GOVERNMENT OF
WESTERN AUSTRALIA

# CLEARING PERMIT

*Granted under section 51E of the Environmental Protection Act 1986*

| | |
|---|---|
| **Purpose Permit number:** | CPS 8588/1 |
| **Permit Holder:** | Shire of Mukinbudin |
| **Duration of Permit:** | 30 May 2020 – 30 May 2030 |

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 improving sightline distance.

2. **Land on which clearing is to be done**
   Kununoppin-Mukinbudin Road reserve (PIN 11659322), Barbalin
   Kununoppin-Mukinbudin Road reserve (PIN 11659321), Barbalin

3. **Area of Clearing**
   The Permit Holder must not clear more than 0.1 hectares of native vegetation within the area cross-hatched yellow on attached Plan 8588/1.

4. **Type of clearing authorised**
   This Permit authorises the Permit Holder to clear native vegetation for the purpose described in condition 1 of this Permit to the extent that the Permit Holder has the right to access the land under the *Local Government Act 1995* or any other written law.

5. **Period during which clearing is authorised**
   The Permit Holder must not clear any native vegetation after 30 May 2025.

6. **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.

## PART II – MANAGEMENT CONDITIONS

7. **Avoid, minimise and reduce the impacts and extent of clearing**
   In determining the amount of native vegetation to be cleared authorised under this Permit, the Permit Holder must have regard to the following principles, set out in 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.

**8. Dieback and weed control**

When undertaking any clearing or other activity authorised under this Permit, the Permit Holder must take the following steps to minimise the risk of the 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 *dieback* or *weed*-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.

**9. Revegetation and rehabilitation – planting of *Eucalyptus* trees**

The Permit Holder must within 12 months of undertaking clearing authorised under this Permit:

(a) undertake deliberate *planting* of *Eucalyptus* trees within the area cross-hatched red on attached Plan 8588/1 at a ratio of at least 2:1 for each tree removed, that will result in a similar species composition, structure and density of native vegetation to pre-clearing in that area;
(b) ensure only *local provenance* propagating material of *Eucalyptus* trees is used;
(c) ensure *planting* is undertaken at the *optimal time*;
(d) ensure *plantings* are of a suitable size;
(e) undertake weed control and watering of plantings for at least three years post *planting;*
(f) the Permit Holder must within 24 months of planting the *Eucalyptus* trees in accordance with condition 9(a) of this Permit:
    (i) engage an *environmental specialist* to make a determination that the *Eucalyptus* trees will survive at a ratio of at least 2:1 for each tree removed.
    (ii) If the determination made by the *environmental specialist* under condition 9(f)(ii) that *Eucalyptus* trees will not survive at a ratio of at least 2:1 for each tree removed, the Permit Holder must *plant* additional *Eucalyptus* trees that will result in *Eucalyptus* trees persisting within area cross-hatched red on attached Plan 8588/1 at a ratio of at least 2:1 for each tree removed.
(g) where additional planting of *Eucalyptus* trees is undertaken in accordance with condition 9(f), the Permit Holder must repeat the activities required by condition 9(c), 9(d) and 9(e) of this Permit.

## PART III – RECORD KEEPING AND REPORTING

**10. Record keeping**

The Permit Holder must maintain the following records in relation to the clearing of native vegetation authorised under this Permit:

(a) the location where the clearing occurred, 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) the date(s) that the area was cleared;
(c) the size of the area cleared (in hectares);
(d) actions taken to avoid, minimise and reduce the impacts and extent of clearing in accordance with condition 7 of this Permit;
(e) actions taken to minimise the risk of the introduction and spread of weeds and dieback in accordance with Condition 8 of this Permit;
(f) rehabilitation activities undertaken in accordance with condition 9 of this Permit.

**11. Reporting**

(a) The Permit Holder must provide to the *CEO*, on or before 31 December of each calendar year, a report containing:
    (i) The records required to be kept under condition 10; and
    (ii) Records of activities done by the Permit Holder under this Permit between 1 July of the preceding calendar year and 30 June of the current calendar year.
(b) If no clearing authorised under this permit has been undertaken, a written report confirming that no clearing under this Permit has been undertaken, must be provided to the *CEO* on or before 31 December of each calendar year.

(c) The Permit Holder must provide to the *CEO*, no later than 90 calendar days prior to expiry date of the Permit, a written report of records required under condition 10, where these records have not already been provided under condition 11(a).

**DEFINITIONS**

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

***CEO*** means the Chief Executive Officer of the Department responsible for the administration of the clearing provisions under the *Environmental Protection Act 1986*

***dieback*** means the effect of *Phytophthora* species on native vegetation;

***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.

***fill*** means material used to increase the ground level, or fill a hollow;

***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;

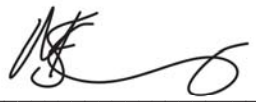
***local provenance*** means native vegetation seeds and propagating material from natural sources within 10 and 50 kilometres and the same Interim Biogeographic Regionalisation for Australia (IBRA) subregion of the area cleared.

***optimal time*** means the period from May to June for undertaking *planting*;

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

***weed/s*** means any plant -

(a) that is a declared pest under section 22 of the *Biosecurity and Agriculture Management Act 2007*;
(b) published in a Department of Biodiversity, Conservation and Attractions species-led ecological impact and invasiveness ranking summary, regardless of ranking;
(c) not indigenous to the area concerned.



Mathew Gannaway
MANAGER
NATIVE VEGETATION REGULATION

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

1 May 2020

# Plan 8588/1


## Legend

- CPS areas approved to clear
- CPS subject to conditions
- Local Government Authorities
- Roads - Minor Roads
- Cadastre

0.1 0.05 0.1 Kilometers

WGS_1984_Web_Mercator_Auxiliary_Sphere

Mathew Gannaway
2020.05.01 20:17:56 +08'00'

Officer with delegated authority under Section 20 of the Environmental Protection Act 1986.



## Locality Map

Government of Western Australia
Department of Water and Environmental Regulation

Government of Western Australia
Department of Water and Environmental Regulation

# Clearing Permit Decision Report

## 1. Application details

### 1.1. Permit application details

**Permit application No.:** 8588/1
**Permit type:** Purpose Permit

### 1.2. Applicant details

**Applicant's name:** Shire of Mukinbudin
**Application received date:** 28 June 2019

### 1.3. Property details

**Property:** Kununoppin – Mukinbudin Road Reserve (PINs 11659321 and 11659322)
**Local Government Authority:** Mukinbudin, Shire of
**Localities:** Barbalin

### 1.4. Application

| Clearing Area (ha) | No. Trees | Method of Clearing | Purpose category: |
|---|---|---|---|
| 0.1 | | Mechanical Removal | Road construction or upgrades |

### 1.5. Decision on application

**Decision on Permit Application:** Granted
**Decision Date:** 1 May 2020
**Reasons for Decision:** The clearing permit application has been assessed against the clearing principles, planning instruments and other matters in accordance with section 51O of the *Environmental Protection Act 1986* (EP Act). It has been concluded that the proposed clearing is at variance with Principle (e) and is not likely to be at variance with the remaining clearing principles.

The vegetation proposed to be cleared is within the extensively cleared Avon Wheatbelt Bioregion and is part of a recognised corridor between a number of otherwise isolated patches of remnant vegetation.

The Shire of Mukinbudin has avoided and minimised the environmental impacts of the proposed clearing through adopting the minimum sightline distance, removing two trees from the application, committing to reassess the necessity of removing trees after under- and mid-storey clearing is conducted and timing clearing to occur outside of bird nesting periods. It has also committed planting replacement suitable Eucalyptus species at the same general location around the intersection, at a ratio of 2:1 for the number of trees removed.

The Delegated Officer determined that, given the small area, the condition of the vegetation, minimisation and mitigation measures implemented, the proposed clearing is not likely to have any significant residual impacts and is not likely to result in an unacceptable risk to the environment. The Delegated Officer also took into consideration the purpose of the clearing is to achieve minimum sightline requirements to meet road safety standards.

Given the above, the Delegated Officer determined to grant a clearing permit subject to weed and dieback management, revegtation and reporting conditions.

## 2. Site Information

**Clearing Description** The Shire of Mukinbudin has applied for a Purpose Permit to clear up to 0.1 hectares of roadside native vegetation for the purpose of improving sightlines around the bend of Kununoppin – Mukinbudin Road, where it intersects with Barbalin – Koonkoobing Road (Figure 1).

The area proposed to be cleared is an approximately 130 metre section of the eastern side of the road reserve. The vegetation proposed to be cleared includes approximately five *Eucalyptus* sp. trees and regrowth native shrubs (see Figure 2 – 6).

The Shire of Mukinbudin advised that the consulting engineer limited the clearing to that which provides for the minimum required sightline distances from the intersection (Shire of Mukinbudin, 2019a).

**Vegetation Description** The vegetation proposed to be cleared is mapped as Beard Vegetation Association 8, wich is described as a medium woodland containing salmon gum and gimlet (Shepherd et al., 2001).

A review of aerial imagery and photographs supplied by the applicant (Shire of Mukinbudin, 2019b) indicate two vegetation types within the area proposed to be cleared:

1. Low agricultural weeds with emergent *Maireana brevifolia* and *Atriplex vesicaria* and
2. Mixed Eucalyptus woodland over *Acacia* sp., *Eremophila* sp. *Dianella revoluta* and *Maireana brevifolia* with occasional agricultural weeds.

**Vegetation Condition**

The vegetation within the application area is adjacent to the existing road and cleared agricultural land. It has been subject to past disturbances from activities such as agriculture and the construction and maintenance of road infrastructure. Aerial imagery, photographs and descriptions provided by the applicant (Shire of Mukinbudin, 2019b) indicate the vegetation is in good to completely degraded condition according to the Keighery (1994) scale, described as:

- Good: Vegetation structure significantly altered with obvious signs of multiple disturbance. Retains basic vegetation structure or ability to regenerate. 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 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 grazing.
- Completely degraded: The structure of the vegetation is no longer intact and the area is completely or almost completely without native species. For example, these areas are often described as 'parkland cleared' with the flora comprising weed or crop species with isolated native trees or shrubs. (Keighery, 1994).

**Soil Type**

The soil type within the application area is mapped as the Kwolyin, Nembudding Subsystem (258KyNE), which is described as rises and low hills, in the northern Zone of Ancient Drainage, with alkaline red loamy duplex (mostly shallow) and yellow sandy earth with mallee scrub and woodland (DPIRD, 2017).

**Comments**

The vegetation proposed to be cleared is located within the Avon Wheatbelt Interim Biogeographical Region of Australia (IBRA) and is approximately 12 kilometres southwest of the Mukinbudin townsite.

The local area is defined as 20 kilometre radius from the application area. A review of available databases has determined that the local area retains approximately 17.4 per cent of the original vegetation cover.

Figure 1. Vegetation proposed to be cleared (hatched blue)

Figure 2. Regrowth *Acacia* sp. shrubs propsed to be cleared (circled), in the northern part of the application area (Shire of Mukinbudin, 2019b)

Figure 3. Four Eucalypts (circled) that may need to be cleared at the southern part of the clearing area (Shire of Mukinbudin, 2019b). The Shire will reassess whether the mature Eucalypts in this area need to be removed after under- and mid-storey clearing (Shire of Mukinbudin, 2020b)

Figure 4. Mature Eucalypt and regrowth *Maireana brevifoli* to be cleared (circled) (Shire of Mukinbudin, 2019b). The Shire will reassess whether this mature Eucalypt needs to be removed after under- and mid-storey clearing in this area (Shire of Mukinbudin, 2020b)

## 3. Minimisation and mitigation measures

The Shire advised that the proposed clearing is based on the minimum required sightline distance of 252 metres (Shire of Mukinbudin, 2019a). The Shire considered moving the stop sign at Barbalin – Koonkoobing Road to change the angles of the sightlines to reduce the amount of clearing required, however, this was rejected because the sightline starting point would have been too far away from the intersection (Shire of Mukinbudin, 2019a).

The Shire advised it is acutely aware of the nature of its highly cleared landscape and has been working to better protect remnant vegetation.

- It has increased its efforts over the last few years to better protect roadside vegetation, including training staff, pruning trees instead of removal and managing roadside weeds;
- It has been running projects funded by the Western Australian Government's State NRM Program to encourage landholders to revegetate suitable areas since 2017;
- In July 2018 it revegetated a realigned section of Koorda–Bullfinch Road; and
- In 2019 it contributed to sending a delegate to present at the State NRM Conference on "Vegetation Decline in the Eastern Wheatbelt" (Shire of Mukinbudin, 2020a).

After a secondary review, the Shire of Mukinbudin (2020b):

- removed two of the original seven trees from the application area;
- committed to reassessing the necessity of removing a further three trees once the clearing of under- and mid-storey vegetation has been conducted under the tree canopies in these areas;
- committed to conducting the clearing in autumn - early winter to reduce the likelihood of bird species nesting in the trees; and
- committed to planting suitable Eucalyptus seedlings in the same general location around the intersection at a ratio of 2-to-1 for the final number of trees removed, as a mitigation strategy to replace the trees that are to be removed.

## 4. Assessment of application against clearing principles

There are records of nine species of threatened and priority flora mapped in the local area. Of these, four threatened and two priority flora species have been recorded on similar soil or vegetation types as the area proposed to be cleared. The Department of Biodiversity, Conservation and Attractions' (DBCA) Wheatbelt region advised the area proposed to be cleared could potentially be suitable habitat for four of these species (DBCA, 2019). On review of the photographs provided by the applicant, as well as consideration of the vegetation condition, the habitat requirements, the morphology and growth form of these flora of conservation significance (Western Australian Herbarium, 1998-), it was determined that the vegetation within the application area is not likely to comprise suitable habitat for these species.

An occurrence of the federally listed, critically endangered *'Eucalypt woodlands of the Western Australian Wheatbelt'* threatened ecological community (TEC) is mapped within the same road reserve, approximately 300 metres east of the vegetation proposed to be cleared. Noting the vegetation proposed to be cleared consists of narrow patches of roadside vegetation in good to completely degraded (Keighery, 1994) condition, it does not meet the minimum condition requirements for recognition as this TEC (Department of the Environment, 2015). This vegetation communtiy is also listed as a Priority 3 priority ecological community (PEC) by DBCA. However, considering the condition of the vegetation and the small scale of the proposed clearing, it is not likley to have a significant impact on this PEC.

According to available datasets, eight fauna species of conservation significance have been recorded within the local area, including the malleefowl (*Leipoa ocellata*), shield-backed trapdoor spider (*Idiosoma nigrum),* arid bronze azure butterfly *(Ogyris subterrestris* subsp*. petrina)*, peregrine falcon (*Falco peregrinus*), red-tailed phascogale (*Phascogale calura*), tree-stem trapdoor spider (*Aganippe castellum*) and white-tailed black cockatoo (*Calyptorhynchus* sp). Considering the habitat range and preferences of Western Australia's two species of white-tailed black cockatoo, the local record is considered to be Carnaby's cockatoo (*Calyptorhyncus latirostris*).

Carnaby's cockatoo's were once abundant in Western Australia however, since the late 1940s, has suffered a 30 per cent contraction in range, a 50 per cent decline in population, and between 1968 and 1990 disappeared from more than a third of its breeding range (Saunders, 1990; Johnstone and Storr, 1998; Saunders and Ingram, 1998; Garnett et al., 2011). Carnaby's cockatoo is now listed as endangered under both the *Biodiversity Conservation Act 2016* (BC Act) and Commonwealth *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act). Proximity of foraging habitat and water is critical to support roosting and breeding sites (Groom, 2015; Le Roux, 2017; Saunders, 1990) and success in breeding is dependent on the quality and proximity of feeding habitat within 12 kilometres of nesting sites (Parks and Wildlife, 2013). Considering the application area is located outside of the current known distribution and breeding range of Carnaby's cockatoo (Commonwealth of Australia, 2012; EPA, 2019) and the nearest record, which is from 1979, is over 16 kilometres away, the vegetation proposed to be cleared is not likely to comprise significant habitat for this species. Furthermore, the trees proposed to be cleared do not appear to contain hollows suitable for Carnaby's cockatoo.

The red-tailed phascogale is listed as vulnerable under the EPBC Act and conservation dependent under the BC Act. According to its approved conservation advice (TSSC, 2016), the red-tailed phascogale is largely confined to woodlands with old-growth hollow-producing eucalypts, particularly wandoo (*Eucalyptus wandoo*) and York gum (*E. loxophleba*), often with associated rock sheoak (*Allocasuarina huegeliana*), preferring long unburnt patches (more than 50 years). The best habitat for this species has a semi-continuous canopy and numerous tree hollows for shelter; it avoids fragmented habitat and open cleared areas (TSSC, 2016). Given the sparsity of vegetation and lack of semi-continuous canopy, the vegetation proposed to be cleared is not likely to comprise significant habitat for this species.

Considering the habitat requirements of the remaining fauna species of conservation significance, the vegetation proposed to be cleared is not likely to be significant as habitat for fauna of conservation significance.

The vegetation proposed to be cleared is mapped as remnant native vegetation and the Roadside Conservation Committee's (RCC) 2004 assessment of the roadside vegetation within the Shire of Mukinbudin identified it as being of high conservation value (RCC, 2004). It contributes to Corridor Connection D, which includes Barbalin South Road, Barbalin North Road, Wyalkatchem Bullfinch Road, Kalyanbudding Road, Jones Road and Kunnunoppin Mukinbudin Road. Corridor Connection D links approximately five, otherwise isolated, patches of remnant vegetation in the southwest of the Shire (RCC, 2004). This includes the two conservation areas within the local area, Barbalin and Wundowlin Nature Reserves, which are approximately 6.7 kilometres to the north of the area proposed to be cleared. Although the vegetation within the application area contributes to the connectivity of remnant vegetation in the local area, the proposed clearing will not severe the corridor and therefore is not likely to have an appreciable impact on these conservation areas.

The national objectives and targets for biodiversity conservation in Australia has a target to prevent clearance of ecological communities with an extent below 30 per cent of that present pre-1750, below which species loss appears to accelerate exponentially at an ecosystem level (Commonwealth of Australia, 2001). Native vegetation coverage in the Avon Wheatbelt IBRA bioregion and the local area is below this threshold, with approximately 19 and 17 per cent of the original native vegetation cover remaining, respectively. Therefore, the vegetation proposed to be cleared is in an area that has been extensively cleared. The mapped vegetation type (Beard 8) has also been extensively cleared in the Avon Wheatbelt IBRA bioregion, with approximately 14 per cent remaining (Government of Western Australia, 2019). However, considering its condition and level of disturbance, the vegetation proposed to be cleared is not likely to be representative of this vegetation type. Notwithstanding the vegetation condition and type, the vegetation proposed to be contributes to the connectivity of remnant vegetation in an extensively cleared landscape and the proposed clearing is at variance with Principle (e). Planting suitable Eucalyptus seedlings in the same general location around the intersection at a ratio of 2-to-1 for the final number of trees removed will mitigate clearing within an extensively cleared landscape.

| | Pre-European extent (ha) | Current extent (ha) | Extent remaining (%) | Current extent in all DBCA managed lands (ha) | Extent remaining in all DBCA managed lands (proportion of Pre-European extent) (%) |
|---|---|---|---|---|---|
| **IBRA bioregion** | | | | | |
| Avon Wheatbelt | 9,517,109 | 1,761,187 | 19 | 174,980 | 2 |
| **Beard vegetation association** | | | | | |
| 8 | 694,638 | 346,425 | 50 | 47,035 | 7 |
| **Beard vegetation association in IBRA bioregion** | | | | | |
| 8 | 356,571 | 50,340 | 14 | 4,353 | 1 |
| **Local area** | | | | | |
| 20km radius | 125,701 | 21,956 | 17 | - | - |

(Government of Western Australia, 2019)

The soils of the area proposed to be cleared are sandy and mapped as having moderate wind erosion and salinity risk (van Gool et al, 2005). However, considering the proposed clearing is limited of a small number of individual trees and shrubs it is unlikley to result in significant soil disturbace and is not likely to result in appreciable land degradation through wind erosion or secondary salination.

The nearest watercourse is approximately 600 metres southeast of the area proposed to be cleared and the mapped soils have low risk of water erosion, flooding, water logging and nutrient export (van Gool et al, 2005). Therefore, the proposed clearing is not likely to include riparian vegetation, impact the quality of surface or ground water, or alter the incidence or intensity of flooding.

Considering the above, the proposed clearing is at variance with clearing principle (e) and is not likely to be at variance with the remaining clearing principles.

While it is noted the proposed clearing of 0.1 hectares of native vegetation will reduce the extent of original vegetation cover in the local area by less than 0.00001 per cent, the appropriate application of the WA Environmental Offset Policy 2011 hierarchy including avoidance, minimisation, mitigation and offset of residual impacts is required. The Shire has reduced the amount of clearing, timed it to minimise disruption to nesting birds, committed to reassessing the necessity of removing trees after under- and mid-storey vegetation has been cleared and committed to planting suitable Eucalyptus seedlings, at a ratio of 2-to-1 for the final number of trees removed, in the same general location around the intersection as a mitigation strategy for the loss of the trees removed. Noting the above, the Delegated Officer determined an offset is not required in this instance.

**Planning instruments and other relevant matters**

The Shire of Mukinbudin is responsible for the management of the road reserve.

No Aboriginal sites of significance are mapped within the application area.

The clearing permit application was advertised on the DWER website on 03 August 2019 with a 14 day submission period. No public submissions have been received in relation to this application.

## 5. References


Commonwealth of Australia (2001). *National Objectives and Targets for Biodiversity Conservation 2001-2005*, Canberra.

Commonwealth of Australia (2012). *EPBC Act referral guidelines for three threatened black cockatoo species*. Department of Sustainability, Environment, Water, Populations and Communities, Canberra.

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Saunders, D.A. (1990). Problems of survival in an extensively cultivated landscape: the case of Carnaby's cockatoo *Calyptorhynchus funereus latirostris.* Biological Conservation. 54: 277-290.

Saunders, D.A. and Ingram, J.A. (1998). Twenty-eight years of monitoring a breeding population of Carnaby's cockatoo. Pacific Conservation Biology. 4: 261-270.

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.

Shire of Mukinbudin (2019a). Clearing permit application CPS 8588/1. Received by DWER on 28 June 2019 (DWER Ref: DWERDT173281).

Shire of Mukinbudin (2019b). Additional information to support clearing permit application CPS 8588/1. Received by DWER on 28 June 2019 (DWER Ref: A1849667).

Shire of Mukinbudin (2020a). Additional information to support clearing permit application CPS 8588/1. Received by DWER on 6 February 2020 (DWER Ref: A1868603).

Shire of Mukinbudin (2020b). Minimisation and mitigation information to support clearing permit application CPS 8588/1. Received by DWER on 8 April 2020 (DWER Ref: A1883389).

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## 6. GIS Datasets

- Aboriginal Sites of Significance
- Department of Biodiversity Conservation and Attractions, Tenure
- Groundwater salinity, statewide
- Hydrology, linear
- IBRA Australia
- Remnant vegetation
- RCC Roadside Conservation Value
- SAC Biodatasets (accessed February 2020)
- Soils mapping, best available