



1. Application details

1.1. Permit application details

Permit application No.: 1170/1
Permit type: Purpose Permit

1.2. Proponent details

Proponent's name: Water Corporation

1.3. Property details

Property: STATE FOREST 65
Local Government Area: City Of Swan
Colloquial name:

1.4. Application

Clearing Area (ha)	No. Trees	Method of Clearing	For the purpose of:
0.1		Mechanical Removal	Building or Structure

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
Hedde vegetation complex Bassendean - Central and South woodland of <i>E. marginata</i> - <i>C. fraseriana</i> - <i>Banksia</i> spp. to low woodland of <i>Melaleuca</i> species, and sedgelands on the moister sites. This area includes the transition of <i>E. marginata</i> to <i>E. tottiana</i> in the vicinity of Perth (Hedde et al. 1980).	The area under application is completely degraded and is made up of a single jarrah tree (<i>Eucalyptus marginata</i>) with widespread veldt grass (360 Environmental 2005).	Completely Degraded: No longer intact; completely/almost completely without native species (Keighery 1994)	The description given for the area under application was taken from a survey conducted by 360 Environmental (2005) and GIS orthomosaic Swan Coastal Plain North 40cm Orthomosaic - DLI 05

Beard Vegetation Association 1001:
Medium very sparse woodland; jarrah, with low woodland; banksia & casuarina (Shepherd et al 2001, Hopkins et al. 2001)

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 not likely to be at variance to this Principle**
The area under application is void of any substantial native vegetation and is predominantly made up of Veldt grass (*Ehrharta calycina*) and a single jarrah tree (*Eucalyptus marginata*). No nesting hollows were evident in any of the trees within the survey area (360 Environmental 2005).

No intact plant communities were present within the surveyed area (360 Environmental 2005).

Given the size of the area to be cleared (0.1ha) and the description of the vegetation under application, it is unlikely that the area under application comprises a high level of biodiversity.

Methodology 360 Environmental (2005) Trim Ref: HD 28411
GIS Databases:
- Swan Coastal Plain North 40cm Orthomosaic - DLI 05

(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 not likely to be at variance to this Principle

The area under application is void of any substantial native vegetation and is predominantly made up of Veldt grass (*Ehrharta calycina*) and a single jarrah tree (*Eucalyptus marginata*).

No nesting hollows were evident in any of the trees within the survey area (360 Environmental 2005).

Given that the vegetation within the applied area is in a completely degraded state (360 Environmental 2005) it is unlikely that it would host any significant habitat for any indigenous fauna.

Methodology 360 Environmental (2005) Trim Ref: HD 28411

GIS Databases:

- Swan Coastal Plain North 40cm Orthomosaic - DLI 05

(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 no Declared Rare Flora (DRF) located within or in close proximity to the area under application (360 Environmental 2005). The closest DRF is located 7.3km to the north east and is buffered by a contiguous *Pinus pinaster* plantation within state forest and is unlikely to be affected by the proposed clearing.

Methodology 360 Environmental (2005) Trim Ref: HD 28411

GIS Databases:

- Swan Coastal Plain North 40cm Orthomosaic - DLI 05

- Declared Rare and Priority Flora List - CALM 01/07/05

(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 Threatened Ecological Communities (TECs) located in or within close proximity to the area under application.

Methodology GIS Databases:

- Swan Coastal Plain North 40cm Orthomosaic - DLI 05

- Threatened Ecological Communities - CALM 12/4/05

(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 area under application is mapped as Beard Vegetation Association 1001 (Shepherd et al. 2001, Hopkins et al 2001) and Heddle complex Bassendean Central and South (Heddle et al 1980).

However, the area under application is void of any substantial native vegetation with no sign of intact plant communities on the site (360 Environmental 2005). The only native vegetation located within the area under application is a single isolated Jarrah tree approximately 40m away from the closest remnant of native vegetation (360 Environmental 2005).

Given the isolation, small size and condition of vegetation in the area under application, the vegetation proposed to be cleared is unlikely to be significant as a remnant of native vegetation in the area.

Methodology 360 Environmental (2005) Trim Ref: HD 28411

GIS Databases:

- Swan Coastal Plain North 40cm Orthomosaic - DLI 05

(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 water courses that occur in or traverse the area under application.

Methodology GIS Databases:

- Swan Coastal Plain North 40cm Orthomosaic - DLI 05

- Geomorphic Wetlands (Mgt Categories), Swan Coastal Plain - DOE

(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 area under application is in a completely degraded state (360 Environmental 2005). The area is classified as having a moderate to low risk of Acid Sulphate Soils occurring, however this is generally at a depth greater than 3m. The removal of a single Jarrah tree (*Eucalyptus marginata*) is unlikely to contribute to significant land degradation issues.

Therefore clearing as proposed is unlikely to be at variance to this principle.

Methodology 360 Environmental (2005) Trim Ref: HD 28411

GIS Databases:

- Swan Coastal Plain North 40cm Orthomosaic - DLI 05
- Acid Sulfate Soil Risk Map, SCP - DOE 04/11/04

(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 area under application lies on the southern boundary of the Gnangara - Moore River state forest and therefore forms part of the Environmental Protection (Gnangara Mound Crown Land) Policy 1992 which is registered as an Environmentally Sensitive Area. The area under application is a completely degraded, weed infested corner that has no connectivity to the surrounding conservation area (360 Environmental 2005). Clearing has the potential to be beneficial to the conservation area due to weed control being managed through the future land use as a pumping station.

Methodology 360 Environmental (2005) Trim Ref: HD 28411

GIS Databases:

- Swan Coastal Plain North 40cm Orthomosaic - DLI 05
- Bushforever - MFP 07/01
- CALM Managed Lands and Waters - CALM 1/07/05

(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

There are no surface water bodies within or in close proximity to the proposed clearing. The area under application is located on the south eastern boundary of the Gnangara mound and is within a Priority 1 Public Drinking Water Source Area (PDWSA). However given the small size (0.1ha) of the area under application and the completely degraded state of the vegetation it is unlikely that clearing will have any impact on the quality of surface or groundwater.

Methodology GIS Databases:

- Swan Coastal Plain North 40cm Orthomosaic - DLI 05
- EPP, Areas - DEP 06/95
- Public Drinking Water Source Areas (PDWSAs) - DOE 07/02/06

(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 area under application consists of a single Jarrah tree (*Eucalyptus marginata*) with widespread Veldt grass rendering the vegetation condition as completely degraded (360 Environmental 2005).

Therefore the clearing as proposed is unlikely to cause any significant change to the current potential for flooding to occur.

Methodology 360 Environmental (2005) Trim Ref: HD 28411

GIS Databases:

- Swan Coastal Plain North 40cm Orthomosaic - DLI 05

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

Comments

Under section 81 of the Water Agencies (Powers) Act 1984, the Water Corporation assumes compulsory acquisition to take land - such as the area under application.

There is no RIWI Act Licence, Works Approval or EP Act Licence that will affect the area proposed to be cleared.

Methodology Information from proponent Trim Ref: EI6205

4. Assessor's recommendations

Purpose	Method	Applied area (ha)/ trees	Decision	Comment / recommendation
Building or Structure	Mechanical Removal	0.1	Grant	The application has been assessed and the clearing is not likely to be at variance to the Clearing Principles. The assessing officer therefore recommends that the permit be granted.

5. References

- 360 Environmental (2005) Proposed Gnangara Road Booster Pump Station Botanical Survey Gnangara Road Lexia, Perth Western Australia Report Reference 94
- 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.
- Hedde, E. M., Loneragan, O. W., and Havel, J. J. (1980) Vegetation Complexes of the Darling System, Western Australia. In Department of Conservation and Environment, Atlas of Natural Resources, Darling System, Western Australia.
- 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.
- 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.

6. Glossary

Term	Meaning
CALM	Department of Conservation and Land Management
DAWA	Department of Agriculture
DEP	Department of Environmental Protection (now DoE)
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 DoE)