



CLEARING PERMIT

Granted under section 51E of the Environmental Protection Act 1986

PERMIT DETAILS

Area Permit Number:	CPS 10571/1
File Number:	DWERVT14557
Duration of Permit:	From 19 July 2024 to 19 July 2026

PERMIT HOLDER

Anton van Jaarsveld

LAND ON WHICH CLEARING IS TO BE DONE

Lot 23 on Deposited Plan 47493, Thomas Brook.

AUTHORISED ACTIVITY

The permit holder must not clear more than 0.71 hectares of *native vegetation* including 14 native trees within the area cross-hatched yellow in Figure 1 of Schedule 1.

CONDITIONS

1. Avoid, minimise, and reduce impacts and extent of clearing

In determining the *native vegetation* authorised to be cleared under this permit, the permit holder must apply the following principles, set out in descending order of preference:

- (a) avoid the clearing of *native vegetation*;
- (b) minimise the amount of *native vegetation* to be cleared; and
- (c) reduce the impact of clearing on any environmental value.

2. Weed and dieback management

When undertaking any clearing authorised under this permit, the permit holder must take the following measures to minimise the risk of introduction and spread of *weeds* and *dieback*:

- (a) clean earth-moving machinery of soil and vegetation prior to entering and leaving the area to be cleared;
- (b) ensure that no known *weed* or *dieback*-affected soil, *mulch*, *fill*, or other material is brought into the area to be cleared; and

(c) restrict the movement of machines and other vehicles to the limits of the areas to be cleared.

3. Directional clearing

The permit holder must:

- (a) conduct clearing activities in a slow, progressive manner towards adjacent *native vegetation*; and
- (b) allow reasonable time for fauna present within the area being cleared to move into adjacent *native vegetation* ahead of the clearing activity.

4. **Records that must be kept**

The permit holder must maintain records relating to the listed relevant matters in accordance with the specifications detailed in Table 1.

No.	Relevant matter	Specifications		
1. In relation to the authorised clearing		(a)	the species composition, structure, and density of the cleared area;	
activities generally (b)	(b)	the location where the clearing occurred, recorded using a Global Positioning System (GPS) unit set to GDA2020, expressing the geographical coordinates in Eastings and Northings;		
		(c)	the date that the area was cleared;	
		(d)	the direction of clearing;	
		(e)	the size of the area cleared (in hectares);	
		(f)	actions taken to avoid, minimise, and reduce the impacts and extent of clearing in accordance with condition 1; and	
		(g)	actions taken to minimise the risk of the introduction and spread of <i>weeds</i> and <i>dieback</i> in accordance with condition 2.	

Table 1: Records that must be kept

5. Reporting

The permit holder must provide to the *CEO* the records required under condition 4 of this permit when requested by the *CEO*.

DEFINITIONS

In this permit, the terms in Table 2 have the meanings defined.

Table 2: Definitions

Term	Definition		
CEO	Chief Executive Officer of the department responsible for the administration of the clearing provisions under the <i>Environmental Protection Act 1986</i> .		
clearing	has the meaning given under section $3(1)$ of the EP Act.		
fill	means material used to increase the ground level, or to fill a depression.		
department	means the department established under section 35 of the <i>Public Sector</i> <i>Management Act 1994</i> (WA) and designated as responsible for the administration of the EP Act, which includes Part V Division 3.		
dieback	means the effect of <i>Phytophthora</i> species on <i>native vegetation</i> .		
EP Act	Environmental Protection Act 1986 (WA)		
mulch	means the use of organic matter, wood chips or rocks to slow the movement of water across the soil surface and to reduce evaporation.		
native vegetation	has the meaning given under section 3(1) and section 51A of the EP Act.		
	means any plant –		
weeds	 (a) that is a declared pest under section 22 of the <i>Biosecurity and</i> <i>Agriculture Management Act 2007</i>; or (b) published in a Department of Biodiversity, Conservation and Attractions species-led ecological impact and invasiveness ranking summary, regardless of ranking; or (c) not indigenous to the area concerned. 		

END OF CONDITIONS

Mathew Gannaway MANAGER NATIVE VEGETATION REGULATION

Officer delegated under Section 20 of the Environmental Protection Act 1986

25 June 2024

SCHEDULE 1

The boundary of the area authorised to be cleared is shown in the map below.



Figure 1: Map of the boundary of the area within which clearing may occur



Clearing Permit Decision Report

1 Application details and outcome				
1.1. Permit application details				
Permit number:	CPS 10571/1			
Permit type:	Area permit			
Applicant name:	Anton van Jaarsveld			
Application received:	21 March 2024			
Application area:	0.71 (as revised) hectares of native vegetation, including 14 native trees			
Purpose of clearing:	Constructing two earthen dams			
Method of clearing:	Mechanical			
Property:	Lot 23 on Deposited Plan 47493			
Location (LGA area/s):	Shire of Donnybrook-Balingup			
Localities (suburb/s):	Thomson Brook			

1.2. Description of clearing activities

The vegetation proposed to be cleared is distributed across four separate areas (see Figure 1, Section 1.5).

The application is for the purpose of construction of two dams serving for agricultural activities in a farm in the Shire of Donnybrook-Balingup (Applicant, 2024a). The dams will help add water to the landscape and farm community which are suffering from recent dry years (Applicant, 2024b).

There are approximately 14 trees of marri (*Corymbia calophylla*) and jarrah (*Eucalyptus marginata*) proposed to be cleared within the application area, with six trees at the north dam (small dam) area and eight trees at the south dam (big dam) (See Appendix E). Trees proposed to be removed at the south dam area were burned severely in a fire in January 2023 (Applicant, 2024c).

1.3. Decision on application

Decision: Granted

Decision date: 25 June 2024

Decision area: 0.71 (as revised) hectares of native vegetation, as depicted in Section 1.5, below.

1.4. Reasons for decision

This clearing permit application was submitted, accepted, assessed and determined in accordance with sections 51E and 51O of the *Environmental Protection Act 1986* (EP Act). The Department of Water and Environmental Regulation (DWER) advertised the application for 21 days and no submissions were received.

In making this decision, the Delegated Officer had regard for the site characteristics (see Appendix B), relevant datasets (see Appendix F.1), photographs of the vegetation provided by the applicant (see Appendix E), the clearing

principles set out in Schedule 5 of the EP Act (see Appendix C), relevant planning instruments and any other matters considered relevant to the assessment (see Section 3). The Delegated Officer also took into consideration that the purpose of the proposed clearing is for dam construction which will help add water to the landscape and farm community.

The assessment identified that the proposed clearing will result in:

- loss of foraging habitat for black cockatoos;
- the potential impacts on fauna individuals should they be present at the time of clearing; and
- the potential introduction and spread of weeds and dieback into adjacent vegetation, which could impact on the quality of the adjacent vegetation and its habitat values.

After consideration of the available information, as well as the applicant's minimisation and mitigation measures (see Section 3.1), the Delegated Officer determined the proposed clearing is not likely to impact fauna present at the time of clearing and the loss of foraging habitat is not going to significantly impact black cockatoo resources in the local area. The Delegated Officer also notes that the applicant will be planting a number of trees along the permitter of the property in July 2024 that will exceed the number of trees removed as a part of this application. The above potential impacts can be minimised and managed to unlikely lead to an unacceptable risk to environmental values.

The Delegated Officer decided to grant a clearing permit subject to conditions to:

- Avoid, minimise to reduce the impacts and extent of clearing.
- Take hygiene steps to minimise the risk of the introduction and spread of weeds and dieback.
- Undertake slow, progressive one directional clearing to allow terrestrial fauna to move into adjacent habitat ahead of the clearing activity.



The areas crosshatched yellow indicate the areas authorised to be cleared under the granted clearing permit.

2 Legislative context

The clearing of native vegetation in Western Australia is regulated under the EP Act and the *Environmental Protection* (*Clearing of Native Vegetation*) Regulations 2004 (Clearing Regulations).

In addition to the matters considered in accordance with section 510 of the EP Act (see Section 1.4), the Delegated Officer has also had regard to the objects and principles under section 4A of the EP Act, particularly:

- the precautionary principle
- the principle of intergenerational equity
- the principle of the conservation of biological diversity and ecological integrity.

Other legislation of relevance for this assessment include:

- Biodiversity Conservation Act 2016 (WA) (BC Act)
- Environment Protection and Biodiversity Conservation Act 1999 (Cth) (EPBC Act)
- Rights in Water and Irrigation Act 1914 (RiWI Act)

The key guidance documents which inform this assessment are:

- A guide to the assessment of applications to clear native vegetation (DER, December 2013)
- *Procedure: Native vegetation clearing permits* (DWER, October 2019)

B Detailed assessment of application

3.1. Avoidance and mitigation measures

Application form and further information were submitted by the applicant (Applicant, 2024a, 2024b and 2024d), showing that the applicant has applied/committed to apply the following avoidance/mitigation measures:

- The locations for dam construction have been chosen in low vegetation areas (See Figure 2) to limit the impact of clearing:
 - The big dam is located in an area where the vegetation was severely burned in January 2023 due to a fire starting from a neighbouring property (Applicant, 2024a).
 - Responding to DWER's request to consider moving the small dam approximately 30-40 metres to the east of the current proposed location to avoid native vegetation clearing, the applicant advised that this option was originally considered, however it is impractical and was not chosen due to the difficulty in natural slope and contour of the area (Applicant, 2024d).
- Planting trees on the perimeter of the property in July 2024 and the number of trees to be planted will exceed the number of trees to be removed.
- The clearing will be limited as much as possible, where thinning trees will be undertaken instead of removing if appropriate.

During the assessment, the applicant requested to reduce the application area, from one hectare to 0.71 hectares (Applicant, 2024b).



Figure 2: The locations of two dams proposed to be constructed.

The Delegated Officer was satisfied that the applicant has made a reasonable effort to avoid and minimise potential impacts of the proposed clearing on environmental values.

3.2. Assessment of impacts on environmental values

In assessing the application, the Delegated Officer has had regard for the site characteristics (see Appendix B) and the extent to which the impacts of the proposed clearing present a risk to biological, conservation, or land and water resource values.

The assessment against the clearing principles (see Appendix C) identified that the impacts of the proposed clearing present a risk to biological value of fauna. The consideration of these impacts, and the extent to which they can be managed through conditions applied in line with sections 51H and 51I of the EP Act, is set out below.

3.2.1. Biological value (fauna) - Clearing Principle (b)

Assessment

Based on photographs provided by the applicant (Applicant, 2024c), vegetation within the application area is identified containing a few trees of marri (*Corymbia calophylla*) and jarrah (*Eucalyptus* marginata), over wattle bush (*Acacia* sp.), blackberry (**Rubus fruticosus*), bracken fern (*Pteridium esculentum*) and invasive grass. The vegetation is in a degraded to completely degraded condition (Keighery, 1994).

In determining the likelihood of conservation significant fauna occurring within the application area, consideration was given to the results of the preferred habitat types, number of records within the local area, proximity of records to the application area, and the type and condition of the vegetation within the application area. Based on these factors, four conservation significant fauna species are considered possibly to occur within the application area, including three threatened black cockatoos (BC) species (forest red-tailed BC (*Calyptorhynchus banksii naso*), Carnaby's BC (*Zanda latirostris*) and Baudin's BC (*Z. baudinii*) and South-western brush-tailed phascogale (*Phascogale tapoatafa wambenger*) (See C.4 for fauna analysis table).

Black cockatoos

The application area is located within the mapped distribution areas of all three BC species. Seven records of BC have been observed within the local area (10-kilometre radius from the application area), with the closest record f 1.4 kilometres from the proposed clearing area.

There are three key components of BC habitat: foraging habitat; roosting habitat; and breeding habitat. The quality of BC foraging habitat to support populations at breeding sites or night roosting sites varies depending upon how BC utilise the habitat in that particular location. Any tall trees, generally close to riparian environments, can be potential roosting habitat of BC (DSEWPC, 2012). A tree suitable for BC breeding is defined as a tree with a diameter of 50 centimetres or greater at a height of 1.5 metres (diameter at breast height – DBH) above the ground. BC generally forage within six kilometres of a night roost site and, while nesting, within a 12 kilometres radius of their nest site (DSEWPC, 2012).

The trees proposed to be cleared at the big dam area have been severely burned, therefore their contribution to BC habitat is limited. There has been limited regeneration since the fire. For the small dam area, the marri and jarrah trees proposed to be cleared have a DBH of less than 50 centimetres (Figure E.2) and contain no hollows (Figure E.3) (Applicant, 2024c). Therefore, these trees do not provide breeding or roosting habitat for BC species.

The applicant advised that no signs of BC foraging have been observed within the property (Applicant, 2024d). Furthermore, there are no known breeding or roosting sites mapped within the local area (QGIS database). Noting this, the small extent of clearing, and the existence of better-quality of remnant vegetation in the surrounding area, the proposed clearing area is unlikely to be a significant foraging resource for BC. In the context of the application area, BCs are most likely to utilise vegetation within the state forest that is located adjacent to the south of the property. The possibility of BCs relying on the foraging habitat provided by the trees within the application area is minimal.

South-western brush-tailed phascogales (Phascogale tapoatafa wambenger)

The south-western brush-tailed phascogale (*Phascogale tapoatafa wambenger* - conservation dependent fauna) is an arboreal dasyurid, associated with dry sclerophyll forests and open woodlands that contain hollow-bearing trees, characterised by high canopy cover and connectivity (DEC, 2012). Sixteen records of this species are mapped within the local area, with the closest 2.7 kilometres from the application area. The proposed clearing area with woodland and connecting canopy structure may provide suitable habitat for this species. However, noting the small extent of the clearing area and the existence of the nearby state forest, the proposed clearing area is unlikely to comprise significant habitat for this species.

However, there is a chance that the proposed clearing may result in impacts to individuals if they happen to be transiting across the application area during the time of the clearing. These impacts can be managed by undertaking slow and directional clearing.

The proposed clearing also increases the risk of weeds and dieback spreading to adjacent remnant vegetation and hence impact available fauna habitat. Weed and dieback management will mitigate impacts to vegetation adjacent to the application area.

Conclusion

Based on the above assessment, the proposed clearing is unlikely to impact significant habitat of any conservation significant fauna species. However, fauna individuals may be impacted should they be present at the time of clearing. Adjacent vegetation may be impacted by weeds and dieback spreading from the proposed clearing.

Conditions

To address the above impacts, the following management measures will be required as conditions on the clearing permit:

- Directional clearing, which requires slow, progressive, one directional clearing to allow terrestrial fauna to disperse ahead of the clearing activity should they occur on site at the time of clearing.
- Weed and dieback control management.

3.3. Relevant planning instruments and other matters

The Shire of Donnybrook-Balingup (the Shire) advised that the proposed clearing area is within the General Agriculture Zone according to the Shire's Local Planning Scheme and the proposal to construct two dams is supported from a planning point of view. The Shire also advise that the proposed works is exempted under Schedule A (1)(I) of Local Planning Scheme No. 7 from having to obtain development approval if the external footprint of the dam wall and any other part of the dam including the stored water is further than 20 metres from boundaries of the subject lot (Shire of Donnybrook-Balingup, 2024).

The applicant informed that he has contacted the Commonwealth Department of Climate Change, Energy, the Environment and Water (DCCEEW) regarding the potential impacts of the prosed clearing on black cockatoos and it was determined that the proposed clearing and dam construction does not trigger any referrals to DCCEEW (Applicant, 2024b).

DWER's South West, Bunbury Water Licensing advised that the applicant has applied for a permit to construct two dams (059829 PER) and for a surface water licence to take 34,000 kL for horticultural purposes and stock & domestic water (059829 SWL). The regional water licensing office also advised that no environmental receptors are likely to be impacted by the construction of the dams or the take of water; and the assessment of these water applications is awaiting the native vegetation clearing permit (DWER, 2024).

No Aboriginal sites of significance have been mapped within the application area. It is the permit holder's responsibility to comply with the *Aboriginal Heritage Act 1972* (WA) and ensure that no Aboriginal Sites of Significance are damaged through the clearing process.

End

Appendix A. Additional information provided by applicant

Summary of additional information	Consideration of provided additional information		
Requesting a reduction of proposed clearing area and other information on mitigation and avoidance	The application area has been revised, and the information regarding this is presented in Section 3.1.		
Photographs of the vegetation proposed to be cleared	The photographs have been considered to provide information on the potential habitat for black cockatoos which is presented in Section 3.2.1. Some representative photographs are presented in Appendix E.		
Information regarding contacting with DCCEEW about referral.	This information is presented in Section 3.3		

During the assessment, the applicant responded to requests for information on the following (see below).

Appendix B. Site characteristics

B.1. Site characteristics

The information provided below describes the key characteristics of the area proposed to be cleared and is based on the best information available to DWER at the time of this assessment. This information was used to inform the assessment of the clearing against the Clearing Principles, contained in Appendix C.

Characteristic	Details
Local context	The area proposed to be cleared are isolated patches of native vegetation in the intensive land use zone of Western Australia. One section of the application area is adjacent to a state forest.
	Spatial data indicates the local area (10-kilometre radius from the centre of the area proposed to be cleared) retains approximately 57.4 per cent of the original native vegetation cover.
Ecological linkage	The application area is not mapped/appears to be within any formal/informal ecological linkages.
Conservation areas	There are no conservation areas mapped within the local area. However, the application area is located adjacent to a state forest.
Vegetation description	Photographs and information supplied by the applicant indicate the vegetation within the proposed clearing area consists of marri (<i>Corymbia calophylla</i>), jarrah (<i>Eucalyptus marginata</i>), wattle (<i>Acacia</i> sp.), blackberry (* <i>Rubus fruticosus</i>), bracken fern (<i>Pteridium esculentum</i>) and invasive grass. Representative photos are available in Appendix E.
	 This is consistent with the mapped vegetation types: Balingup_24, which is described as open forest of <i>Eucalyptus marginata</i> subsp. <i>marginata - Corymbia calophylla</i> on slopes and woodland of <i>Eucalyptus rudis</i> on the valley floor in the humid zone (most of the application area); and Grimwade_130, which is described as tall open forest to open forest of <i>Corymbia calophylla - Eucalyptus marginata</i> subsp. <i>marginata</i> with <i>Eucalyptus</i> patens on slopes and <i>Eucalyptus rudis</i> over some <i>Agonis flexuosa</i> on lower slopes in the humid zone (Heddle et al, 1980).
	The mapped vegetation types retain approximately 29.4 and 50.3 per cent of the original extents, respectively (Government of Western Australia, 2019).
Vegetation condition	Photographs supplied by the applicant indicate the vegetation within the proposed clearing area is in degraded to completely degraded (Keighery, 1994) condition.

Characteristic	Details	
	The Keighery (1994) condition rating scale is provided in Appendix D. Representative photos are available in Appendix E.	
Climate and landform	Climate: Mean maximum temperature is 23.2 degrees Celsius.	
	Mean minimum temperature is 9.8 degrees Celsius.	
	Rainfall: Mean annual rainfall is 969.5 millimetres. (At Donnybrook station, 14.4 kilometres from Thomson Brook - BOM, 2024)	
	Two types of landform are mapped:	
	255LvBL4 - Moderate valley slopes.	
	 255LvGR - Moderately incised valleys (30-70 m deep). 	
Soil description	 The soils are mapped as: 255LvBL4 - Friable red-brown loamy earths, brown loamy earths, brown deep loamy duplexes and loamy gravels (most of the application area) 255LvGR - Loamy gravels, friable red/brown loamy earths, brown loamy earths and brown deep loamy duplexes. 	
Land degradation risk	The soils have low risks of land degradation resulting from salinity, flooding, waterlogging and wind erosion; but having medium to high risks due to subsurface acidification, phosphorus export and water erosion (See Appendix B.3).	
Waterbodies	The desktop assessment and aerial imagery indicated that three minor, non-perennial watercourses transect the area proposed to be cleared.	
Hydrogeography	Groundwater salinity within the application area is mapped as from 500 to 1000 milligrams per litre total dissolved solids.	
Flora	Records of three conservation significant flora species have been mapped within the local area. All are Priority 3 species and are mapped over nine kilometres from the application area. No threatened or priority flora species were mapped within the application area. Based on habitat preferences of these species, the proposed clearing area is not likely to contain priority flora.	
Ecological communities	No threatened and priority ecological communities are mapped within the local area.	
Fauna	The desktop assessment identified that a total of 15 threatened or priority fauna species have been recorded within the local area, including ten threatened fauna species, four priority fauna species, and one specially protected fauna species. The application area is located within the distribution of all three threatened black cockatoo species. The closest record from the proposed clearing is approximately 1.4 kilometres for white-tailed black cockatoo (<i>Zanda latirostris</i> or <i>Z. baudinii</i>).	

B.2. Fauna analysis table

With consideration for the site characteristics set out above, relevant datasets (see Appendix F.1), and photographs of the vegetation provided (Applicant, 2024a and 2024c), impacts to the following conservation significant fauna required further consideration.

Species name	Conservation status	Suitable habitat features? [Y/N]	Suitable vegetation type? [Y/N]	Distance of closest record to application area (km)	Number of known records within the combined application area	Are surveys adequate to identify? [Y, N, N/A]
Forest red-tailed black cockatoo (Calyptorhynchus banksii naso)	VU	Y	Y	2.2	4	N/A

Species name	Conservation status	Suitable habitat features? [Y/N]	Suitable vegetation type? [Y/N]	Distance of closest record to application area (km)	Number of known records within the combined application area	Are surveys adequate to identify? [Y, N, N/A]
South-western brush-tailed phascogale (<i>Phascogale tapoatafa wambenger</i>)	CD	Y	Y	2.7	16	N/A
Baudin's cockatoo (Zanda baudinii)	EN	Y	Y	8.9	1	N/A
White-tailed black cockatoo (<i>Zanda</i> sp. 'white-tailed black cockatoo')	EN	Y	Y	1.4	2	N/A

VU: Vunerable;; EN: Endangered; CD: conservation dependent

B.3. Land degradation risk table

Risk categories	Soil unit 255LvBL4	Soil unit 255LvGR
Wind erosion	L2: 3-10% of map unit has a high to extreme	M2: 30-50% of map unit has a high to extreme
	wind erosion risk	wind erosion risk
Water erosion	H1: 50-70% of map unit has a high to extreme	M1: 10-30% of map unit has a high to extreme
	water erosion risk	water erosion risk
Salinity	L1: <3% of map unit has a moderate to high	L1: <3% of map unit has a moderate to high
	salinity risk or is presently saline	salinity risk or is presently saline
Subsurface Acidification	H2: >70% of map unit has a high subsurface	H2: >70% of map unit has a high subsurface
	acidification risk or is presently acid	acidification risk or is presently acid
Flood risk	L1: <3% of the map unit has a moderate to high	L1: <3% of the map unit has a moderate to
	flood risk	high flood risk
Water logging	L1: <3% of map unit has a moderate to very high	L1: <3% of map unit has a moderate to very
	waterlogging risk	high waterlogging risk
Phosphorus export risk	H2: >70% of map unit has a high to extreme	M2: 30-50% of map unit has a high to extreme
	phosphorus export risk	phosphorus export risk

(DPIRD, 2019)

Appendix C. Assessment against the clearing principles

Assessment against the clearing principles	Variance level	Is further consideration required?
Environmental value: biological values		
Principle (a): "Native vegetation should not be cleared if it comprises a high level of biodiversity."	May be at variance	No
Assessment:		
The area proposed to be cleared contain suitable habitat for threatened fauna species. However, due to the degraded to completely degraded condition of vegetation in a context of an agricultural farm, the vegetation proposed to clear is unlikely to comprise a high level of biodiversity.		
Principle (b): "Native vegetation should not be cleared if it comprises the	At variance	Yes
whole or a part of, or is necessary for the maintenance of, a significant habitat for fauna."		Refer to Section 3.2.1, above.
Assessment:		,
The area proposed to be cleared does contains habitat for conservation significant fauna.		

Assessment against the clearing principles	Variance level	Is further consideration required?
<u>Principle (c):</u> "Native vegetation should not be cleared if it includes, or is necessary for the continued existence of, threatened flora."	Not likely to be at	No
Assessment:	vanance	
The area proposed to be cleared is unlikely to contain threatened flora species.		
<u>Principle (d):</u> "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."	Not likely to be at variance	No
Assessment:		
No threatened ecological communities are mapped within the local area. The area proposed to be cleared does contain species that can indicate a TEC.		
Environmental value: significant remnant vegetation and conservation are	eas	
<u>Principle (e):</u> "Native vegetation should not be cleared if it is significant as a remnant of native vegetation in an area that has been extensively cleared."	Not likely to be at	No
Assessment:	variance	
The extent of the mapped vegetation type and native vegetation in the local area is consistent with the national objectives and targets for biodiversity conservation in Australia. The vegetation proposed to be cleared is not considered to be part of a significant ecological linkage in the local area.		
<u>Principle (h):</u> "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."	Not likely to be at variance	No
Assessment:		
Given no conservation areas are mapped within the local area, the proposed clearing is not likely to have an impact on the environmental values of conservation areas.		
Environmental value: land and water resources		
<u>Principle (f):</u> "Native vegetation should not be cleared if it is growing in, or in association with, an environment associated with a watercourse or wetland."	At variance	No
Assessment:		
Given three watercourses recorded transecting the application area, the proposed clearing is considered as an environment associated with a watercourse. However, considering the small extent of clearing and the minor and non-perennial nature of the mapped watercourses, the proposed clearing is unlikely to have significant impacts on these watercourses.		
<u>Principle (g):</u> "Native vegetation should not be cleared if the clearing of the vegetation is likely to cause appreciable land degradation."	Not likely to be at	No
Assessment:	variance	
The mapped soils have a moderate to high risk of subsurface acidification, phosphorus export and water erosion. Noting the small extent of the clearing in two separate areas, and that the purpose is for a dam which will slow water flow, the proposed clearing is not likely to have an appreciable impact on land degradation.		

Assessment against the clearing principles	Variance level	Is further consideration required?
<u>Principle (i):</u> "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."	Not likely to be at variance	No
Assessment:		
Given the non-perennial nature of the watercourses transecting the application area and the small extent of the clearing, the proposed clearing is unlikely to significantly impact surface or ground water quality.		
<u>Principle (j):</u> "Native vegetation should not be cleared if the clearing of the vegetation is likely to cause, or exacerbate, the incidence or intensity of flooding."	Not likely to be at variance	No
Assessment:		
The mapped soils and topographic contours in the surrounding area do not indicate the proposed clearing is likely to contribute to increased incidence or intensity of flooding or waterlogging.		
However, noting the purpose of the clearing, the area proposed to be cleared will be waterlogged after the dams are constructed.		

Appendix D. Vegetation condition rating scale

Vegetation condition is a rating given to a defined area of vegetation to categorise and rank disturbance related to human activities. The rating refers to the degree of change in the vegetation structure, density and species present in relation to undisturbed vegetation of the same type. The degree of disturbance impacts upon the vegetation's ability to regenerate. Disturbance at a site can be a cumulative effect from a number of interacting disturbance types.

Considering its location, the scale below was used to measure the condition of the vegetation proposed to be cleared. This scale has been extracted from Keighery, B.J. (1994) *Bushland Plant Survey: A Guide to Plant Community Survey for the Community*. Wildflower Society of WA (Inc). Nedlands, Western Australia.

Condition	Description	
Pristine	Pristine or nearly so, no obvious signs of disturbance.	
Excellent	Vegetation structure intact, with disturbance affecting individual species; weeds are non-aggressive species.	
Very good	Vegetation structure altered, with obvious signs of disturbance. For example, disturbance to vegetation structure caused by repeated fires, the presence of some more aggressive weeds, dieback, logging and/or grazing.	
Good	Vegetation structure significantly altered by very obvious signs of multiple disturbances. Retains basic vegetation structure or ability to regenerate it. For example, disturbance to vegetation structure caused by very frequent fires, the presence of some very aggressive weeds at high density, partial clearing, dieback and/or grazing.	
Degraded	Basic vegetation structure severely impacted by disturbance. Scope for regeneration but not to a state approaching good condition without intensive management. For example, disturbance to vegetation structure caused by very frequent fires, the presence of very aggressive weeds, partial clearing, dieback and/or grazing.	
Completely degraded	The structure of the vegetation is no longer intact and the area is completely or almost completely without native species. These areas are often described as 'parkland cleared' with the flora comprising weed or crop species with isolated native trees or shrubs.	

Measuring vegetation condition for the South West and Interzone Botanical Province (Keighery, 1994)

Appendix E. Photographs of the vegetation



Figure E.1. Photos of vegetation within application area (south dam) containing severely burned trees (Applicant, 2024a)



Figure E.2. Photos of vegetation within application area (north dam). Trees in red circles are proposed to be cleared (Applicant, 2024c).



Figure E.3. Zoomed-in photos of vegetation within application area (north dam) to show the canopy (Applicant, 2024c).

Appendix F. Sources of information

F.1. GIS databases

Publicly available GIS Databases used (sourced from www.data.wa.gov.au):

- 10 Metre Contours (DPIRD-073)
- Aboriginal Heritage Places (DPLH-001)
- Cadastre (LGATE-218)
- DBCA Lands of Interest (DBCA-012)
- Environmentally Sensitive Areas (DWER-046)
- Flood Risk (DPIRD-007)
- Groundwater Salinity Statewide (DWER-026)
- Hydrography Inland Waters Waterlines
- IBRA Vegetation Statistics
- Imagery
- Pre-European Vegetation Statistics
- Public Drinking Water Source Areas (DWER-033)
- Regional Parks (DBCA-026)
- Remnant Vegetation, All Areas
- RIWI Act, Groundwater Areas (DWER-034)
- RIWI Act, Surface Water Areas and Irrigation Districts (DWER-037)
- Soil Landscape Land Quality Flood Risk (DPIRD-007)
- Soil Landscape Land Quality Phosphorus Export Risk (DPIRD-010)
- Soil Landscape Land Quality Subsurface Acidification Risk (DPIRD-011)
- Soil Landscape Land Quality Water Erosion Risk (DPIRD-013)
- Soil Landscape Land Quality Water Repellence Risk (DPIRD-014)
- Soil Landscape Land Quality Waterlogging Risk (DPIRD-015)
- Soil Landscape Land Quality Wind Erosion Risk (DPIRD-016)
- Soil Landscape Mapping Best Available

Restricted GIS Databases used:

- ICMS (Incident Complaints Management System) Points and Polygons
- Threatened Flora (TPFL)
- Threatened Fauna
- Threatened Ecological Communities and Priority Ecological Communities

F.2. References

Applicant (2024a) *Clearing permit application CPS 10571/1*, received 21 March 2024 (DWER Ref: DWERDT927431).

Applicant (2024b) *Providing further information for CPS 10571/1*, received 10 May 2024 (DWER Ref: DWERDT947728).

Applicant (2024c) Confirming the number of trees proposed to be cleared and providing photos of these trees -CPS 10571/1, received 21 May 2024 (DWER Ref: DWERDT951574, DWERDT951580, DWERDT951582, DWERDT951584).

Applicant (2024d) *Response to the request for further information for CPS 10571/1*, received 14 June 2024 (DWER Ref: DWERDT963845).

Bureau of Meteorology (BOM) (2024). *Climate statistics for Australian locations – Donnybrook*. Available from: <u>http://www.bom.gov.au/climate/averages/tables/cw_009534.shtml</u> (Accessed in May 2024)

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Department of Environment and Conservation (DEC) (2012) Fauna profiles: Brush-tailed phascogale, Phascogale tapoatafa. Department of Environment and Conservation, Western Australia

- Department of Environment Regulation (DER) (2013). A guide to the assessment of applications to clear native vegetation. Perth. Available from: https://www.der.wa.gov.au/images/documents/your-environment/native-vegetation/Guidelines/Guide2_assessment_native_veg.pdf.
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- Department of Sustainability, Environment, Water, Population and Communities (DSEWPC) (2012) *EPBC Act* referral guidelines for three threatened black cockatoo species: Carnaby's cockatoo (endangered) Calyptorhynchus latirostris, Baudin's cockatoo (vulnerable) Calyptorhynchus baudinii, Forest red-tailed black cockatoo (vulnerable) Calyptohynchus banksii naso.
- Department of Water and Environmental Regulation (DWER) (2019). *Procedure: Native vegetation clearing permits*. Joondalup. Available from: <u>https://dwer.wa.gov.au/sites/default/files/Procedure Native vegetation clearing permits v1.PDF</u>.
- Department of Water and Environmental Regulation (DWER) (Regulatory Services Water) (2024) *Rights in Water and Irrigation Act 1914 advice for clearing permit application CPS 10571/1*, received 20 May 2024 (DWER Ref: DWERDT967127).
- Government of Western Australia (2019) 2018 South West Vegetation Complex Statistics. Current as of March 2019. WA Department of Biodiversity, Conservation and Attractions, Perth, https://catalogue.data.wa.gov.au/dataset/dbca
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- Keighery, B.J. (1994) *Bushland Plant Survey: A Guide to Plant Community Survey for the Community*. Wildflower Society of WA (Inc). Nedlands, Western Australia.
- Shire of Donnybrook-Balingup (2024) Advice for clearing permit application CPS 10571/1, received 14 May 2024 (DWER Ref: DWERDT948643).