



## 1. Application details

### 1.1. Permit application details

Permit application No.: 1819/1  
Permit type: Area Permit

### 1.2. Proponent details

Proponent's name: Coralong Pty Ltd

### 1.3. Property details

Property: LOT 3754 ON PLAN 207065 (House No. 1750 BIBBY NAMBUNG 6521)  
Local Government Area: Shire Of Dandaragan  
Colloquial name:

### 1.4. Application

Clearing Area (ha)	No. Trees	Method of Clearing	For the purpose of:
14.3		Mechanical Removal	Plantation

## 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
Beard vegetation association 1031: Mosaic: Shrublands; hakea scrub-heath / Shrublands; dryandra heath. (Hopkins et al. 2001, Shepherd et al. 2001)	The area under application is parkland cleared and is dominated by Eucalyptus tottiana (Coastal blackbutt) with some of the trees either dead or dying. (DEC Site visit, 2007; DAFWA, 2007)	Degraded: Structure severely disturbed; regeneration to good condition requires intensive management (Keighery 1994)	The description of the vegetation under application was obtained through a site visit conducted on 7 June 2007 (DEC Trim Ref DOC31237) and DAFWA's Land Degradation Assessment Report (DEC Trim Ref DOC29864).

## 3. Assessment of application against clearing principles

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

<b>Comments</b>	<b>Proposal is not likely to be at variance to this Principle</b> The area under application is dominated by Eucalyptus tottiana (Coastal blackbutt) with some of the trees either dead or dying. The area is parkland cleared and is surrounded by existing pasture and numerous weeds. (DEC Site visit, 2007; DAFWA, 2007)  The level of disturbance, weed invasion and low native species density suggests that the original biodiversity has been compromised. The areas under application are therefore not likely to contain a higher level of biodiversity than that found locally in the nearby Badgingarra National Park.
<b>Methodology</b>	DEC Site visit (2007) DAFWA (2007) GIS Databases: - Interim Biogeographic Regionalisation of Australia - EA 18/10/00.

### (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.

<b>Comments</b>	<b>Proposal is not likely to be at variance to this Principle</b> The area under application is dominated by Eucalyptus tottiana (Coastal blackbutt) with some of the trees either dead or dying. The area is parkland cleared and is surrounded by existing pasture and numerous weeds. (DEC Site visit, 2007; DAFWA, 2007)  The area under application is relatively small in size and fragmented in the landscape. In addition the level of disturbance, weed invasion and low native species density suggests that the original habitat value has been compromised. This proposal is therefore unlikely to be at variance with this principle.
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**Methodology** DEC Site visit (2007)  
DAFWA (2007)  
GIS Databases:  
- SAC Bio Datasets (240807)

**(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**

There are six records of two Declared Rare Flora, three records of 2 Priority Two flora, four records of four species of Priority Three flora and nine records of three species of Priority Four flora within 10 km from the areas under application, with the closest occurrence being 2.1 km from the area under application.

The Declared Rare Flora occurs on the same broad soil type as the area under application. DAFWA (2007) advise that 'The surface geology is described as ferruginous laterite on the slopes and upper landscapes and alluvium comprised of sand, silt and clay in the valleys. The soils are mainly deep white sands in the valleys and on lower slopes together with pale sandy gravels.' The area under application occurs in the valley floor and consists of deep white sands (DEC Site visit, 2007).

DEC (Flora Conservation Officer) advised that the DRF *Patersonia spirifolia* occurs on laterite and rocky outcrops and is unlikely to occur on sandy soils. In addition the DRF *Eucalyptus balanites* occurs within approximately 9 km from the area under application. Due to the distance from the area under application and the likelihood of the DRF *Patersonia spirifolia* occurring on sandy soils it is unlikely that the area under application includes or is necessary for the continued existence of rare flora.

**Methodology** DAFWA (2007)  
DEC Site visit (2007)  
GIS Databases:  
- Declared Rare and Priority Flora list - CALM 01/07/05  
- Clearing Regulations - Environmentally Sensitive Areas - DoE 30/05/05  
- SAC Bio Datasets (280807)

**(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**

There are no known Threatened Ecological Communities (TEC's) within 10 km of the area under application. This proposal is therefore not likely to be at variance with this principle.

**Methodology** GIS Databases:  
- Threatened Ecological Communities - CALM 12/04/05

**(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 not likely to be at variance to this Principle**

The vegetation under application is a component of Beard Vegetation Association 1031 (Hopkins et al. 2001) of which there is 34.9% of the pre-European extent remaining (Shepherd 2006). This vegetation type is therefore 'depleted' for biodiversity conservation (Department of Natural Resources and Environment 2002). The vegetation under application also falls within the Geraldton Sandplains Bioregion and the Shire of Dandaragan of which there is 42.2% and 48.8% of pre-European extent remaining respectively (Shepherd 2006).

The area under application falls within the Intensive Landuse Zone as described under EPA Position Statement No2 which does not support further clearing for agricultural purposes, however due to the application area consisting of scattered trees within a small area, the proposed clearing is of low concern.

On the basis that the pre-European extent of the Beard Vegetation Association, Geraldton Sandplains Bioregion and the Shire of Dandaragan meets the National Objectives Targets for Biodiversity Conservation 2001-2005, being 30% of that present pre-1750, this proposal is not likely to be at variance to this Principle.

**Methodology** Shepherd et al (2001)  
Department of Natural Resources and Environment (2002)  
Shepherd (2006)  
GIS Databases:  
- Interim Biogeographic Regionalisation of Australia - EA 18/10/00  
- Pre-European Vegetation - DA 01/01  
- Local Government Authorities - DLI 08/07/04  
- EPA Position Paper No 2 Agriculture Region - DEP 12/00

**(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**

DAFWA advise that 'The landform is hilly to undulating with defined drainage lines in the valleys. Drainage through the location is from north-east to south-west into Bibby Creek which flows through the south-eastern corner.' A minor non-perennial watercourse runs adjacent to the area under application. (DEC Site Visit, 2007)

The area under application is dominated by *Eucalyptus tottiana* (Coastal blackbutt) with some of the trees either dead or dying. The area is parkland cleared and is surrounded by existing pasture and numerous weeds. (DEC Site visit, 2007; DAFWA, 2007) The vegetation under application is not representative of riparian vegetation and therefore this proposal is unlikely to be at variance with this principle.

**Methodology** DAFWA (2007)  
DEC Site Visit (2007)  
GIS Databases:  
- Hydrography, linear - DoE 01/02/04  
- Hydrographic Catchments - Catchments - DoE 23/03/05

**(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**

DAFWA (2007) advise that 'The assessment identified the potential for land degradation in the form of wind erosion and water erosion. The greatest wind erosion risk is likely to be associated with the clearing of the area of remnant vegetation. It is unlikely to be a problem with the clearing of the scattered blackbutts provided the surface vegetation cover is maintained.'

The area under application is dominated by *Eucalyptus tottiana* (Coastal blackbutt) with some of the trees either dead or dying. The area is parkland cleared and is surrounded by existing pasture and numerous weeds. (DEC Site visit, 2007; DAFWA, 2007) Considering the small area under application and as there is an existing groundcover in place, it is unlikely that this proposal is at variance with this Principle.

**Methodology** DEC Site Visit (2007)  
DAFWA (2007)  
GIS Databases:  
- Rainfall, Mean Annual - BOM 30/09/01  
- Salinity Risk LM 25m - DOLA 00  
- Acid Sulphate Soil risk map, SCP DOE 04/11/04  
- Soils, Statewide - DA 11/99

**(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 Badgingarra National Park is the only area of conservation estate within a 10 km radius and lies approximately 4.6km east of the area under application and is also listed on the Register of National Estate. However, based on the separation distance between the two it is unlikely that the clearing as proposed will have a significant impact on the park. In addition there are no ecological corridors that link the area under application to the Badgingarra National Park.

This proposal is therefore unlikely to be at variance with this principle.

**Methodology** GIS Databases:  
- CALM Regional Parks - CALM 12/04/02  
- CALM Managed Lands & Waters - CALM 01/07/05  
- Proposed National Parks FMP-CALM 19/03/03  
- Register of National Estate - EA 28/01/03

**(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**

The area subject to this proposal has an average annual rainfall of 600mm and an evaporation rate of 600mm per annum. This area has little surface flow with the exception of heavy rainfall events and seasonal flow. DAFWA (2007) advised that onsite testing from the creek adjacent to the scattered blackbutts revealed fresh water at 75mS/m. In addition the groundwater salinity is 500-1000 TDS mg/L which is again considered to be fresh. Clearing the relatively small area under application is unlikely to have an impact on groundwater quality.

The watercourse adjoining the area under application already shows signs of gully erosion and the sandy

nature of the soil on the valley floor is expected to increase the risk of sedimentation during heavy rainfall events (DEC Site visit, 2007). Groundwater dependant ecosystems are also shown to potentially occur downstream from the area under application on the adjoining property. Further more, DAFWA (2007) advised that 'Off site degradation can occur with the transport of silt to downstream properties.'

The area under application is dominated by Eucalyptus todtiana (Coastal blackbutt) with some of the trees either dead or dying. The area is parkland cleared and is surrounded by existing pasture and numerous weeds. (DEC Site visit, 2007; DAFWA, 2007) Considering the proposal will only remove trees and there is an existing groundcover in place, it is unlikely that this proposal is at variance with this Principle.

**Methodology** DAFWA (2007)  
 DEC Site Visit (2007)  
 GIS Databases:  
 - Current WIN data sets  
 - Public Drinking Water Sources (PDWSAs) - DOE 09/08/05  
 - Hydrographic Catchments - Catchments - DOE 23/03/05  
 - Hydrography, linear - DoE 01/02/04  
 - Mean Annual Rainfall Isohyets (1975 - 2003) - DOW  
 - Potential Groundwater Dependiant Ecosystems - DOE 2004

**(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**  
 The soils under application mainly consist of deep white sands in the valleys and on lower slopes together with pale sandy gravels (DAFWA, 2007). The area under application occurs in the valley floor with a general relief in topography towards the south west. Given the relatively small size of the area under application and the transmissive nature of the sandy soils it is unlikely that the clearing of vegetation will cause an increase in the peak height or duration of flooding.

**Methodology** DAFWA (2007)  
 GIS Databases:  
 - Rainfall, Mean Annual - BOM 30/09/01  
 - Topographic Contours, Statewide - DOLA 12/09/02

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

**Comments**  
 The Shire of Dandaragan has not indicated if there are any planning requirements or approvals that would affect the clearing.  
 There is no further requirement for a RIWI Act Licence, Works Approval or EP Act Licence for the area under application.  
 There is a Native Title claim over the area under application, however as the property is freehold land Native Title has been extinguished.

**Methodology** There are three Environmental Impact Assessments (EIA's) over the area under application, these EIA's have no impact on this proposal.  
 GIS databases:  
 - Native Title Claims - DLI 7/11/05  
 - Aboriginal Sites of Significance - DIA 26/04/07  
 - Environmental Impact Assessments  
 - EPA Position Paper No 2 Agriculture Region - DEP 12/00

**4. Assessor's comments**

Purpose	Method	Applied area (ha)/ trees	Comment
Plantation	Mechanical Removal	14.3	The assessable criteria have been addressed and no objections were raised.

**5. References**

DAFWA (2007) Land degradation assessment report. Office of the Commissioner of Soil and Land Conservation, Department of Agriculture Western Australia. DEC TRIM Ref DOC29864.  
 Department of Natural Resources and Environment (2002) Biodiversity Action Planning. Action planning for native biodiversity

- at multiple scales; catchment bioregional, landscape, local. Department of Natural Resources and Environment, Victoria.
- EPA (2000) Environmental protection of native vegetation in Western Australia. Clearing of native vegetation, with particular reference to the agricultural area. Position Statement No. 2. December 2000. Environmental Protection Authority.
- Hopkins, A.J.M., Beeston, G.R. and Harvey J.M. (2001) A database on the vegetation of Western Australia. Stage 1. CALMScience after J. S. Beard, late 1960's to early 1980's Vegetation Survey of Western Australia, UWA Press.
- 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. (2006). Adapted from: 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. Includes subsequent updates for 2006 from Vegetation Extent dataset ANZWA1050000124.
- Shepherd, D.P., Beeston, G.R. and Hopkins, A.J.M. (2001) Native Vegetation in Western Australia, Extent, Type and Status. Resource Management Technical Report 249. Department of Agriculture, Western Australia.
- Site Visit Report (2007) Department of Environment and Conservation (DEC), Western Australia. DEC TRIM ref DOC31237.

## 6. 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)

