



ECC

ENVIRONMENTAL
COMPLIANCE CONSULTANCY



ECC-88-317-REP-5-D

ENVIRONMENTAL SCOPING REPORT PLUS IMPACT ASSESSMENT

**EXPLORATION ACTIVITIES ON EPL 7688 FOR BASE AND RARE METALS, INDUSTRIAL MINERALS
AND PRECIOUS METALS IN THE OTJOZONDJUPA AND OSHIKOTO REGIONS**

PREPARED FOR VOTORANTIM METALS (PTY) LTD



November 2020

TITLE AND APPROVAL PAGE

Project Name:	Proposed exploration activities on EPL 7688 for base and rare metals, industrial minerals, and precious metals in the Otjozondjupa and Oshikoto regions.
Project Number	ECC-88-317-REP-5-D
Client Name:	Votorantim Metals Namibia (Pty) Ltd
Ministry Reference:	N/A
Status of Report:	Draft for public review
Date of issue:	November 2020
Review Period	12 th to 19 th November 2020

Environmental Compliance Consultancy Contact Details:

We welcome any enquiries regarding this document and its content: please contact:

Stephan Bezuidenhout

Environmental Consultant & Practitioner
Tel: +264 81 699 7608
Email: stephan@eccenvironmental.com
www.eccenvironmental.com

Jessica Bezuidenhout Mooney

Environmental Consultant & Practitioner
Tel: +264 81 699 7608
Email: jessica@eccenvironmental.com
www.eccenvironmental.com

Confidentiality

Environmental Compliance Consultancy Notice: This document is confidential. If you are not the intended recipient, you must not disclose or use the information contained in it. If you have received this document in error, please notify us immediately by return email and delete the document and any attachments. Any personal views or opinions expressed by the writer may not necessarily reflect the views or opinions of Environmental Compliance Consultancy.

Please note at ECC we care about lessening our footprint on the environment; therefore all documents are printed double sided.

EXECUTIVE SUMMARY

Votorantim Metals Namibia (Pty) Ltd (herein referred to as Votorantim or the proponent), intends to undertake exploration activities on Exclusive Prospecting Licence (EPL) 7688 for base and rare metals, industrial minerals, and precious metals in the Otjozondjupa and Oshikoto regions. Approximately (90 % of the EPL lies in the Otjozondjupa Region and 10% in the Oshikoto Region, in an area north of the Otavi town.

The proposed project triggers listed activities in terms of the Environmental Management Act, No. 7 of 2007 and its Environmental Impact Assessment Regulations, No. 30 of 2012, therefore an environmental clearance certificate is required. As part of the environmental clearance certificate application, an Environmental Impact Assessment (EIA) has been undertaken to satisfy the requirements of the Environmental Management Act, No. 7 of 2007. This environmental scoping report and Environmental Management Plan (EMP) shall be submitted to the competent authority as part of the application for the environmental clearance certificate.

The proposed exploration activities on EPL 7688 include soil sampling, ground and airborne geophysical surveys (audio-magnetotelluric, induced polarization and magnetic ground surveys), geological mapping, and exploration drilling on selected target areas. Some limited bush-clearing in bush encroached areas will be carried out, for the creation of working areas and access tracks where necessary. All sites of activity will be managed according to stringent environmental requirements that Votorantim upholds in its exploration projects. Access agreements will be entered into with all farmers / holders of private ground which may be accessed.

The exploration activities will commence as soon as an environmental clearance certificate has been granted by the Environmental Commissioner and activities are expected to be conducted over a 3-year period, which is the duration of the exploration licence. However, the period of each phase of the exploration programme may vary and will be refined as geological information becomes available.

EPL 7688 is located within the Karstveld vegetation type of the Acacia Tree-and-shrub Savanna Biome as well as thornbush woodland (Mendelsohn *et al.*, 2002). The vegetation structure in the proposed area can be broadly classified as woodland. The area supports a high terrestrial diversity of animal and plant life, with the plant diversity in the area supporting more than 500 species.

The impacts of exploration activities with respect to airborne dust are expected to be limited to vehicular traffic. There will be some release of exhaust fumes from machinery that will impact the immediate vicinity but will be of short duration. Additionally, there will be associated drilling and machinery noise, which could be a disturbance to immediate neighbours, but this will be of short duration.

Through further investigation, it was determined that the effects from noise are considered to be of minor significance, however with additional mitigation, the significance is reduced to low. The additional mitigation measures include:

- Residents shall be provided at least two weeks' notice of drilling operations within 1km of their property;
- Activities will be minimized to allocated daylight working hours;

- Continual engagement with residents shall be undertaken by the proponent to identify any concerns or issues, and appropriate mitigation and management measures shall be further agreed; and
- Noise suppression measures shall be applied if drilling occurs in locations that may affect residents.

Water is a scarce and vital resource in Namibia and, as such, must always be treated with caution. EPL 7688 is located partially in the Owambo Basin (north) and the Kunene South Groundwater Basin (south). The area is underlain by dolomites, which show a high potential of groundwater with an increased potential where fractures and faults occur on a local scale. The aquifer is also reliable, as it is frequently recharged and water quality is generally of a high standard (Mendelsohn *et al.*, 2002). The potential for contamination from the proposed activities is regarded as minimal. Protection of water quality is addressed in the EMP.

This study concluded that a potential environmental risk, which may require further investigation, is related to the cumulative impacts as a result of visual disturbance, nuisance of noise and the loss of sense of place. Receptors are farm owners, neighbours, tourists and visitors. The visual disturbance and loss of the sense of place is considered to be of moderate significance, however with additional mitigation, the significance can be reduced to minor. These additional mitigation measures include:

- Positioning of drill equipment in such a way that it is out of sight from human receptors;
- Barriers or fences shall be used if drilling occurs in locations that may affect residents or livestock;
- Residents need to be informed at least two weeks in advance that drilling operations are within 1km of their property; and
- Continuous engagement with residents to identify any concerns or issues, and appropriate mitigation and management measures agreed upon.

The overall potential impact of this proposed project is not considered significant as it does not widely exceed recognised levels of acceptable change, does not threaten the integrity of the receptors, and it is not material to the decision-making process. The assessment is considered to be comprehensive and sufficient to identify impacts, and it is concluded that no further assessment is required.

On this basis, it is of the opinion of ECC that an environmental clearance certificate could be issued, on conditions that the management and mitigation measures specified in the EMP are implemented and adhered to.

TABLE OF CONTENTS

1	INTRODUCTION	9
1.1	PROJECT OVERVIEW.....	9
1.2	SCOPE OF WORK.....	9
1.3	THE PROPONENT OF THE PROPOSED PROJECT	11
1.4	ENVIRONMENTAL CONSULTANCY.....	11
1.5	ENVIRONMENTAL LEGAL REQUIREMENTS	11
1.6	TERMINOLOGIES APPLIED IN THIS REPORT.....	12
2	APPROACH TO THE IMPACT ASSESSMENT.....	14
2.1	PURPOSE OF THE ENVIRONMENTAL IMPACT ASSESSMENT.....	14
2.2	THE ASSESSMENT PROCESS	14
2.3	SCREENING OF THE PROPOSED PROJECT	16
2.4	SCOPING OF THE ENVIRONMENTAL ASSESSMENT	16
2.5	BASELINE STUDIES	17
2.6	IMPACT PREDICATION AND EVALUATION	17
2.7	EIA CONSULTATION	18
2.7.1	INTERESTED AND AFFECTED PARTIES	18
2.7.2	NON-TECHNICAL SUMMARY.....	19
2.7.3	NEWSPAPER ADVERTISEMENTS	19
2.7.4	SITE NOTICES	19
2.7.5	CONSULTATION FEEDBACK.....	19
2.8	DRAFT EIA AND EMP	19
2.9	FINAL EIA AND EMP	19
2.10	AUTHORITY ASSESSMENT AND DECISION MAKING	20
2.11	MONITORING AND AUDITING.....	20
3	REGULATORY FRAMEWORK.....	21
3.1	NATIONAL LEGISLATION.....	21
3.2	PERMITS AND LICENCES	25
3.2.1	EXCLUSIVE PROSPECTING LICENCE.....	25
4	PROJECT DESCRIPTION.....	26
4.1	NEED FOR THE PROPOSED PROJECT.....	26
4.2	ALTERNATIVES CONSIDERED	26
4.2.1	NO-GO ALTERNATIVE	26
4.3	PROPOSED EXPLORATION ACTIVITIES.....	26
4.3.1	EXPLORATION SCHEDULE.....	27
4.3.2	EQUIPMENT AND MATERIALS	27
4.3.3	WORKERS AND ACCOMMODATION.....	27
4.3.4	RESOURCE USE AND WASTE MANAGEMENT.....	28
4.3.5	SITE REHABILITATION	28
5	ENVIRONMENTAL AND SOCIAL BASELINE	29
5.1	INTRODUCTION	29
5.2	SITE AND SURROUNDING ENVIRONMENT	29
5.3	CLIMATE.....	32
5.4	GEOLOGY AND GEOMORPHOLOGY	34
5.5	TOPOGRAPHY AND SOIL.....	35
5.6	HYDROLOGY.....	37

5.6.1	GROUNDWATER	37
5.6.2	GROUNDWATER FLOW	37
5.7	BIODIVERSITY	38
5.7.1	VEGETATION	38
5.7.2	FAUNA SPECIES	39
5.8	SOCIO-ECONOMIC BASELINE	40
5.8.1	DEMOGRAPHIC PROFILE	40
5.8.2	GOVERNANCE	40
5.8.3	HEALTH	41
5.8.4	EMPLOYMENT	41
5.8.5	ECONOMIC ACTIVITIES	42
5.8.6	CULTURAL HERITAGE	43
5.8.7	NOISE AND SENSE OF PLACE	43
6	IDENTIFICATION AND EVALUATION OF IMPACTS	45
6.1	INTRODUCTION	45
6.2	ASSESSMENT GUIDANCE	45
6.3	LIMITATIONS, UNCERTAINTIES AND ASSUMPTIONS	46
6.4	DETERMINATION OF SIGNIFICANCE	47
6.5	MITIGATION	51
7	IMPACT ASSESSMENT FINDINGS AND PROPOSED MITIGATION MEASURES	52
7.1	SCOPING ASSESSMENT FINDINGS	52
7.1.1	FURTHER CONSIDERATION: NOISE AND VISUAL IMPACTS	64
8	ENVIRONMENTAL MANAGEMENT PLAN	66
9	CONCLUSION	67
	REFERENCES	68
	APPENDIX A- EMP	70
	APPENDIX B - NON-TECHNICAL SUMMARY	71
	APPENDIX C- EVIDENCE OF PUBLIC CONSULTATION	72
	APPENDIX D - ECC CVS	83
LIST OF TABLES		
	TABLE 1 - PROPONENTS DETAILS	11
	TABLE 2 - LISTED ACTIVITIES TRIGGERED BY THE PROJECT	11
	TABLE 4 - LEGAL COMPLIANCE	21
	TABLE 5 - NATIONAL POLICIES	24
	TABLE 6 - PERMITS AND LICENCES REQUIREMENTS	25
	TABLE 7 - LIMITATIONS, UNCERTAINTIES AND ASSUMPTIONS	46
	TABLE 8 - NATURE OF IMPACT	47
	TABLE 9 - TYPE OF IMPACT	47
	TABLE 10 - REVERSIBILITY OF IMPACT	48
	TABLE 11 - MAGNITUDE OF CHANGE	48
	TABLE 12 - DURATION OF IMPACT	48
	TABLE 13 - SCALE OF CHANGE	49
	TABLE 14 - PROBABILITY OF CHANGE	49
	TABLE 15 - SIGNIFICANCE DESCRIPTION	49
	TABLE 16 - SENSITIVITY AND VALUE OF RECEPTOR	50

TABLE 17 - SIGNIFICANCE OF IMPACT	50
TABLE 18- SCOPING ASSESSMENT FINDINGS AND PROPOSED MITIGATION MEASURES.....	53
TABLE 19 - SUMMARY OF EFFECTS.....	64

LIST OF FIGURES

FIGURE 1 - LOCATION OF EPL 7688	9
FIGURE 2 - ECC SCOPING PROCESS	15
FIGURE 3 - LOCATION OF EPL 7688 RELATIVE TO NEIGHBOURING FARMS	18
FIGURE 4 - ACCESSIBILITY MAP OF EPL 7688	30
FIGURE 5 - LOCATION OF EPL 7688 RELATIVE TO NEIGHBOURING FARMS	31
FIGURE 6 - PREVAILING WIND DIRECTION AND WIND SPEED IN THE AREA OF THE PROPOSED PROJECT (SOURCE: IOWA STATE UNIVERSITY, 2020).	33
FIGURE 7 - EPL 7688 REGIONAL AND LOCAL GEOLOGY	34
FIGURE 8 - ELEVATION PROFILE ALONG EPL 7688	35
FIGURE 9 - EPL 7688 REGIONAL AND LOCAL SOIL MAP	36
FIGURE 10 - HYDROLOGY MAP OF THE EPL 7688.....	38
FIGURE 11 - EPL 7688 REGIONAL AND LOCAL VEGETATION MAP	39
FIGURE 12 - DETERMINATION OF SIGNIFICANCE.....	47

DEFINITIONS AND ABBREVIATIONS

AMT	Audio-Magneto telluric
DEA	Directorate of Environmental Affairs
ECC	Environmental Compliance Consultancy
EIA	Environmental Impact Assessment
EMP	Environmental Management Plan
EPL	Exclusive Prospecting Licence
NDP5	Fifth National Development Plan
GDP	Gross Domestic Product
HIV/AIDS	Human Immunodeficiency Virus / Acquired Immunodeficiency Syndrome
IP	Induced Polarization
I&AP	Interested and affected parties
IFC	International Finance Cooperation
MAWLR	Ministry of Agriculture, Water and Land Reform
MET	Ministry of Environment and Tourism
MEFT	Ministry of Environment, Forestry and Tourism
MHSS	Ministry of Health and Social Services
MME	Ministry of Mines and Energy
NSA	Namibian Statistics Agency
NTS	Non-Technical Summary
RAB	Rotary Air Blast (drilling)
RC	Reverse Circulation (drilling)
TB	Tuberculosis
WHO	World Health Organization

1 INTRODUCTION

1.1 PROJECT OVERVIEW

Votorantim Metals Namibia (Pty) Ltd propose to undertake mineral exploration activities on EPL 7688 for base and rare metals, industrial minerals and precious metals in the Otjozondjupa Region, extending slightly into the Oshikoto Region (refer to Figure 1).

The proposed project area lies mainly near the B1 road, which runs between the Otavi and Tsumeb towns. EPL 7688 is located approximately 5 km north of the town of Otavi and south west of Tsumeb. The B1 road can be used to access the site, as well as from the C39 road west of Otavi (Figure 1).

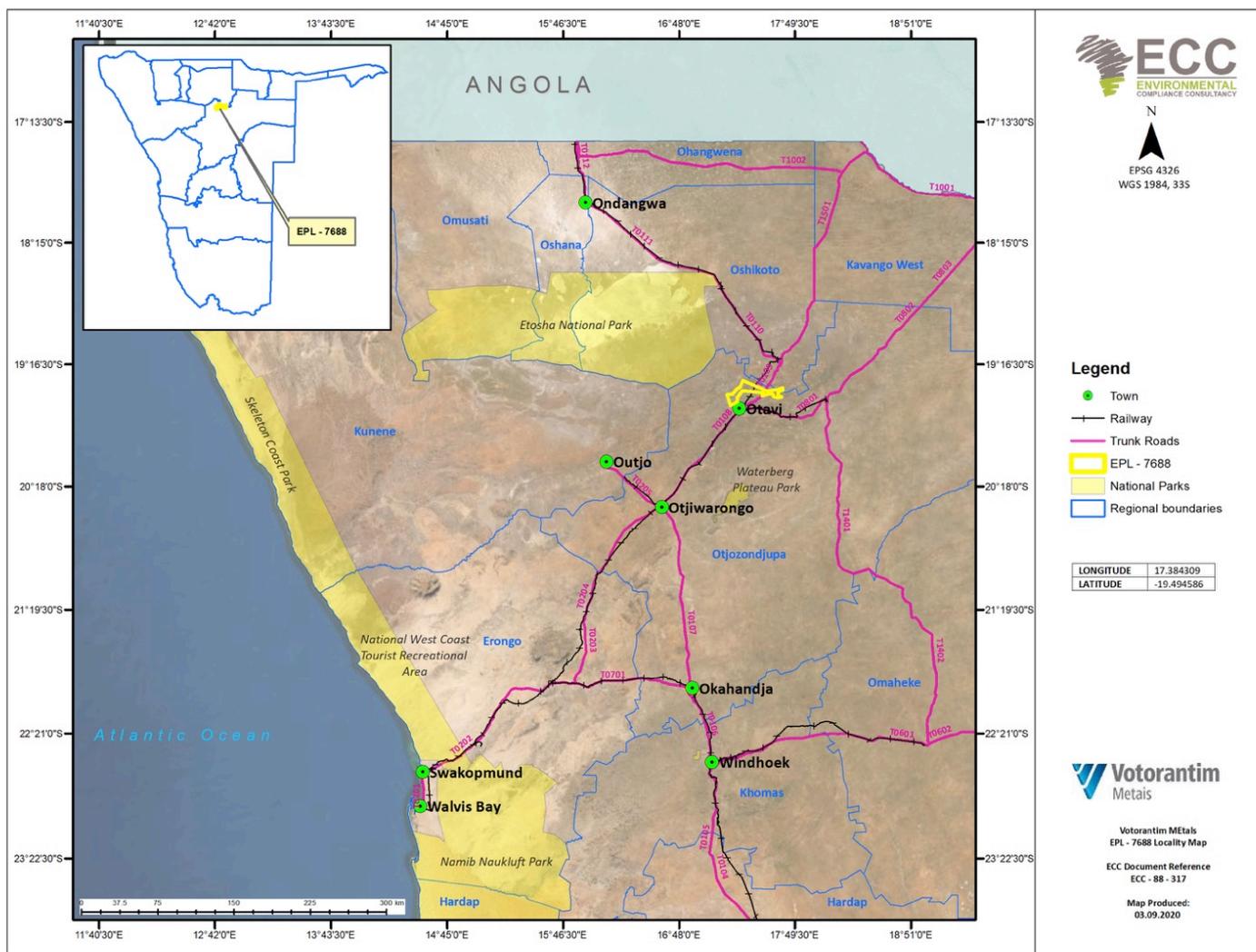


FIGURE 1 - LOCATION OF EPL 7688

1.2 SCOPE OF WORK

Environmental Compliance Consultancy (ECC) has been engaged by the proponent, to undertake the ESIA and an Environmental Management Plan (EMP) in terms of the Environmental Management Act, 2007 and its regulations.

The purpose of this report is to present the findings of the scoping study for the proposed project. This scoping report has been outlined in terms of the requirements of the Environmental Management Act, No. 7 of 2007 and its regulations, promulgated in 2012 (referred to herein as the EIA Regulations).

An environmental clearance application will be submitted to the relevant competent authorities; the Ministry of Mines and Energy (MME) and Ministry of Environment, Forestry and Tourism (MEFT).

ECC has prepared this report. ECC's terms of reference for the assessment is strictly to address potential effects, whether positive or negative and their relative significance, explore alternatives for technical recommendations and identify appropriate mitigation measures.

This report provides information to the public and stakeholders to aid in the decision-making process for the proposed project. The objectives are to:

- Provide a description of the proposed activity and the site on which the activity is to be undertaken, and the location of the activity on the site;
- Provide a description of the environment that may be affected by the activity;
- Identify the laws and guidelines that have been considered in the assessment and preparation of this report;
- Provide details of the public consultation process;
- Describe the need and desirability of the activity;
- Provide a high level of environmental and social impact assessment on feasible alternatives that were considered; and
- Report the assessment findings, identifying the significance of effects, including cumulative effects.

In addition to the environmental assessment, an EMP (Appendix A) is also required in terms of the Environmental Management Act, No. 7 of 2007. An EMP has been developed to provide a management framework for the planning and implementation of exploration activities. The EMP provides exploration standards and arrangements to ensure that the potential environmental and social impacts are mitigated, prevented and/or minimised as far as reasonably practicable, and that statutory requirements and other legal obligations are fulfilled.

1.3 THE PROPONENT OF THE PROPOSED PROJECT

The details of the proponent are set out in Table 1.

TABLE 1 - PROPONENTS DETAILS

CONTACT	POSTAL ADDRESS	EMAIL ADDRESS	TELEPHONE
VOTORANTIM METALS NAMIBIA (PTY) LTD Mr Eckhart Freyer	P O Box 2184, Windhoek, Namibia	efreyer@iway.na	+264 81 124 732

1.4 ENVIRONMENTAL CONSULTANCY

ECC, a Namibian consultancy (registration number Close Corporation 2013/11401), has prepared this scoping report and impact assessment on behalf of the proponent. ECC operates exclusively in the environmental, social, health and safety fields for clients across southern Africa, in both the public and private sectors. ECC is independent of the proponent and has no vested or financial interest in the proposed project, except for fair remuneration for professional services rendered.

All compliance and regulatory requirements regarding this EIA report should be forwarded by email or posted to the following address:

Environmental Compliance Consultancy

PO BOX 91193
Klein Windhoek, Namibia
Tel: +264 81 669 7608
Email: info@eccenvironmental.com

1.5 ENVIRONMENTAL LEGAL REQUIREMENTS

The Environmental Management Act, No.7 of 2007 stipulates that an environmental clearance certificate is required to undertake listed activities in terms of the Act and its regulations. Listed activities triggered by the project in terms of the Environmental Management Act, No. 7 of 2007 and its regulations are as follows:

TABLE 2 - LISTED ACTIVITIES TRIGGERED BY THE PROJECT

LISTED ACTIVITY	EIA SCREENING FINDING
FOREST ACTIVITIES 4. The clearance of forest areas, deforestation, timber harvesting or any other related activity that required authorisation in terms of the Forest Act, 2001 (Act No. 12 of 2001) or any other law.	<ul style="list-style-type: none"> ○ The proposed project may require limited vegetation clearing in bush encroached areas for access tracks and site camps. Specially protected plant species will not be cleared without approval from the competent authority.
WATER RESOURCE DEVELOPMENTS 8.1 The abstraction of groundwater or surface water for industrial or commercial purposes.	<ul style="list-style-type: none"> ○ Due to the drilling of exploration boreholes, the abstraction of groundwater is possible, although it is intended that water will be obtained from existing boreholes in the proposed project area.

LISTED ACTIVITY	EIA SCREENING FINDING
<p>MINING AND QUARRYING ACTIVITIES</p> <p>3.1 The construction of facilities for any process or activities which requires a licence, right or other forms of authorisation, and the renewal of a licence, right or other forms of authorisation, in terms of the Minerals (Prospecting and Mining Act), No. 33 of 1992.</p> <p>3.2 Other forms of mining or extraction of any natural resources whether regulated by law or not</p> <p>3.3 Resource extraction, manipulation, conservation, and related activities</p>	<ul style="list-style-type: none"> ○ The proposed project has obtained an EPL from MME; the proponent now requires an environmental clearance certificate from DEA/MEFT for the search of base and rare metals, industrial minerals and precious metals. ○ Soil and rocks will be sampled within selected target areas of the project area.

1.6 TERMINOLOGIES APPLIED IN THIS REPORT

This section provides definitions of key terms to enable the reader to form a technical understanding of the type of work associated with exploration programmes.

- **REMOTE SENSING** techniques in mineral exploration enable explorers to evaluate large areas of the earth remotely without having to undertake ground-based exploration operations. Remote sensing may be used to map the geology and structure that potentially localise the ore deposits, or may be used to identify rocks, which have been hydrothermally altered. Remote sensing involves the use of aircraft and satellite-based equipment to obtain the data to record spectral data from the surface of the earth. Remote sensing includes a number of tools and techniques including geographical information systems, radar and sonar. Typically, satellites or a high-flying aircraft are used in the data collection process. It is a useful tool when searching for minerals and can give an indication of where deposits could be located. Remote sensing aids in narrowing down the field survey area and helps to identify target areas that may be considered for mapping.
- **AIRBORNE GEOPHYSICAL SURVEYS**, using magnetic, radiometric and electromagnetic techniques, are a key aspect in mineral exploration, enabling explorers to probe under cover, mapping geology and structure, including potentially direct identification of mineral deposits. Modern surveys are flown at a low level in a grid pattern, adhering fully to the safety margins prescribed by the Civil Aviation Authority (CAA) of Namibia.
- **GEOLOGICAL MAPPING** of outcrops is used to describe the primary lithology and morphology of rock bodies as well as age relationships between rock units. Mapping is a crucial part of refining subsurface targets, as it provides structural information and can be used to predict the subsurface geology. This will be conducted concurrently with the geochemical sampling.
- **GEOCHEMICAL SAMPLING** (soil and rock sampling) is a non-invasive technique to determine the existence and extent of mineralization and a potential resource. Geochemical data are used to focus on areas of higher mineral potential as the project advances and help to define drill targets. They assist the company to drill more selectively and thereby increase the chances of intersecting mineralised zones during exploration and reduce the overall footprint of exploration and

environmental impact in the area. Geochemical surveys will be the first ground exploration method to be undertaken by the proponent in the licence area.

SAMPLING - Selecting a fractional but representative part of the soil or rock for analysis.

- **GEOPHYSICAL GROUND SURVEYS**, including magnetic, Induced Polarization (IP) and Electromagnetic (EM) techniques, will be undertaken, as appropriate, to collect data that give an indication of essential rock properties, particularly at depth. They are also used to map the geological structures. IP surveys involve sending electrical currents into the ground, measured via electrodes along linear cut-lines up to 3 km long to provide access to electrical cables. Small holes in the ground (0.2m x 0.2m x 0.3m) will be required for IP electrodes every 25 or 50m along a survey line. Copper sulphate solution will be used to improve the conduction of electrodes during the IP survey. The majority of EM techniques are completely non-invasive, and operate by sending electromagnetically induced currents into the ground. EM surveys are conducted along the same linear traverse lines. A variation is the Audio-Magneto Telluric (AMT) technique, in which surveys utilize the same lines and small holes in the ground, but without the application of high voltage electrical currents.
- **RAB DRILLING** (Rotary Air Blast drilling) is an open-hole technique that injects compressed air down the drill pipe and recovers the drill-chip fragments, on the outside of the drill stem.
- **DIAMOND DRILLING** entails the use of a diamond-studded drill in order to obtain core samples of two cm or more in diameter. Bio-degradable drill additives will be used during diamond core drilling. Soil, rock and drill core samples will be temporarily stored at the site office. Exploration activities are usually undertaken in phases, with periods of no field activity between them, whilst awaiting analytical results, and the integration and interpretation of data to decide on the next phase of exploration.

2 APPROACH TO THE IMPACT ASSESSMENT

2.1 PURPOSE OF THE ENVIRONMENTAL IMPACT ASSESSMENT

The aim of this assessment is to determine which impacts are likely to be significant (the main focus of the assessment); scope the available data and any gaps which need to be filled; determine the spatial and temporal scope; and identify the assessment methodology.

Scoping of the EIA was undertaken by the ESIA team. The scope of the assessment was determined through undertaking a preliminary assessment of the proposed project against the receiving environment obtained through a desk-top review, available site-specific literature, monitoring data and site reports.

ECC's terms of reference for the assessment is strictly to address potential effects, whether positive or negative and their relative significance, explore alternatives for technical recommendations and identify appropriate mitigation measures.

2.2 THE ASSESSMENT PROCESS

The EIA methodology applied here has been developed using the IFC standards and models (IFC, 2012; 2017), in particular Performance Standard 1: *'Assessment and management of environmental and social risks and impacts'* which establishes the importance of:

- Integrated assessment to identify the environmental and social impacts, risks, and opportunities of projects;
- Effective community engagement through disclosure of project-related information and consultation with local communities on matters that directly affect them; and
- The client's management of environmental and social performance throughout the life of the project.

Furthermore, the Namibian Draft Procedures and Guidance for EIA and EMP (GRN, 2008) as well as the international and national best practice documents to our disposal and over 25 years of combined EIA experience, were also drawn upon in the assessment process.

This impact assessment is a formal process in which the potential effects of the project on the biophysical, social and economic environments are identified, assessed and reported, so that the significance of potential impacts can be taken into account when considering whether to grant approval, consent or support for the proposed project. The process followed through the basic assessment is illustrated in Figure 2 and detailed further in the following sections.

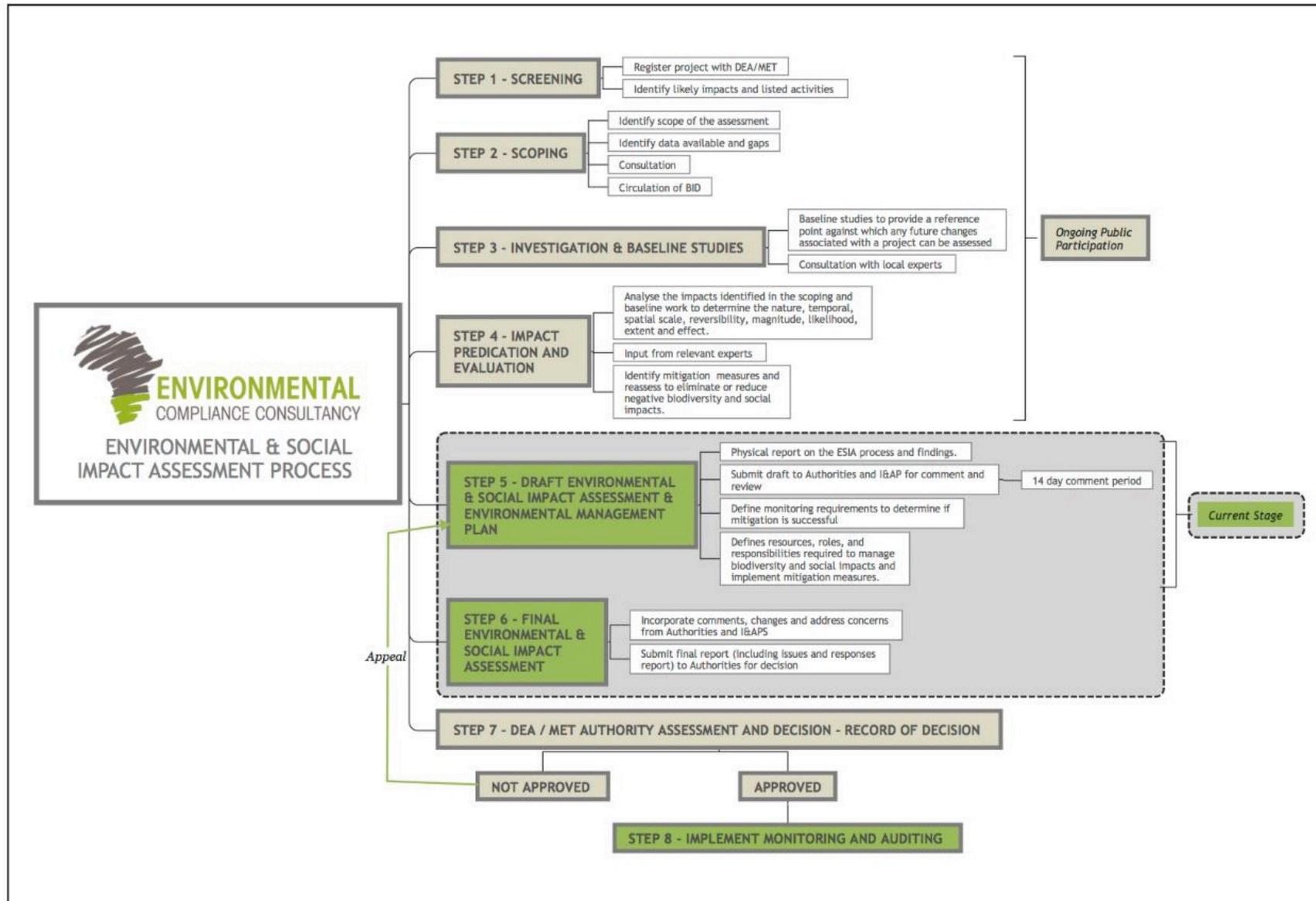


FIGURE 2 - ECC SCOPING PROCESS

2.3 SCREENING OF THE PROPOSED PROJECT

The first stages of the EIA process are to register the project with the competent authority and undertake a screening exercise. The screening exercise determines whether the proposed project is considered as a Listed Activity in terms of the Environmental Management Act, No. 7 of 2007 and associated regulations, and if significant impacts may arise. The location, scale and duration of project activities will be considered against the receiving environment.

It was concluded that an EIA (e.g. scoping report and EMP) is required, as the proposed project is considered as a listed activity and there may be potential for significant impacts to occur.

2.4 SCOPING OF THE ENVIRONMENTAL ASSESSMENT

Where an ESIA is required, the second stage is to scope the assessment. The main aims of this stage are to determine which impacts are likely to be significant (the main focus of the assessment); scope the available data and any gaps which need to be filled; determine the spatial and temporal scope; and identify the assessment methodology.

The screening phase of the project is a preliminary analysis to determine ways in which the project may interact with the biophysical, social and economic environment. Impacts that are identified as potentially significant during the screening and scoping phases are taken forward for further assessment in the ESIA process. The details and outcome of the screening process are discussed further in sections 6 and 7.

Subsequently, scoping of the ESIA was undertaken by the EIA team. The scope of the assessment was determined through undertaking a preliminary assessment of the proposed project against the receiving environment obtained through a high-level desktop review. Feedback from consultation with the client and stakeholders also informed this process.

The following environmental and social topics and subtopics were scoped into the assessment:

SOCIO-ECONOMIC ENVIRONMENT

- Limited goods and services procurement within the local economy.

BIOPHYSICAL ENVIRONMENT

- Dust emissions
- Soil and geology
- Terrestrial ecology
- Terrestrial biodiversity (including fauna and flora)
- Groundwater (potential cumulative impact). Water management suggestions are contained in the EMP.

The following topic was scoped out of the EIA, as no likely significant impacts are predicted as the proposed project poses little to no change from the current baseline, therefore are not discussed further in this report.

- Heritage: A desktop review of the general EPL area has not revealed any site of interest with a heritage connotation to it. The EMP does however contain a Standard Operating

Procedure (SOP) called a “chance-find” procedure to be utilised in the unlikely event of a possible archaeological find.

2.5 BASELINE STUDIES

Baseline studies are undertaken as part of the scoping stage, which involves collecting all pertinent information from the current status of the receiving environment. This provides a baseline against which changes that occur as a result of the proposed project can be measured.

For the proposed project, baseline information was obtained through a desktop study, focussing on environmental receptors that could be affected by the proposed project, verified through site-specific information. The baseline information is covered in Section 5.

A robust baseline is required in order to provide a reference point against which any future changes associated with a project can be assessed, and it allows for suitable mitigation and monitoring actions to be identified.

The existing environment and social baseline for the proposed project were collected through various methods:

- Desk-top studies
- Consultation with stakeholders, and
- Engagement with Interested and Affected Parties (I&APs). See Appendix C.

2.6 IMPACT IDENTIFICATION AND EVALUATION

Impact identification and evaluation involves predicting the possible changes to the environment as a result of the development/project. The ECC methodology was applied to determine the magnitude of an impact and whether or not the impact was considered significant and thus warrant further investigation. The impact prediction and evaluation methodology used is presented in Section 6 of this report. The findings of the assessment are presented in Section 7.

2.7 EIA CONSULTATION

Public participation and consultation are a requirement in terms of Section 21 of the Environmental Management Act, No. 7 of 2007 and its regulations for a project that requires an environmental clearance certificate. Consultation is a compulsory and critical component in the EIA process, aimed at achieving transparent decision-making, and can provide many benefits.

The objectives of the stakeholder engagement process are to:

- Provide information on the project to I&APs: introduce the overall concept and plan;
- Clarify responsibility and regulating authorities;
- Listen to and understand community issues, concerns and questions;
- Explain the process of the EIA and timeframes involved; and
- Establish a platform for ongoing consultation.

2.7.1 INTERESTED AND AFFECTED PARTIES

All relevant authoritative bodies were identified and listed as I&APs, as well as organisations and individuals with an implied interest. Other I&APs were identified through invitations such as the newspaper advertisements and site notices. To all of these stakeholders a formal letter was sent. The letter and the list of registered I&APs are provided in Appendix C.

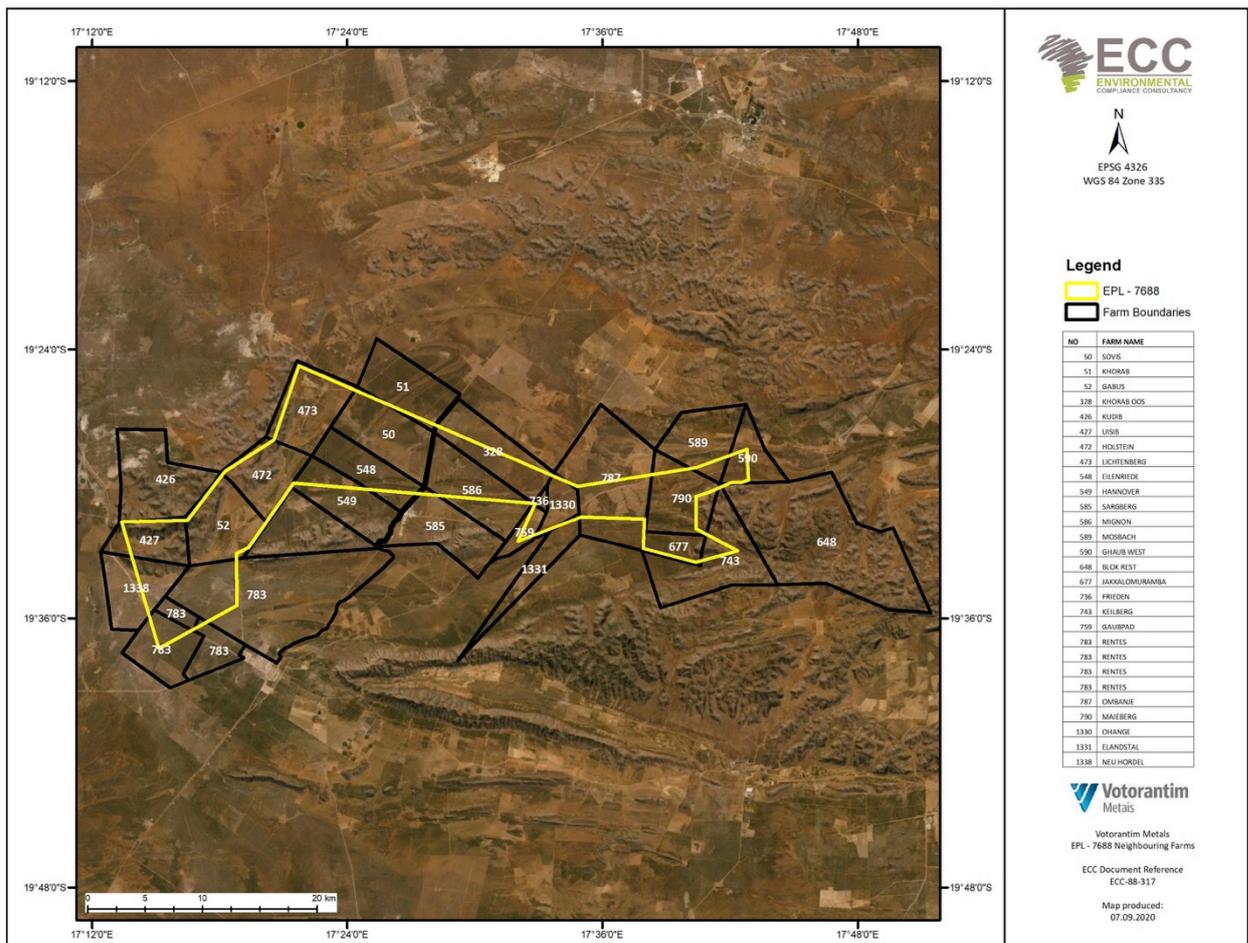


FIGURE 3 - LOCATION OF EPL 7688 RELATIVE TO NEIGHBOURING FARMS

2.7.2 NON-TECHNICAL SUMMARY

The Non-Technical Summary (NTS) presents a high-level description of the proposed project; sets out the EIA process and when and how consultation is undertaken; and provides contact details for further project-specific inquiries to all registered I&APs. The NTS was distributed to registered I&APs and the NTS can be found in Appendix B.

2.7.3 NEWSPAPER ADVERTISEMENTS

Notices regarding the proposed project and associated activities were circulated in three newspapers namely the 'Republikein, Sun, and Allgemeine Zeitung' on the 21st and 28st September 2020 (see Appendix C). The purpose of this was to commence the consultation process by informing the public about the project and enabling I&APs to register any comments and interest raised for the project.

2.7.4 SITE NOTICES

A site notice ensures neighbouring properties and stakeholders are made aware of the proposed project. The notice was set up at the boundary of the EPL as illustrated in Appendix C.

2.7.5 CONSULTATION FEEDBACK

The I&APs were encouraged to provide constructive input during the consultation periods. Matters of concern raised during the initial round of consultation are presented in Appendix C.

The public review period of the scoping report and the EMP is set between 12 -19 November 2020. Any comments received on the draft reports will be included and addressed, where applicable, in the final documentation.

2.8 DRAFT EIA AND EMP

This report and EMP for the project's environmental clearance includes an assessment of the biophysical and social environment, which satisfies the requirements of Step 5 (Figure 2).

The EIA report documents the findings of the assessment process, provides stakeholders with the opportunity to comment and continued consultation and forms part of the environmental clearance application. The EMP provides measures to manage the environmental and social impacts of the proposed project and outlines specific roles and responsibilities to fulfil the plan.

This EIA report focuses on the significant impacts that may arise from the proposed project as described in Step 4 (Figure 2). These impacts are discussed in Chapter 7.

This EIA report will be made available to stakeholders and I&APs for consultation for a period of 7 days (12/11/2020 – 19/11/2020), meeting the mandatory requirement of 7 days as set out in the Environmental Management Act, No. 62 of 2007 and its Environmental Impact Assessment Regulations, No. 30 of 2012. The aim of this stage is to ensure all stakeholders and I&APs have the opportunity to provide final comments on the assessment process and findings and register their concerns.

2.9 FINAL EIA AND EMP

The final EIA report and associated appendices will be available to all stakeholders on the ECC website www.eccenvironmental.com. All I&APs will be informed via email. The EIA report and

appendices will be formally submitted to the Office of the Environmental Commissioner, DEA as part of the application for an environmental clearance certificate.

2.10 AUTHORITY ASSESSMENT AND DECISION MAKING

The Environmental Commissioner in consultation with other relevant authorities will assess if the findings of the EIA presented in the EIA report is acceptable. If deemed acceptable, the Environmental Commissioner will revert to the proponent with a record of decision and any recommendations.

2.11 MONITORING AND AUDITING

In addition to the EMP being implemented by the proponent, a monitoring strategy and audit procedure will be determined by the proponent and competent authority. This will ensure key environmental receptors are monitored over time to establish any significant changes from the baseline environmental conditions caused by project activities.

3 REGULATORY FRAMEWORK

This chapter outlines the regulatory framework applicable to the proposed project. Table 4 provides a list of applicable legislation and the relevance to the project. An environmental clearance is required for any activity listed as per Government Notice No 29 of 2012 of the EMA.

3.1 NATIONAL LEGISLATION

TABLE 3 - LEGAL COMPLIANCE

NATIONAL REGULATORY REGIME	SUMMARY	APPLICABILITY TO THE PROJECT
Constitution of the Republic of Namibia of 1990	<p>The Constitution of the Republic of Namibia, 1990 clearly defines the country’s position in relation to sustainable development and environmental management. The constitution refers that the state shall actively promote and maintain the welfare of the people by adopting policies aimed at the following:</p> <p><i>“Maintenance of ecosystems, essential ecological processes and biological diversity of Namibia and utilization of living natural resources on a sustainable basis for the benefit of all Namibians, both present, and future; in particular, the government shall provide measures against the dumping or recycling of foreign nuclear and toxic waste on Namibian territory.”</i></p>	<p>The proponent is committed to engage the local community for the proposed project by providing local jobs as well as, exploring ways of finding rich recourses to that could contribute to the mining sector in Namibia.</p>
Minerals (Prospecting and Mining) Act, No. 33 of 1992	<p>Provides for the reconnaissance, prospecting and mining for, and disposal of, and the exercise of control, minerals in Namibia.</p> <p>Section 50 (i) requires <i>“an environmental impact assessment indicating the extent of any pollution of the environment before any prospecting operations or mining operations are being carried out and an estimate of any pollution, if any, likely to be caused by such prospecting operations or mining operations”</i></p> <p>Section 50 sets out that in addition to any term and condition contained in a mineral agreement and any term and condition contained in any mineral licence, it shall be a term and condition of any mineral licence that the holder of such mineral licence shall:</p> <p>Exercise any right granted to him or her in terms of the provisions of this Act reasonably and in such manner that the rights and interests of the owner of any land to which such licence relates are not adversely affected, except to the extent to which such owner is compensated.</p> <p>Section 52 sets out that the holder of a mineral</p>	<p>The proposed activity is prospecting for minerals; hence it requires an EIA to be carried out as it triggers listed activities in the Environmental Management Act and its regulations. This report presents the findings of the EIA.</p> <p>Works shall not commence until all conditions in the Act are met, which includes an agreement with the landowners and conditions of compensation have been agreed.</p> <p>The project shall be compliant with Section 76, with regards to records, maps, plans and financial statements, information, reports, and returns submitted.</p> <p>As the proponent will need to access privately owned land the proponent will ensure Sections 50 and 52 are complied with.</p>

NATIONAL REGULATORY REGIME	SUMMARY	APPLICABILITY TO THE PROJECT
	<p>licence shall not exercise any rights conferred upon such holder by this Act or under any terms and conditions of such mineral licence</p> <p>(a) In, on or under any private land until such time as such holder.</p> <p>(i) Has entered into an agreement in writing with the owner of such land containing terms and conditions relating to the payment of compensation, or the owner of such land has in writing waived any right to such compensation and has submitted a copy of such agreement or waiver to the Commissioner.</p>	
<p>Environmental Management Act, (No. 7 of 2007) and its regulations, including the Environmental Impact Assessment Regulation, 2007 (No. 30 of 2012)</p>	<p>The Act aims to promote sustainable management of the environment and the use of natural resources by establishing principles for decision-making on matters affecting the environment.</p> <p>It sets the principles of environmental management as well as the functions and powers of the minister. The Act requires certain activities to obtain an environmental clearance certificate prior to project development. The Act states an EIA may be undertaken and submitted as part of the environmental clearance certificate application.</p> <p>The MEFT is responsible for the protection and management of Namibia’s natural environment. The Department of Environmental Affairs under the MEFT is responsible for the administration of the EIA process.</p>	<p>This environmental scoping report (and EMP) documents the findings of the environmental assessment undertaken for the proposed project, which will form part of the environmental clearance application. The assessment and report have been undertaken in line with the requirements under the Act and associated regulations.</p>
<p>Water Act, No. 54 of 1956</p>	<p>Although the Water Resources Management Act, No 11 of 2013 has been billed, but not promulgated, it cannot be enacted as the regulations have not been passed – so the Water Act 54 of 1956 is still in effect. This act provides for <i>“the control, conservation and use of water for domestic, agricultural, urban and industrial purposes; to make provision for the control, in certain respect and for the control of certain activities on or in water in certain areas”</i>.</p> <p>The Department of Water Affairs within the Ministry of Agriculture Water and Land Reform (MAWLR) is responsible for the administration of the act.</p> <p>The Minister may issue a permit in terms of regulations 5 and 9 of the government notice R1278 of 23 July 1971 as promulgated under section 30 (2) of the Water Act no. 54 of 1956, as amended.</p>	<p>The Act stipulates obligations to prevent pollution of water. Should wastewater be discharged, a permit is required. The EMP sets out measures to avoid polluting the water environment.</p> <p>Measures to minimise potential groundwater and surface water pollution are contained in the EMP.</p> <p>Abstraction of water from boreholes requires an abstraction permit. Abstraction rates need to be measured and reported to the authorities in accordance with the requirements of this legislation. In addition, annual reporting on the environmental impacts of water</p>

NATIONAL REGULATORY REGIME	SUMMARY	APPLICABILITY TO THE PROJECT
		<p>abstraction is recommendable. Should the project require drilling and abstraction of water from underground sources, an application should be submitted to the authorities.</p>
<p>Soil Conservation Act, No. 76 of 1969) and the Soil Conservation Amendment Act, No. 38 of 1971)</p>	<p>Makes provision for the prevention and control of soil erosion and the protection, improvement and the conservation, improvement and manner of use of the soil and vegetation.</p>	<p>This will be taken into consideration during the intention of the works to be undertaken within the EPL 7688 site. Measures in the EMP set out methods to avoid soil erosion.</p>
<p>The Forestry Act, No. 12 of 2001 as amended by the Forest Amendment Act, No. 13 of 2005</p>	<p>Section 22 requires a permit for the cutting, destruction or removal of vegetation that are classified under rare and or protected species; clearing the vegetation on more than 15 hectares on any piece of land or several pieces of land situated in the same locality which has predominantly woody vegetation; or cut or remove more than 500 cubic metres of forest produce from any piece of land in a period of one year.</p>	<p>The planned project activities will include minimal vegetation clearing to support exploration activities. The necessary permit should be obtained from the MEFT, where the application should satisfy that the cutting and removal of vegetation will not interfere with the conservation of soil, water or forest resources.</p>
<p>National Heritage Act, No. 27 of 2004.</p>	<p>The Act provides provision of the protection and conservation of places and objects with heritage significance. Section 55 stipulates that exploration companies must report any archaeological findings to the National Heritage Council after which a heritage permit needs to be issued</p>	<p>There might be potential for heritage objects to be found on site, therefore the stipulations in the Act have been taken into consideration and are incorporated into the EMP. Section 55 compels exploration companies to report any archaeological findings to the National Heritage Council after which a permit needs to be issued before the find can be disturbed. In cases where heritage sites are discovered the 'chance find procedure' will be used</p>

TABLE 4 - NATIONAL POLICIES

NATIONAL REGULATORY REGIME	SUMMARY	APPLICABILITY TO THE PROJECT
Vision 2030	<p>Vision 2030 sets out the nation’s development programmes and strategies to achieve its national objectives. It sets out eight themes to realise the country’s long-term vision.</p> <p>Vision 2030 states that the overall goal is to improve the quality of life of the Namibian people to a level in line with the developed world.</p>	<p>The planned project shall meet the objectives of Vision 2030 and shall contribute to the overall development of the country through continued employment opportunities.</p>
The Fifth National Development Plan (NDP5)	<p>NDP5 is the fifth in the series of seven five-year national development plans that outline the objectives and aspiration of Namibia’s long-term vision as expressed in Vision 2030. NDP5 is structured on the pillars of economic progression, social transformation, environmental sustainability and good governance. Under the social transformation pillar is the goal of improved education.</p>	<p>The planned project supports meeting the objectives of NDP5 by creating specialised or skilled opportunities for employment to the nearby community and the Namibian nation.</p>
Minerals Policy	<p>The Minerals Policy was adopted in 2002 and sets guiding principles and direction for the development of the Namibian mining sector while communicating the values of the Namibian people. It sets out to achieve several objectives in line with the sustainable development of Namibia’s natural resources. The policy strives to create an enabling environment for local and foreign investments in the mining sector and seeks to maximise the benefits for the Namibian people from the mining sector while encouraging local participation, amongst others.</p> <p>The objectives of the Minerals Policy are in line with the objectives of the Fifth National Development Plan that include reduction of poverty, employment creation and economic empowerment in Namibia.</p>	<p>The objectives of the Minerals Policy are in line with the objectives of the NDP5, i.e. reduction of poverty, employment creation, and economic empowerment in Namibia. The proposed project conforms to the policy, which has been considered through the EIA process and the production of this report.</p>
Labour Act, No. 11 of 2007	<p>The Labour Act, No. 11 of 2007 (Regulations relating to the Occupational Health & Safety provisions of Employees at Work promulgated in terms of Section 101 of the Labour Act, No. 6 of 1992 - GN156, GG 1617 of 1 August 1997)</p>	<p>The proposed project will comply with stringent health and safety policies, including the compulsory use of specific PPE in designated areas to ensure adequate protection against health and safety risks. Proper storage and labelling of hazardous substances are required. The project will ensure employees in charge of and working with hazardous substances need to be</p>

NATIONAL REGULATORY REGIME	SUMMARY	APPLICABILITY TO THE PROJECT
		aware of the specific hazardous substances in order not to compromise worker and environmental safety.

3.2 PERMITS AND LICENCES

3.2.1 EXCLUSIVE PROSPECTING LICENCE

The EPL 7688 was granted on the 01st of June 2020 and expires on the 31st of March 2023. In terms of the Minerals (Prospecting and Mining) Act, No. 33 of 1992, an EPL may be renewed, however, it may only be extended twice for two-year periods if demonstrable progress is shown. Renewals beyond seven years require special approvals from the Minister MME, 2018.

Such renewals are subject to a reduction in the size of the EPL. When a company applies for renewal of an EPL, the application must be lodged 90 days prior to the expiry date of the EPL or, with good reason, no later than the expiry date (MET & MME, 2018).

If renewal is applied for, the MME must review the renewal application and make any comments and/or recommendations for consideration by the Minerals (Prospecting and Mining Rights) Committee (MPMRC). Amendments and revisions may be required for the EIA and EMP. Due consideration must be given when renewing the licence to ascertain whether there is justification to renew the licence. Once an EPL expires and a new EPL is issued, even if it is to the previous holder, the full screening process must be followed with a full EIA process, before operations may commence (MET & MME, 2018).

The permits and license that may be relevant to the proposed projects are outlined in Table 6.

TABLE 5 - PERMITS AND LICENCES REQUIREMENTS

PERMIT AND LICENCES	RELEVANT AUTHORITY	VALIDITY/DURATION
WATER ABSTRACTION PERMITS	Ministry of Agriculture, Water and Land Reform	Permit dependent
EXCLUSIVE PROSPECTING LICENCE	Ministry of Mines and Energy - Windhoek	3 years
NOTICE OF INTENTION TO DRILL	Ministry of Mines and Energy - Windhoek	To be submitted prior to drilling

4 PROJECT DESCRIPTION

4.1 NEED FOR THE PROPOSED PROJECT

The mining sector in Namibia significantly contributes to the country's Gross Domestic Product (GDP), government tax receipts and export revenues. For this reason, exploration activities are encouraged in Namibia and the vision of the Minerals Policy being to "further attract investment and enable the private sector to take the lead in exploration, mining, mineral beneficiation and marketing" supports the development.

The proposed project is in line with this vision and has the potential to create employment in local communities in the Otjozondjupa Region. In the event that exploration activities are successful, and a resource can be defined, with commercially viable mineral concentrations, exploration operations can result in socio-economic development in the area.

4.2 ALTERNATIVES CONSIDERED

The proposed project has been subject to a process of design evolution, informed by both consultation and an iterative environmental assessment. In terms of the Environmental Management Act, No. 7 of 2007 and its regulations, alternatives considered should be analysed and presented in the scoping assessment and EIA report. This requirement ensures that during the design evolution and decision-making process, potential environmental impacts, costs, and technical feasibility have been considered, which leads to the best option(s) being identified.

Exploration activities range from extremely low impact exploration such as remote sensing from satellites to more invasive methods such as extensive close-spaced drilling. The methods used shall be determined, based on the exploration programme, which is further designed once more information and data is obtained. At this stage of the project, the exploration activities are yet to be finalised and therefore a range of options remain.

Once the exploration programme is further defined, the most suitable options and methods shall be identified to ensure the impacts on the environment and society are minimised.

4.2.1 NO-GO ALTERNATIVE

Should exploration activities within EPL 7688 not take place, the anticipated environmental impacts from exploration activities would not occur, however, the social and economic benefits associated with project would also not be materialized.

There would not be an opportunity to define resources within the project area, this would be a missed opportunity for geological mapping and data collection that would add to regional knowledge of Namibia's mineral wealth and, if found to be viable for mining, could benefit the Namibian economy.

4.3 PROPOSED EXPLORATION ACTIVITIES

The exploration activities on EPL 7688 will include some or all of the following methods: aerial or remote sensing, geological mapping, geochemical sampling, geophysical surveys and drilling. Details of these methods are described below. Ground-based exploration techniques are inevitable in the

search of base, rare and precious metals. Data obtained by remote-sensing data are also used to select target areas.

Diamond drilling and possible Rotary Air Blast (RAB) drilling may occur and the number of holes and aerial extent will be determined by the geochemical and geophysical anomalies obtained. AMT, IP and magnetic ground surveys shall be undertaken to measure chargeability, conductivity and magnetic susceptibility of the rocks.

Existing tracks shall be used as far as reasonably practical. In the event that new tracks are required they will be developed by hand or by use of a bulldozer, terrain dependent. Vegetation clearing will be limited to clearing for access tracks and site camps, should additional areas be cleared for exploration activities the Forest Act, No. 12 of 2001 and its regulations will be complied with (the relevant forestry permits will be applied for if required). Any established or large trees or specially protected plant species shall not be removed, and access tracks will be routed to avoid these wherever possible and permits will be obtained as necessary. Impacts and effects of the geochemical surveys and drilling programmes are likely to be low.

4.3.1 EXPLORATION SCHEDULE

The exploration activities are executed and managed from the Votorantim Exploration Office in Otavi. Field exploration activities, using techniques as discussed above, are anticipated to be carried out over the licence validity period. Remote sensing studies and planning phases for the prospecting programme will require 2-6 months. Geochemical sampling will be undertaken concurrently with geological mapping for approximately 2-6 months. Geophysical surveys will then be carried out over a period of about two (2) months after which the project will advance to reverse circulation or core drilling.

The duration of drilling programs is variable, and usually depends on the information that is gained from drilling. Applications for the environmental clearance certificate, along with all required permits will be submitted during this period should a renewal of the EPL be required.

4.3.2 EQUIPMENT AND MATERIALS

During the exploration phase double and single cab vehicles will be used to transport workers to, from and around the site. Field activities will be organized from Otavi. Contractor's camp infrastructure may include tents and chemical toilets, to be temporary set up on the site. A drill rig (track-mounted) will be brought to site for core drilling, along with a water truck and supporting equipment (rods truck, water and fuel bowsers, and RC compressor) for use during drilling. Drilling equipment, diesel fuel and consumables shall be brought to the exploration site to support exploration activities as and when needed.

4.3.3 WORKERS AND ACCOMMODATION

Four to eight possible job opportunities are foreseen during the exploration phase and workers will be sourced from the nearest towns such as Otavi and Otjiwarongo. The workers will be deployed at various stages of exploration including soil sampling, geological mapping, geophysical surveys and drilling operations.

It is envisaged that for most of the exploration programme workers will reside in Otavi and be transported to and from the site. The proponent will provide transport. However, during the latter part of the prospecting (drilling) workers may be required to stay at the exploration site in campsites or in existing housing rented from the property owner. The proponent shall provide suitable living facilities during this period.

4.3.4 WASTE MANAGEMENT

Water will be required for various uses including human consumption during the planned exploration activities and to support any of the exploration activities such as diamond drilling. The water will most likely be sourced from an existing water source on site, after permission has been obtained from the farm owner, of which they will be compensated for water usage. There is generally no shortage of water in the Otavi area. No water will be needed for the first stage of exploration (i.e. soil sampling), 1m³/day water will be required for geophysical surveys in the second stage of exploration and approximately a volume of 30m³ / day of water may be required for diamond drilling in the third stage of exploration.

Waste produced on site will include sewerage and solid waste such as packaging material. Wastewater (e.g. water with drill additives) used during drilling is recycled, contained and allowed to evaporate after use. The drill-sludge is disposed of at the Otavi municipal waste disposal site. In case of provision of the mobile toilets to be used on site, sewerage generated shall be managed by the toilet contractor. Wastewater that is discharged into the environment must comply with wastewater discharge specifications.

4.3.5 SITE REHABILITATION

Once exploration activities are completed the areas shall be rehabilitated to a condition as close to the original state as far as possible. Rehabilitation shall be determined during the exploration programme and shall be agreed with the landowners and authorities as implied by legislation (discussed in Section 3). Before and after photographs will be used to monitor rehabilitation success.

5 ENVIRONMENTAL AND SOCIAL BASELINE

5.1 INTRODUCTION

This section provides an overview of the existing biophysical environment through the analysis of the baseline data regarding the existing natural and socio-economic environment. Desktop studies on the national database are undertaken as part of the scoping stage to get information of the current status of the receiving environment. This provides a baseline where changes that occur as a result of the proposed project can be measured.

5.2 SITE AND SURROUNDING ENVIRONMENT

Otavi is located at the intersection of the B1, B8 and the C39 roads. The B1 connects Otavi with Otjiwarongo to the south and Oshivelo to the north. A number of district roads crisscross the Otjozondjupa Region, while a network of farm roads and tracks provide access to the EPL (Figure 4).

Otavi, is a small town that consists of approximately 5200 inhabitants in the Otjozondjupa Region, central Namibia. Otavi is governed by a town council, its economy relies on small businesses and many surrounding game/cattle farms, as well as on visitors passing through to the northern and southern parts of the country. Most of the area is dolomitic (Precambrian) and the district was in the past renowned for its mineral wealth. Located approximately 7 km south of Otavi, lies the Elefantenberg (elephant mountain), a mountain that is 1624 meters above sea level. Some nearby tourism attractions include the Gaub Caves and the Hoba Meteorite, which will not be affected by exploration activities (Info-Namibia, 2020).

EPL 7688 overlaps with 28 commercial farms (Figure 5). The farms have well-kept boundary fences with tracks, which can be used for access and movements during the exploration activities. The EPL lies in a region that receives higher annual rainfall than the rest of the country (more than 550 ml annually), which allows intensive agriculture. Despite the prominence of crop production the mineral importance of the Otavi Mountains dominates (Info-Namibia, 2020).

Pro-active communication between the proponent, farmers and neighboring property owners, need to be maintained when planning to access the EPL and to keep them updated on exploration activities.

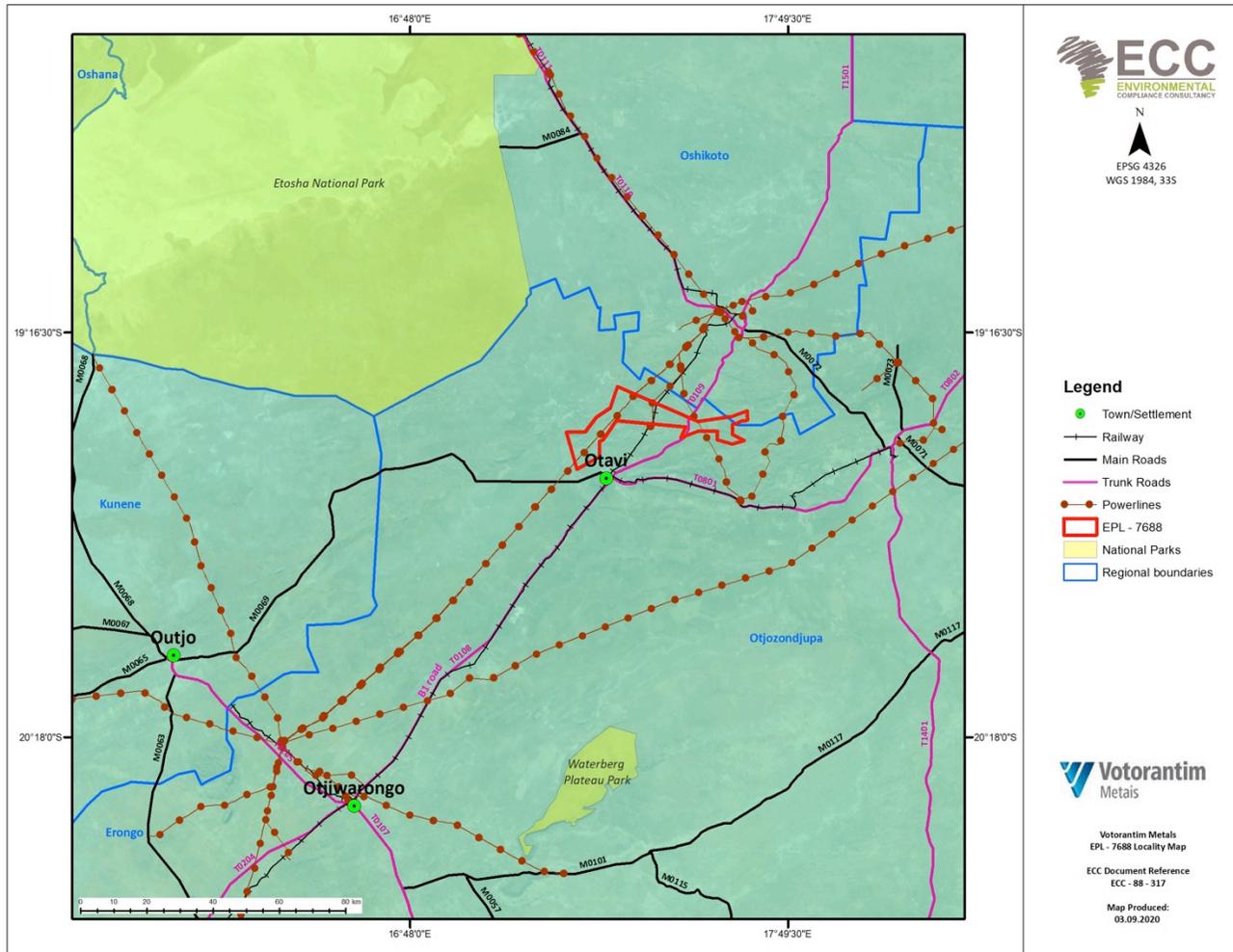


FIGURE 4 - ACCESSIBILITY MAP OF EPL 7688

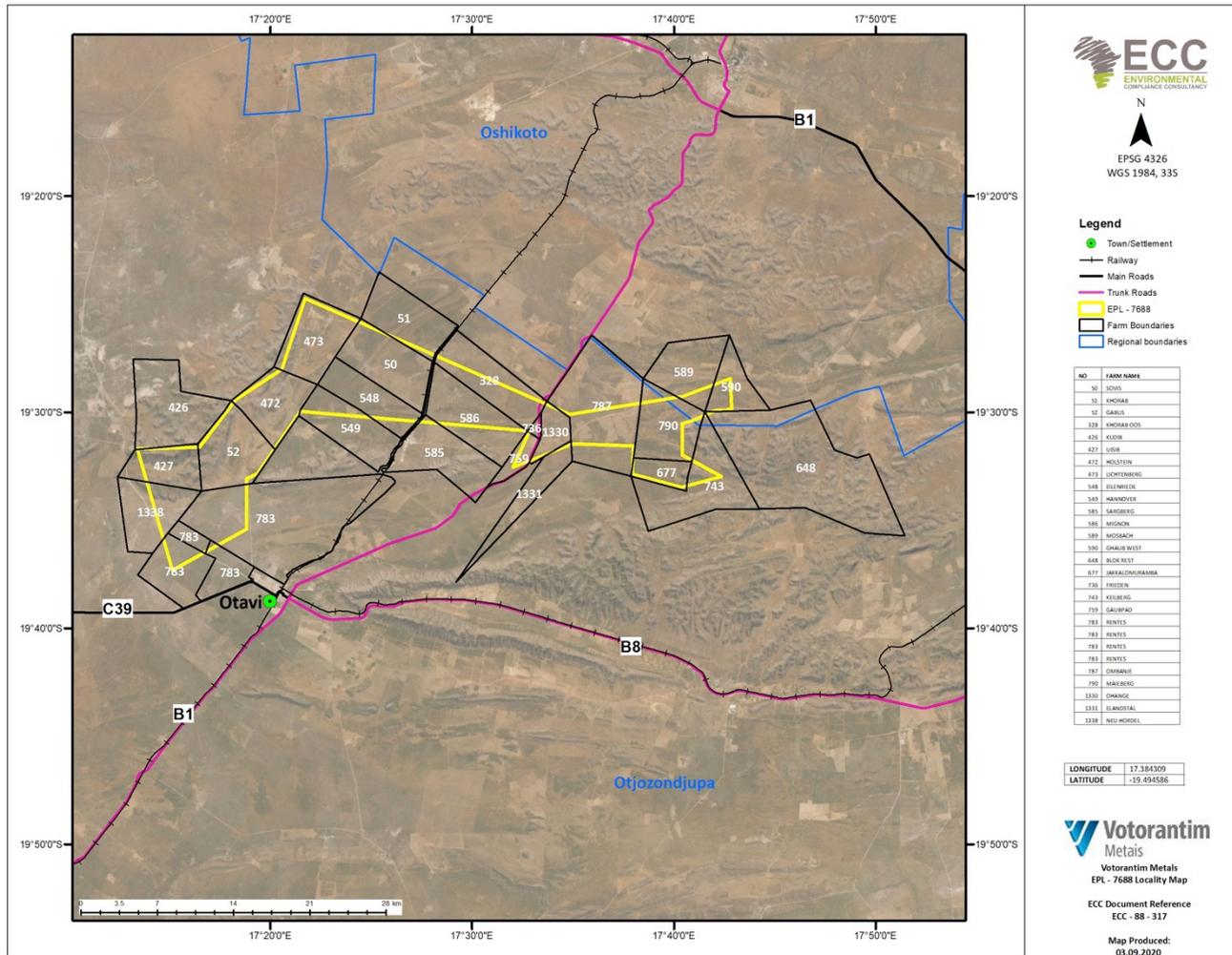


FIGURE 5 - LOCATION OF EPL 7688 RELATIVE TO NEIGHBOURING FARMS

5.3 CLIMATE

EPL 7688 is located in a part of Namibia which receives higher rainfall than the rest of the country, between 500 and 600 mm of rain per year, with a variation coefficient of less than 30%. Rainfall events are limited to the summer months, mainly between October and April, in the form of thunderstorms often associated with heavy downpours. Potential evaporation is between 1,680 and 1,820 mm per year, meaning an average water deficit of between 1,500 and 1,700 mm per year. Relative humidity is low, rarely more than 20% in winter but may reach 85% in summer before or after thunderstorm build-up. Maximum temperatures average around 32 - 34°C, mainly recorded during the afternoons between November and January, while minimum temperatures are around 6 - 8°C and are normally recorded during nights in June and July. Deviations from these averages are common, with the highest temperatures reaching 38 - 40°C and the lowest temperatures below 6°C. Occasional frost can occur (Mendelsohn et al., 2002).

Due to the rhythm of the pressure systems, the wind patterns over the interior remain fairly predictable. Prevailing wind over EPL 7688 is expected to be from the east and northeast, with occasional airflow from the southeast and southwest. Wind speed is expected to be low with more than two-thirds of the time lower than 2 m/s. The stronger air movements during the afternoons and evenings are the result of the ground being heated more in some places than others, in combination with the orographic effect of the mountains. During the winter months wind speed is slightly higher (Mendelsohn, et al., 2002).

Strong easterly winds blow for several days a year in Namibia, mainly in spring. These are known as Berg Winds. They are hot and dry and result in a considerable increase in fire hazard ratings.

Predominant wind direction is from the east, with an average wind speed of 1.6 mps (meters/second), and a calm of 22.2% (Figure 6) (Iowa State University, 2020).



[FYOW] Otjiwarongo
Windrose Plot
Time Bounds: 01 Sep 2017 01:00 PM - 22 Apr 2020 08:00 AM Africa/Windhoek

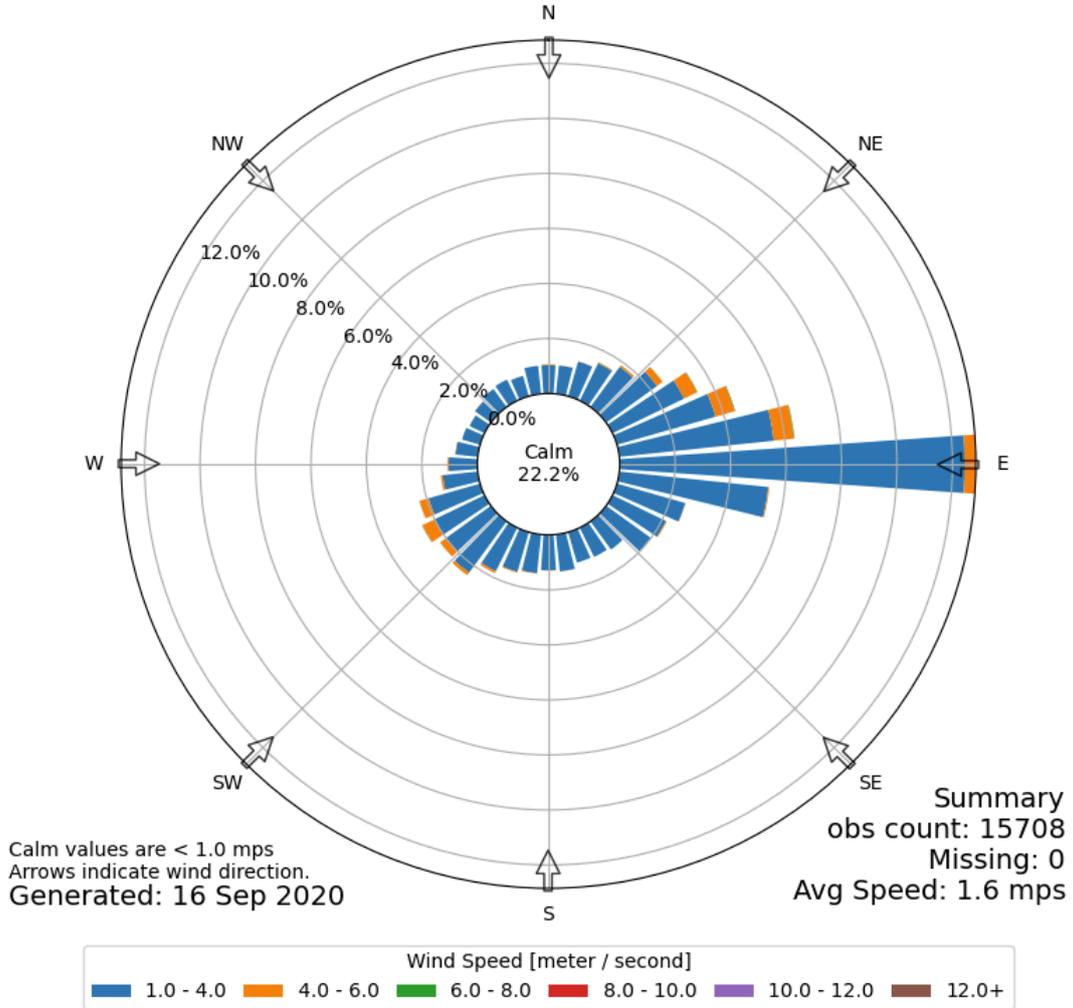


FIGURE 6 - PREVAILING WIND DIRECTION AND WIND SPEED IN THE AREA OF THE PROPOSED PROJECT (SOURCE: IOWA STATE UNIVERSITY, 2020).

5.4 GEOLOGY AND GEOMORPHOLOGY

The local geology of the entire EPL 7688 comprises units of the Otavi Group, which forms part of the Damara Supergroup (Figure 7). The Damara Supergroup covers the largest part of the northwest quarter of Namibia, and is oriented in a predominantly SW-NE direction with an extension into what is known as the Otavi Mountains (Mendelsohn et al, 2002).

The dolomites of the Otavi Group crop out in a series of east-west striking ridges that constitutes the Otavi Mountains. The origin of the Otavi Mountains is associated with the ancient sea between the Congo and Kalahari Cratons. Over millions of years a lime and dolomite rock mass of up to 5,000 m thick was formed, which was pressed upwards and folded intensely as the result of a gigantic collision between the two mainlands approximately 650 million years ago. Later the landscape was subject to a prolonged period of erosion, and only some of its higher parts preserved a mountainous character. The erosion affected the water-soluble limestones in particular, creating a karst landscape marked by several synclinal and anticlinal axes, and underlain by carbonate rocks (mainly silicified dolomites). Dissolution is common, creating cavities, caves and sinkholes, but because of the karst environment no surface run-off into rivers is possible.

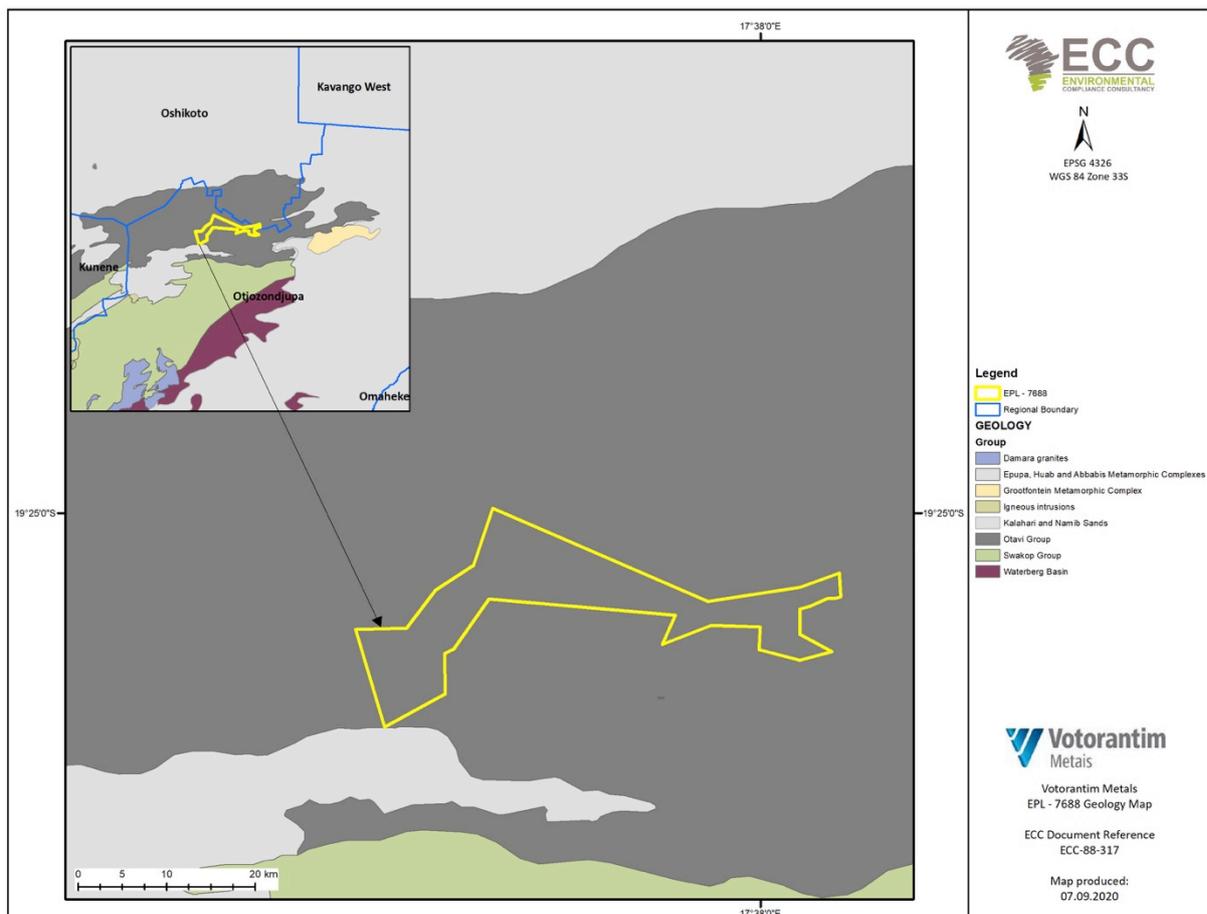


FIGURE 7 - EPL 7688 REGIONAL AND LOCAL GEOLOGY

5.5 TOPOGRAPHY AND SOIL

EPL 7688 is located on an elevation varying between 1,320 and 1,850 m above mean sea level (Figure 8). The landscape is mountainous with some sharp topographical contrasts. Generally there is a rise in elevation from west to east and from south to north, with the highest readings to the northeast of the EPL.

Topsoil is largely absent where the surface is covered with rocky outcrops, especially in the west and east with cambisols covering the largest part of the flatter central area (Figure 9). Mollic leptosols, typically associated with eroding hilly and undulating landscapes, is the dominant soil type near the mountainous areas, and also the southwest of the EPL. These soils are marked by a shallow soil profile (indicating little influence of soil-forming processes), and contain large amounts of gravel. Leptosols are coarse-textured, underlain by solid rock within 30 cm from the surface. The soil is thus poorly developed and thin, lacks appreciable quantities of accumulated clay and organic material and is susceptible to erosion during the rainy season, especially in the beginning of the rainy season when vegetation cover is sparse. As the topsoil is loose and thin, it is also susceptible to wind erosion, especially when the vegetation cover is sparse (Mendelsohn et al, 2002). The sources of dust associated with the proposed exploration activities are land clearing and creation of access road. These activities may have a minor impact on the neighboring community and the Ohorongo cement solar PV plant.

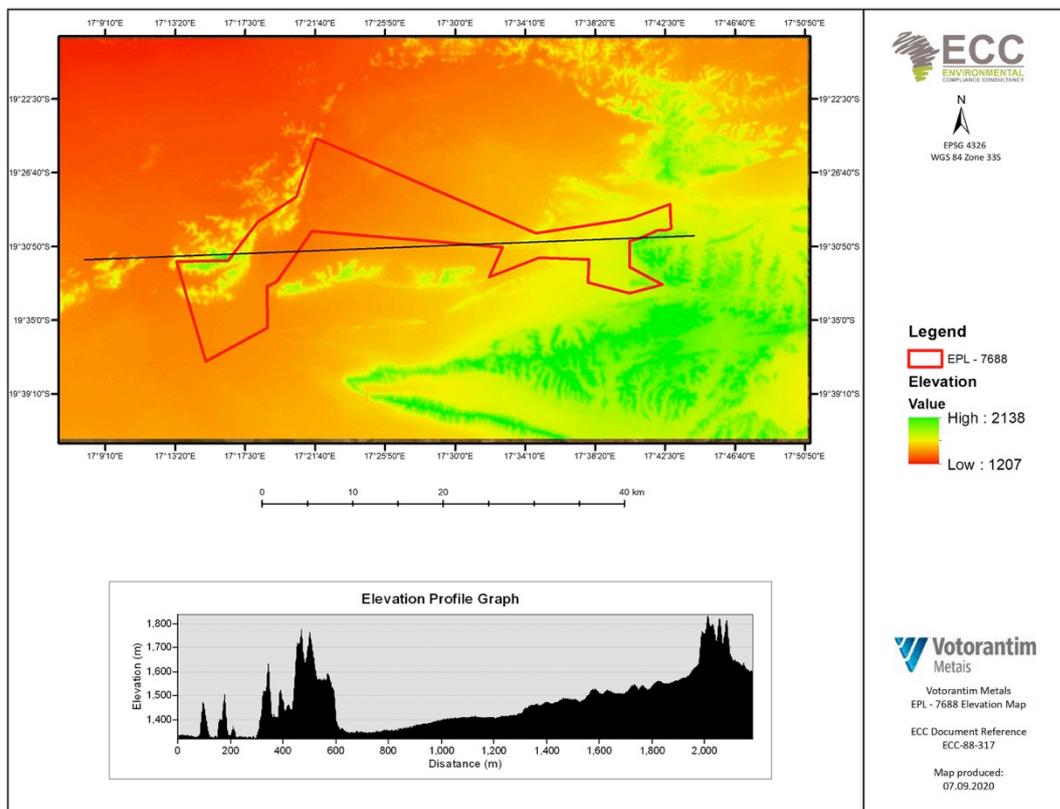


FIGURE 8 - ELEVATION PROFILE ALONG EPL 7688

Cambisols are of a dark yellow brown colour, loose and with an open texture and can have a thickness up to 1 m, but is often underlain by a near-surface hardpan to boulder-calcrete unit. These soils are recent and its parent material is only slightly weathered, therefore cambisols are characterised by an absence of appreciable quantities of accumulated clay and organic material. Fairly fertile, these soils have a good water-holding capacity and internal drainage (Mendelsohn et al, 2002). Although fine and silty, it occasionally contains coarse, medium and fine grained sub-rounded calcrete nodules. The hardpan is underlain by nodular or powder calcrete that varies in thickness.

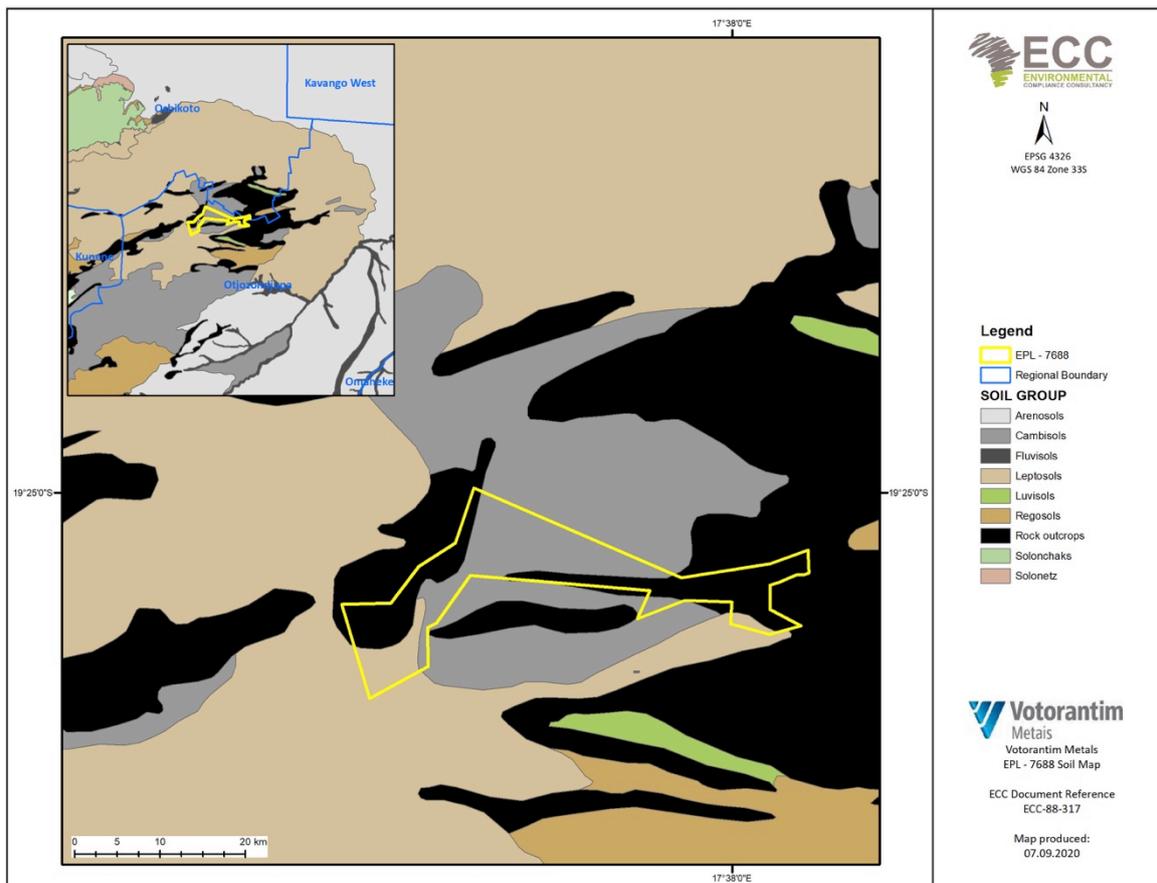


FIGURE 9 - EPL 7688 REGIONAL AND LOCAL SOIL MAP

5.6 HYDROLOGY

The Otavi Mountains form part of a karst landscape, which means that well-defined surface drainage systems are absent, or follow only short distances before surface water penetrates the surface. Although a drainage pattern can be identified, the flow of surface water is more defined by topographical valleys than the presence of streambeds. Many karst features occur in the Otavi Mountain Lands due to the solution of limestone and dolomite along joints and fractures that have provided a passage for water. Solution features can result in springs, where an underground “stream” intersects the ground surface, and caves. The nearest cave that is known to contain water is Aikab Hericenote, approximately 25km away from the Otavi area.

5.6.1 GROUNDWATER

The farms located within and nearby EPL 7688 obtain water from borehole abstraction. There are more than 30 boreholes within the EPL 7688 area. It is assumed that water will be obtained from some of these existing boreholes during the exploration activities. Considering the nature and scale of the proposed exploration, drilling is unlikely to impact groundwater. There is no water shortage around the project area, however, should the project require the drilling and abstraction of water from an additional borehole, an application must be submitted to the MAWLR.

5.6.2 GROUNDWATER FLOW

Groundwater flow in the area takes place mainly along fractures and contact zones within hard rock formations. Groundwater in the area flows in a northwesterly direction as inferred from historical groundwater data.

EPL 7688 is located partially in the Owambo Basin (north) and the Kunene South Groundwater Basin (south) (Figure 10). The general groundwater flow in the northern part is north while it is southeast in the southern part (Christelis and Struckmeier, 2001). The area is underlain by dolomites, which show a high potential of groundwater with an increased potential where fractures and faults occur on a local scale. The aquifer is also reliable, as it is frequently recharged and water quality is generally of a high standard (Mendelsohn et al., 2002).

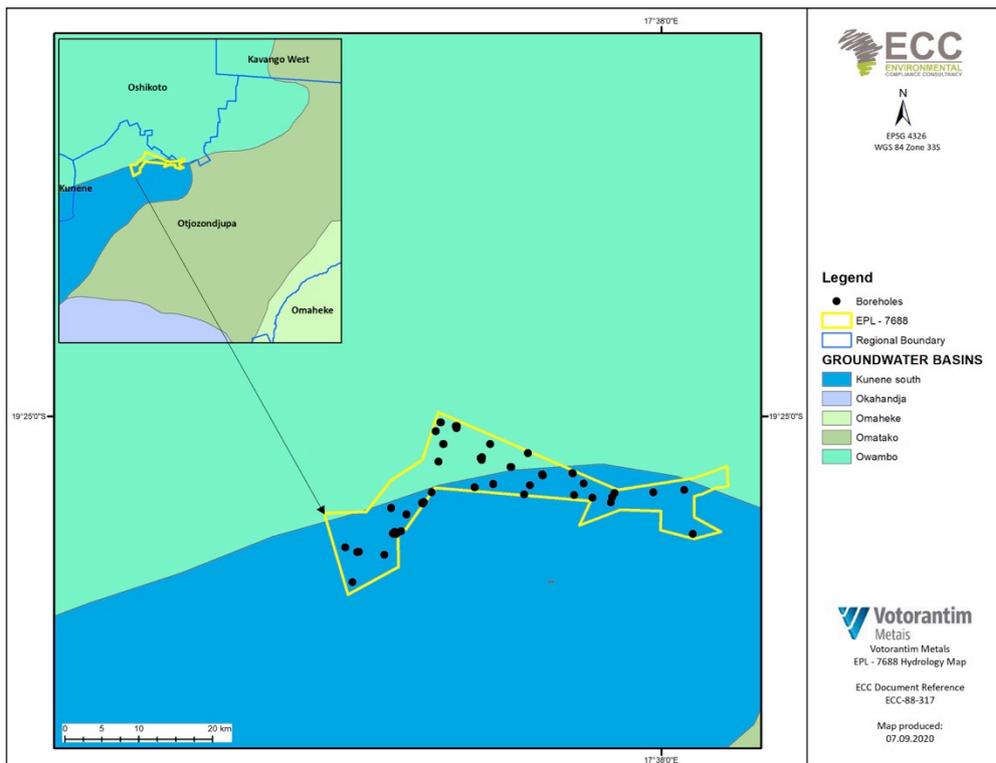


FIGURE 10 - HYDROLOGY MAP OF THE EPL 7688

5.7 BIODIVERSITY

5.7.1 VEGETATION

The Otavi Mountains are covered by the Karstveld vegetation type of the Acacia Tree-and-shrub Savanna Biome (Figure 11). It is broadly classified as a woodland, with vegetation dominated by relatively dense stands of woody shrubs and trees. In some places plant growth become progressively shrubby, especially where the soils are shallower, slopes are steeper and where it is more hilly and rocky (Mendelsohn et al, 2002). Most of the woody vegetation vary between 1 and 3m in height. Thorny Acacia species dominate but a number of species are closely associated with the higher elevations only. Thornbush thickets dominate on the sandy parts and calcrete-rocky parts.

The most important environmental variable affecting the vegetation is rain, but micro-habitat conditions and rangeland management practices determine bush density and grass composition. Grazing resources are made up of a wide variety of grass species, which vary widely in palatability and in their abundance. Large parts of the farmland on and around EPL 7688 are marked by bush encroachment, mainly as a result of long continuous periods of selective grazing by livestock. The encroachment has led to a decreased carrying capacity on many farms and the invader bush is managed in several ways as a result, one of which is the production of charcoal for export.

Plant diversity is estimated >500 species (Mendelsohn et al, 2002), although local differentiation as a result of topography and the availability of water is possible. This is the highest occurrence of plant diversity in Namibia, and some endemics, near-endemics and protected species occur. Biophysical baseline information does not accentuate the uniqueness of mountain vegetation and the diversity

of plants species may converge on relatively small areas in which there are several habitats and niches offered by micro-climate, elevation and sheltered spaces.

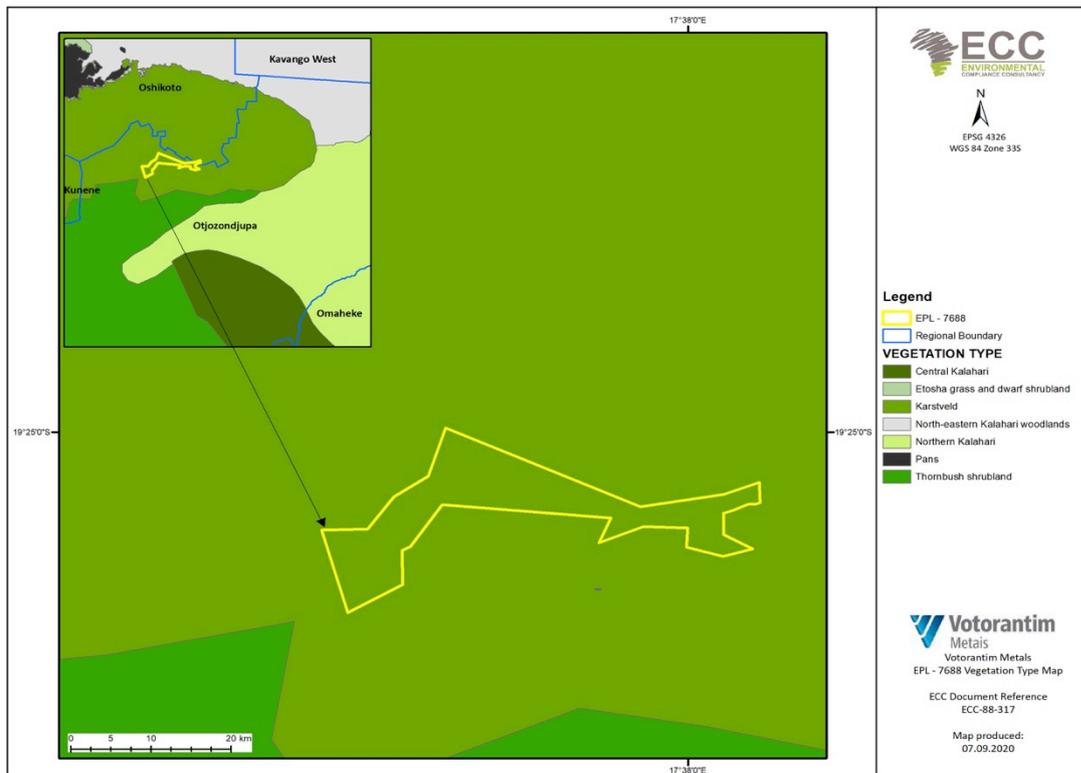


FIGURE 11 - EPL 7688 REGIONAL AND LOCAL VEGETATION MAP

5.7.2 FAUNA SPECIES

Overall terrestrial biodiversity of the Otavi Mountains ranges from medium to high. The number of mammal species ranges between 61 and 75, the number of bird species is between 201 and 230, with 71 – 80 reptile species, 12 – 15 frog species and 10 – 11 scorpion species that could be expected (Mendelsohn et al, 2002). High bird diversity reflects the presence of a greater range of habitats compared with surrounding areas. The vegetation of the Otavi Mountains in combination with the higher elevation support many birds that are absent from the surroundings. On a local scale it is expected that diversity increases with the increase in habitats, which is closely coupled to shelter, food and water availability and migration routes. The micro-climate associated with an increase in elevation plays a prominent role in this regard and is directly related to the increase in terrestrial diversity.

The dominant land use within and on the surroundings of the EPL is extensive agriculture, in particular large livestock farming and to a lesser degree crop production. For crop production some farmers apply irrigation, mainly to produce fresh vegetables, while some farmers rely on the higher rainfall to produce maize.

5.8 SOCIO-ECONOMIC BASELINE

The largest part of EPL 7688 is located in the Otjozondjupa Region with a tiny part located within the Oshikoto Region. Otjozondjupa is one of the bigger regions of Namibia and is located in the northern half of the country, bordering the Khomas and Omaheke regions in the south, the Erongo and Kunene regions in the west and the Oshikoto, Kavango-West and Kavango-East regions in the north. In the east the region stretches along the international border with Botswana. The Oshikoto Region includes a large part of the Etosha National Park to its west, and is bordered by the Omusati and Oshana regions in the west, the Ohangwena to the north and Kavango-West and Otjozondjupa regions to the east.

As the largest part of the EPL is located within the Otjozondjupa Region, most of the information covered in this section is relevant to the Otjozondjupa Region and discussed below.

5.8.1 DEMOGRAPHIC PROFILE

Namibia is one of the least densely populated countries in the world (2.8 person per km²). Vast areas of Namibia are without people, in contrast to some fairly dense concentrations, such as the central-north and along the Kavango River. Windhoek, the capital, functions as a primate city – not only is it the urban area with the biggest population, but the concentration of private and public head offices attracts Namibians from all parts of the country in search for a better life. National population growth rate is estimated at less than 2%, lower than most African countries. Namibia's population is young - although 57% falls in the age group 15 – 59, 37% of the total population is younger than 15 (NSA, 2017). Since 2005 there has been a steady improvement in life expectancy, currently estimated at 65 years. In 2018 it was estimated that 50% of all Namibians are urbanized, in other words living in an urban settlement (retrieved from www.worldpopulationreview.com). The last national census was conducted in 2011 and counted 2.1 million Namibians. An inter-censal demographic survey was conducted in 2016 and estimated the total population at 2.3 million (NSA, 2017).

The population density of the Otjozondjupa Region, where the project is located, is low (1.5 persons per km²) when compared to the national average, and the current total population of the region was estimated at 154,342 in 2016 (NSA, 2017). In 2011 the population of Otjiwarongo was 28,249 and with a generalized urbanization growth rate of 4.0% the current estimated population is estimated to be 40,200 residents. Otavi is smaller, recording only 5,200 residents in 2011 and an estimated population of 7,400 in 2020. Kombat, at its peak, had over 1,000 residents. As of 2015 the settlement is almost abandoned. Functional services include a primary school, which operates at a reduced capacity, and a clinic. Grootfontein had a population of 23,793 in 2011 and with the generalized urbanization growth rate of 4.0% the current estimated population is estimated to be 33,864 residents.

5.8.2 GOVERNANCE

Namibia is divided in 14 regions, subdivided by 121 constituencies. Otjozondjupa Region is divided into seven constituencies. Each region has a regional council, elected during regional elections per constituency. Towns are governed through local authorities, in the form of municipalities.

The population density of the Otjozondjupa Region is much lower than the national average and the current total population of the region is projected at 160,100 (retrieved from www.citypopulation.de). Otjiwarongo is the capital and also the largest town of the Otjozondjupa Region. Many of the region's head offices are located in the town. Other towns of the region are Grootfontein, Otavi, and Okakarara.

Relevant to EPL 7688 the two closest towns, Otavi and Otjiwarongo, are governed through local authorities in the form of municipalities.

5.8.3 HEALTH

Since independence in 1990, the health status of Namibia has increased steadily with a remarkable improvement in access to primary health facilities and medical infrastructure. Despite the progress, the World Health Organization (WHO) in 2015 recommended strategic priorities of the health system in Namibia which include improved governance, an improved health information system, emergency preparedness, risk reduction and response, preventative health care and the combating of HIV/AIDS and TB (WHO, 2016).

HIV/AIDS remains a major reason for low life expectancy and is one of the leading causes of death in Namibia. There is a high HIV prevalence among the whole population, but since the peak in 2002 (15,000 new cases of HIV per year, and 10,000 yearly deaths due to AIDS) the epidemic started to stabilise (UNICEF, 2011). Although new infections as well as fatalities halved during the next decade, life expectancy for females returned to pre-independence levels but for males it did not reach pre-independence levels yet. HIV/AIDS remains the leading cause of death and premature mortality for all ages, killing up to half of all males and females aged 40 - 44 years in 2013 (IHME, 2016).

Tuberculosis (TB) is a leading killer of people infected by HIV/AIDS, and Namibia has a high burden – in 2018, 35% of people notified with TB were infected with HIV. The country is included among the top 30 high-burden TB countries in the world, with an estimated incidence rate of 423 per 100,000 people and 60 fatalities per 100,000 people in 2018 (retrieved from www.mhss.gov.na).

Over the period 2000 – 2013 significant rises were observed for stroke, ischemic heart diseases, diabetes, and depressive disorders, but HIV/AIDS remained the top cause of premature mortality. Over the same period significant decreases were observed for diarrheal diseases, neonatal conditions, and malaria. Risk factors are key drivers of premature mortality, and social ills were identified as the leading factor for death – particularly unsafe sex and alcohol and drug abuse. TB and malaria are compounded by the AIDS epidemic, and the risk of contracting malaria and TB is 15% greater if a person is also infected with HIV, with a risk of 50% higher to die as a result (IHME, 2016).

As of the beginning of 2020 the coronavirus disease (COVID-19), a communicable respiratory disease, has caused illness in humans at a pandemic scale and has resulted in an increasing number of deaths worldwide. The viral outbreak is adversely affecting various socio-economic activities globally, and with reports of the increasing number of people testing positive, it is anticipated that this may have significant impacts on the operations of various economic sectors in Namibia too. The disease caused many countries to enter a state of emergency and lockdown mode, with dire economic consequences.

5.8.4 EMPLOYMENT

Otjondjupa's labour force participation rate was more than 76.8%, compared to the average of 71.2% for Namibia. More than half of the people were employed in the private sector and about one-quarter by the State. Agriculture is the economic sector with the most employees – about 30%, while 40% of those employed fell in the occupational group of general labourers and other unskilled occupations. Wages and salaries represented the income source of 61.7% of households (NSA, 2018). As a whole the region was marked by low education levels, which affected employability and prevented many

households to earn a decent income. More than 60% of the population is over 15 years of age and about one-third of the total population can be regarded as part of the labour force.

The unemployment rates in Namibia, particularly among the youth are high. According to the Namibia Labour Survey (2018), the unemployment rate of the Oshikoto and Otjozondjupa regions was 26.6% and 36.1% respectively, while the unemployment rate for people between 15 and 34 years of age was 47.4% in 2018, slightly higher than the national average of 46.1% (Namibian Statistics Agency, 2018).

In 2018, 53.4% of all working Namibians were employed in the private sector and 21.5% by the state. State-owned enterprises employ 7.6% Namibians and private individuals 16.6%. Wages and salaries represented the main income source of 47.4% of households in Namibia. Agriculture (combined with forestry and fishing) is the economic sector with the most employees – 23% of all employed persons in Namibia work in this sector. Agriculture is also the sector that employs the most informal workers in Namibia, calculated at 87.6%. Wages of employees in the agriculture sector are lower than all other sectors except for workers in accommodation and food services and domestic work in private households (NSA, 2019).

Low education levels affects employability and prevents many households to earn a decent income. Of all people employed in Namibia, 63.5% are not higher qualified than junior secondary level (Grade 10 and lower). In total 11.8% of all people employed had no formal education. In total 29.1% of all people employed fall in the category “elementary occupation” and 15.2% in the category “skilled agriculture” (NSA, 2019).

Overall the rate of unemployment is estimated at 33.4% for Namibia, using the broad definition of unemployment. More than 60% of the population is over 15 years of age and about one-third of the total population can be regarded as part of the labour force. The unemployment rate in rural and urban areas is almost the same – 33.4% in urban areas and 33.5% in rural areas. The highest unemployment rates are found amongst persons with education levels lower than junior secondary. The unemployment rate of persons with no formal education is 28.6%, with primary education 34.6% and with junior secondary education 32.7% (NSA, 2019).

5.8.5 ECONOMIC ACTIVITIES

The economy of the Otjozondjupa Region is predominantly agriculture-based. Extensive livestock farming forms the livelihood of many people, and is one of the reasons for the low intensity land use over much of the 105,460 km² the region covers, the total low population of (154 342 in 2016) as well as the low population density (about 1.5 persons per km²). Large parts of the region are covered by commercial and communal farms, mainly for cattle ranching. Guest farms and hunting farms are also common. On both commercial and communal land, bush encroachment decreased the carrying capacity of the farms markedly over the last four decades. The invader bush is managed in several ways, one of which is the production of charcoal for export.

Mining plays a pivotal role in the economy of Namibia. Since independence, it has consistently been the biggest contributor to Namibia’s economy in terms of revenue and accounts for 25% of the country’s income. Mining is one of the main contributors to GDP, and one of the largest economic sectors of Namibia. The main commodities are uranium, gold, diamonds, copper, zinc, lead, salt and dimension stone. Also a major employer, about 1.7% of the formal labour force of Namibia is directly employed by the mining sector.

Employees in mining receive the highest wages by industry (NSA, 2019). The multiplying effect of income from employment in the mining sector is also significant – not only is it estimated that each employed person provides for four other persons, but the mining industry contributes in various ways to the national economy by means of taxes and royalties, a strong service-support base and specialized contractors. Several mining activities emerged in the Otjozondjupa Region during the last decade and had a strong influence on the regional demography and economy – not only as a result of the establishment of the Otjikoto Gold Mine of B2Gold between Otavi and Otjiwarongo, but also as a result of other mining projects such as Okoruso, Okanjande, the Whale Rock cement factory of Cheetah Cement near Otjiwarongo and Ohorong Cement near Otavi. In Tsumeb the smelter of Dundee Precious Metals Tsumeb (Pty) Ltd is also an influencer in the sector.

Several new government offices have been established in Otjiwarongo town as the regional capital. Other factors that influenced the socio-economy of the region, and in particular Otjiwarongo and Otavi, is the continuous growth of the tourism industry as well as the growing importance of the charcoal industry. Combined, all these factors had a cumulative role in the changing land use patterns and socio-economic landscape of the region (and the two towns), which can only be quantified when comparisons from the next national census with the 2011 census are possible.

Since 2016, Namibia recorded slow economic growth, registering an estimated growth of only 1.1% in 2016. The primary and secondary industries contracted by 2.0 and 7.8% respectively. During 2017 the economy contracted by 1.7, 0.7 and 1.9% in the first, second and third quarters respectively (NSA, 2019). Despite the more positive expectations, the economy retracted to an average growth of not more than 1% annually since 2017.

5.8.6 CULTURAL HERITAGE

In Namibia several mountains are closely coupled to heritage values, and it is possible that this applies to the Otavi Mountains as well. For many years the mineral deposits of the mountains were known, and copper was mined at Tsumeb over a period of nine decades. It is possible that the mountains were inhabited or visited before the times of recorded history, simply based on the significance of its known mineral deposits. In addition, the Otavi Mountains are known for the occurrence of fossils and an intriguing palaeontology, which makes it possible that more of these sites can be discovered.

A review of the National Heritage Council database was conducted, and no known heritage sites were identified on EPL 7688. In cases where heritage sites are discovered the chance find procedure will be used.

If any historical or heritage sites(s) of importance on or around the project area are encountered during exploration activities these will be reported to the Monument's Council in Windhoek, and the site will be left untouched.

5.8.7 NOISE AND SENSE OF PLACE

EPL 7688 is located where the predominant land use is extensive subsistence farming with the only signs of human influence is in the form of agricultural infrastructure, i.e. water installations, fences, tracks and buildings. Sensitive receptors associated with the EPL area may include farm owners and farm workers, visitors and tourists and neighbours.

The naturalness of the area can be disrupted by the combined and amplified effects of exploration activities – in the form of noise, dust, movements of heavy machinery, landscape scars and visual obtrusions. This may alter and affect the lifestyle of receptors, although the exploration activities are short-term and reversible.

EPL 7688 lies over 28 farms and it is likely that noise will become a nuisance to farmers / residents of the area. The proponent will continue to communicate with the farm owners, should this be a pertaining issue, and further mitigation measures will be applied.

Additionally, work will be planned in advance and an agreement will be met with the farm owners on the most suitable timing of work and amelioration noise during drilling activities.

6 IDENTIFICATION AND EVALUATION OF IMPACTS

The key stage of the EIA process is the impact prediction and evaluation stage. This stage is the process of bringing together project characteristics with the baseline environmental characteristics and ensuring all potentially significant environmental and social impacts are identified and assessed. Impact prediction and evaluation involve envisaging the possible changes to the environment as a result of the proposed project. The recognized methodology was applied to determine the magnitude of impact and whether or not the impact was considered significant and thus warrant further investigation. The assessment considers all stages of the project's life cycle that is scoped into the assessment and is presented in this report. It is an iterative process that commences at project inception and runs through to the final design and project implementation (construction and operations). The impact prediction and evaluation stage were undertaken in August 2020 and the findings of the assessment are presented in this document.

6.1 INTRODUCTION

Chapter 2 provides an overview of the approach used in this EIA process and details each of the steps undertaken to date. Identification and evaluation of impacts is a key step in the EIA process. This chapter outlines the methods followed to identify and evaluate the impacts arising from the proposed project. The findings of the assessment are presented in this chapter.

This chapter provides the following:

- Details on the assessment guidance used to assess impacts;
- Lists the limitations, uncertainties and assumptions with regards to the assessment methodology;
- Details how impacts were identified and evaluated, and how the level of significance was derived; and
- Details how mitigation was applied in the assessment and how additional mitigation was identified.

6.2 ASSESSMENT GUIDANCE

The principal documents used to inform the assessment method are:

- International Finance Corporation standards and models, in particular Performance Standard 1, 'Assessment and management of environmental and social risks and impacts' (International Finance Corporation, 2017) (International Finance Corporation, 2012);
- International Finance Corporation CIA and Management Good Practice Handbook (International Finance Corporation, 2013); and,
- Namibian Draft Procedures and Guidance for EIA and EMP (Republic of Namibia, 2008).

6.3 LIMITATIONS, UNCERTAINTIES AND ASSUMPTIONS

Some limitations and uncertainties were acknowledged during the EIA process, which are summarised in Table 7, along with the assumptions made to manage them. In line with EIA best practice, assumptions have been made based on realistic worst-case scenarios, thereby ensuring that the worst-case potential environmental impacts are identified and assessed.

TABLE 6 - LIMITATIONS, UNCERTAINTIES AND ASSUMPTIONS

LIMITATION / UNCERTAINTY	ASSUMPTION
Number of access roads and temporary drill campsites	The making of new tracks or access roads will be avoided, and existing tracks and routes will be used as far as possible. While every effort will be made to minimize environmental damage, in some cases it will be necessary to clear some bush to create small roads, which may be required for equipment to reach the site and for temporary campsites. If needed, cut lines have to be created by clearing of vegetation to have access to some parts of the EPL.
The program of exploration works is not confirmed	It is assumed that exploration work shall take a couple of months with two to three week sampling projects at different times on different sites and with follow-up exploration drilling projects possible. Activities involve drilling; aerial or remote sensing; geophysical surveys; and mineral sampling. Pitting and trenching are unlikely.
Number of workers, area they will come from and accommodation	It is planned that approximately four to eight people will be contracted for the proposed project. Most of the employees will stay in Otavi; contractors may camp on exploration sites / farms, depending on approval of farm owners.

Where uncertainties exist, a cautious approach has been applied, allowing the worst-case scenario for potential impacts to be identified. Where limitation and uncertainties exist, assumptions have been made and applied during the assessment process. These have been clearly described in the baseline section.

6.4 DETERMINATION OF SIGNIFICANCE

The evaluation and identification of the environmental and social impacts require the assessment of the project characteristics against the baseline characteristics, ensuring all potentially significant impacts are identified and assessed. The significance of an impact is determined by taking into consideration the combination of the sensitivity and importance/value of environmental and social receptors that may be affected by the proposed project, the nature and characteristics of the impact, and the magnitude of potential change. The magnitude of change (the impact) is the identifiable changes to the existing environment which may be negligible, low, minor, moderate, high, or very high; temporary/short term, long-term or permanent; and either beneficial or adverse.

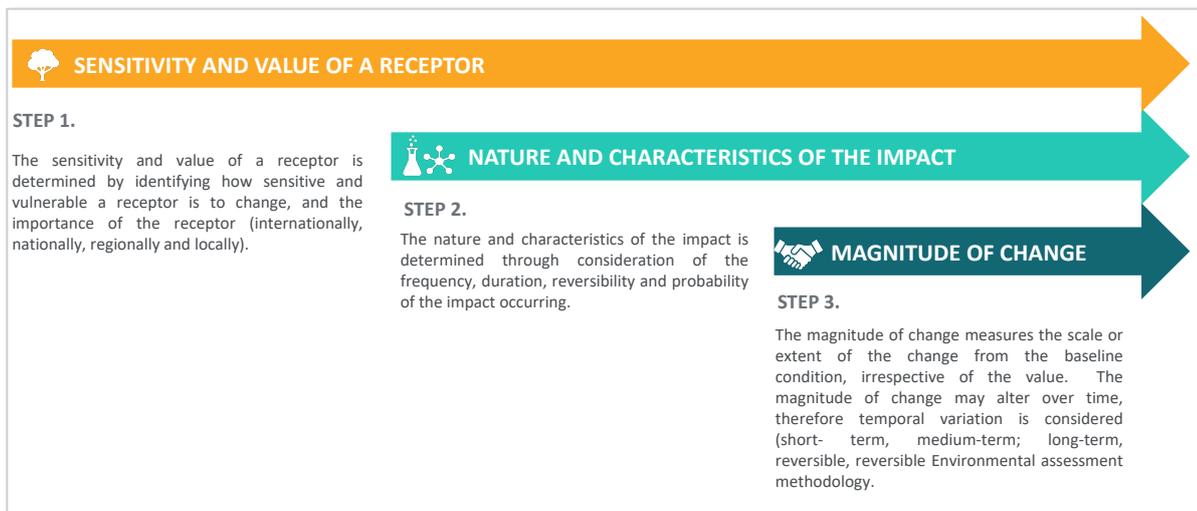


FIGURE 12 - DETERMINATION OF SIGNIFICANCE

The tables below set the description and thresholds used in determining impact significance.

TABLE 7 - NATURE OF IMPACT

NATURE	
Term	Description
Beneficial (Positive)	An impact that is considered to represent an improvement on the baseline or introduces a positive change.
Adverse (Negative)	An impact that is considered to represent an adverse change from the baseline or introduces a new undesirable factor.

TABLE 8 - TYPE OF IMPACT

TYPE	
Term	Description
Direct	Impacts causing an impact through direct interaction between a planned project activity and the receiving environment/receptors.
Indirect	Impacts that result from other activities that are encouraged to happen as a result / consequence of the Project. Associated with the project and may occur at a later time or wider area
Cumulative	Impacts that arise as a result of an impact and effect from the project interacting with those from another activity to create an additional impact and effect

TABLE 9 - REVERSIBILITY OF IMPACT

REVERSIBILITY	
Term	Description
Reversible	Impacts are reversible and recoverable in the future
Partly Reversible	Some parts of the impact can be reversed while others remain
Irreversible	Impacts which are not reversible and are permanent

TABLE 10 - MAGNITUDE OF CHANGE

MAGNITUDE OF CHANGE	
Term	Description
None / negligible	Very minor loss or detrimental alteration to one (or maybe more) characteristic, feature or element; or Very minor benefit to, or positive addition of, one (or maybe more) characteristic, feature or element.
Low / Minor	Some measurable change in attributes, quality or vulnerability; minor loss of, or alteration to, one (or maybe more) key characteristic, feature or element; or Minor benefit to, or addition of, one (or maybe more) key characteristic, feature or element; some beneficial effect on attribute quality or a reduced risk of a negative effect occurring.
Moderate	Loss of resource, but not adversely affecting its integrity; partial loss of/damage to key characteristics, features or elements; or Benefit to, or addition of, key characteristics, features or elements; improvements of attribute quality.
High / Major	Loss of resource, and quality and integrity of resource; severe damage to key characteristics, features or elements; or Large scale or major improvement of resources quality; extensive restoration or enhancement; major improvement of attribute quality.
Very high / unknown	Loss of resource, significantly affecting the long-term quality and integrity of a resource; irreparable damage or loss of key characteristics, features or elements; or the magnitude is too great to quantify as it is unknown.

TABLE 11 - DURATION OF IMPACT

DURATION	
Term	Description
Temporary	Transient; a period of less than 1 year
Short term	Impacts that are likely to last for the duration of the activity causing the impact and are recoverable (1-5 years)
Medium term	Impacts that are likely to continue after the activity causing the impact and are recoverable (5-15 years)
Long term	Impacts that are likely to last far beyond the end of the activity causing the damage (greater than 15 years with impact ceasing after decommissioning of the project)
Permanent	Permanent

TABLE 12 - SCALE OF CHANGE

SCALE OF CHANGE - EXTENT / GEOGRAPHIC SCALE	
Term	Description
On-site	Impacts that are limited to the boundaries of the proposed project site
Local	Impacts that occur in the local area of influence, including around the proposed site and within the wider community
Regional	Impacts that affect a receptor that is regionally important by virtue of scale, designation, quality or rarity.
National	Impacts that affect a receptor that is nationally important by virtue of scale, designation, quality or rarity.
International	Impacts that affect a receptor that is internationally important by virtue of scale, designation, quality or rarity.

TABLE 13 - PROBABILITY OF CHANGE

PROBABILITY	
Term	Description
Improbably (Rare)	The event may occur in exceptional circumstances yet, rarely occurs in the industry. The event could occur once every 100 years
Low probability (Unlikely)	The event has happened elsewhere yet, is unlikely to occur. The event could occur once every 10 years
Medium Probability (Possible)	The event could occur under some circumstances. The event could occur once every 5 years.
High Probability (Likely)	The event is expected to occur. The event could occur twice per year
Definite (Almost certain)	The event will occur. The event could occur once per month

TABLE 14 - SIGNIFICANCE DESCRIPTION

SIGNIFICANCE OF IMPACT	DESCRIPTION
Low – Major (Beneficial) All scores	Impacts are considered to be beneficial to the environment and society:
Low (negative) 0 - 25	Impacts are considered to be local factors that are unlikely to be critical to decision-making.
Minor (negative) 25 - 50	Impacts are considered to be important factors but are unlikely to be key decision-making factors. The impact will be experienced, but the impact magnitude is sufficiently small (with and without mitigation) and well within accepted standards, and/or the receptor is of low sensitivity/value. Impacts are considered to be short-term, reversible and/or localized in extent.
Moderate (negative) 50 - 75	Impacts are considered within acceptable limits and standards. Impacts are long-term, but reversible and/or have regional significance. These are generally (but not exclusively) associated with sites and features of national importance and resources/features that are unique and which, if lost, cannot be replaced or relocated.
Major (negative) 75 - 100	Impacts are considered to be key factors in the decision-making process that may have an impact of major significance, or large magnitude impacts occur to highly valued/sensitive resource/receptors. Impacts are expected to be permanent and non-reversible on a national scale and/or have international significance or result in a legislative non-compliance.

TABLE 15 - SENSITIVITY AND VALUE OF RECEPTOR

SENSITIVITY AND VALUE	DESCRIPTION
Low	Of value, importance or rarity on a local scale; and/or not particularly sensitive to change or has considerable capacity to accommodate a change.
Medium	Of value, importance or rarity on a regional scale, and with limited potential for substitution; and/or moderate sensitivity to change, or moderate capacity to accommodate a change.
High	Of value, importance or rarity on an international and national scale, and with very limited potential for substitution; and/or very sensitive to change or has little capacity to accommodate a change.

TABLE 16 - SIGNIFICANCE OF IMPACT



		Significance of Impact					
		Low	Minor (2)	Moderate (3)	Major (4)		
Sensitivity	Biophysical A biophysical receptor that is protected under legislation or international conventions (CITES) listed as rare, threatened or endangered IUCN species; Highly valued/sensitive resource/receptors	Social Those affected people/communities will not be able to adapt to changes or continue to maintain pre impact livelihoods.	High (3)	Minor (3)	Moderate (6)	Major (9)	Major (12)
	Of value, importance or rarity on a regional scale, and with limited potential for substitution; and/or Not protected or listed (globally) but may be a rare or threatened species in country; with little resilience to ecosystem changes, important to ecosystem functions, or one under threat or population decline.	Able to adapt with some difficulty and maintain preimpact status but only with a degree of support	Medium (2)	Low (2)	Minor (4)	Moderate (6)	Major (8)
	Not protected or listed as common / abundant; or not critical to other ecosystems functions	Those affected are able to adapt with relative ease and maintain preimpact status. There is no perceptible change to people's livelihood.	Low (1)	Low (1)	Low (2)	Minor (3)	Moderate (4)

To ensure the beneficial impacts are brought out in the assessment, green has been applied to ensure the different type of impact is clear. The description for each level of significance presented in Table 14 was also followed when determining the level of significance of a beneficial impact.

The significance of impacts has been derived by applying the identified thresholds for receptor sensitivity and magnitude of change, as well as the definition of significance. **Moderate and major adverse impacts are considered as significant.** The following thresholds were therefore used to double check the assessment of significance had been applied appropriately; a significant impact would meet **at least one** of the following criteria:

- It exceeds widely recognized levels of acceptable change;
- It threatens or enhances the viability or integrity of a receptor or receptor group of concern; and
- It is likely to be material to the ultimate decision about whether or not the environmental clearance certificate is granted.

6.5 MITIGATION

Mitigation comprises a hierarchy of measures ranging from preventative environmental impacts by avoidance, to measures that provide opportunities for environmental enhancement. The mitigation hierarchy is avoidance; reduction at source; reduction at receptor level; repairing and correcting; compensation; remediation; and enhancement.

Mitigation measures can be split into three distinct categories, broadly defined as:

1. Actions undertaken by the EIA process that influence the design process, through implementing design measures that would entirely avoid or eliminate an impact or modifying the design through the inclusion of environmental features to reduce the magnitude of change. These are considered as embedded mitigation.
2. Standard practices and other best practice measures for avoiding and minimizing environmental impacts. These are considered as good practice measures.
3. Specified additional measures or follow-up action to be implemented to further reduce adverse impacts that remain after the incorporation of embedded mitigation. These are considered as additional mitigation.

The EIA is an iterative process whereby the outcomes of the environmental assessments inform the project. Considerable mitigation has been built into the proposed project as potentially significant adverse environmental impacts have been identified and design changes have been identified to overcome or reduce them. The EMP (Appendix A) provides the good practice measures and specified additional measures or follow-up action.

Embedded mitigation and good practice mitigation have been taken into account in the assessment. Additional mitigation measures have been identified when the significance of impact requires it and causes the impact to be further reduced. Where additional mitigation has been identified, a final assessment of the significance of impacts (residual impacts) was carried out taking into consideration the additional mitigation.

7 IMPACT ASSESSMENT FINDINGS AND PROPOSED MITIGATION MEASURES

This section sets out the overall approach that was adopted to assess the potential environmental and social impacts associated with the project. To fully understand the significance of each of the potential impacts, each impact must be evaluated and assessed.

7.1 SCOPING ASSESSMENT FINDINGS

When undertaking the scoping exercise, the design of the proposed project and best practice measures were considered to ensure the likely significant effects and any required additional mitigation measures were identified. A summary of the potential impacts and mitigation and/or control measures are discussed below. The following topics were considered during the scoping phase:

- Surface water and groundwater;
- Soils and topography;
- Socio-economics (employment, demographics, and land-use);
- Noise;
- Ecology (fauna and flora);
- Air quality (including dust); and
- Cultural heritage.

Table 18 sets out the findings of the scoping assessment phase. Activities that could be the source of an impact have been listed, followed by receptors that could be affected. The pathway between the source and the receptor has been identified where both are present. Where an activity and / or receptor has not been identified, an impact is unlikely, thus no further assessment or justification is provided. Where the activity, receptor and pathway have been identified, a justification has been provided documenting if further assessment is required or not required.

Due to the nature and localised scale of the exploration activities, and the environmental context of the site, the potential environmental and social effects are limited and unlikely to be significant. The only area where uncertainty remained during the scoping phase was the potential effects on human receptors from the increase in noise levels and visual impacts, namely residents in the near farmhouses. Further consideration of the potential effects on humans was therefore undertaken and results are presented in the next section.

TABLE 17- SCOPING ASSESSMENT FINDINGS AND PROPOSED MITIGATION MEASURES

DESCRIPTION OF ACTIVITY	RECEPTOR	DESCRIPTION OF IMPACT	EFFECT/DESCRIPTION OF MAGNITUDE	VALUE OF SENSITIVITY	MAGNITUDE OF CHANGE	SIGNIFICANCE OF IMPACT	IMPACT MANAGEMENT/CONTROL MEASURES	RESIDUAL IMPACT AFTER MITIGATION
Site operations such as maintenance activities, loss of containment, accidental fuel / hydraulic fluid leaks and spills, or similar sources.	Groundwater quality	Hydrocarbon leaks and spills could enter the aquifer causing contamination.	Adverse Direct Partly Reversible Moderate Short term Regional Possible	Medium	Minor	Minor (4)	<ul style="list-style-type: none"> - Good housekeeping - Training through toolbox talks and induction - All stationary vehicles and machinery must have drip trays to collect leakages of lubricants and oil - Spill kits and absorption material available during fuel delivery, storage or use - Accidental spills and leaks (including absorption material) to be cleaned as soon as possible - Major spills to be reported, also to the authorities - Maintenance and service schedules on equipment is in place - Store bulk fuel in adequate containment areas (non-porous surface, banded) - No damaged containers in use - Preventative measures will be in place when service and maintenance activities are done (drip trays, non-porous 	Low (2)

DESCRIPTION OF ACTIVITY	RECEPTOR	DESCRIPTION OF IMPACT	EFFECT/DESCRIPTION OF MAGNITUDE	VALUE OF SENSITIVITY	MAGNITUDE OF CHANGE	SIGNIFICANCE OF IMPACT	IMPACT MANAGEMENT/CONTROL MEASURES	RESIDUAL IMPACT AFTER MITIGATION
							surfaces, funnels, non-damaged containers) - Refuelling will be done in areas with adequate preventative measures in place	
Potential spillages of drill fluid, lubrication, etc. or drilling that penetrate the groundwater table.	Groundwater quality	Hydrocarbon leaks and spills could enter the aquifer causing contamination.	Adverse Indirect Partly Reversible Minor Short term Local Possible	Low	Minor	Low (2)	- Ensure drill pads and spill kits are in place - Consider alternative sites when water table is too high - Drill system should be dug to direct any accidental spills into sumps - Extraction volumes of water shall be minimal during exploration and where possible, water from existing water sources shall be used	Low (1)
Discharge and infiltration of non-contained wastewater	Water	Wastewater can contaminate surface and groundwater	Adverse Direct Partly Reversible Minor Short term Regional Unlikely	Low	Minor	Low (2)	- Wastewater discharges will be contained - Workers will be made aware about the importance of wastewater management - Good housekeeping	Low (1)
Inadequate management of waste	Water	Waste items and litter can pollute drainage channels	Adverse Cumulative Reversible Minor	Low	Low	Low (1)	- Good housekeeping - Training and awareness through toolbox talks and induction	Low (1)

DESCRIPTION OF ACTIVITY	RECEPTOR	DESCRIPTION OF IMPACT	EFFECT/DESCRIPTION OF MAGNITUDE	VALUE OF SENSITIVITY	MAGNITUDE OF CHANGE	SIGNIFICANCE OF IMPACT	IMPACT MANAGEMENT/CONTROL MEASURES	RESIDUAL IMPACT AFTER MITIGATION
			Temporary On-site Unlikely				<ul style="list-style-type: none"> - Implement a Standard Operational Procedure on waste management, for all kinds of waste possible on-site (e.g. domestic, mineral, hydrocarbons, hazardous, etc.) - Raise awareness about the importance of responsible waste management - Implement a culture of correct waste collection, waste segregation and waste disposal - Avoid hazardous waste on site - Wastewater discharges will be contained – no disposal of waste water 	
Inadequate management of hazardous and hydrocarbon waste	Soil	Pollution of soil	Adverse Direct Reversible Minor Short term On-site Possible	Low	Minor	Low (2)	<ul style="list-style-type: none"> - Good housekeeping - Training and awareness through toolbox talks and induction - Implement a Standard Operational Procedure (SOP) on waste management, for all kinds of waste possible on-site (e.g. domestic, mineral, hydrocarbons, 	Low (1)

DESCRIPTION OF ACTIVITY	RECEPTOR	DESCRIPTION OF IMPACT	EFFECT/DESCRIPTION OF MAGNITUDE	VALUE OF SENSITIVITY	MAGNITUDE OF CHANGE	SIGNIFICANCE OF IMPACT	IMPACT MANAGEMENT/CONTROL MEASURES	RESIDUAL IMPACT AFTER MITIGATION
							<ul style="list-style-type: none"> hazardous) - Implement a culture of correct waste collection, waste segregation and waste disposal 	
Vegetation clearing for access routes, drill pads and temporary contractors camp	Terrestrial ecology and biodiversity	Loss / alteration of terrestrial habitats and loss of species	Adverse Direct Reversible Minor Short term On-site Possible	Low	Minor	Low (2)	<ul style="list-style-type: none"> - Use existing roads for access to avoid new tracks and cut lines - Minimise clearance areas through proper planning of the exploration activities - Where necessary, rescue and relocate plants of significance - Promote revegetation of cleared areas upon completion of exploration activities 	Low (1)
Ambient noise as a result of machinery use and movement (also through the use of airborne equipment)	Terrestrial ecology and biodiversity	Residing and nesting organisms can be disturbed	Adverse Direct Reversible Minor Short term On-site Likely	Low	Minor	Low (2)	<ul style="list-style-type: none"> - Restrict excessive noise to areas of activities only - Restrict excessive noise to daytime hours (7 am to 5 pm weekdays and 7 am until 1 pm on Saturday) - No activities between dusk and dawn - Drill equipment shall be suitably positioned to ensure that noisy equipment is away 	Low (1)

DESCRIPTION OF ACTIVITY	RECEPTOR	DESCRIPTION OF IMPACT	EFFECT/DESCRIPTION OF MAGNITUDE	VALUE OF SENSITIVITY	MAGNITUDE OF CHANGE	SIGNIFICANCE OF IMPACT	IMPACT MANAGEMENT/CONTROL MEASURES	RESIDUAL IMPACT AFTER MITIGATION
							<ul style="list-style-type: none"> from receptors - All equipment to be shut down or throttled back between periods of use, - Respect civic aviation regulations about the use of a drone 	
Increased movement of machinery	Terrestrial ecology and biodiversity	Residing and nesting organisms such as reptiles can be disturbed, injured or killed	Adverse Direct Partly reversible Moderate Short term On-site Possible	Low	Minor	Low (2)	<ul style="list-style-type: none"> - Restrict movements to areas of activities only - Use existing tracks and routes only - Identify rare, endangered, threatened and protected species in advance - Route new tracks around protected species and sensitive areas - Restrict movements to daytime hours - Make workers aware and notify them on avoiding some areas - No driving off designated access routes (into the bush) / off-road driving - No animals or birds may be collected, caught, consumed or removed from site 	Low (1)

DESCRIPTION OF ACTIVITY	RECEPTOR	DESCRIPTION OF IMPACT	EFFECT/DESCRIPTION OF MAGNITUDE	VALUE OF SENSITIVITY	MAGNITUDE OF CHANGE	SIGNIFICANCE OF IMPACT	IMPACT MANAGEMENT/CONTROL MEASURES	RESIDUAL IMPACT AFTER MITIGATION
Increased disturbance of areas with natural vegetation	Terrestrial ecology and biodiversity	Alien species and weeds can be introduced to the area	Adverse Direct Reversible Minor Short term On-site Possible	Low	Minor	Low (2)	<ul style="list-style-type: none"> - Eradicate weeds and alien species as soon as they appear - Make workers aware about alien species and weeds 	Low (1)
Vegetation clearing	Soil	Increased exposure due to vegetation clearance can cause soil erosion	Adverse Direct Reversible Moderate Short term On-site Possible	Low	Minor	Low (2)	<ul style="list-style-type: none"> - Ensure erosion control and prevention measures are in place when vegetation clearance is required - Where necessary, plan access routes, drill pads and camps outside of existing drainage lines - Where necessary, install diversions to curb possible erosion - Restore drainage lines when disturbed 	Low (1)
Drilling and the use of drilling equipment	Soil	Loss of soil quality due to mixing of earth matter, trampling and compaction	Adverse Direct Reversible Moderate Short term On-site Possible	Low	Minor	Low (2)	<ul style="list-style-type: none"> - Limit the possibility of compaction and creating of a hard subsurface - Limit the possibility of trampling - Topsoil should be stockpiled separately, and re-spread during rehabilitation - During drilling oil absorbent 	Low (1)

DESCRIPTION OF ACTIVITY	RECEPTOR	DESCRIPTION OF IMPACT	EFFECT/DESCRIPTION OF MAGNITUDE	VALUE OF SENSITIVITY	MAGNITUDE OF CHANGE	SIGNIFICANCE OF IMPACT	IMPACT MANAGEMENT/CONTROL MEASURES	RESIDUAL IMPACT AFTER MITIGATION
							<ul style="list-style-type: none"> matting should be placed under and around the rig - Equipment must be in a good condition to ensure that accidental oil spills do not occur and contaminate soil - In the event of spills and leaks, polluted soils must be collected and disposed of at an approved site - Limit the possibility to mix mineral waste with topsoil 	
Drilling activities, movement of machinery and vehicles	Heritage	Potential damage to cultural heritage sites	Adverse Direct Partly Reversible High Permanent On-site Possible	High	Minor	Moderate (6)	<ul style="list-style-type: none"> - Implement a Chance Find Procedure - Raise awareness about possible heritage finds - Report all finds that could be of heritage importance - In case archaeological remains to be uncovered, cease activities and the site manager has to assess and demarcate the area - Project manager to visit the site and determine whether work can proceed without damage to findings, mark exclusions boundary and inform ECC with GPS position 	Minor (4)

DESCRIPTION OF ACTIVITY	RECEPTOR	DESCRIPTION OF IMPACT	EFFECT/DESCRIPTION OF MAGNITUDE	VALUE OF SENSITIVITY	MAGNITUDE OF CHANGE	SIGNIFICANCE OF IMPACT	IMPACT MANAGEMENT/CONTROL MEASURES	RESIDUAL IMPACT AFTER MITIGATION
							<ul style="list-style-type: none"> - If needed, further investigation has to be requested for a professional assessment and the necessary protocols of the Chance Find Procedure have to be followed, - Archaeologist will evaluate the significance of the remains and identify appropriate action, (record and remove; relocate or leave premises, depending on the nature and value of the remains), - Inform the police if the remains are human, - Obtain appropriate clearance or approval from the competent authority, if required, and recover and remove the remains to the National Museum or National Forensic Laboratory as directed. 	
Drilling activities, resulting into dust emissions	Community	Visual disturbance and loss of Sense of Place	Adverse Direct Reversible Moderate	High	Minor	Moderate (6)	<ul style="list-style-type: none"> - Position drill equipment in such a way that it is out of sight from human receptors - Apply dust suppression 	Minor (4)

DESCRIPTION OF ACTIVITY	RECEPTOR	DESCRIPTION OF IMPACT	EFFECT/DESCRIPTION OF MAGNITUDE	VALUE OF SENSITIVITY	MAGNITUDE OF CHANGE	SIGNIFICANCE OF IMPACT	IMPACT MANAGEMENT/CONTROL MEASURES	RESIDUAL IMPACT AFTER MITIGATION
Windblown dust from exposed/cleared land during exploration activities		Possible disturbance in the productivity of the Ohorongo cement Solar PV plant in the northeastern boundaries of the Sargberg farm.	Temporary Local Likely				where possible – Restrict speed of vehicles (<30km/h) – Specific activities that may generate dust and impact on residents shall be avoided during high wind events – All vehicles and machinery / equipment to be shut down or throttled back between periods of use – Barriers or fences shall be used if drilling occurs in locations that may affect residents or livestock – Residents need to be informed at least two weeks in advance that drilling operations are within 1km of their property – Maintain good housekeeping – Continuous engagement with residents to identify any concerns or issues, and appropriate mitigation and management measures agreed upon	
Movement of vehicles,	Community	Create conflict with farm owners and	Adverse Indirect	Low	Minor	Low (2)	– Ensure documented permission to enter farms	Low (1)

DESCRIPTION OF ACTIVITY	RECEPTOR	DESCRIPTION OF IMPACT	EFFECT/DESCRIPTION OF MAGNITUDE	VALUE OF SENSITIVITY	MAGNITUDE OF CHANGE	SIGNIFICANCE OF IMPACT	IMPACT MANAGEMENT/CONTROL MEASURES	RESIDUAL IMPACT AFTER MITIGATION
exploration activities		neighbours about access, leaving gates open, suspicious movements, loss of farming area, etc.	Reversible Minor Short term On-site Likely				<ul style="list-style-type: none"> – Farmers should have access to all farm areas at all times – Residents shall be provided at least two weeks' notice of drilling operations within 1 km of their property – Existing water points and feeding area need to be left unaffected – Use existing roads for access, avoid new tracks / cut lines, – Compliance with all applicable laws and agreements – Continuous engagement with residents to identify any concerns or issues, and mitigation and management measures agreed upon 	
Movement of vehicles, exploration activities	Community	Presence of exploration team can be blamed for stock theft and poaching	Adverse Cumulative Reversible Minor Temporary Local Unlikely	Low	Low	Low (1)	<ul style="list-style-type: none"> – Develop and implement an operations manual or procedures to work on private farms and implement monitoring programmes thereafter – Maintain continuous engagement with residents to identify any concerns or issues, and appropriate 	Low (1)

DESCRIPTION OF ACTIVITY	RECEPTOR	DESCRIPTION OF IMPACT	EFFECT/DESCRIPTION OF MAGNITUDE	VALUE OF SENSITIVITY	MAGNITUDE OF CHANGE	SIGNIFICANCE OF IMPACT	IMPACT MANAGEMENT/CONTROL MEASURES	RESIDUAL IMPACT AFTER MITIGATION
							mitigation and management measures agreed upon – Ensure appropriate supervision of all activities – Raise awareness and sensitize employees about contentious issues such as stock theft and poaching – Accidents and incidents need to be reported to project manager and recorded in incident register	
Exploration activities	Community	Triggers job creation, skills development and opportunities for the local economy	Beneficial Direct Reversible Minor Short term Local Possible	Medium	Low	Low (2)	– Maximize local employment – As far as possible promote local procurement – Enhance development of local skills where possible	Low beneficial

7.1.1 FURTHER CONSIDERATION: NOISE AND VISUAL IMPACTS

Exploration and mining activities have the potential to disrupt the sense of place, a collective term to describe the special and uniqueness of an area, mostly through the amplifying effects of noise, dust, machinery movements, and visual intrusion. Collectively, the activities have a negative impact on the naturalness of the landscape with the result to temporarily alter and affect the lifestyles of receptors (neighbours, farm owners, tourists). Such disturbances brought about by exploration activities are often-short term and reversible. For the duration of the proposed project, communication with the affected parties and key stakeholders shall be maintained. In the event where the drill site is located in proximity to the receptors, measures will be taken to reduce the visual impacts.

Through the application of the EIA methodology presented in Section 2 the conclusion of the assessment is that with additional mitigation, the significance of effect is expected to be minor. No additional studies are considered necessary to further assess this impact.

TABLE 18 - SUMMARY OF EFFECTS

ACTIVITY	RECEPTOR	IMPACT	NATURE OF IMPACT	VALUE & SENSITIVITY	MAGNITUDE OF CHANGE	SIGNIFICANCE OF IMPACT
Placement and operations of heavy machinery and drill rigs, equipment and the creation of laydown areas on site	Neighbours / farm owners / tourists	Visual impacts (obscure views, create visual contrast, dust, intrusive objects), movement of heavy machinery, nuisance (noise), loss of naturalness	Adverse Direct Reversible Local / on-site Short term Certain	Medium	Minor	Minor Adverse

The following additional mitigation measures have been identified in addition to those presented in the EMP and shall be communicated to the proponent to ensure environmental effects are minimised as reasonably practicable:

- Interested and affected parties will be communicated to prior to the commence of the exploration activities
- Reasonable time frames for duty will be place i.e. no drilling when it is dark
- Site notice of project will be available at the site during the course of the proposed project
- Adequate procedures for drilling activities will be encouraged i.e. no hammering of drill rods with steel hammers
- Drill equipment shall be suitably positioned to ensure that noisy equipment is as far away from human receptors as possible
- Noise suppression measures shall be applied by all drilling staff (e.g. earmuffs are mandatory) and if drilling occurs in locations that may affect residents

- Residents shall be provided at least two weeks' notice of drilling operations within 1km of their property, and
- The proponent shall undertake continual engagement with residents.

The potential impact therefore is not considered significant as it does not widely exceed recognised levels of acceptable change; does not threaten the integrity of the receptors, nor is it material to the decision-making.

8 ENVIRONMENTAL MANAGEMENT PLAN

The EMP for the proposed project is presented in Appendix A. It provides management options to ensure the impacts of the proposed project are minimised. An EMP is a tool used to take pro-active action by addressing potential problems before they occur. This should limit the corrective measures needed, although additional mitigation measures might be included if necessary.

The management measures should be adhered to during all stages of the exploration activities. All persons involved and partaking in the proposed activities should be made aware of the measures outlined in the EMP to ensure activities are conducted in an environmentally responsible manner.

The objectives of the EMP are:

- To include all components of the development and operations of the project;
- To prescribe the best practicable control methods to lessen the environmental impacts associated with the project;
- To monitor and audit the performance of operational personnel in applying such controls; and
- To ensure that appropriate environmental training is provided to responsible operational personnel.

9 CONCLUSION

ECC's EIA methodology was used to undertake the environmental assessment for the proposed project to identify if there is potential for significant effects to occur as a result of the proposed project. Through the scoping process, the only risk to the environment was the potential for visual impacts and noise levels to increase thereby impacting human receptors in the area. All other social and environmental receptors were scoped out as significant effects were unlikely and therefore no further assessment was deemed necessary. Through further analysis and identification of mitigation and management methods, the assessment concludes that the likely significance of effects on humans from noise impacts is expected to be minor and prior awareness and communication about the project shall be encouraged. Various best practice and mitigation measures have been identified to avoid and reduce effects as far as reasonably practical, as well as ensure the environment is protected and unforeseen effect and environmental disturbances are avoided.

On this basis, it is of the opinion of ECC that an environmental clearance certificate be issued, on conditions that the management and mitigation measures specified in the EMP are implemented and adhered to.

REFERENCES

Christelis, G. & Struckmeier, W. (Eds.) (2001). Groundwater in Namibia – an explanation to the hydrogeological map. Windhoek: Ministry of Agriculture, Water and Rural Development (Department of Water Affairs).

BDO Namibia. (2019). From <https://www.bdo.com.na/en-gb/industries/natural-resources/mining-in-namibia>

Boni, M., Terracciano, R., Evans, N., Laukamp C., Schneider J., & BechstädT T. (2007). Genesis of Vanadium Ores in the Otavi Mountainland, Namibia. Germany

City population. (2020). Namibian population statistics. Retrieved from www.citypopulation.de/en/namibia/cities/

Government of the Republic of Namibia (GRN) (2008) Namibian Draft Procedures and Guidance for Environmental Impact Assessment and Environmental Management Plan. Windhoek: GRN.

Info-Namibia. (2020). Tsumeb, Namibian Mining Town. Retrieved from <https://www.info-namibia.com/activities-and-places-of-interest/otavi/tsumeb>

Institute for Health Metrics and Evaluation (IHME) 2016. Namibia- State of the nation's health: Findings from the global burden of disease. Seattle: IHME

International Finance Corporation. (2017). A Guide to Biodiversity for the Private Sector. The Social and Environmental Impact Assessment Process.

International Finance Corporation. (2012). IFC Performance Standards on Environmental and Social Sustainability. The World Bank.

Iowa State University. (2020). Retrieved from https://mesonet.agron.iastate.edu/sites/windrose.phtml?network=NA__ASOS&station=FYWW

Mendelshon, J., Jarvis, A., Roberts, C., & Robertson, T. (2002). Atlas of Namibia; A Portrait of the Land and its People. Cape Town: David Philip Publishers.

Ministry of Environment and Tourism (MET), Ministry of Mines and Energy (MME). (2018). National Policy on the Prospecting and Mining in Protected Areas . Windhoek: Ministry of Environment and Tourism, Ministry of Mines and Energy.

Ministry of Health and Social Services (MHSS) (2020). Diseases. Retrieved from www.mhss.gov.na

Ministry of Mines and Energy. (2018, August). Mineral Rights and Resources Development . From Ministry of Mines and Energy: <http://www.mme.gov.na/mines/mrrd/>

Namibia Statistics Agency (NSA). (2017). Namibia inter-censal demographic survey 2016 report. Windhoek: NSA

Namibia Statistics Agency. (2018). Namibia Labour Force Survey 2018. Windhoek: Namibia Statistics Agency.

Namibia Statistics Agency (NSA). (2019). The Namibia labour force survey 2018 report. Windhoek: NSA

World Health Organization (WHO) 2016. WHO country cooperation strategy 2010 – 2015 Namibia. Windhoek: WHO

APPENDIX A- EMP

APPENDIX B - NON-TECHNICAL SUMMARY

APPENDIX C- EVIDENCE OF PUBLIC CONSULTATION

The following was advertised in the 'Republikein, Sun, and Allgemeine Zeitung' newspapers on the 21st September 2020.

MONDAY 21 SEPTEMBER 2020

Market Watch

5

NOTICE OF AN ENVIRONMENTAL ASSESSMENT AND PUBLIC PARTICIPATION PROCESS
EXPLORATION ACTIVITIES ON EPL 7688
OTJONZDUPA AND OSHIKOTO REGIONS, NAMIBIA

Environmental Compliance Consultancy CC (ECC) hereby gives notice to the public that an application for an environmental clearance certificate in terms of the Environmental Management Act, No. 7 of 2007 will be made as per the following:

Applicant: Votorantim Metals Namibia (Pty) Ltd
Environmental Assessment Practitioner (EAP): Environmental Compliance Consultancy
Location: Otjonzdupa and Oshikoto Regions, Namibia

Project: Exploration activities on EPL 7688 for base and rare metals, industrial minerals, and precious metals in the Otjonzdupa and Oshikoto Regions.

Proposed activity: The proponent proposes to carry out exploration activities for base and rare metals, industrial minerals, and precious metals on EPL 7688. The EPL is within the Otjonzdupa Region and a smaller part of it extends east into the Oshikoto Region. Exploration methods may include geochemical survey (soil and rock sampling), geophysical survey (electromagnetic surveys), drilling and drill-core sampling.

Application for environmental clearance certificate: In terms of the Environmental Management Act, No. 7 of 2007, ECC on behalf of Votorantim Metals Namibia (Pty) Ltd has obtained permission to explore EPL 7688, and is required to apply for an environmental certificate from the Ministry of Environment, Forestry and Tourism for the above-mentioned project.

Purpose of the review and registration period: The purpose of the review and registration period is to introduce the proposed project and to afford interested and Affected Parties (I&APs) an opportunity to register and comment on the Non-Technical Summary (NTS) and to ensure that potential issues and concerns are brought forward, captured and considered further in the assessment process.

Registration period: Effective from 21 September to 12 October 2020.

How you can participate: ECC is undertaking the required environmental assessment and public participation process in terms of the Act. I&APs and stakeholders are required to register for the project at: <https://eccenvironmental.com/projects/>

Environmental Compliance Consultancy
Registration Number: CC/2013/11404
Members: Mr. St. Beaudouin and Mrs. J. Mooney
PO Box 91193, Klein Windhoek
Tel: +264 81 669 7608
E-mail: info@eccenvironmental.com
Website: <http://www.eccenvironmental.com>
Project id: ECC-88-317-ADT-4-A

CALL FOR PROPOSALS

The Ministry of Environment, Forestry and Tourism (MEFT) in collaboration with United Nations Development Programme (UNDP) Namibia under the Climate Promise is seeking short-term services of qualified experts for the following consultancies respectively:

A. List of consultancies:

- Support regional Stakeholder discussions that promote the NDC specific vision and articulate the benefits of more ambitious NDCs by 2020.
- Supporting sub national dialogues around Namibia NDC with private sector and civil society organizations, civil society mobilization and private sector engagement.
- Support assessment of vulnerability of the Namibia economy to impacts of Climate Change and potential consequences on population and economy to inform the new NDC.
- Strengthen the adaptation section with a specific focus on the Blue Economy (in line with the national BE Policy) as a means of adapting to the impacts of climate change and to inform the new NDC.
- Development of the NDC Investment Strategy for both the private and public sector.
- Climate Promise nation-wide awareness raising campaign, and development of policy briefs - and selected briefs (e.g. nature-based solutions on societal development challenges like climate change, water security, food security, human health and socio-economic development).
- Marketing and mass-distribution campaign for the Mission 1.5 Online Game under the Climate Promise Project.
- Creating an enabling environment to engage with the dynamic media to raise awareness with non-traditional narratives that provides outreach to leave no one behind.

B. Guidelines for Submissions:

Interested consultants can respond to the detailed Terms of Reference (ToRs) on the website of the Ministry of Environment, Forestry and Tourism (MEFT). When submitting your bids, please consider that the provision of the above consulting services will be carried out concurrently and running over a period of 2 months (i.e. October-November 2020). Interested qualified short-term technical consultants must submit a motivation letter outlining their comparable experience, proposed methodology, work plan and time frame accompanied by quotation including proposed fees and all other related costs to Mr. Alfeus Shekunyenge and Mr. Paulus Ashili, email: alfeus.shekunyene@met.gov.na or paulus.ashili@met.gov.na, Cell no. +264 813 863 465 or +264 61 284 2808. Please submit pdf copies of the required documents to the above e-mail addresses by 17:00 on the 29th of September 2020. NB1: Any applicants that do not adhere to the above requirements (or incomplete submissions beyond the due date) will be automatically disqualified. NB2: The MEFT would like to expressly encourage young Namibians professionals and graduates with the skills and expertise that are meeting the requirements of the various consultancies to apply.

2. NOTES TO THE FINANCIAL RESULTS (continued)

2.6 Secondary business segments (N\$'000)

	2020			2019		
	Namibia	Non-Namibian	Group	Namibia	Non-Namibian	Group
Rental – operating income	319,101	10,287	329,388	311,490	8,664	320,154
Rental – straight-line adjustment	2,481	908	3,389	4,662	-	4,662
Revenue	321,582	11,195	332,777	316,152	8,664	324,816
Share of profit from associate after tax	-	23,427	23,427	-	26,263	26,263
(Loss)/Profit for the year	(17,532)	13,964	(17,568)	295,995	7,057	303,052
Properties as per valuations	2,838,280	76,000	2,914,280	2,831,192	82,750	2,913,942
Sectoral spread	97%	3%	100%	97%	3%	100%
Total assets	2,916,260	442,466	3,358,726	2,881,075	441,268	3,322,343
Total liabilities	(1,805,923)	(344,855)	(2,150,778)	(1,655,119)	(370,837)	(2,025,956)

2.7 Property portfolio

The portfolio was independently valued at N\$2.9bn (2019: N\$2.9bn) by Mills Fitchet Magnus Penny with a negative fair value adjustment of N\$15.3m (2019: N\$27.9m positive). The properties were negatively impacted due to the COVID-19 pandemic with the significant impact on retail and hospitality related properties in the portfolio. Total capital expenditure amounted to N\$85m (2019: N\$86m). We diversified our portfolio in line with our strategy by investing in a residential portfolio acquired for N\$86.7m on 30 October 2019, one of the few asset classes to deliver growth for the year and helped reduce the impact of the negative fair value adjustments in the portfolio. The first phase of Urban Village, the Ekekenheim convenience (lifestyle) centre, commenced trading on 1 February 2020, completed at a total cost of N\$102m (comprising N\$40m land and N\$62m development cost).

The property portfolio is classified as a level 3 asset. Level 3 fair value measurements are those derived from valuation techniques that include inputs for an asset or liability that are not based on observable market data. Discount rates, capitalisation rates, market rental growth rates and reversion rates are key inputs into the models.

2.8 Interest-bearing borrowings

	2020		2019	
	Utilised facility N\$'000	Weighted average interest rate	Utilised facility N\$'000	Weighted average interest rate
Expiry				
Non-current liabilities				
2021	-	0.0	75,000	9.4
2022	575,761	4.1	549,760	4.0
2023	311,510	6.0	150,000	9.1
2025	227,000	5.9	-	0.0
Total	1,114,071	5.2	774,760	7.5
Current liabilities				
Revolving facilities	123,530	3.7	116,227	9.0
Maturing within one year	75,000	2.4	268,700	8.9
Total	198,530	6.0	384,927	9.0
GRAND TOTAL	1,312,601	5.2	1,159,687	7.4

Total available utilised facilities are N\$65m (2019: N\$148m) and €2m (Proceeds in the Euro facility), excluding the Domestic Medium-Term Note Programme (DMTNP) of N\$416.7m and the cash balance.

2.9 Derivative liability

	Total fair value N\$'000	Non-current fair value N\$'000	Current fair value N\$'000	Nominal value N\$'000	Average fixed interest rate*
2020	(23,001)	(13,546)	(9,455)	340,000	6.5%
2019	(5,162)	(2,905)	(2,257)	440,000	7.4%

* Floating rate is the 3M JIBAR rate.

The interest rate swaps are classified as level 2 financial instruments which are derived from inputs, other than quoted prices (unadjusted) in active markets for identical assets and liabilities, that are observable for the asset and liability, either directly or indirectly. The valuation technique used is the discounted cash flow model, with the discount rates being a key input.

3. DIRECTORS' COMMENTARY

3.1 Financial results and distribution

The operating profit before finance costs and debt interest was impacted by a negative fair value adjustments on the derivative instruments due to the decrease in the repo rates compared to our fixed swap rates, the listed investment devaluation as well as the investment properties valuation (refer to note 2.7). Current year also reflected a full year of debt interest premium amortisation post the rights issue of April 2019.

Property income increased from the previous period by 28% which is despite the rent relief of N\$18m provided to tenants as a result of COVID-19 for the period April to June. Excluding the rent relief, rental growth would have been 8.2% which is attributable to the residential acquisition made during the year.

3.2 DIRECTORS' COMMENTARY (continued)

3.1 Financial results and distribution (continued)

The vacancy rate deteriorated to 5.4% (2019: 3.2%) for the portfolio with a 9.3% vacancy on the residential portfolio. The increase is aggravated by the current trading environment which continues to put pressure on tenants' ability to remain profitable. Lease escalations have been flat or negative for parts of the retail and office sectors and compressed for the industrial sector. Debt collectors remain under pressure and saw our provision for bad debts increasing to N\$23.2m (2019: N\$8.6m) due to COVID-19, as well as IFRS 9 application. Focus for the financial year will continue to be placed on protecting our income streams, managing expenses and reducing our overall debtors level.

3.2 Investment in associate

The investment in associate yielded an average return of 7.5% (2019: 8.21%) of which Oryx's share is N\$23m (2019: N\$26m). Of the net income, N\$4m (2019: N\$3m) relates to Oryx's share of the fair value adjustment which is not included in distributable income. The translation of the loan resulted in a foreign exchange loss of N\$6.6m (2019: N\$5.8m) while the translation of the associate resulted in a foreign exchange gain of N\$62m (2019: N\$9.7m), using a spot rate of N\$19.45 as at 30 June 2020 (2019: N\$15.96). This investment is in the Euro zone.

The sale of the Super Konzum Vukovarska property resulted in a proportional reduction in issued capital of the associate via a share buy-back. This in turn resulted in a reduction in the value of the investment in associate on 29 May 2020 of €2.3m (26%) or N\$43.6m which is the sale proceeds recorded. There has been no change in the percentage holding.

3.3 Interest-bearing borrowings

Gearing was 39.1% (2019: 34.9%) with the increase resulting from increased debt facilities entered into during the year whilst investment property remained flat. The weighted average interest rate is 5.83% (2019: 7.48%) which reduced as a result of the decrease in the repo rate during the year. 49% (2019: 65%) of total debt drawn was fixed using interest rate swaps with a nominal value of N\$340m (2019: N\$440m). As a result of the decrease in the repo rate, the Group obtained revised pricing for existing swaps resulting in a 242bps decrease in total in the Euro zone.

During the period Oryx commercial paper of N\$128.7m matured, and was replaced by another bond of N\$83.3m for a three-year term at 3M JIBAR plus 2.2% and with a repayment of N\$45.4m using existing facilities.

3.4 The market and prospects

COVID-19 brought both the global and local economies to a standstill amplifying an already declining local economy and causing downward pressure on disposable income, tenant turnovers, and ultimately rentals (Cirrus, 2020 Outlook).

Oryx's balanced property portfolio is well placed to withstand the current economic downturn and management remains focused on strengthening the balance sheet, improving cash flow, retaining tenants and driving operational efficiencies to create a platform for growth that will provide sustained shareholder value in the long term.

While current market conditions remain difficult, opportunities are presenting themselves in all property sectors and therefore management continues to seek opportunities that will deliver yield enhancing and long term growth to our unitholders. While these opportunities exist the Board is mindful of current borrowing levels at 39.1%. Low interest rates will give the property industry some breathing space to maintain margins on property transactions and help restore investor confidence.

3.5 Subsequent events

Subsequent to year end, the Group obtained a N\$100m facility from Rand Merchant Bank, priced at 3M JIBAR plus 2.58% for a 3 year term. The Group further refinanced the N\$75m Nedbank term loan during September 2020 at 3m JIBAR plus 2.85% for a 3 year term. The proceeds from the associate capital reduction resulting from the sale of the Velica Gores facility during September 2020 and paid into the Euro Flex reserve facility. A condemnation was obtained from ABSA Bank Limited relating to the vacancy covering 5% on the bonded portfolio. Oryx and Retailability, the new owners of Edgars, agreed on the terms of a new three-year lease agreement. The formal agreement will be signed after Competition Commission approval for Retailability's purchase of Edgars has been approved in South Africa, which reduces the risk of this potential vacancy in the short term. We also take note of the announcement made by Government on 12 August 2020 to revert to stage 3 lockdown with curtailment of large gatherings, prohibition on sit-down restaurant meals and travel restrictions. This will have an adverse effect on the business, the impact of which is not currently quantifiable.

3.6 Going concern

Due to the impact of COVID-19 and the uncertainty on the economy ahead, the Board scrutinised budgets and cash flows for the year ahead. By July 2021 the Group is required to refinance N\$19m short term debt and N\$34m (Euro debt) long term debt. While indications are positive that these debts will be refinanced with the respective banks, management has implemented mitigating actions should this not be the case. Current available facilities amount to N\$65m. Refer to our audited financial statements for more detail around these actions. The directors are of the opinion that Oryx will be a going concern for the foreseeable future from the date of this report. The going concern basis was therefore adopted in preparing the Annual Financial Statements.

3.7 Appreciation

Ms Lizette Smit has resigned as Chief Financial Officer effective 30 September 2020. The Board wishes to extend its gratitude for her valuable contribution to Oryx. Ms Francis Heunis has been appointed as CFO effective 1 October 2020 and the Board would like to congratulate her on her new role. The Board would also like to thank its management, employees and service providers for their commitment and dedication during this period. We also thank our tenants, financiers and unitholders for their continued support in these unprecedented difficult times.

4. DISTRIBUTION

During March 2020 the Board decided to postpone the payment of the half year distribution, amounting to N\$50,940,000 or 69.75cpa, to 2 October 2020 due to the unknown impact that COVID-19 might have. After further deliberation by the Board, an extraordinary general meeting of debenture holders on 29 June 2020 was called for and held. Resolutions adopted were to cancel any further distributions for 2020, but that the half year distributions remain payable. Therefore, no distribution is declared for the six months ended 30 June 2020. The resolutions pertaining to future distributions will be tabled at the AGM for consideration by unitholders as the Board strongly believes that these changes remain necessary to see the Group through these unprecedented times.

Below is a reminder of the salient dates applicable to distribution number 34 declared 2 March 2020

Last day to trade cum distribution:	Friday, 13 March 2020
Record date to participate in the distribution:	Friday, 20 March 2020
Payment date:	Friday, 2 October 2020

By order of the Board
Mr PM Kazmaier – Chairperson
17 September 2020

The following was advertised in the 'Republikein, Sun, and Allgemeine Zeitung' newspapers on the 28th September 2020.

4 **Republikein Sun** **Allgemeine Zeitung** Market Watch MONDAY 28 SEPTEMBER 2020

Nigeria is Africa's largest economy

Nigeria's central bank cuts lending rate

Low oil prices have taken their toll on the continent's top producer, which relies on crude sales for 90% of foreign exchange earnings.

BY ALEXIS AKWAGYIRAM

Nigeria's central bank cut its benchmark lending rate by 100 basis points to 11.5% in a surprise move aimed at stimulating growth in Africa's largest economy.

Nigeria's economy, badly hit by the coronavirus pandemic, contracted 6.1% in the second quarter and now faces possible recession in the third quarter, with the government expecting the economy to contract by as much as 8.9% this year. Low oil prices have also taken their toll on the continent's top producer, which relies on crude sales for 90% of foreign exchange earnings.

Central bank governor Godwin Emefiele said six of the 10 members of the monetary policy committee voted for the cut, one

for a 50-point reduction and three for holding the rate.

Loosening monetary policy "would complement the bank's commitment to sustaining the trajectory of the economic recovery and reduce the negative impact of Covid-19", he said.

Inflation

Emefiele said the cut aimed to force banks to lend to help the economy despite rising inflation.

He said inflation was mainly due to supply side constraints, adding that cheaper credit to the do-

estic economy would stimulate growth.

The central bank has said it aims to maintain inflation within a target range of 6% to 9%. But annual inflation rose in August for the 12th successive month to a more-than two-year high of 13.22% as the pandemic disrupted the supply of goods and services.

In May, the bank cut the rate by 100 basis points to 12.5% the first reduction since March 2019 and the largest since 2015. The bank's monetary policy committee voted to hold the rate at its last meeting

in July. "Given Nigeria's budgetary pressures, creating an environment that is more conducive to local financing of the deficit is understandable," said Razia Khan, chief economist for

Africa at Standard Chartered bank. "There will be no immediate inflation relief, however well-intentioned the policy."

Financial markets were closed when the decision was taken. Money market

rates opened at historic lows of between 0.5% and 1%, while the naira currency eased to 467 per dollar on the black market due to the excess naira liquidity, traders said.

- Namp/Reuters

Loosening monetary policy "would complement the bank's commitment to sustaining the trajectory of the economic recovery."

Godwin Emefiele
Central bank governor: Nigeria



Nigerian president, Muhammadu Buhari.
PHOTO NAMP/APP

NOTICE

NEW BUSINESS HOURS

We would like to inform all our customers that the Post Offices business hours will be adjusted from **1 October 2020** as follows:

Monday - Friday:	08:30 - 16:00
Saturdays	08:30 - 12:00

Visit the NamPost website for more details.

Issued By:
Retail Channel
Executive Retail Channel
Tel: (061) 201 3004/7
E-mail: fiinaka@nampost.com.na

www.nampost.com.na

We Deliver More.



nampost®



NOTICE OF AN ENVIRONMENTAL ASSESSMENT AND PUBLIC PARTICIPATION PROCESS
EXPLORATION ACTIVITIES ON EPL 7688
OTJONZONDJUPA AND OSHIKOTO REGIONS, NAMIBIA

Environmental Compliance Consultancy CC (ECC) hereby gives notice to the public that an application for an environmental clearance certificate in terms of the Environmental Management Act, No. 7 of 2007 will be made as per the following:

<p>Applicant: Environmental Assessment Practitioner (EAP):</p> <p>Location:</p>	<p>Votorantim Metals Namibia (Pty) Ltd Environmental Compliance Consultancy Otjonzondjupa and Oshikoto Regions, Namibia</p>
---	---

Project: Exploration activities on EPL 7688 for base and rare metals, industrial minerals, and precious metals in the Otjonzondjupa and Oshikoto Regions.

Proposed activity: The proponent proposes to carry out exploration activities for base and rare metals, industrial minerals, and precious metals on EPL 7688. The EPL is within the Otjonzondjupa Region and a smaller part of it extends east into the Oshikoto Region. Exploration methods may include geochemical survey (soil and rock sampling), geophysical survey (electromagnetic surveys), drilling and drill-core sampling.

Application for environmental clearance certificate: In terms of the Environmental Management Act, No. 7 of 2007, ECC on behalf of Votorantim Metals Namibia (Pty) Ltd has obtained permission to explore EPL 7688, and is required to apply for an environmental certificate from the Ministry of Environment, Forestry and Tourism for the above-mentioned project.

Purpose of the review and registration period: The purpose of the review and registration period is to introduce the proposed project and to afford Interested and Affected Parties (I&APs) an opportunity to register and comment on the Non-Technical Summary (NTS) and to ensure that potential issues and concerns are brought forward, captured and considered further in the assessment process.

Registration period: Effective from **21 September to 12 October 2020**.

How you can participate: ECC is undertaking the required environmental assessment and public participation process in terms of the Act. I&APs and stakeholders are required to register for the project at: <https://eccenvironmental.com/project/>

Environmental Compliance Consultancy
Registration Number: CC/2013/11404
Members: Mr JS Bezuidenhout or Mrs J Mooney
PO Box 51155, Windhoek
Tel: +264 81 669 7108
E-mail: info@eccenvironmental.com
Website: <http://www.eccenvironmental.com>
Project ID: ECC-88-317-AD1-8-A





Do you want to be part of the 10 degrees South Expo?
Contact us for bookings or more information:
events@nmh.com.na

4 - 7 November

Venue: SKW



Experience Africa



motor show







SITE NOTICE

**NOTICE OF AN ENVIRONMENTAL ASSESSMENT AND
 PUBLIC PARTICIPATION PROCESS
 EXPLORATION ACTIVITIES ON EPL 7688
 OTJOZONDJUPA AND OSHIKOTO REGIONS, NAMIBIA**

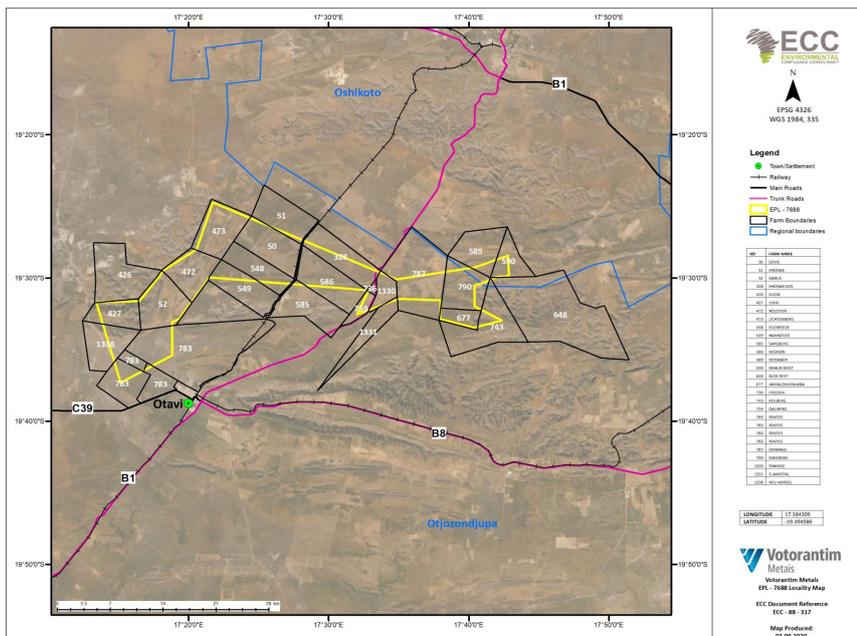
Environmental Compliance Consultancy cc (ECC) hereby gives notice to the public that an application for an environmental clearance certificate in accordance with the Environmental Management Act, No. 7 of 2007 will be made as per the following:

Applicant: Votorantim Metals Namibia (Pty) Ltd
Environmental Assessment Practitioner (EAP): Environmental Compliance Consultancy
Project ID: ECC-88-317

Project: Exploration activities on EPL 7688 for base and rare metals, industrial minerals, and precious metals in the Otjozondjupa and Oshikoto regions, Namibia.

Proposed activity: The proponent proposes to carry out exploration activities for base and rare metals, industrial minerals, and precious metals on EPL 7688. The EPL lies approximately 25km northeast of Otavi and can be accessed via the B1 road. The EPL is within the Otjozondjupa Region and a smaller part of it extends east into the Oshikoto Region. Exploration methods may include geochemical surveys (soil and rock sampling), geophysical surveys (electromagnetic surveys), drilling and drill-core sampling.

Location of EPL 7688:



Application for environmental clearance certificate: In terms of the Environmental Management Act No. 7 of 2007, ECC on behalf of the proponent is required to submit an application for environmental clearance to the competent authority and the Ministry of Environment, Forestry and Tourism for the above-mentioned project.

Purpose of the review and registration period: The purpose of the review and registration period is to introduce the proposed project and to afford Interested and Affected Parties (I&APs) an opportunity to register and comment on the Non-Technical Summary (NTS) and to ensure that potential issues and concerns are brought forward, captured and considered further in the assessment process.

REGISTERED MAIL AND STAKEHOLDER LIST

Farm or portion no.	Stakeholder Type	Farm Name	Organization	Stakeholders contact person	Contact details
NA	Authorities (Local)	NA	Otavi Town Council	NA	P.O Box 59 Otavi severina@otavitown.org.na +264 67 234 022
NA	Authorities (Local)	NA	Otjondjupa Regional Council	NA	P.O. Box 2089 Otjiwarongo pr@otjondjuparc.gov.na 067 303 702
NA	Other - NGOs, Community Groups, Social	NA	Otavi Farmers Association Chairman	Mr Wolfgang Falk	Mr Wolfgang Falk, Tel 081 2421146, ondjondjo@iway.na. Secretary – Mrs Juanita Falk, Tel 081 277 4295, ondjondjo@iway.na
NA	Other - NGOs, Community Groups, Social	NA	Otavi Farmers Association Chairman	Christine Stoman	Christine Stoman (CS the Sec) Secretary: Otavi Farmers' Association Post Office: GTO RAU Tel: (067) 30-4971 Cell: 081 244 6034 Fax2Email: 088 652 1020 stoman@afol.com.na
NA	Other - NGOs, Community Groups, Social	NA	Namibian Chambers of Environment (NCE)	Henriette	admin@n-c-e.org +264 (0)61 240 140
50	Directly Affected	Sovis		Jakes Jakob & Anna Ndapandohamba Mbandi	P.O.Box 23418 Hochland Park Windhoek 0811226018 mbandji@yahoo.com / mbandji@gmail.com
51	Directly Affected	Khorab		Chris Desiree Bartholomae	P.O.Box 238 Otavi
52	Directly Affected	Gabus	Gabus Game Ranch Safari Lodge		Mr Heinz Kuehl- 0811292231 office@gabusnamibia.com

328	Directly Affected	Khorab Oos		Hadaloha Investment (PTY) LTD	P.O.Box 24499 Windhoek
426	Directly Affected	Kudib			Mrs Sabine Pusch - 0812986484 farmdakota@gmail.com
427	Directly Affected	Uisib			Mr A.J.Schoeman - 0812231736 ps91@iway.na
472	Directly Affected	Holstein		Karl Heinz	P.O.Box 52 Otavi 0811292231 Kuehl@afol.com.na
473	Directly Affected	Lichtenberg		Caesers World CC	P.O.Box 376 Otavi
548	Directly Affected	Eilenriede		Louisa Ndesihafela Pineas	P/Bag 13343 Windhoek 0812131283 naamboangula123@gmail.com
549	Directly Affected	Hannover	Ohorongo cement	Estelle Alberts	Ohorongo cement PA in Otavi Pusch.elke@ohorongo-cement.com 0812749058 Plant Manager TEL: +264 67 235 7099 MOBILE: +264 81 149 0561 alberts.estelle@ohorongo-cement.com
585	Directly Affected	Sargberg	Ohorongo cement	Estelle Alberts	Ohorongo cement PA in Otavi Pusch.elke@ohorongo-cement.com 0812749058 Plant Manager TEL: +264 67 235 7099 MOBILE: +264 81 149 0561 alberts.estelle@ohorongo-cement.com
586	Directly Affected	Mignon		Malakia Nakuumba Lukas	P.O.Box 367 Oshakati 0811240519

589	Directly Affected	Mosbach		Mosbach Enterprise CC	P.O.Box 437 Tsumeb
590	Directly Affected	Ghaub west		Orban Investments Three Two Two (Pty) Ltd	P.O.Box 170 Grootfontein
648	Directly Affected	Blok rest		Leon Folscher Pretorius	P.O.Box 651 Grootfontein
677	Directly Affected	Jakal omuramba		Gazania Investments One Hundred (Pty) Ltd	Philip Henred P.O.Box 86358 Windhoek 0811294193 philipg@henred.co.za
736	Directly Affected	Frieden		Dr. Naando	P.O.Box 20772 Windhoek ndapewa771@gmail.com 0811240344
743	Directly Affected	Keilberg		Gazania Investments One Hundred (Pty) Ltd	P.O.Box 86358 Windhoek
759	Directly Affected	Gaub pad		Batholomeus & Victorine Ngumeritiza Tjivikua	P.O.Box 97 Otavi 0812505376
783	Directly Affected	Rentes			Dr O. Zapke - 0811248090 ottovet@iway.na Wilhelm Schmidt fwschmidtboerdery@yahoo.com
787	Directly Affected	Ombanje		Leake S. & Letta Hangala	P/Bag 23612 Windhoek pameni@hangala.com 0811639606
790	Directly Affected	Maieberg		Gazania Investments	Willem Spoelstra P.O.Box 86358

				One Hundred (Pty) Ltd	Windhoek spoelstra@iway.na 0811277050
1330	Directly Affected	Ochange			Mr Justus Brits - 0812616738 ochangejk@iway.na
1331	Directly Affected	Elandstal		Government of the Republic of Namibia	P/Bag 13343 Windhoek



+264 81 669 7608

info@eccenvironmental.com

www.eccenvironmental.com



ECC Ref: ECC-88-317-LET- 07-A
22 September 2020

Identified Stakeholder and or Potentially Interested Party for:
Votorantim Metals Namibia Exploration Activities on EPL 7688

Dear Sir or Madam:

RE: NOTIFICATION OF ENVIRONMENTAL ASSESSMENT FOR EXPLORATION ACTIVITIES FOR BASE AND RARE METALS, INDUSTRIAL MINERALS AND PRECIOUS METALS ON EPL 7688 IN THE OSHIKOTO AND OTJOZONDJUPA REGIONS, NAMIBIA.

Environmental Compliance Consultancy (ECC) has been engaged by Votorantim Metals Namibia (Pty) Ltd (the Proponent) to act on their behalf for the environmental clearance certificate application for the proposed exploration activities for base and rare metals, industrial minerals and precious metals on EPL 7688 in Oshikoto and Otjozondjupa regions, Namibia.

ECC is conducting the Environmental Impact Assessment (EIA) in terms of the Environmental Management Act, No. 7 of 2007 and will be submitted to the competent authority and the Ministry of Environment, Forestry and Tourism for a record of decision.

The proposed project is to conduct mineral exploration activities on EPL 7688. As part of the proposed exploration project, the following activities are envisaged, which shall be confirmed, as the exploration program is refined:

- Soil sampling at 400m x 100m spaced intervals;
- Regional geological mapping;
- Limited vegetation clearing for the creation of tracks;
- Potential creation of cut-lines for geophysical surveys;
- Opening access tracks in bush-encroached areas, where there are not sufficient existing tracks; and
- Drilling exploration boreholes.

This letter is intended to engage stakeholders and potentially Interested and Affected Parties (I&APs) of the project and provide a communication channel to ECC for the project. You have been

ENVIRONMENTAL COMPLIANCE CONSULTANCY CC
PO BOX 91193 WINDHOEK, NAMIBIA
MEMBERS: J.L. MOONEY & JS BEZUIDENHOUT
REGISTRATION NUMBER: CC/2013/11404



identified as either a stakeholder, interested or affected party; therefore ECC wishes to inform you of how you can become involved in the project.

Public participation is an important part of the EIA process, as it allows public and stakeholders to obtain information about the proposed project. Public participation occurs at various stages throughout a project lifecycle including:

- Advertising in newspapers;
- Distributing a Non-Technical Summary (NTS) to identified stakeholders and I&APs;
- Registered I&APs will also be informed of the available draft scoping report for a 7-day comment and review period, during this period I&APs will have the opportunity to review the draft document and raise any issues or concerns, and
- Stakeholders and I&APs who wish to register as an I&AP must do so on the ECC website as per the link provided below: <https://eccenvironmental.com/projects/>

If you are unable to complete the registration form online please email info@eccenvironmental.com and request an electronic copy of the form that you can complete, sign, scan and return via email to info@eccenvironmental.com to register as an I&AP for the project.

ECC values community input and participation in our projects and we look forward to working with you as the project develops.

The NTS can also be obtained from our website and provides a brief overview of the proposed project <https://eccenvironmental.com/projects/>

Should you have any questions or require additional information please do not hesitate to contact either of us.

Yours sincerely,



Stephan Bezuidenhout
Environmental Compliance Consultancy
Contact: 081 669 7608
Email: stephan@eccenvironmental.com



Jessica Bezuidenhout (Mooney)
Environmental Compliance Consultancy
Contact: 081 669 7608
Email: jessica@eccenvironmental.com

APPENDIX D - ECC CVS