

# **Clearing Permit Decision Report**

#### 1. Application details

1.1. Permit application details

Permit application No.: 1153/3

Permit type: Purpose Permit

1.2. Proponent details

Proponent's name: Metals Exploration Limited

1.3. Property details

Property: Exploration Licence 69/535
Local Government Area: Shire of Ngannyatjarraku

Colloquial name: Wingellina Area

1.4. Application

Clearing Area (ha) No. Trees Method of Clearing For the purpose of: 5.233 Mechanical Removal Mineral Exploration

1.5. Decision on application

Decision on Permit Application: Grant

Decision Date: 7 December 2017

### 2. Site Information

# 2.1. Existing environment and information

#### 2.1.1. Description of the native vegetation under application

**Vegetation Description** 

The amended clearing permit application area has been broadly mapped as the following Beard vegetation associations (GIS Database):

19: Low woodland; mulga between sand ridges; and

92: Hummock grasslands, sparse tree steppe; bloodwood over hard spinifex Triodia basedowii

The application area was surveyed by Outback Ecology Services on 13-22 April 2008 (Outback Ecology Services, 2009). The following seven vegetation types were identified within the application area:

**Ega:** Eucalyptus gamophylla (Eucalyptus mannensis subsp. mannensis) (very) open shrub mallee over Senna spp., Acacia spp. open shrubland/scattered shrubs over *Triodia* spp. hummock grassland on upper slopes and ridges;

**Eso:** Eucalyptus socialis subsp. eucentrica open shrub mallee occasionally with Eucalyptus gamophylla, Eucalyptus mannensis subsp. mannensis scattered mallees over Acacia aneura, Acacia kempeana, Acacia oswaldii, Acacia validinervia scattered tall shrubs/open shrubland/low shrubland over mixed shrubs over Triodia spp. hummock grassland, Eragrostis eriopoda, Enteropogon ramosus scattered grasses/very open grassland. On valley floors and plains associated with increased moisture availability;

**Egyp:** Eucalyptus gypsophila (Very) open shrub mallee often with Eucalyptus socialis subsp. eucentrica over mixed Acacia spp. over Ptilotus obovatus var. obovatus low shrubland/open shrubland over Triodia helmsii/Triodia pungens hummock grassland. On hills and slopes;

**Aca:** Acacia aneura var. aneura, Acacia aneura aff. intermedia low woodland-scatterd tall shrubs over mixed Acacia spp., Senna artemisioides scattered shrubs/open shrubland over Eragrostis eriopoda, Aristida spp., Enteropogon ramosus open-closed grassland. On plains surrouding Wingellina;

**Hdi:** Hakea divaricata low open woodland over \*Cenchrus ciliaris, Enteropogon ramosus open grassland, apparently restricted on flats;

**Apr:** Acacia pruinocarpa, Hakea lorea subsp. lorea tall open shrubland over Senna artemisioides subsp. oligophylla x helmsii, Acacia kempeana low open shrubland over Triodia helmsii hummock grassland, Cymbopogon obtectus very open tussock grassland. On low hills to the south of Wingellina; and

**Ccot:** Codonocarpus cotinifolius low open woodland over Eucalyptus gamophylla scattered mallee over Senna glutinosa, Acacia kempeana, Hakea lorea subsp. lorea open shrubland over Acacia valdinervia, Ptilotus nobilis subsp. nobilis low open shrubland over Triodia helmsii hummock grassland, Cymbopogon obtectus very open tussock grassland. On low hills to the south of Wingellina.

<sup>\*</sup>Identified weed species

**Clearing Description** 

Wingellina Area

Metals Exploration Limited proposes to clear up to 5.233 hectares of native vegetation within a total boundary of approximately 8,638.17 hectares, for the purpose of mineral exploration. The project is located approximately 698 kilometres north-east of Laverton, in the Shire of Ngannyatjarraku.

**Vegetation Condition** 

Excellent: Vegetation structure intact; disturbance affecting individual species, weeds non-aggressive (Keighery,

1994).

То

Degraded: Structure severely disturbed; regeneration to good condition requires intensive management

(Keighery, 1994).

Comment

Vegetation condition was obtained from a flora and vegetation survey conducted by Outback Ecology Services

Clearing permit CPS 1153/1 was granted by the Department of Mines and Petroleum on 26 May 2011, authorising the clearing of up to 4.23 hectares of native vegetation within a boundary of approximately 8,554 hectares. CPS 1153/1 was amended on 19 May 2016 for the purpose of extending the permit duration by five years.

On 3 October 2017, the permit holder applied to amend CPS 1153/2 to increase the permit boundary and amount of approved clearing.

# 3. Assessment of application against Clearing Principles

#### Comments

Metals Exploration Limited has applied to increase the amount of clearing authorised by one hectare to a total of 5.233 hectares and to increase the permit boundary by approximately 84.17 hectares.

The amendment application area lies within the Mann-Musgrave Block (CR1) subregion of the Central Ranges Interim Biogeographic Regionalisation of Australia (IBRA) bioregion (GIS Database). The Mann-Musgrave Block subregion covers approximately 4,701,518 hectares (GIS Database). The sandplains of this subregion support low open woodlands of either Desert Oak or Mulga over *Triodia basedowii* hummock grasslands. Low open woodlands of Ironwood (*Acacia estrophiolata*) and Corkwoods (*Hakea* spp.) over tussock and hummock grasses often fringe ranges. The ranges support mixed wattle scrub or *Callitris glaucophylla* woodlands over hummock and tussock grasslands (CALM, 2002).

The amendment area occurs within an Environmentally Sensitive Area (Register of National Estate), which is the Ranges of the Western Desert (GIS Database). According to the Australian Heritage Database (2017) the Ranges of the Western Desert are a system of ranges with many gorges and valleys. The ranges are dominated by spinifex steppe, mulga and mallee scrub (Australian Heritage Database, 2017). Despite the area being on the Register of National Estate for natural values, it is considered that the proposed clearing is low impact and of a small scale and will not significantly impact on the environmental values of the area.

No Threatened or Priority Ecological Communities, or Threatened flora species have been recorded in the amendment area (GIS Database).

The fauna habitats present within the amendment area are consistent with those described in clearing permit decision report CPS 1153/1.

One weed species has been recorded within the amendment application area (Outback Ecology Services, 2009), namely *Cenchrus ciliaris*. Weeds have the potential to alter the biodiversity of an area, competing with native vegetation for available resources and making areas more fire prone. This in turn can lead to greater rates of infestation and further loss of biodiversity if the area is subject to repeated fires. This species is not listed as a 'Declared Plant' species under the *Agriculture and Related Resources Protection Act 1976* by the Department of Primary Industries and Regional Development. Potential impacts to biodiversity as a result of the proposed clearing may be minimised by maintaining the weed management condition.

Current environmental information has been reviewed and the assessment of the clearing principles is consistent with the assessment in clearing permit decision reports CPS 1153/1 and 1153/2.

# Methodology

Australian Heritage Database (2017)

### GIS Database:

- DPaW Tenure
- Hydrography, Lakes
- Hydrography, Linear
- IBRA Australia
- Imagery
- Landsystem Rangelands
- Pre-European Vegetation

- Public Drinking Water Source Areas
- Soils, Statewide
- Threatened and Priority Flora
- Threatened and Priority Ecological Communities boundaries
- Threatened and Priority Ecological Communities buffered
- Threatened Fauna

# Planning Instrument, Native Title, previous EPA decision or other matter.

#### Comments

There is one native title claim over the area under application (DPLH, 2017). This claim has been registered with the National Native Title Tribunal on behalf of the claimant group. However, the mining tenure has been granted in accordance with the future act regime of the *Native Title Act 1993* and the nature of the act (i.e. the proposed clearing activity) has been provided for in that process, therefore, the granting of a clearing permit is not a future act under the *Native Title Act 1993*.

There are several registered Aboriginal Sites of Significance within the application area (DPLH, 2017). It is the proponent's responsibility to comply with the *Aboriginal Heritage Act 1972* and ensure that no Aboriginal Sites of Significance are damaged through the clearing process.

It is the proponent's responsibility to liaise with the Department of Water and Environmental Regulation and the Department of Biodiversity Conservation and Attractions, to determine whether a Works Approval, Water Licence, Bed and Banks Permit, or any other licences or approvals are required for the proposed works.

The amendment application was advertised on 30 October 2017 by the Department of Mines, Industry Regulation and Safety, inviting submissions from the public. No submissions were received in relation to this application.

Methodology DPLH (2017)

#### 4. References

Australian Heritage Database (2017) Ranges of the Western Desert, Laverton - Warburton Rd, Warburton via Laverton, WA, Australia. Department of the Environment and Energy. <a href="http://www.environment.gov.au/cgi-bin/ahdb/search.pl">http://www.environment.gov.au/cgi-bin/ahdb/search.pl</a> (Accessed 27 November 2017).

CALM (2002) A Biodiversity Audit of Western Australia's 53 Biogeographical Subregions. Department of Conservation and Land Management, Western Australia.

DPLH (2017) Aboriginal Heritage Enquiry System. Department of Planning, Lands and Heritage. <a href="http://maps.daa.wa.gov.au/AHIS/">http://maps.daa.wa.gov.au/AHIS/</a> (Accessed 27 November 2017).

Keighery, B.J. (1994) Bushland Plant Survey: A Guide to Plant Community Survey for the Community. Wildflower Society of WA (Inc). Nedlands, Western Australia.

Outback Ecology Services (2009) Wingellina Nickel Project: Baseline Vegetation and Flora Assessment. Report prepared for Metals X Limited, by Outback Ecology Services, April 2009.

#### 5. Glossary

#### **Acronyms:**

**BoM** Bureau of Meteorology, Australian Government

DAADepartment of Aboriginal Affairs, Western Australia (now DPLH)DAFWADepartment of Agriculture and Food, Western Australia (now DPIRD)DBCADepartment of Biodiversity Conservation and Attractions, Western Australia

DEC Department of Environment and Conservation, Western Australia (now DBCA and DWER)

DEE Department of the Environment and Energy, Australian Government
DER Department of Environment Regulation, Western Australia (now DWER)
DMIRS Department of Mines, Industry Regulation and Safety, Western Australia
DMP Department of Mines and Petroleum, Western Australia (now DMIRS)

**DPIRD** Department of Primary Industries and Regional Development, Western Australia

**DPLH** Department of Planning, Lands and Heritage, Western Australia

**DRF** Declared Rare Flora

**DoE** Department of the Environment, Australian Government (now DEE)

**DoW** Department of Water, Western Australia (now DWER)

**DPaW** Department of Parks and Wildlife, Western Australia (now DBCA)

**DSEWPaC** Department of Sustainability, Environment, Water, Population and Communities (now DEE)

**DWER** Department of Water and Environmental Regulation, Western Australia

**EPA** Environmental Protection Authority, Western Australia **EP Act** Environmental Protection Act 1986, Western Australia

EPBC Act Environment Protection and Biodiversity Conservation Act 1999 (Federal Act)

GIS Geographical Information System
ha Hectare (10,000 square metres)

IBRA Interim Biogeographic Regionalisation for Australia

**IUCN** International Union for the Conservation of Nature and Natural Resources – commonly known as the

World Conservation Union

PEC Priority Ecological Community, Western Australia

RIWI Act Rights in Water and Irrigation Act 1914, Western Australia

TEC Threatened Ecological Community

#### **Definitions:**

{DPaW (2017) Conservation Codes for Western Australian Flora and Fauna. Department of Parks and Wildlife, Western Australia}:-

#### T Threatened species:

Published as Specially Protected under the *Wildlife Conservation Act 1950*, listed under Schedules 1 to 4 of the Wildlife Conservation (Specially Protected Fauna) Notice for Threatened Fauna and Wildlife Conservation (Rare Flora) Notice for Threatened Flora (which may also be referred to as Declared Rare Flora).

**Threatened fauna** is that subset of 'Specially Protected Fauna' declared to be 'likely to become extinct' pursuant to section 14(4) of the *Wildlife Conservation Act 1950*.

**Threatened flora** is flora that has been declared to be 'likely to become extinct or is rare, or otherwise in need of special protection', pursuant to section 23F(2) of the *Wildlife Conservation Act 1950*.

The assessment of the conservation status of these species is based on their national extent and ranked according to their level of threat using IUCN Red List categories and criteria as detailed below.

#### CR Critically endangered species

Threatened species considered to be facing an extremely high risk of extinction in the wild. Published as Specially Protected under the *Wildlife Conservation Act 1950*, in Schedule 1 of the Wildlife Conservation (Specially Protected Fauna) Notice for Threatened Fauna and Wildlife Conservation (Rare Flora) Notice for Threatened Flora.

#### EN Endangered species

Threatened species considered to be facing a very high risk of extinction in the wild. Published as Specially Protected under the *Wildlife Conservation Act 1950*, in Schedule 2 of the Wildlife Conservation (Specially Protected Fauna) Notice for Threatened Fauna and Wildlife Conservation (Rare Flora) Notice for Threatened Flora.

#### VU Vulnerable species

Threatened species considered to be facing a high risk of extinction in the wild. Published as Specially Protected under the *Wildlife Conservation Act 1950*, in Schedule 3 of the Wildlife Conservation (Specially Protected Fauna) Notice for Threatened Fauna and Wildlife Conservation (Rare Flora) Notice for Threatened Flora.

#### EX Presumed extinct species

Species which have been adequately searched for and there is no reasonable doubt that the last individual has died. Published as Specially Protected under the *Wildlife Conservation Act 1950*, in Schedule 4 of the Wildlife Conservation (Specially Protected Fauna) Notice for Presumed Extinct Fauna and Wildlife Conservation (Rare Flora) Notice for Presumed Extinct Flora.

# IA Migratory birds protected under an international agreement

Birds that are subject to an agreement between the government of Australia and the governments of Japan (JAMBA), China (CAMBA) and The Republic of Korea (ROKAMBA), and the Bonn Convention, relating to the protection of migratory birds. Published as Specially Protected under the *Wildlife Conservation Act 1950*, in Schedule 5 of the Wildlife Conservation (Specially Protected Fauna) Notice.

#### CD Conservation dependent fauna

Fauna of special conservation need being species dependent on ongoing conservation intervention to prevent it becoming eligible for listing as threatened. Published as Specially Protected under the *Wildlife Conservation Act 1950*, in Schedule 6 of the Wildlife Conservation (Specially Protected Fauna) Notice.

#### OS Other specially protected fauna

Fauna otherwise in need of special protection to ensure their conservation. Published as Specially Protected under the *Wildlife Conservation Act 1950*, in Schedule 7 of the Wildlife Conservation (Specially Protected Fauna) Notice.

#### P Priority species

Species which are poorly known; or

Species that are adequately known, are rare but not threatened, and require regular monitoring. Assessment of Priority codes is based on the Western Australian distribution of the species, unless the distribution in WA is part of a contiguous population extending into adjacent States, as defined by the known spread of locations.

#### P1 Priority One - Poorly-known species:

Species that are known from one or a few locations (generally five or less) which are potentially at risk. All occurrences are either: very small; or on lands not managed for conservation, e.g. agricultural or pastoral lands, urban areas, road and rail reserves, gravel reserves and active mineral leases; or otherwise under threat of habitat destruction or degradation. Species may be included if they are comparatively well known from one or more locations but do not meet adequacy of survey requirements and appear to be under immediate threat from known threatening processes. Such species are in urgent need of further survey.

#### P2 Priority Two - Poorly-known species:

Species that are known from one or a few locations (generally five or less), some of which are on lands managed primarily for nature conservation, e.g. national parks, conservation parks, nature reserves and other lands with secure tenure being managed for conservation. Species may be included if they are comparatively well known from one or more locations but do not meet adequacy of survey requirements and appear to be under threat from known threatening processes. Such species are in urgent need of further survey.

#### P3 Priority Three - Poorly-known species:

Species that are known from several locations, and the species does not appear to be under imminent threat, or from few but widespread locations with either large population size or significant remaining areas of apparently suitable habitat, much of it not under imminent threat. Species may be included if they are comparatively well known from several locations but do not meet adequacy of survey requirements and known threatening processes exist that could affect them. Such species are in need of further survey.

#### P4 Priority Four - Rare, Near Threatened and other species in need of monitoring:

- (a) Rare. Species that are considered to have been adequately surveyed, or for which sufficient knowledge is available, and that are considered not currently threatened or in need of special protection, but could be if present circumstances change. These species are usually represented on conservation lands.
- (b) Near Threatened. Species that are considered to have been adequately surveyed and that are close to qualifying for Vulnerable, but are not listed as Conservation Dependent.
- (c) Species that have been removed from the list of threatened species during the past five years for reasons other than taxonomy.

#### Principles for clearing native vegetation:

- (a) Native vegetation should not be cleared if it comprises a high level of biological diversity.
- (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.
- (c) Native vegetation should not be cleared if it includes, or is necessary for the continued existence of, rare
- (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.
- (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.
- (f) Native vegetation should not be cleared if it is growing in, or in association with, an environment associated with a watercourse or wetland.
- (g) Native vegetation should not be cleared if the clearing of the vegetation is likely to cause appreciable land degradation.
- (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.
- (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.
- (j) Native vegetation should not be cleared if clearing the vegetation is likely to cause, or exacerbate, the incidence or intensity of flooding.