# SCREENING REPORT FOR AN ENVIRONMENTAL AUTHORIZATION AS REQUIRED BY THE 2014 EIA REGULATIONS – PROPOSED SITE ENVIRONMENTAL SENSITIVITY

**EIA Reference number:** N/A

**Project name:** River Valley Beef cattle feedlot

Project title: Proposed cattle feedlot on portion 28 of the farm Sterkfontein 424-IR, Meyerton,

Gauteng

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Applicant: River Valley Beef (Pty) Ltd

Compiler: Chantelle Barendze

Compiler signature:

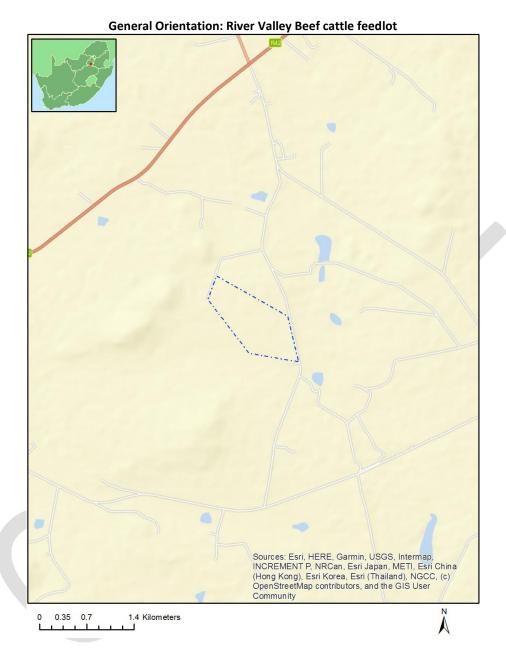
Application Category: Transformation of land | Indigenous vegetation

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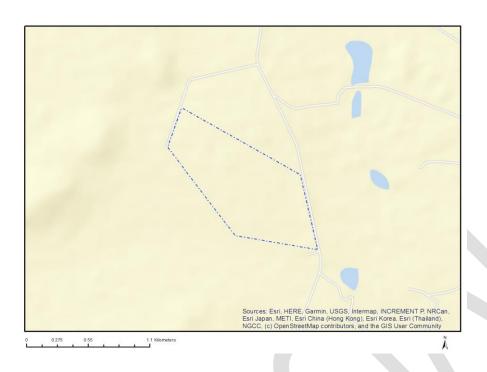
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# **Proposed Project Location**

# Orientation map 1: General location



### Map of proposed site and relevant area(s)



#### Cadastral details of the proposed site

#### Property details:

No	Farm Name	Farm/ Erf No	Portion	Latitude	Longitude	Property Type
1	STERKFONTEIN	424	0	26°37'28.75S	28°10'17.42E	Farm
2	STERKFONTEIN	424	39	26°37'28.85S	28°10'24.88E	Farm Portion
3	STERKFONTEIN	424	38	26°37'12.24S	28°10'46.44E	Farm Portion

Development footprint<sup>1</sup> vertices: No development footprint(s) specified.

Wind and Solar developments with an approved Environmental Authorisation or applications under consideration within 30 km of the proposed area

No	EIA Reference No	Classification	Status of application	Distance from proposed area (km)
1	12/12/20/2060	Solar PV	Approved	25.9
2	14/12/16/3/3/2/825	Solar PV	Approved	22.6
3	12/12/20/2060	Solar PV	Approved	22.4
4	14/12/16/3/3/2/753	Solar PV	Approved	24.3

<sup>&</sup>lt;sup>1</sup> "development footprint", means the area within the site on which the development will take place and incudes all ancillary developments for example roads, power lines, boundary walls, paving etc. which require vegetation clearance or which will be disturbed and for which the application has been submitted.

#### Environmental Management Frameworks relevant to the application



Environmental	LINK
Management	
Framework	
Gauteng EMF	https://screening.environment.gov.za/ScreeningDownloads/EMF/GPEMF
	2021 Gazette and summary.pdf

## Environmental screening results and assessment outcomes

The following sections contain a summary of any development incentives, restrictions, exclusions or prohibitions that apply to the proposed development site as well as the most environmental sensitive features on the site based on the site sensitivity screening results for the application classification that was selected. The application classification selected for this report is:

Transformation of land | Indigenous vegetation.

#### Relevant development incentives, restrictions, exclusions or prohibitions

The following development incentives, restrictions, exclusions or prohibitions and their implications that apply to this site are indicated below.

Incentive, restriction	Implication
micentive, restriction	Implication
or prohibition	

Strategic Transmission	https://screening.environment.gov.za/ScreeningDownloads/Developmen
Corridor-Central corridor	tZones/Combined_EGI.pdf
Air Quality-Vaal Triangle	https://screening.environment.gov.za/ScreeningDownloads/Developmen
Airshed Priority Area	tZones/Final VTAPA AQMP 20090408 -15 April 2009.pdf
Strategic Gas Pipeline	https://screening.environment.gov.za/ScreeningDownloads/Developmen
Corridors-Phase 3:	tZones/Combined GAS.pdf
Richards Bay to Gauteng	<u>ceorics/ combined_oriorpar</u>

#### Proposed Development Area Environmental Sensitivity

The following summary of the development site environmental sensitivities is identified. Only the highest environmental sensitivity is indicated. The footprint environmental sensitivities for the proposed development footprint as identified, are indicative only and must be verified on site by a suitably qualified person before the specialist assessments identified below can be confirmed.

Theme	Very High	High	Medium	Low
	sensitivity	sensitivity	sensitivity	sensitivity
Agriculture Theme		Х		
Animal Species Theme			X	
Aquatic Biodiversity Theme				Х
Archaeological and Cultural				Х
Heritage Theme				
Civil Aviation Theme			X	
Defence Theme				Х
Paleontology Theme				Х
Plant Species Theme			Х	
Terrestrial Biodiversity Theme	X			

#### Specialist assessments identified

Based on the selected classification, and the known impacts associated with the proposed development, the following list of specialist assessments have been identified for inclusion in the assessment report. It is the responsibility of the EAP to confirm this list and to motivate in the assessment report, the reason for not including any of the identified specialist study including the provision of photographic evidence of the site situation.

No	Specialist	Assessment Protocol
	assessment	
1	Landscape/Visual Impact Assessment	https://screening.environment.gov.za/ScreeningDownloads/AssessmentProtocols/Gazetted_General_Requirement_Assessment_Protocols.pdf
2	Archaeological and Cultural Heritage Impact Assessment	https://screening.environment.gov.za/ScreeningDownloads/AssessmentProtocols/Gazetted General Requirement Assessment Protocols.pdf
3	Palaeontology Impact Assessment	https://screening.environment.gov.za/ScreeningDownloads/Asse ssmentProtocols/Gazetted_General_Requirement_Assessment_P rotocols.pdf
4	Terrestrial Biodiversity Impact Assessment	https://screening.environment.gov.za/ScreeningDownloads/Asse ssmentProtocols/Gazetted_Terrestrial_Biodiversity_Assessment_ Protocols.pdf
5	Aquatic Biodiversity Impact Assessment	https://screening.environment.gov.za/ScreeningDownloads/Asse

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01/06/2023

		ssmentProtocols/Gazetted Aquatic Biodiversity Assessment Pr otocols.pdf
6	Socio-Economic Assessment	https://screening.environment.gov.za/ScreeningDownloads/AssessmentProtocols/Gazetted_General_Requirement_Assessment_Protocols.pdf
7	Plant Species Assessment	https://screening.environment.gov.za/ScreeningDownloads/AssessmentProtocols/Gazetted_Plant_Species_Assessment_Protocols.pdf
8	Animal Species Assessment	https://screening.environment.gov.za/ScreeningDownloads/Asse ssmentProtocols/Gazetted Animal Species Assessment Protoco ls.pdf



### Results of the environmental sensitivity of the proposed area.

The following section represents the results of the screening for environmental sensitivity of the proposed site for relevant environmental themes associated with the project classification. It is the duty of the EAP to ensure that the environmental themes provided by the screening tool are comprehensive and complete for the project. Refer to the disclaimer.

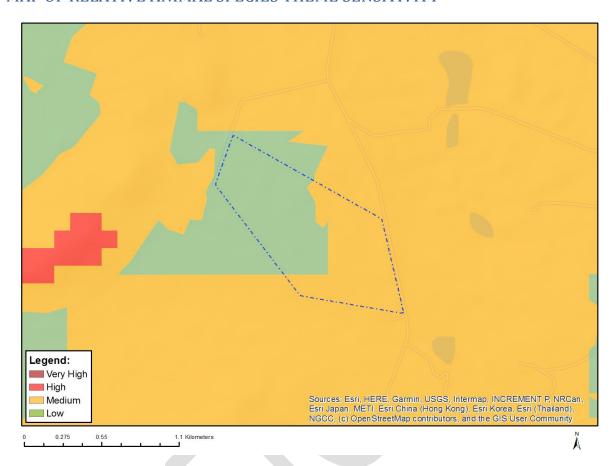
#### MAP OF RELATIVE AGRICULTURE THEME SENSITIVITY



Very High sensitivity	High sensitivity	Medium sensitivity	Low sensitivity
	X		

Sensitivity	Feature(s)
High	Land capability;09. Moderate-High/10. Moderate-High
High	Annual Crop Cultivation / Planted Pastures Rotation;Land capability;09. Moderate-High/10. Moderate-High
High	Annual Crop Cultivation / Planted Pastures Rotation;Land capability;01. Very low/02. Very low/03. Low-Very low/04. Low-Very low/05. Low
High	Annual Crop Cultivation / Planted Pastures Rotation;Land capability;06. Low-Moderate/07. Low-Moderate/08. Moderate
Medium	Land capability;06. Low-Moderate/07. Low-Moderate/08. Moderate

#### MAP OF RELATIVE ANIMAL SPECIES THEME SENSITIVITY



Where only a sensitive plant unique number or sensitive animal unique number is provided in the screening report and an assessment is required, the environmental assessment practitioner (EAP) or specialist is required to email SANBI at <a href="mailto:eiadatarequests@sanbi.org.za">eiadatarequests@sanbi.org.za</a> listing all sensitive species with their unique identifiers for which information is required. The name has been withheld as the species may be prone to illegal harvesting and must be protected. SANBI will release the actual species name after the details of the EAP or specialist have been documented.

Very High sensitivity	High sensitivity	Medium sensitivity	Low sensitivity
		Х	

Sensitivity	Feature(s)
Low	Subject to confirmation
Medium	Insecta-Lepidochrysops procera
Medium	Insecta-Orachrysops mijburghi
Medium	Mammalia-Crocidura maquassiensis
Medium	Mammalia-Hydrictis maculicollis

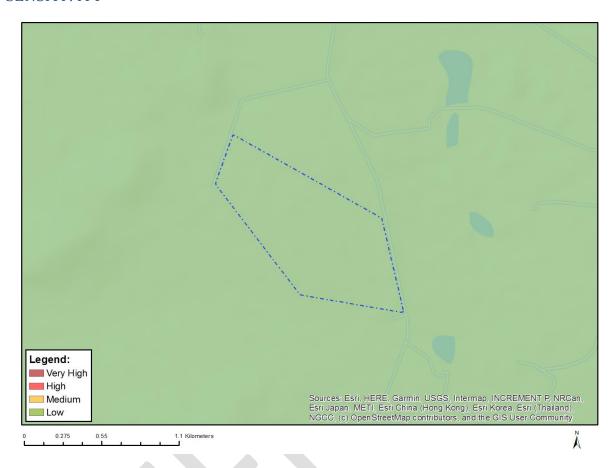
#### MAP OF RELATIVE AQUATIC BIODIVERSITY THEME SENSITIVITY



Very High sensitivity	High sensitivity	Medium sensitivity	Low sensitivity
			Χ

Sensitivity Feature(	٠,
Low Low sensit	ivity

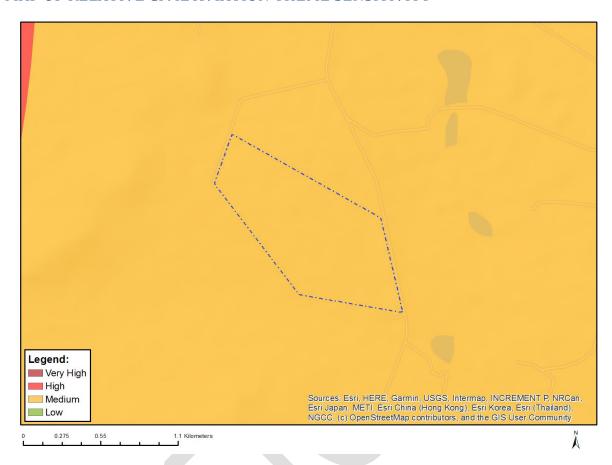
# MAP OF RELATIVE ARCHAEOLOGICAL AND CULTURAL HERITAGE THEME SENSITIVITY



Very High sensitivity	High sensitivity	Medium sensitivity	Low sensitivity
			Χ

Sensitivity	Feature(s)	
Low	Low sensitivity	

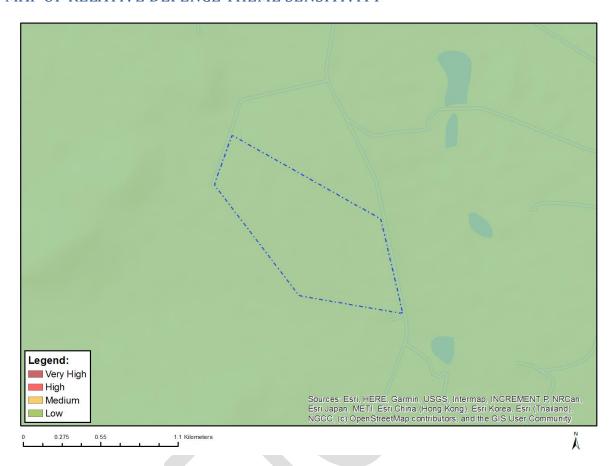
#### MAP OF RELATIVE CIVIL AVIATION THEME SENSITIVITY



Very High sensitivity	High sensitivity	Medium sensitivity	Low sensitivity
		Х	

Sensitivity	Feature(s)
Medium	Between 8 and 15 km of other civil aviation aerodrome

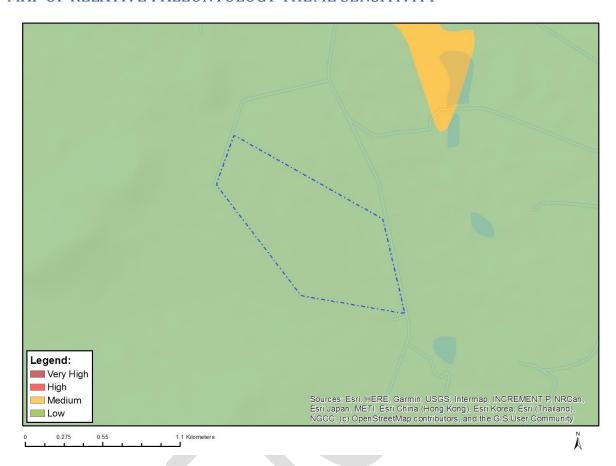
#### MAP OF RELATIVE DEFENCE THEME SENSITIVITY



Very High sensitivity	High sensitivity	Medium sensitivity	Low sensitivity
			Χ

Sensitivity	Feature(s)
Low	Low Sensitivity

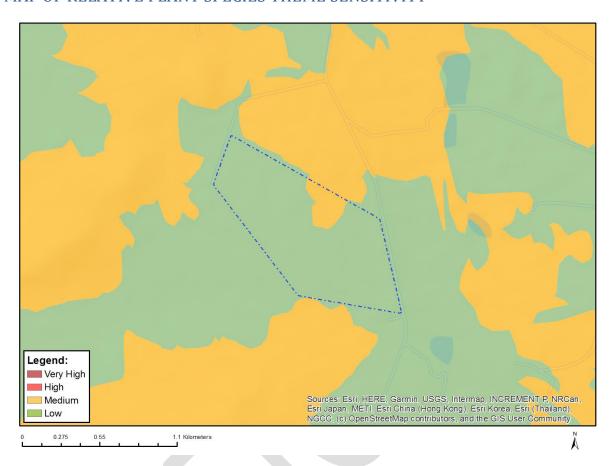
#### MAP OF RELATIVE PALEONTOLOGY THEME SENSITIVITY



Very High sensitivity	High sensitivity	Medium sensitivity	Low sensitivity
			Χ

Sensitivity	Feature(s)
Low	Features with a Low paleontological sensitivity

#### MAP OF RELATIVE PLANT SPECIES THEME SENSITIVITY

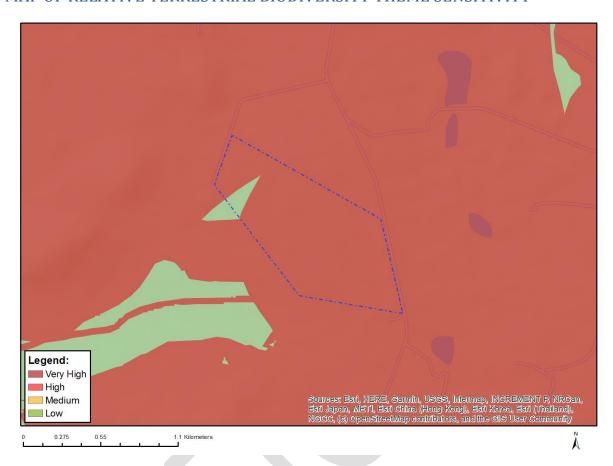


Where only a sensitive plant unique number or sensitive animal unique number is provided in the screening report and an assessment is required, the environmental assessment practitioner (EAP) or specialist is required to email SANBI at <a href="mailto:eiadatarequests@sanbi.org.za">eiadatarequests@sanbi.org.za</a> listing all sensitive species with their unique identifiers for which information is required. The name has been withheld as the species may be prone to illegal harvesting and must be protected. SANBI will release the actual species name after the details of the EAP or specialist have been documented.

Very High sensitivity	High sensitivity	Medium sensitivity	Low sensitivity
		Х	

Sensitivity	Feature(s)
Low	Low Sensitivity
Medium	Sensitive species 1252
Medium	Khadia beswickii
Medium	Delosperma macellum
Medium	Sensitive species 691
Medium	Sensitive species 1248
Medium	Prunus africana

#### MAP OF RELATIVE TERRESTRIAL BIODIVERSITY THEME SENSITIVITY



Very High sensitivity	High sensitivity	Medium sensitivity	Low sensitivity
X			

Sensitivity	Feature(s)	
Low	Low Sensitivity	
Very High	CBA 1	
Very High	ESA 1	
Very High	ESA 2	
Very High	National Protected Area Expansion Strategy (NPAES)	
Very High	VU_Soweto Highveld Grassland	

# MOTIVATION FOR THE INCLUSION/ EXCLUSION OF CERTAIN SPECIALIST STUDIES AS INDICATED IN THE DFFE SCREENING TOOL

This document functions as a review of the DFFE screening tool for the proposed cattle feedlot on portion 28 of the farm Sterkfontein 424-IR, Meyerton, Gauteng. For more information see the DFFE screening tool in **Appendix I**. See below a summary of the DFFE screening tool's outputs (Table 1).

 Table 1 Environmental sensitivity as per the DFFE screening tool

Theme	Very High sensitivity	High sensitivity	Medium sensitivity	Low sensitivity
Agriculture Theme	Sometrivity	X	Solisiavity	Solicitivity
Animal Species Theme			Х	
Aquatic Biodiversity Theme				Х
Archaeological and Cultural Heritage Theme				Х
Civil Aviation Theme			X	
Defence Theme				Х
Palaeontology Theme				Х
Plant Species Theme			Х	
Terrestrial Biodiversity Theme	X			

Based on the DFFE screening tool output, the following specialist studies were identified (Table 2).

Table 2 List of specialist assessments required as per the DFFE screening tool.

No	Specialist assessment
1	Landscape/Visual Impact Assessment
2	Archaeological and Cultural Heritage Impact Assessment
3	Palaeontology Impact Assessment
4	Terrestrial Biodiversity Impact Assessment
5	Aquatic Biodiversity Impact Assessment
6	Socio-Economic Assessment
7	Plant Species Assessment
8	Animal Species Assessment

The section that follows aims to provide background as to the inclusion / exclusion of certain specialist assessments.

#### 1. LANDSCAPE THEME SENSITIVITY

#### 1.1. MOTIVATION FOR EXCLUSION:

A Visual impact study was already conducted and included in the Draft BAR. **Refer to Appendix G for specialist report.** 

# 2. MAP OF RELATIVE ARCHAEOLOGICAL AND CULTURAL HERITAGE THEME SENSITIVITY



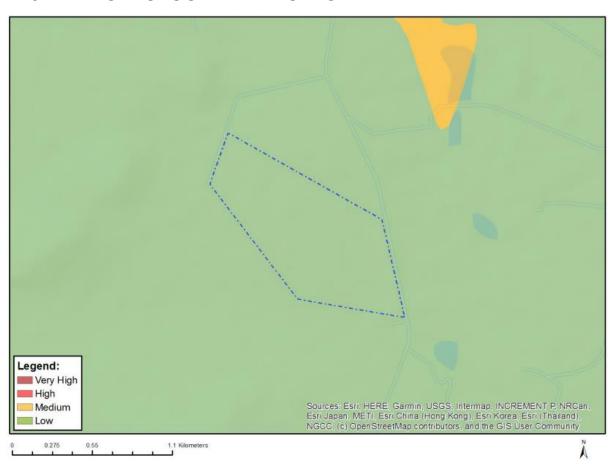
Very High sensitivity	High sensitivity	Medium sensitivity	Low sensitivity
			Χ

Sensitivity	Feature(s)	
Low	Low sensitivity	

#### 2.1. MOTIVATION FOR EXCLUSION:

A Phase 1 HIA study was already conducted and included in the Draft BAR (**Appendix G**).

#### 3. PALEONTOLOGY THEME SENSITIVITY



Very High sensitivity	High	Medium	Low
	sensitivity	sensitivity	sensitivity
			Х

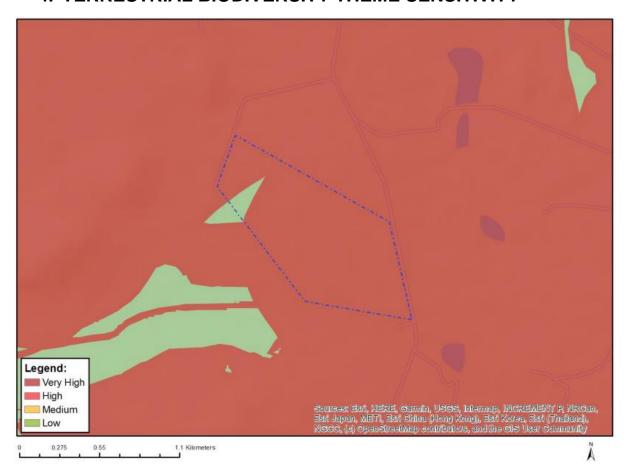
#### **Sensitivity Features:**

Sensitivity	Feature(s)	
Low	Features with a Low paleontological sensitivity	

#### 3.1. MOTIVATION FOR EXCLUSION:

A Phase 1 HIA study was already conducted and included in the Draft BAR (**Appendix G**). Aspects concerning Paleontological themes were included in the phase one HIA study.

#### 4. TERRESTRIAL BIODIVERSITY THEME SENSITIVITY



Very High sensitivity	High sensitivity	Medium sensitivity	Low sensitivity
X			

#### **Sensitivity Features:**

Sensitivity	Feature(s)
Low	Low Sensitivity
Very High	CBA 1
Very High	ESA 1
Very High	ESA 2
Very High	National Protected Area Expansion Strategy (NPAES)
Very High	VU_Soweto Highveld Grassland

#### 4.1. MOTIVATION FOR EXCLUSION:

A terrestrial ecological study addresses biodiversity concern (Appendix G). These studies have already been conducted and are included in the Draft BAR.

# 5. MAP OF RELATIVE AQUATIC BIODIVERSITY THEME SENSITIVITY



Very High sensitivity	High sensitivity	Medium sensitivity	Low sensitivity
			Χ

#### **Sensitivity Features:**

Sensitivity	Feature(s)
Low	Low Sensitivity

#### 5.1. MOTIVATION FOR EXCLUSION:

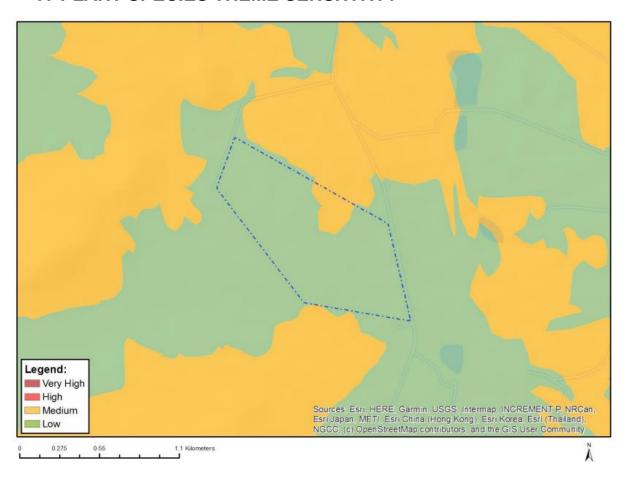
The aquatic biodiversity theme was assigned a low sensitivity due to the absence of rivers, streams and wetlands on the proposed development site and no development will occur within 32 m of a watercourse. For the reasons mentioned above the EAP deems it unnecessary to include an aquatic biodiversity impact assessment.

#### 6. SOCIO-ECONOMIC THEME SENSITIVITY

#### **6.1. MOTIVATION FOR EXCLUSION:**

The project will provide jobs for the local community members and address national food security. No negative impacts are expected regarding the socio-economic theme of the development. For the reasons mentioned above the EAP deems it unnecessary to include a socio-economic impact assessment.

#### 7. PLANT SPECIES THEME SENSITIVITY



Very High sensitivity	High sensitivity	Medium sensitivity	Low sensitivity
		Х	

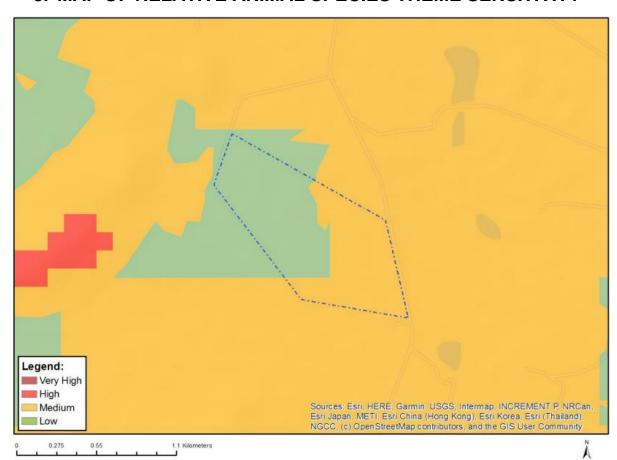
Sensitivity	Feature(s)
Low	Low Sensitivity
Medium	Sensitive species 1252
Medium	Khadia beswickii
Medium	Delosperma macellum

Medium	Sensitive species 691	
Medium	Sensitive species 1248	
Medium	Prunus africana	

#### 7.1. MOTIVATION FOR EXCLUSION:

A terrestrial ecological assessment was already conducted and included in the Draft BAR (**Appendix G**).

## 8. MAP OF RELATIVE ANIMAL SPECIES THEME SENSITIVITY



Very High sensitivity	High	Medium	Low
	sensitivity	sensitivity	sensitivity
		X	

Sensitivity	Feature(s)
Low	Subject to confirmation
Medium	Insecta - Lepidochrysops procera
Medium	Insecta - Orachrysops mijburghi
Medium	Mammalia - Crocidura maquassiensis
Medium	Mammalia - Hydrictis maculicollis

#### 8.1. MOTIVATION FOR EXCLUSION:

The animal species theme was assigned a medium sensitivity due to the possible occurrence of two mammal and one invertebrate elements. Due to the site being disturbed, isolated and within an agricultural area, it is very unlikely for any of the species identified from the screening tool report to occur on-site. During the terrestrial ecology study, the specialist did not encounter any of the above-mentioned species (Appendix G). For the reasons mentioned above the EAP deems it unnecessary to include an animal species impact assessment.