART II – MANAGEMENT CONDITIONS

- 7. Management Plan (Offset)**
The Permit Holder must implement and adhere to "Shire of Trayning Offset Proposal, Clearing Permit Applications CPS 5523/1, CPS 5629/1 and CPS 5507/1", submitted to the Department of Environment Regulation on the 20 August 2013.
- 8. Retain vegetative material and topsoil, revegetation and rehabilitation**
The Permit Holder shall:
 - (a) retain the vegetative material and topsoil removed by clearing authorised under this Permit and stockpile the vegetative material and topsoil in an area that has already been cleared.

- (b) within 6 months following clearing authorised under this permit, *revegetate* and *rehabilitate* the area within the area cross-hatched yellow on attached Plan 5629/1 by:
- (i) re-shaping the surface of the land so that it is consistent with the surrounding 5 metres of uncleared land;
 - (ii) ripping the ground on the contour to remove soil compaction;
 - (iii) laying the vegetative material and topsoil retained under condition 8(a) on the cleared area;
 - (iv) deliberately *planting* and/or *direct seeding* native vegetation that will result in a similar species composition, structure and density of native vegetation to pre-clearing vegetation types in that area; and
 - (v) ensuring only *local provenance* seeds and propagating material are used to *revegetate* and *rehabilitate* the area.
- (c) within 18 months of undertaking *revegetation* and *rehabilitation* in accordance with condition 8(b) of this Permit:
- (i) engage an *environmental specialist* to determine the species composition, structure and density of the area *revegetated* and *rehabilitated*; and
 - (ii) where, in the opinion of an *environmental specialist*, the composition structure and density determined under condition 8(c)(i) of this Permit will not result in a similar species composition, structure and density to that of pre-clearing vegetation types in that area, the Permit Holder must undertake additional *planting* or *direct seeding* of native vegetation in accordance with the requirements of condition 8(b)(iv) and (v) of this Permit.
- (d) Where additional *planting* or *direct seeding* of native vegetation is undertaken in accordance with condition 8(c)(ii) of this permit, the Permit Holder shall repeat condition 8(c)(i) and 8(c)(ii) within 24 months of undertaking the additional *planting* or *direct seeding* of native vegetation.
- (e) Where a determination by an *environmental specialist* that the composition, structure and density within areas *revegetated* and *rehabilitated* will result in a similar species composition, structure and density to that of pre-clearing vegetation types in that area, as determined in condition 8(c)(i) and (ii) of this permit, that determination shall be submitted for the CEO's consideration. If the CEO does not agree with the determination made under condition 8(c)(ii), the CEO may require the Permit Holder to undertake additional *planting* and *direct seeding* in accordance with the requirements under condition 8(c)(ii).

PART III - RECORD KEEPING AND REPORTING

9. Records must be kept

The Permit Holder must maintain the following records for activities done pursuant to this Permit:
In relation to the *revegetation* of areas pursuant to condition 8:

- (a) the location of any area of *offsets* recorded using a Global Positioning System (GPS) unit set to Geocentric Datum Australia 1994 (GDA94), expressing the geographical coordinates in Eastings and Northings or decimal degrees;
- (b) a description of the *offset* activities undertaken; and
- (c) the size of the *offset* area (in hectares).

10. Reporting

- (a) The Permit Holder must provide to the CEO on or before 30 June of each year, a written report:
- (i) of records required under condition 9 of this Permit; and
 - (ii) concerning activities done by the Permit Holder under this Permit between 1 January to 31 December of the preceding calendar year.
- (b) If no clearing authorised under this Permit was undertaken between 1 January to 31 December of the preceding calendar year, a written report confirming that no clearing under this permit has been carried out, must be provided to the CEO on or before 30 June of each year.
- (c) Prior to 28 June 2018, the Permit Holder must provide to the CEO a written report of records required under condition 9 of this Permit where these records have not already been provided under condition 10(a) of this Permit.

DEFINITIONS

The following meanings are given to terms used in this Permit:

direct seeding means a method of re-establishing vegetation through the establishment of a seed bed and the introduction of seeds of the desired plant species;

environmental specialist: means a person who holds a tertiary qualification in environmental science or equivalent, and has experience relevant to the type of environmental advice that an environmental specialist is required to provide under this Permit, or who is approved by the CEO as a suitable environmental specialist.

local provenance means native vegetation seeds and propagating material from natural sources within 50 kilometres and the same Interim Biogeographic Regionalisation for Australia (IBRA) subregion of the area cleared.

offset/s means an offset required to be implemented under Part II of this Permit;

planting means the re-establishment of vegetation by creating favourable soil conditions and planting seedlings of the desired species;

rehabilitate/ed/ion means actively managing an area containing native vegetation in order to improve the ecological function of that area;

revegetate/ed/ion means the re-establishment of a cover of *local provenance* native vegetation in an area using methods such as natural *regeneration*, *direct seeding* and/or *planting*, so that the species composition, structure and density is similar to pre-clearing vegetation types in that area.

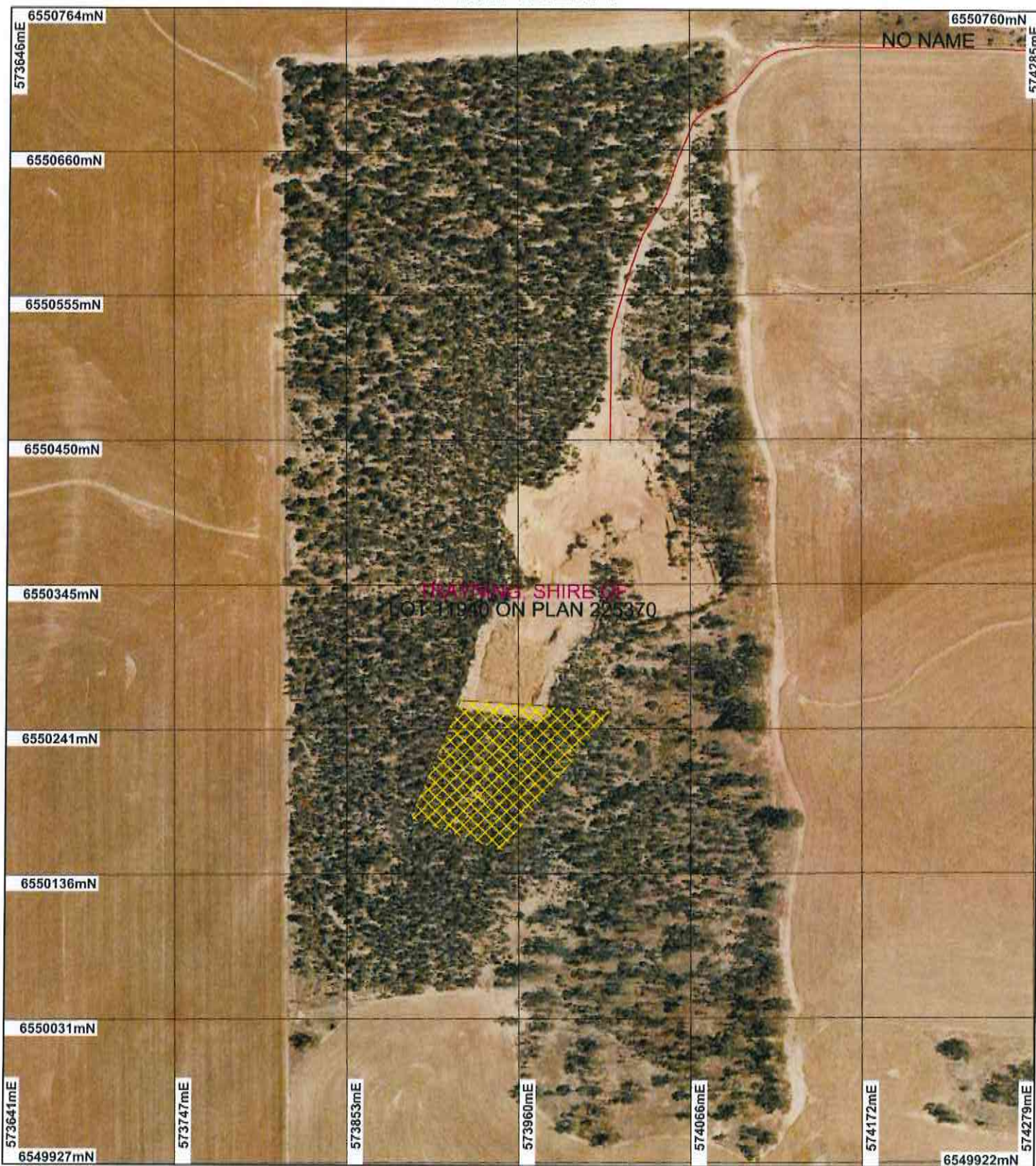


M Warnock
MANAGER
NATIVE VEGETATION CONSERVATION BRANCH

*Officer delegated under Section 20
of the Environmental Protection Act 1986*

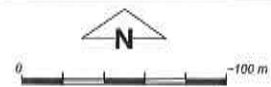
29 August 2013

Plan 5629/1



LEGEND

- Road Centrelines
 - Easements
 - Local Government Authorities_1
 - Clearing Instruments
 - Areas Approved to Clear
- Trayning 50cm Orthomosaic - Landgate 2004



Scale 1:3718
(Approximate when reproduced at A4)

Geocentric Datum Australia 1994

Note: the data in this map have not been projected. This may result in geometric distortion or measurement inaccuracies.

M Warnock Date 29/8/13
M Warnock

Officer with delegated authority under Section 20 of the Environmental Protection Act 1988

Information derived from this map should be confirmed with the data custodian acknowledged by the agency acronym in the legend.



Government of Western Australia
Department of Environment Regulation

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1. Application details

1.1. Permit application details

Permit application No.: 5629/1
Permit type: Purpose Permit

1.2. Proponent details

Proponent's name: Shire of Trayning

1.3. Property details

Property: LOT 11940 ON PLAN 225370 (SOUTH TRAYNING 6488)
Local Government Area: Shire of Trayning
Colloquial name:

1.4. Application

Clearing Area (ha)	No. Trees	Method of Clearing	For the purpose of:
0.77		Mechanical Removal	Extractive Industry

1.5. Decision on application

Decision on Permit Application: Grant
Decision Date: 29 August 2013

2. Site Information

2.1. Existing environment and information

2.1.1. Description of the native vegetation under application

Vegetation Description	Clearing Description	Vegetation Condition	Comment
The vegetation under application has been mapped as Beard Vegetation Association 1049 which is described as medium woodland; wandoo, York gum, salmon gum, morel and gimlet (Shepherd et al., 2001).	The application is to clear 0.77 hectares of native vegetation within Lot 11940 on Plan 225370, South Trayning, for the purpose of extracting gravel.	Pristine: No obvious signs of disturbance (Keighery 1994)	The vegetation under application forms part of a larger remnant within a landscape predominantly cleared for agriculture. The vegetation under application has been observed as Melaleuca, Allocasuarina, Grevillea and Acacia species, with scattered Eucalypts (Shire of Trayning, 2013). The vegetation condition and observed vegetation type were ascertained through an offset proposal submitted by the Shire of Trayning (2013).

3. Assessment of application against clearing principles

(a) Native vegetation should not be cleared if it comprises a high level of biological diversity.

Comments **Proposal is at variance to this Principle**
The vegetation under application is comprised of 0.77 hectares of native vegetation in a pristine (Keighery, 1994) condition.

One rare and four priority 3 flora species have been recorded within 10 kilometres of the application area. The rare species is located within a different vegetation association and is not likely to occur within the application area. Three of the priority species occur on the same vegetation type and all occur on the same soil type. Priority 3 taxa are defined as species that are not under imminent threat but known threatening processes exist that could affect them. As the application area is not large (0.77 hectares), it is not likely to form a significant habitat for these species. The mapped and observed (Shire of Trayning, 2013) vegetation type is not consistent with known priority ecological communities and none have been recorded within 10 kilometres of the proposed clearing.

The application area has been mapped as Beard Vegetation Association 1049 described as medium woodland; wandoo, York gum, salmon gum, morel and gimlet (Shepherd et al., 2001). This vegetation association has approximately seven percent of its pre-European vegetation remaining in the Avon Wheat belt Bioregion. The Avon Wheat belt Bioregion has approximately 18 percent of its pre-European vegetation extent remaining. These levels are below the recommended threshold level of 30 percent, below which species loss appears to accelerate exponentially at an ecosystem level (Commonwealth of Australia 2001).

The Shire of Trayning retains approximately 12 percent native vegetation (Government of Western Australia, 2013) and aerial photography indicates that the local area (10 kilometre radius) has less than 10 percent of native vegetation remaining. Given this, the proposed clearing falls within a highly cleared landscape and any remaining vegetation is likely to be significant for the maintenance of habitat for fauna and flora.

The application area forms part of an approximately 21 hectare remnant of native vegetation. As larger remnants of native vegetation are able to support higher biological diversity, the potential diversity of the application area is increased.

As the application falls within a highly cleared landscape and forms part of a larger remnant that is significant in the local area, it contains a high level of biological diversity and is at variance to this clearing Principle.

The applicant has proposed to revegetate 8 hectares of vegetation to offset the identified impacts of this application as well as CPS 5507/1 and CPS 5629/1 (approximate ratio of 3:1). The offset site falls within a landfill site managed by the Shire of Trayning (Shire of Trayning, 2013). Revegetating the clearing area will also assist in mitigating the potential environmental impacts.

Methodology

References:

Commonwealth of Australia (2001)
Keighery (1994)
Government of Western Australia (2013)
Shepherd et al., (2001)
Shire of Trayning (2013)

GIS Databases:

- Pre-European Vegetation
- Trayning 50 cm Orthomosaic - Landgate 2004
- NWRA Current extent of Native Vegetation
- SAC Bio datasets - Accessed July 2013

(b) Native vegetation should not be cleared if it comprises the whole or a part of, or is necessary for the maintenance of, a significant habitat for fauna indigenous to Western Australia.

Comments

Proposal is at variance to this Principle

The application area has been mapped as Beard vegetation association 1049, described as medium woodland; wandoo, York gum, salmon gum, morel and gimlet (Shepherd et al., 2001). This vegetation association retains approximately seven percent of its pre-European vegetation extent in the Avon Wheatbelt Bioregion and approximately 18 percent of native vegetation in this bioregion remains.

The Shire of Trayning retains approximately 12 percent native vegetation (Government of Western Australia, 2013) and aerial photography indicates that the local area (10 kilometre radius) has less than 10 percent of native vegetation remaining. Given this, the proposed clearing falls within a highly cleared landscape and therefore any remaining vegetation is likely to be significant for fauna and be necessary for the maintenance of fauna habitat.

The application area forms part of an approximately 21 hectare remnant of native vegetation. As larger remnants of native vegetation are able to support a higher biological diversity, the fauna habitat value of the application area is increased.

Seven fauna species of conservation significance have been mapped within a 20 kilometre radius of the application area (DEC, 2007-). Four of these are listed as "rare or likely to become extinct" under the Wildlife Conservation Act 1950; being *Egernia stokesii* subsp. *badia* (western Spiny-tailed Skink), *Leipoa ocellata* (malleefowl), *Petrogale lateralis lateralis* (black flanked rock-wallaby) and *Idiosoma nigrum* (shield-backed trapdoor spider). The western Spiny-tailed Skink, black flanked rock-wallaby and malleefowl are also listed in the Environment Protection and Biodiversity Conservation Act 1999 (EPBC, Act).

Given the habitat requirements for these species, details of each record as well as the observed and mapped vegetation association, the application area is not likely to form habitat for these species.

As the application area forms part of a significant remnant for local fauna within a highly cleared landscape, it is at variance to this clearing Principle.

The applicant has proposed to revegetate 8 hectares of vegetation to offset the identified impacts of this application as well as CPS 5507/1 and CPS 5629/1 (approximate ratio of 3:1). The offset site falls within a landfill site managed by the Shire of Trayning (Shire of Trayning 2013b). Revegetating the clearing area will also assist in mitigating the potential environmental impacts.

Methodology References:
Avon Catchment Council (2007)
DEC (2007-)
Government of Western Australia (2013)

GIS Databases:
- DEC tenure
- NWRA Current extent of Native Vegetation
- Pre-European vegetation
- SAC Bio datasets - Accessed July 2013

(c) Native vegetation should not be cleared if it includes, or is necessary for the continued existence of, rare flora.

Comments **Proposal is not likely to be at variance to this Principle**

One rare flora species has been recorded within the local area (10 kilometres radius), approximately seven kilometres from the application area. Given the distance to this species and as it occurs on a different vegetation and soil type, the proposed clearing is not likely to contain rare flora and is not likely to be at variance to this clearing Principle.

Methodology GIS Databases:
- Pre-european vegetation
- SAC Bio datasets - Accessed 04/13
- Soils, Statewide

(d) Native vegetation should not be cleared if it comprises the whole or a part of, or is necessary for the maintenance of a threatened ecological community.

Comments **Proposal is not likely to be at variance to this Principle**

No threatened ecological communities have been recorded within 70 kilometres of the application area. Given this, the application is not likely to be at variance to this clearing Principle.

Methodology GIS Databases:
- SAC Bio datasets - Accessed July 2013
- Soils, Statewide

(e) Native vegetation should not be cleared if it is significant as a remnant of native vegetation in an area that has been extensively cleared.

Comments **Proposal is at variance to this Principle**

Aerial photography (Trayning 50cm Orthomosaic - Landgate 2004) indicates the local area (10 kilometre radius) is approximately 10 percent vegetated.

The IBRA Bioregion (Avon Wheatbelt) and the local government authority area (Shire of Trayning) retains approximately 18 percent and 12 percent of their respective pre-European vegetation extents (Government of Western Australia, 2013).

The application area is mapped as Beard Vegetation Association 1049, which retains approximately seven percent of its pre-European vegetation extent within the Avon Wheatbelt IBRA Bioregion. Approximately Six percent of this land is held within Department of Parks and Wildlife tenure. Beard Vegetation Association 1049 has also been identified as priority 1 for ecosystem protection within the Avon Wheatbelt Bioregion (DEC, 2013).

The national objectives and targets for biodiversity conservation in Australia has a target to prevent clearance of ecological communities with an extent below 30 percent of that present pre-1750, below which species loss appears to accelerate exponentially at an ecosystem level (Commonwealth of Australia, 2001). As the mapped vegetation association and, the remaining vegetation within the Shire and the IBRA Bioregion are significantly below this target, the application falls within a highly cleared landscape. Any remaining vegetation in these areas is significant as fauna and flora habitat.

The application area forms part of an approximately 21 hectare remnant of native vegetation. As larger remnants of native vegetation are able to support a higher biological diversity, the ecological habitat value of the application area is increased.

Given the above, the proposed clearing is at variance to this clearing Principle

The applicant has proposed to revegetate 8 hectares of vegetation to offset the identified impacts of this application as well as CPS 5507/1 and CPS 5629/1 (approximate ratio of 3:1). The offset site falls within a landfill site managed by the Shire of Trayning (Shire of Trayning 2013b). Revegetating the clearing area will also assist in mitigating the potential environmental impacts.

	Pre-European (ha)	Current Extent (ha)	Remaining (%)	Extent in DEC Managed Lands (%)
IBRA Bioregion* Avon Wheatbelt	9 517 109	1 732 027	18	10
Shire* Shire of Trayning	165 120	20 279	12	14
Beard Vegetation Association in Bioregion* 1049	833 385	56 954	7	6

Methodology

References

*Government of Western Australia 2013
Commonwealth of Australia 2001
DEC (2013)

GIS Databases:

- NLWRA, Current extent of Native Vegetation
- Pre-European Vegetation
- Trayning 50cm Orthomosaic - Landgate 2004

(f) Native vegetation should not be cleared if it is growing in, or in association with, an environment associated with a watercourse or wetland.

Comments

Proposal is not likely to be at variance to this Principle

There are no wetlands or watercourses mapped within or adjacent to the application area. Given this, the application is not likely to be at variance to this clearing Principle.

Methodology

GIS Databases:

- Hydrography linear

(g) Native vegetation should not be cleared if the clearing of the vegetation is likely to cause appreciable land degradation.

Comments

Proposal is not likely to be at variance to this Principle

The soil within the application area has been mapped as Tf6 and is described as gently undulating to rolling terrain with some ridges and uneven slopes; chief soils are hard alkaline yellow mottled soils and hard alkaline red soils (Northcote et al 1960 - 1968).

The groundwater salinity within the application area has been mapped at 14 000 - 35 000 mg/L Total Dissolved Solids. Although this is classified as saline (Water and Rivers Commission, 2001), as the application is limited in size and will remain surrounded by deep rooted vegetation, it is not likely to lead to land degradation through primary salinity.

The mean annual rainfall mapped of the application area is 400mm.

Given this and as no watercourses occur within the application area, it is not likely to be at variance to this clearing Principle.

Methodology

References:

Water and Rivers Commission (2001)

GIS Databases:

- Hydrography linear
- Groundwater salinity Statewide

(h) Native vegetation should not be cleared if the clearing of the vegetation is likely to have an impact on the environmental values of any adjacent or nearby conservation area.

Comments

Proposal is not likely to be at variance to this Principle

The application area lies approximately 11 kilometres east of the Yelbeni Nature Reserve and 12 kilometres north west of the Walcancobbing Nature Reserve. The land between these reserves and the application area has almost entirely been cleared for agriculture.

Given the above, the application is not likely to be at variance to this clearing Principle.

Methodology

GIS Databases:

- DEC Tenure

(i) Native vegetation should not be cleared if the clearing of the vegetation is likely to cause deterioration in the quality of surface or underground water.

Comments Proposal is not likely to be at variance to this Principle

As no watercourses have been mapped within or in close proximity to the application area, the application is not likely to cause deterioration in the quality or quantity of surface water.

The groundwater salinity within the application area has been mapped at 14 000 - 35 000 mg/L total dissolved solids. Although this is classified as saline (Water and Rivers Commission, 2001), as the application is limited in size and will remain surrounded by deep rooted vegetation, it is not likely to degrade the quality of groundwater.

Given the above the application is not likely to be at variance to this clearing Principle.

Methodology References:
Water and Rivers Commission (2001)

GIS Databases:
- Hydrography linear
- Groundwater salinity Statewide

(j) Native vegetation should not be cleared if clearing the vegetation is likely to cause, or exacerbate, the incidence or intensity of flooding.

Comments Proposal is not likely to be at variance to this Principle

As the vegetation proposed to be cleared is limited in size, surrounded by native vegetation and no watercourses have been mapped within the application area. It is not likely to be at variance to this clearing Principle.

Methodology GIS Databases:
- Hydrography, Linear

Planning instrument, Native Title, Previous EPA decision or other matter.

Comments

The applicant was sent a letter on the 8 August 2013 asking as to how identified environmental impact would be managed. As a result of this an offset proposal in conjunction with CPS 5507/1 and 5629/1 was submitted. This offset involves the revegetation of 8 hectares within a landfill site at a ratio of approximately 3:1.

The application area is located within the Avon River System Surface Water Area covered by the Rights in Water and Irrigation Act 1914. As no watercourses will be impacted by the proposed clearing a bed and banks permit is not required.

The application area is zoned rural under the town planning scheme zone.

The clearing under application is located within the agricultural area defined in the Environmental Protection Authority's (EPA) Position Statement No.2 (EPA, 2000). EPA Position Statement No. 2 states that significant clearing of native vegetation has already occurred on agricultural land, leading to a reduction in biodiversity and increase in land salinisation, and therefore any further reduction in native vegetation through clearing for agriculture cannot be supported. The proposed clearing is for gravel extraction, not agricultural purposes.

No public submissions have been received in response to this application and no aboriginal sites of significance are mapped within the application area.

Methodology References:
EPA (2000)

GIS Databases:
- RIWI Act areas

4. References

- Commonwealth of Australia (2001) National Objectives and Targets for Biodiversity Conservation 2001-2005, Canberra.
- DEC (2007 -) NatureMap: Mapping Western Australia's Biodiversity. Department of Environment and Conservation. URL: <http://naturemap.dec.wa.gov.au/>. Accessed 5/07/2013
- DEC (2013) Regional advice for Clearing Permit Application CPS 5523/1, Shire of Trayning. Department of Environment and Conservation, Western Australia (DEC ref A617634)
- Government of Western Australia. (2013). 2012 Statewide Vegetation Statistics incorporating the CAR Reserve Analysis (Full Report). Current as of October 2012. WA Department of Environment and Conservation, Perth.
- Keighery, B.J. (1994) Bushland Plant Survey: A Guide to Plant Community Survey for the Community. Wildflower Society of WA (Inc). Nedlands, Western Australia.

- Northcote, K. H. with Beckmann G G, Bettenay E., Churchward H. M., van Dijk D. C., Dimmock G. M., Hubble G. D., Isbell R. F., McArthur W. M., Murtha G. G., Nicolls K. D., Paton T. R., Thompson C. H., Webb A. A. and Wright M. J. (1960-68): 'Atlas of Australian Soils, Sheets 1 to 10, with explanatory data'. CSIRO and Melbourne University Press: Melbourne.
- 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.
- Shire of Trayning (2013) Offset proposal for Clearing Permit Application's CPS 5523/1 and CPS 5629/1, Shire of Trayning, Western Australia (DEC ref A654409).
- Water and Rivers Commission (2001) Position Statement: Wetlands, Water and Rivers Commission, Perth.

5. Glossary

Term	Meaning
BCS	Biodiversity Coordination Section of DEC
CALM	Department of Conservation and Land Management (now BCS)
DAFWA	Department of Agriculture and Food
DEC	Department of Environment and Conservation
DEP	Department of Environmental Protection (now DEC)
DoE	Department of Environment
DoIR	Department of Industry and Resources
DRF	Declared Rare Flora
EPP	Environmental Protection Policy
GIS	Geographical Information System
ha	Hectare (10,000 square metres)
TEC	Threatened Ecological Community
WRC	Water and Rivers Commission (now DEC)