# VISUAL IMPACT ASSESSMENT FOR THE PROPOSED EZELSJACHT SOLAR ENERGY FACILITY

Prepared for: South Africa Mainstream Renewable Power Developments (Pty) Ltd

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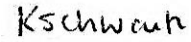

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**Kerry Schwartz**
**(Project Manager)**

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**Liandra Scott-Shaw**
**(Reviewer)**

# BASIS OF REPORT

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**National Environmental Management Act, 1998 (Act No. 107 of 1998) (NEMA) and Environmental Impact Assessment (EIA) Regulations, 2014 (as amended) - Requirements for Specialist Reports (Appendix 6)**

| **Regulation GNR 326 of 4 December 2014, as amended 7 April 2017, Appendix 6** | **Section of Report** |
|---|---|
| (a) details of the specialist who prepared the report; and the expertise of that specialist to compile a specialist report including a *curriculum vitae*; | **Section 1.3**<br>**Appendix B** |
| (b) a declaration that the specialist is independent in a form as may be specified by the competent authority; | **Appendix B** |
| (c) an indication of the scope of, and the purpose for which, the report was prepared; | **Section 1.2**<br>**Appendix A** |
| (cA) an indication of the quality and age of base data used for the specialist report; | **Section 1.4**<br>**Section 1.5** |
| (cB) a description of existing impacts on the site, cumulative impacts of the proposed development and levels of acceptable change; | **Section 6**<br>**Section 8** |
| (d) the duration, date and season of the site investigation and the relevance of the season to the outcome of the assessment; | **Section 1.4**<br>**Section 2** |
| (e) a description of the methodology adopted in preparing the report or carrying out the specialised process inclusive of equipment and modelling used; | **Section 1.4**<br>**Appendix E** |
| (f) details of an assessment of the specific identified sensitivity of the site related to the proposed activity or activities and its associated structures and infrastructure, inclusive of a site plan identifying site alternatives; | **Section 6** |
| (g) an identification of any areas to be avoided, including buffers; | **Section 6.3**<br>**Section 8** |
| (h) a map superimposing the activity including the associated structures and infrastructure on the environmental sensitivities of the site including areas to be avoided, including buffers; | **Section 6.3** |
| (i) a description of any assumptions made and any uncertainties or gaps in knowledge; | **Section 2** |
| (j) a description of the findings and potential implications of such findings on the impact of the proposed activity, including identified alternatives on the environment or activities; | **Section** Error! Reference source not found.<br>**Section 9** |
| (k) any mitigation measures for inclusion in the EMPr; | **Section 8.5** |
| (l) any conditions for inclusion in the environmental authorisation; | No specific conditions relating to the visual environment need to be included in the environmental authorisation (EA) |
| (m) any monitoring requirements for inclusion in the EMPr or environmental authorisation; | **Section 8.5** |
| (n) a reasoned opinion—<br>i. whether the proposed activity, activities or portions thereof should be authorised;<br>iA. Regarding the acceptability of the proposed activity or activities; and<br>ii. if the opinion is that the proposed activity, activities or portions thereof should be authorised, any avoidance, management and mitigation measures | **Section 10.1** |

| | |
|---|---|
| that should be included in the EMPr or Environmental Authorization, and where applicable, the closure plan; | |
| (o) a summary and copies of any comments received during any consultation process and where applicable all responses thereto; and | No feedback has yet been received from the public participation process regarding the visual environment |
| (p) any other information requested by the competent authority | No information regarding the visual study has been requested from the competent authority to date. |
| (2) Where a government notice gazetted by the Minister provides for any protocol or minimum information requirement to be applied to a specialist report, the requirements as indicated in such notice will apply. | **N/A** |

# EXECUTIVE SUMMARY

South Africa Mainstream Renewable Power Developments (Pty) Ltd (hereafter referred to as "Mainstream"), is proposing to construct the 110MW Ezelsjacht Solar Energy Facility (SEF) and associated grid connection infrastructure near De Doorns in the Western Cape Province. The proposed SEF development will be subject to a full Environmental Impact Assessment (EIA) process in terms of the National Environmental Management Act (Act 107 of 1998) (NEMA) as amended and EIA Regulations, 2014 (as amended). Accordingly, an EIA process as contemplated in terms of the EIA Regulations (2014, as amended) is being undertaken in respect of the proposed SEF project. The competent authority for this EIA is the national Department of Forestry, Fisheries and Environment (DFFE).

The VIA has determined that the study area has a largely natural visual character with some pastoral elements. The area has seen very limited transformation or disturbance and as such the proposed Ezelsjacht SEF development is expected to alter the visual character of the area and contrast significantly with the typical land use and / or pattern and form of human elements present. The level of contrast will however be slightly reduced by the presence of the R318 Main Road and existing high voltage power lines traversing the study area.

A broad-scale assessment of visual sensitivity, based on the physical characteristics of the study area, economic activities and land use that predominates, determined that the area would have a moderate visual sensitivity. However, an important factor contributing to the visual sensitivity of an area is the presence, or absence of visual receptors that may value the aesthetic quality of the landscape and depend on it to produce revenue and create jobs.

No protected areas were identified in the study area and only four (4) potentially sensitive visual receptor locations were identified within 5km of the SEF project area boundary. One of these receptors was found to be linked to leisure-based (specifically nature-based) tourism is therefore considered to be a sensitive receptor, this being Ezelsjacht Guest Farm (SR5). However, the visibility assessment found this receptor location to be outside the viewshed for the SEF project area. In addition, it is known that this receptor and the SEF development are located on land owned by the same landowner. As such, the property owner is has a vested interest in the SEF project.

The remaining three (3) receptors identified appear to be farmsteads which are regarded as potentially sensitive visual receptors as they are located within a mostly rural setting with natural vistas that will likely be altered by the proposed development. Local sentiments toward the proposed development are however unknown at this stage. All but one of these receptors were found to be outside the viewshed for the SEF and project area and although VR1 is inside the viewshed, the visibility assessment indicated that only a small section of the eastern boundary of the SEF project area would be visible from this location.

The R318 Main Road that traverses the study area is considered to have scenic and rural value and is utilised, to some extent, for its tourism potential. As a result, it is considered to be a potentially sensitive receptor road – i.e. a road being used by motorists who may object to the potential visual intrusion of the proposed SEF and associated infrastructure. However, the major portion of this road within the study area is outside the viewshed for the project area and as such motorists travelling along these sections of the route will not experience any impacts as a result of the development. Sections of the route that are within the viewshed

are all more than 2km from the project area boundary and as such impacts affecting these sections of the route are expected to be low.

A preliminary assessment of overall impacts revealed that impacts associated with the proposed Ezelsjacht SEF are of **MODERATE** significance during both construction and decommissioning phases. During operation, visual impacts from the SEF would be of **MODERATE** significance with relatively few mitigation measures available to reduce the visual impact.

Four (4) additional existing and proposed renewable energy developments and infrastructure projects were identified within a 30km radius of the Ezelsjacht SEF project. All of these projects are outside the assessment zone for the Ezelsjacht SEF and most are located in close proximity to main roads or built-up areas. In light of this and considering the hilly nature of the terrain, it is not anticipated that these developments will result in any significant cumulative impacts affecting the landscape or the visual receptors within the assessment zone for the Ezelsjacht SEF project.

However, a cumulative assessment must include the proposed Ezelsjacht WEF and associated grid connection project, both of which are located in close proximity to the Ezelsjacht SEF project area. From a visual perspective, the concentration of renewable energy facilities as proposed will further change the visual character of the area and alter the inherent sense of place, extending an increasingly industrial character into the broader area, and resulting in significant cumulative impacts. It is however anticipated that these impacts could be mitigated to acceptable levels with the implementation of the recommended mitigation measures. In addition, it is possible that these developments in close proximity to each other could be seen as one large Renewable Energy Facility (REF) rather than several separate developments. Although this will not necessarily reduce impacts on the visual character of the area, it could potentially reduce the cumulative impacts on the landscape.

In light of this and the relatively low level of human habitation in the study area however, cumulative impacts have been rated as **MODERATE**.

From a visual perspective, there are no fatal flaws associated with the proposed Ezelsjacht SEF project area.

# CONTENTS



## LIST OF TABLES



## LIST OF FIGURES

## APPENDICES

# ACRONYMS AND ABBREVIATIONS

| Acronym / Abbreviation | Definition |
|---|---|
| BA | Basic Assessment |
| DBAR | Draft Basic Assessment Report |
| DEIAR | Draft Environmental Impact Assessment Report |
| DEM | Digital Elevation Model |
| DFFE | Department of Forestry, Fisheries and Environment |
| DM | District Municipality |
| DSR | Draft Scoping Report |
| DTM | Digital Terrain Model |
| EA | Environmental Authorisation |
| EIA | Environmental Impact Assessment |
| EMP | Environmental Management Plan |
| FEIAR | Final Environmental Impact Assessment Report |
| FSR | Final Scoping Report |
| GIS | Geographic Information System |
| I&AP | Interested and/or Affected Party |
| IPP | Independent Power Producer |
| LM | Local Municipality |
| kV | Kilovolt |
| MW | Megawatt |
| NGI | National Geo-Spatial Information |
| REF | Renewable Energy Facility |
| REIPPP | Renewable Energy Independent Power Producer Programme |
| SACAA | South African Civil Aviation Authority |
| SANBI | South African National Biodiversity Institute |
| SEF | Solar Energy Facility |
| VIA | Visual Impact Assessment |
| VR | Visual Receptor |
| WEF | Wind Energy Facility |

# DEFINITIONS

**Anthropogenic feature:** An unnatural feature resulting from human activity.

**Cultural landscape:** A representation of the combined worlds of nature and of man illustrative of the evolution of human society and settlement over time, under the influence of the physical constraints and/or opportunities presented by their natural environment and of successive social, economic and cultural forces, both external and internal (World Heritage Committee, 1992).

**Sense of place:** The unique quality or character of a place, whether natural, rural or urban. It relates to uniqueness, distinctiveness or strong identity.

**Scenic route:** A linear movement route, usually in the form of a scenic drive, but which could also be a railway, hiking trail, horse-riding trail or 4x4 trail.

**Sensitive visual receptors:** An individual, group or community that is subject to the visual influence of the proposed development and is adversely impacted by it. They will typically include locations of human habitation and tourism activities.

**Sky Space:** The area in which the turbine rotors would rotate.

**Slope Aspect:** Direction in which a hill or mountain slope faces.

**Study area / Visual Assessment Zone:** The area with a zone of 10km from the outer boundary of the proposed WEF application site, and 5km from the proposed SEF and grid connection corridor alternatives.

**Viewpoint:** A point in the landscape from where a particular project or feature can be viewed.

**Viewshed / Visual Envelope:** The geographical area which is visible from a particular location.

**Visual character:** The pattern of physical elements, landforms and land use characteristics that occur consistently in the landscape to form a distinctive visual quality or character.

**Visual contrast:** The degree to which the development would be congruent with the surrounding environment. It is based on whether or not the development would conform with the land use, settlement density, forms and patterns of elements that define the structure of the surrounding landscape.

**Visual exposure:** The relative visibility of a project or feature in the landscape.

**Visual impact:** The effect of an aspect of the proposed development on a specified component of the visual, aesthetic or scenic environment within a defined time and space.

**Visual receptors:** An individual, group or community that is subject to the visual influence of the proposed development but is not necessarily adversely impacted by it. They will typically include commercial activities, residents and motorists travelling along routes that are not regarded as scenic.

**Visual sensitivity:** The inherent sensitivity of an area to potential visual impacts associated with a proposed development. It is based on the physical characteristics of the area (visual character), spatial distribution of potential receptors, and the likely value judgements of these receptors towards the new development, which are usually based on the perceived aesthetic appeal of the area.

# Visual Impact Assessment for the Proposed Ezelsjacht Solar Energy Facility

## 1. INTRODUCTION

South Africa Mainstream Renewable Power Developments (Pty) Ltd (hereafter referred to as "Mainstream"), is proposing to construct the 110MW Ezelsjacht Solar Energy Facility (SEF) and associated infrastructure near De Doorns in the Western Cape Province. The proposed SEF development will be subject to a full Environmental Impact Assessment (EIA) process in terms of the National Environmental Management Act (Act 107 of 1998) (NEMA) as amended and EIA Regulations, 2014 (as amended). Accordingly, an EIA process as contemplated in terms of the EIA Regulations (2014, as amended) is being undertaken in respect of the proposed SEF project. The competent authority for this EIA is the national Department of Forestry, Fisheries and Environment (DFFE).

Grid connection infrastructure for the SEF will be subject to a separate Basic Assessment (BA) Process as contemplated in terms of regulation 19 and 20 of the EIA Regulations, 2014, which will be undertaken in parallel to the EIA Phase for the SEF process.

Specialist studies have been commissioned to assess and verify the proposed development under the new Gazetted specialist protocols[1].

### 1.1 SCOPE AND OBJECTIVES

This Visual Impact Assessment (VIA) is being undertaken as part of the EIA process. The aim of the VIA is to identify potential visual issues associated with the development of the proposed SEF as well as to determine the potential extent of visual impacts. This will be achieved by determining the character of the visual environment and identifying areas of potential visual sensitivity that may be subject to visual impacts. The visual assessment focuses on the potentially sensitive visual receptor locations and provides an assessment of the magnitude and significance of the visual impacts associated with the SEF.

### 1.1 SPECIALIST CREDENTIALS

This VIA was undertaken by Kerry Schwartz, a GIS specialist with more than 25 years' experience in the application of GIS technology in various environmental, regional planning and infrastructural projects. Kerry's GIS and spatial analysis skills have been extensively utilised in projects throughout South Africa and in other African countries. Kerry has also undertaken many VIAs in recent years and the relevant VIA project experience is listed in the table below.

A Curriculum Vitae and a signed specialist statement of independence are included in Appendix A of this specialist assessment.

**Table 1: Relevant Project Experience**

| | |
|---|---|
| Visual Specialist | SLR Consulting – Kerry Schwartz |
| Contact Details | klschwartz@slrconsulting.com |
| Qualifications | BA (Geography), University of Leeds 1982 |

[1] Formally gazetted on 20 March 2020 (GN No. 320)

| | |
|---|---|
| VIA Expertise | • VIAs (EIAs) for the proposed Koup 1 and Koup 2 WEFs and associated Grid Connection Infrastructure, near Beaufort West, Western Cape Province.<br>• VIA (EIA) for the proposed Oya Energy Facility near Matjiesfontein, Western Cape Province;<br>• VIA (BA) for the proposed construction of 132kV power lines to serve the authorised Loeriesfontein 3 PV Solar Energy Facility near Loeriesfontein, Northern Cape Province;<br>• VIA (BA) for the proposed construction of the Oya 132kV power line near Matjiesfontein, Northern and Western Cape Provinces;<br>• VIAs (BA) for the proposed Gromis WEF and associated Grid Connection Infrastructure, near Komaggas, Northern Cape Province.<br>• VIAs (BA) for the proposed Komas WEF and associated Grid Connection Infrastructure, near Komaggas, Northern Cape Province.<br>• VIAs (Scoping and Impact Phase) for the proposed Mooi Plaats, Wonderheuvel and Paarde Valley solar PV plants near Noupoort in the Northern and Eastern Cape Provinces.<br>• VIAs (Scoping and Impact Phase) for the proposed Sendawo 1, 2 and 3 solar PV energy facilities near Vryburg, North West Province.<br>• VIAs (Scoping and Impact Phase) for the proposed Tlisitseng 1 and 2 solar PV energy facilities near Lichtenburg, North West Province.<br>• VIA for the proposed Nokukhanya 75MW Solar PV Power Plant near Dennilton, Limpopo Province.<br>• VIAs (Scoping and Impact Phase) for the proposed Helena 1, 2 and 3 75MW Solar PV Energy Facilities near Copperton, Northern Cape Province.<br>• VIA (EIA) for the proposed Paulputs WEF near Pofadder in the Northern Cape Province.<br>• VIA (EIA) for the proposed development of the Rondekop WEF near Sutherland in the Northern Cape Province.<br>• VIA (BA) for the proposed development of the Tooverberg WEF near Touws Rivier in the Western Cape Province.<br>• VIA (BA) for the proposed development of the Kudusberg WEF near Sutherland, Northern and Western Cape Provinces.<br>• VIA (Scoping and Impact Phase) for the proposed development of the Kuruman Wind Energy Facility near Kuruman, Northern Cape Province.<br>• VIA (Scoping and Impact Phase) for the proposed development of the Phezukomoya Wind Energy Facility near Noupoort, Northern Cape Province.<br>• VIA (Scoping and Impact Phase) for the proposed development of the San Kraal Wind Energy Facility near Noupoort, Northern Cape Province.<br>• VIAs (Scoping and Impact Phase) for the proposed Graskoppies Wind Farm near Loeriesfontein, Northern Cape Province.<br>• VIAs (Scoping and Impact Phase) for the proposed Hartebeest Leegte Wind Farm near Loeriesfontein, Northern Cape Province.<br>• VIAs (Scoping and Impact Phase) for the proposed Ithemba Wind Farm near Loeriesfontein, Northern Cape Province.<br>• VIAs (Scoping and Impact Phase) for the proposed Xha! Boom Wind Farm near Loeriesfontein, Northern Cape Province |

## 1.2 ASSESSMENT METHODOLOGY

This VIA is based on a combination of desktop-level assessment supported by field-based observation.

### 1.2.1 Physical landscape characteristics

Physical landscape characteristics such as topography, vegetation and land use are important factors influencing the visual character and visual sensitivity of the study area. Baseline information about the physical characteristics of the study area was initially sourced from spatial databases provided by National Geo-Spatial Information (NGI), the South African National Biodiversity Institute (SANBI) and the South African National Land Cover Dataset (Geoterraimage – 2020). The characteristics identified via desktop means were later verified during the site visit.

### 1.2.2 Identification of sensitive receptors

Visual receptor locations and routes that are sensitive and/or potentially sensitive to the visual intrusion of the proposed development were identified and assessed in order to determine the impact of the proposed development on these receptor locations.

### 1.2.3 Fieldwork and photographic review

A three (3) day site visit was undertaken between the 3rd and the 5th of October 2022 (early summer). The purpose of the site visit was to:

- verify the landscape characteristics identified via desktop means;
- conduct a photographic survey of the study area;
- verify, where possible, the sensitivity of visual receptor locations identified via desktop means;
- eliminate receptor locations that are unlikely to be influenced by the proposed development;
- identify any additional visually sensitive receptor locations within the study area; and
- inform the impact rating assessment of visually sensitive receptor locations (where possible).

### 1.2.4 Visual / Landscape Sensitivity

GIS technology was used to identify any specific areas of potential visual sensitivity within the Ezelsjacht SEF development site. These would be areas where the placement of solar panels or the establishment of a new power line would result in the greatest probability of visual impacts on potentially sensitive visual receptors.

In addition, the National Environmental Screening Tool[2] was examined to determine any relative landscape sensitivity in respect of the proposed development.

### 1.2.5 Impact Assessment

For the purposes of the Scoping Phase report, a broad the assessment of potential visual issues / impacts resulting from the proposed Ezelsjacht SEF will be undertaken and possible mitigation measures will be provided.

A full assessment of impacts and rating matrix for the proposed development will be presented in the EIA phase VIA.

[2] https://screening. environment.gov.za/screeningtool/

### 1.2.6 Consultation with I&APs

Continuous consultation with Interested and Affected Parties (I&APs) undertaken during the public participation process will be used (where available) to help establish how the proposed development will be perceived by the various receptor locations and the degree to which the impact will be regarded as negative. Although I&APs have not yet provided any feedback in this regard, the EIA phase report will be updated to include relevant information as and when it becomes available.

## 1.3 SOURCES OF INFORMATION

The main sources of information utilised for this VIA included:

- Project description for the proposed development provided by Mainstream;
- Elevation data from 25m Digital Elevation model (DEM) from the NGI;
- 1:50 000 topographical maps of South Africa from the NGI;
- Land cover and land use data extracted from the 2020 South African National Land-Cover Dataset provided by GEOTERRAIMAGE;
- Vegetation classification data extracted from the South African National Biodiversity Institute's (SANBI's) VEGMAP 2018 dataset;
- Google Earth Satellite imagery 2022;
- South African Renewable Energy EIA Application Database from Department of Environmental Affairs (incremental release Quarter 3 2021);
- The National Web-Based Environmental Screening Tool, Department of Forestry, Fisheries and Environment (DFFE).

# 2. ASSUMPTIONS AND LIMITATIONS

- Given the nature of the receiving environment and the height of the proposed PV panels and associated infrastructure elements, the study area or visual assessment zone is assumed to encompass an area of 5km from the proposed SEF – i.e., an area of 5km from the boundary of the SEF project area. This limit on the visual assessment zone relates to the fact that visual impacts decrease exponentially over distance. Thus, although the proposed development may still be visible beyond 5 km, the degree of visual impact would diminish considerably. As such, the need to assess the impact on potential receptors beyond this distance would not be warranted.
- The identification of visual receptors involved a combination of desktop assessment as well as field-based observation. Initially Google Earth imagery was used to identify potential receptors within the study area. Where possible, these receptor locations were verified and assessed during a site visit which was undertaken between the 3rd and the 5th of October 2022. Due to the extent of the study area however, and the fact that many of the identified receptors are farmhouses on private property, it was not possible to visit or verify every potentially sensitive visual receptor location. As such, a number of broad assumptions have been made in terms of the likely sensitivity of the receptors to the proposed development. Sensitive receptor locations typically include sites such as tourism or recreational facilities and scenic locations within natural settings which are likely to be adversely affected by the visual intrusion of the proposed development. It should be noted however that not all receptor locations would necessarily perceive the proposed development in a negative way. This is usually dependent on the use of the facility, the economic dependency of the occupants on the scenic quality of views from the facility and on people's perceptions of the value of "Green

Energy". Thus, the presence of a receptor in an area potentially affected by the proposed development does not necessarily mean that any visual impact will be experienced.

- As stated, the exact status of all the receptors could not be verified during the field investigation and as such the receptor impact rating was largely undertaken via desktop means.
- Receptors that were assumed to be farmsteads were still regarded as being potentially sensitive to the visual impacts associated with the proposed development and were thus assessed as part of the VIA.
- Based on the project description provided by Mainstream, all analysis for this VIA is based on a worst-case scenario where PV panel heights are assumed to be 5 m. Substation, Battery Energy Storage (BESS) facilities and office building heights are assumed to be no more than 10m in height.
- Due to the varying scales and sources of information; maps may have minor inaccuracies. Terrain data for this area, derived from the National Geo-Spatial Information (NGI)'s 25m Digital Elevation Model (DEM), is fairly coarse and somewhat inconsistent and as such, localised topographic variations in the landscape may not be reflected on the DEM used to generate the viewshed(s) and visibility analysis conducted in respect of the proposed development.
- In addition, the viewshed / visibility analysis does not take into account any existing vegetation cover or built infrastructure which may screen views of the proposed development. This analysis should therefore be seen as a conceptual representation or a worst-case scenario.
- No feedback regarding the visual environment has been received from the public participation process to date. Any feedback from the public during the review period of the Draft Scoping Report (DSR) for the SEF will however be incorporated into further drafts of this report, if relevant.
- At the time of undertaking the visual study no information was available regarding the type and intensity of lighting that will be required for the proposed SEF and therefore the potential impact of lighting at night has not been assessed at a detailed level. However, lighting requirements are relatively similar for all SEFs and as such, general measures to mitigate the impact of additional light sources on the ambiance of the nightscape have been provided.
- At the time of undertaking the visual study no *detailed* information was available regarding the likely layout of the PV arrays and associated infrastructure. The potential visual impact of a typical SEF and associated infrastructure has therefore been assessed.
- In the light of the fact that the renewable energy industry is still relatively new in South Africa, this report draws on international literature and web material to describe the generic impacts associated with SEFs.
- At the time of writing this report, the proposed PV layout was still in the preliminary design phase and as such, no visualisation modelling (photomontages) was undertaken for the proposed development
- The assessment of the potential cumulative impacts of other renewable energy developments on the existing landscape character and on the identified sensitive receptors will be provided in the EIA Phase VIA.
- It should be noted that the fieldwork for this study was undertaken in early October 2022, during early summer. However, the study area is typically characterised by low levels of rainfall all year round and therefore the season is not expected to affect the significance of the potential visual impact of the proposed Ezelsjacht SEF development.
- The overall weather conditions in the study area have certain visual implications and are expected to affect the visual impact of the proposed development to some degree. Clear weather conditions tend to prevail throughout the year in the study area. In these clear conditions, the PV panels would

present a greater contrast with the surrounding environment than they would on an overcast day. Clear and overcast weather conditions were experienced during the field investigation and this factor was taken into consideration when undertaking this VIA.

# 3. TECHNICAL DESCRIPTION

## 3.1 PROJECT LOCATION

The proposed SEF is located approximately 18km south-east of De Doorns in the Western Cape Province and is within the Breede Valley Local Municipality, in the Cape Winelands District Municipality (**Figure 1**),

The SEF project area as shown on the locality map below (**Figure 2**) is approximately 370 hectares (ha) in extent and is located on Portion 6 of the Farm Ratelbosch No 149.

A smaller buildable area will however be identified as a result of the exclusion of sensitive areas as determined through various specialist studies being conducted as part of the EIA process.

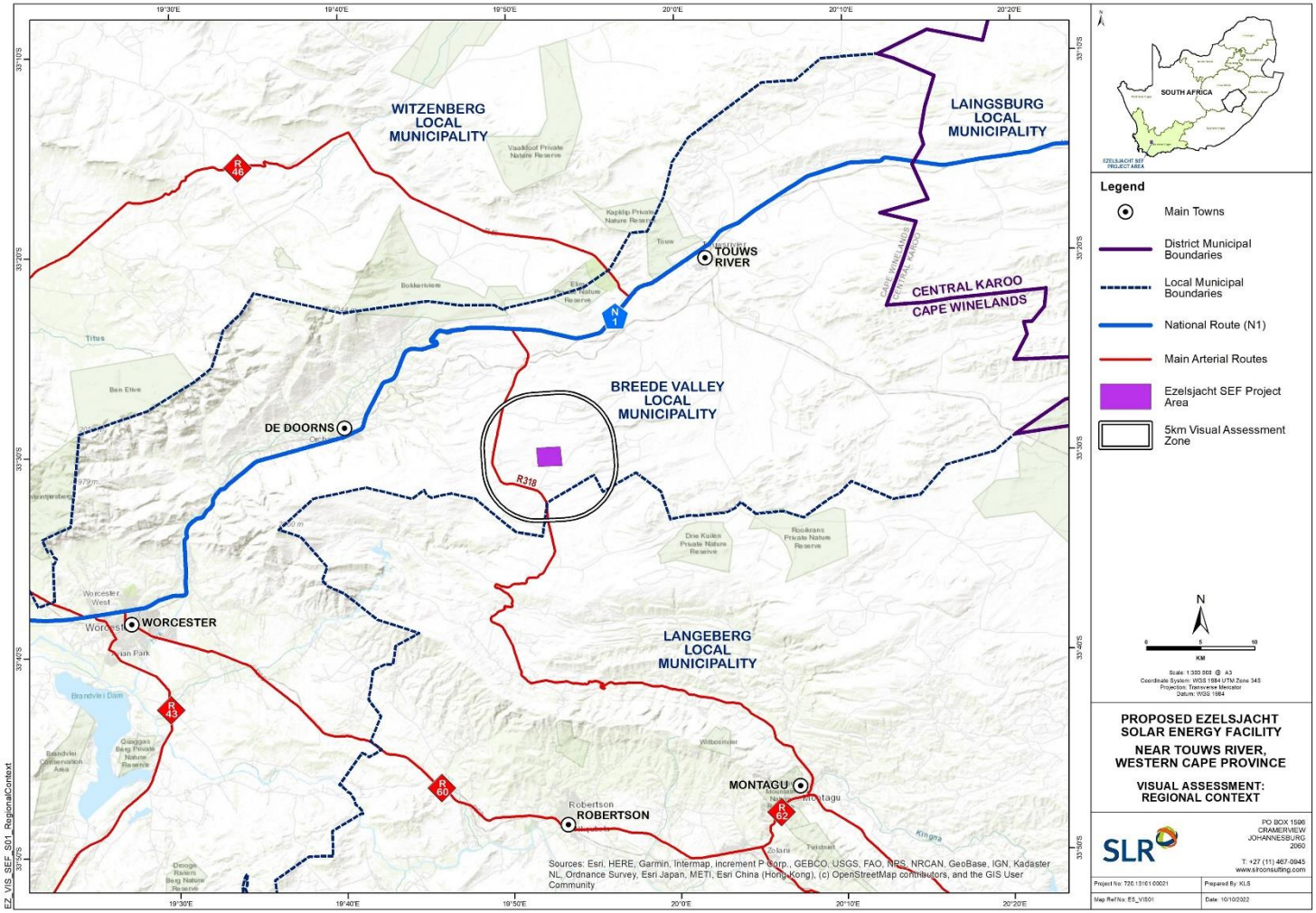


**Figure 1: Ezelsjacht SEF in the regional context**

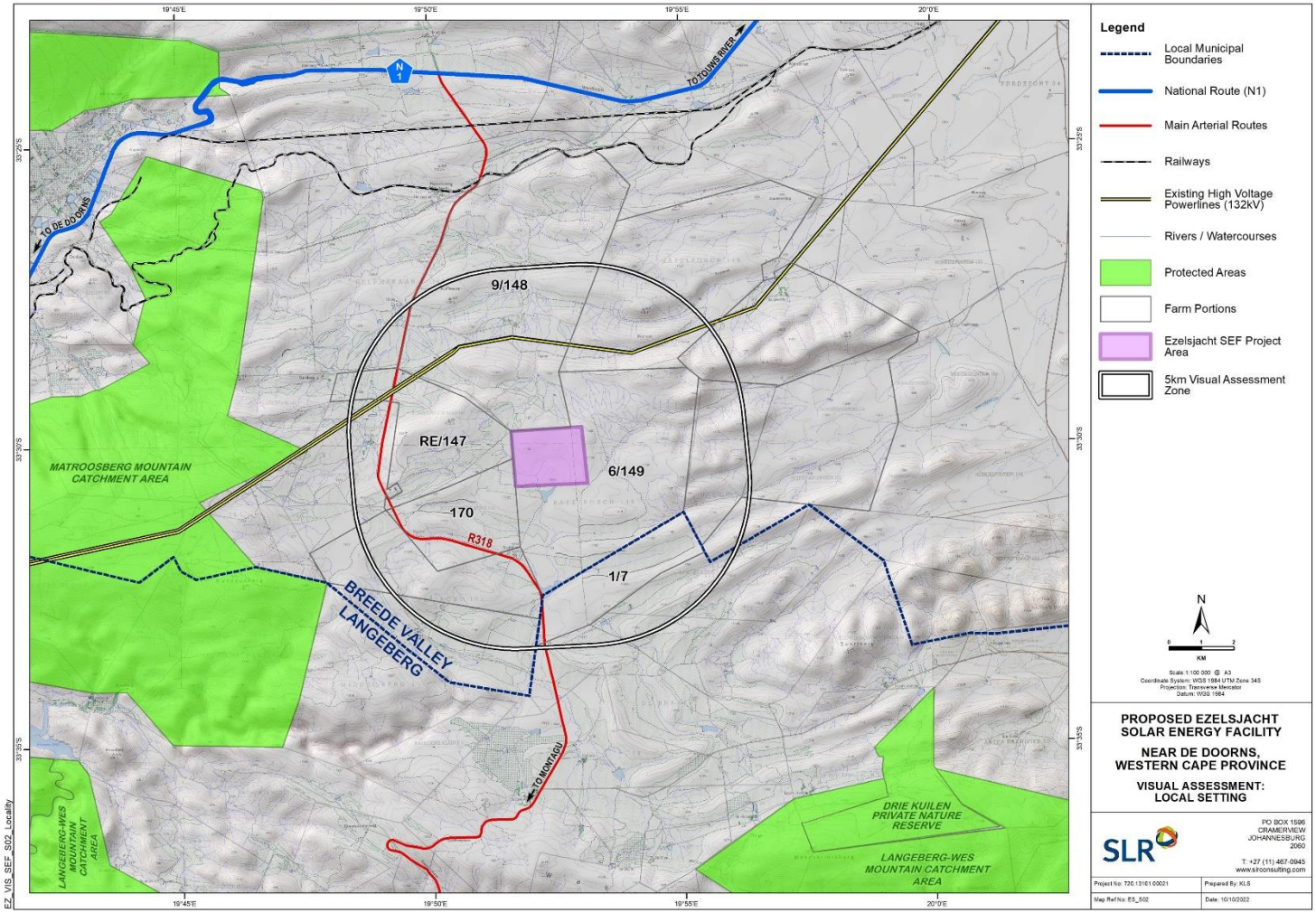


**Figure 2: Ezelsjacht SEF site locality**

## 3.2 PROJECT TECHNICAL DETAILS

### 3.2.1 SOLAR FIELDS

- At this stage, it is anticipated that the proposed SEF will include PV fields (arrays) comprising multiple PV modules. The PV modules are arranged in rows and columns, some of which may require levelling of the terrain and associated slope stabilisation measures.
- Solar PV panels will be on a 60° rotational tracker and will have a PV panel and tracker height of up to 5m (**Figure 3**).

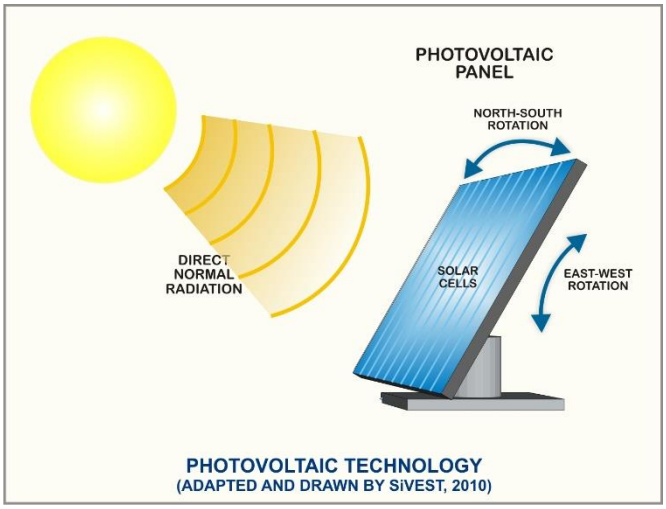


**Figure 3: Typical components of a solar PV panel**

### 3.2.2 ON-SITE INFRASTRUCTURE

- A 25 hectare (ha) site is being assessed as an Infrastructure Area that will accommodate:
  - 33/132kV IPP portion of the substation (
  - Operations and Maintenance (O&M) Building (1 ha);
  - Temporary construction laydown area of approximately 3ha. It should be noted that no construction camps will be required in order to house workers overnight.
  - Battery Energy Storage System (BESS) of up to 500MWh will be located within the assessed area and will cover an area of 5 ha. The type of technology would be determined during the EIA phase, the types of technologies to be considered will be either redox flow or solid state.
- Internal access roads with a width of up to 12m (existing access roads will be used as far as possible).
- Galvanised steel fencing (1.8m high).
- Associated infrastructure including:
  - Cabling: Underground 33kV cables, buried along internal access roads where feasible; and outside of the road footprints and where there are topography and environmental concerns. Overhead 33kV power lines will be constructed, using monopole structures where burying is not possible due to technical, geological, environmental or topographical constraints.33kV overhead power lines supported by 132 kV pylons of approximately 22 m high will be required, as well as tracks for access to the pylons.

- Electrical transformers adjacent to Panels (typical footprint of up to approximately 2m x 2m) to step up the voltage to between 11kV and 33kV.

### 3.2.3 EIA Layout Alternatives

No layout alternatives are being considered for the solar PV energy facility, as the location of the solar PV array has been determined based on identified sensitive and/or no-go areas. The findings of the respective specialist studies will be used to further inform the location of the solar PV array. All identified sensitive and/or no-go areas (including their respective buffers) will be avoided accordingly, as required.

However, as part of the proposed Scoping & EIA process for the SEF project, various site area / location alternatives (with sizes to be confirmed) will be assessed for the associated infrastructure such as the construction laydown area, O&M Buildings, IPP Substations and BESS. However, no site alternatives have yet been assessed.

# 4. LEGAL REQUIREMENTS AND GUIDELINES

Key legal requirements pertaining to the proposed SEF development are outlined below.

In terms of the National Environmental Management Act, 1998 (Act No. 107 of 1998), (NEMA) and the EIA Regulations 2014 (as amended), the proposed development includes listed activities which require a full Environmental Impact Assessment (EIA) to be undertaken. As part of the EIA process, the need for a VIA to be undertaken has been identified in order to assess the visual impact of the proposed SEF.

There is currently no legislation within South Africa that explicitly pertains to the assessment of visual impacts, however in addition to NEMA the following legislation has relevance to the protection of scenic resources:

- National Environmental Management: Protected Areas Act, 2003 (Act No. 57 of 2003)
- National Heritage Resources Act, 1999 (Act No. 25 of 1999)

Based on these Acts protected or conservation areas and sites or routes with cultural or symbolic value have been taken into consideration when identifying sensitive and potentially sensitive receptor locations and rating the sensitivity of the study area.

Accordingly, this specialist visual assessment has been undertaken in compliance with Appendix 6 of 2014 NEMA EIA Regulations (as amended).

# 5. FACTORS INFLUENCING VISUAL IMPACT

The degree of visibility of an object informs the level and intensity of the visual impact, but other factors also influence the nature of the visual impact. The landscape and aesthetic context of the environment in which the object is placed, as well as the perception of the viewer are also important factors.

## 5.1 VISUAL ENVIRONMENT

SEF developments are not features of the natural environment but are rather a representation of human (anthropogenic) alteration. As such, these developments are likely to be perceived as visually intrusive when placed in largely undeveloped landscapes that have a natural scenic quality and where tourism activities are practised that are dependent on the enjoyment of, or exposure to, the scenic or aesthetic character of the area. Residents and visitors to these areas could perceive the development to be highly incongruous in this context and may regard the development as an unwelcome intrusion which degrades the natural character and scenic beauty of the area, and which could potentially even compromise the practising of tourism activities in the area. This is particularly important in this instance as there are formal protected areas and some leisure / nature-based tourism facilities in the broader area, thus suggesting that the area has some tourism significance.

It should however be noted that the experience of the viewer is highly subjective and there are those who may not perceive features such as PV panels as a visual intrusion.

The presence of other anthropogenic features associated with the built environment may not only obstruct views but also influence the perception of whether a development is a visual impact. In industrial areas for example, where other infrastructure and built form already exists, the visual environment could be considered to be 'degraded' and thus the introduction of a SEF into this setting may be considered to be less visually intrusive than if there was no existing built infrastructure visible.

### 5.2 SUBJECTIVE EXPERIENCE OF THE VIEWER

The perception of the viewer / receptor toward an impact is highly subjective and involves 'value judgements' on behalf of the receptor. The viewer's perception is usually dependent on the age, gender, activity preferences, time spent within the landscape and traditions of the viewer (Barthwal, 2002). Thus, certain receptors may not consider a SEF and the associated grid connection infrastructure to be a negative visual impact as this type of development is often associated with employment creation, social upliftment and the general growth and progression of an area and could even have positive connotations.

### 5.3 TYPE OF VISUAL RECEPTOR

Visual impacts can be experienced by different types of receptors, including people living or working, or driving along roads within the viewshed of the proposed development. The receptor type in turn affects the nature of the typical 'view', with views being permanent in the case of a residence or other place of human habitation, or transient in the case of vehicles moving along a road. The nature of the view experienced affects the intensity of the visual impact experienced.

It is important to note that visual impacts are only experienced when there are receptors present to experience this impact. Thus, where there are no human receptors or viewers present, there are not likely to be any visual impacts experienced.

### 5.4 VIEWING DISTANCE

Viewing distance is a critical factor in the experiencing of visual impacts, as beyond a certain distance, even large developments tend to be much less visible, and difficult to differentiate from the surrounding landscape. The visibility of an object is likely to decrease exponentially as one moves away from the source of impact, with the impact at 1 000m being considerably less than the impact at a distance of 500m.

## 6. VISUAL CHARACTER AND SENSITIVITY OF THE STUDY AREA

Defining the visual character of an area is an important part of assessing visual impacts as this establishes the visual baseline or existing visual environment in which the development would be constructed. The visual impact of a development is measured by establishing the degree to which the development would contrast with, or conform to, the visual character of the surrounding area. The inherent sensitivity of the area to visual impacts or visual sensitivity is thereafter determined, based on the visual character, the economic importance of the scenic quality of the area, inherent cultural value of the area and the presence of visual receptors.

Physical and land use related characteristics, as outlined below, are important factors contributing to the visual character of an area.

## 6.1 PHYSICAL AND LAND USE CHARACTERISTICS

### 6.1.1 Topography

The site proposed for the Ezelsjacht SEF development lies to the north of the Langeberg Mountain Range at an average altitude of approximately 1200 meters above mean sea level (mamsl). The area is largely characterised by rolling hills and undulating plains (**Figure 4**). Areas of greater relief occur to the west and south-east of the study area where the Kwadousberg and Waboomberg Mountain Ranges form distinctive features in the landscape (**Figure 5**).

The SEF project area is located on a relatively flat to undulating plain, effectively bordered to the west, north and east by hills (**Figure 6**).

Maps showing the topography and slopes within and in the immediate vicinity of the SEF area are provided in **Figure 7**and **Figure 8**.


**Figure 4: Typical terrain in the Ezelsjacht SEF study area including undulating plains interspersed with low ridges.**

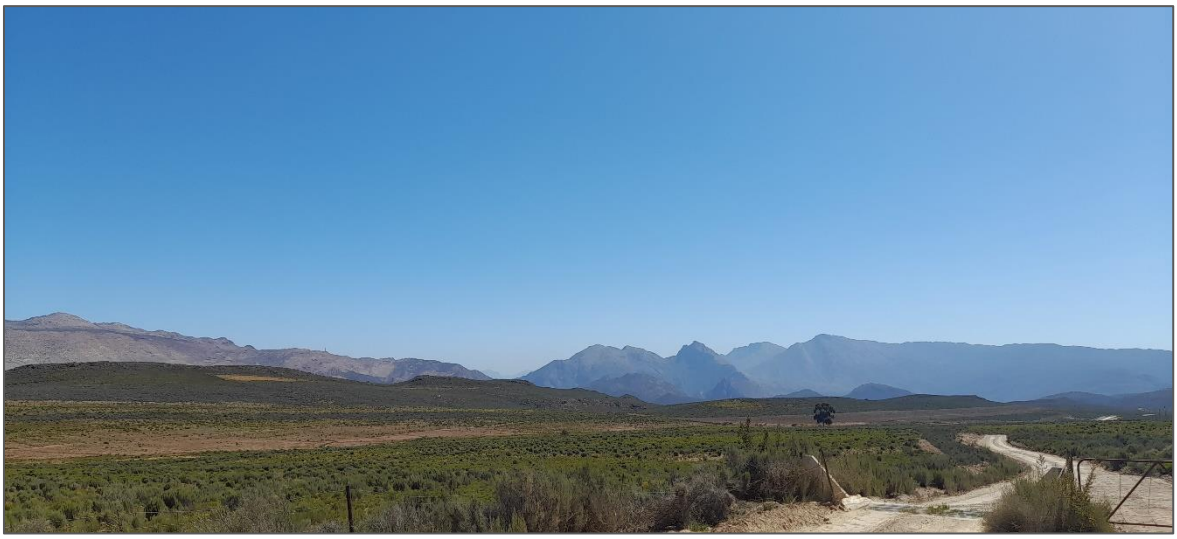

**Figure 5: View east from the R318 main Road towards the Waboomberg Mountain Range.**

**Figure 6: View towards the SEF project area from the R318 Main Road are obstructed by a range of hills.**

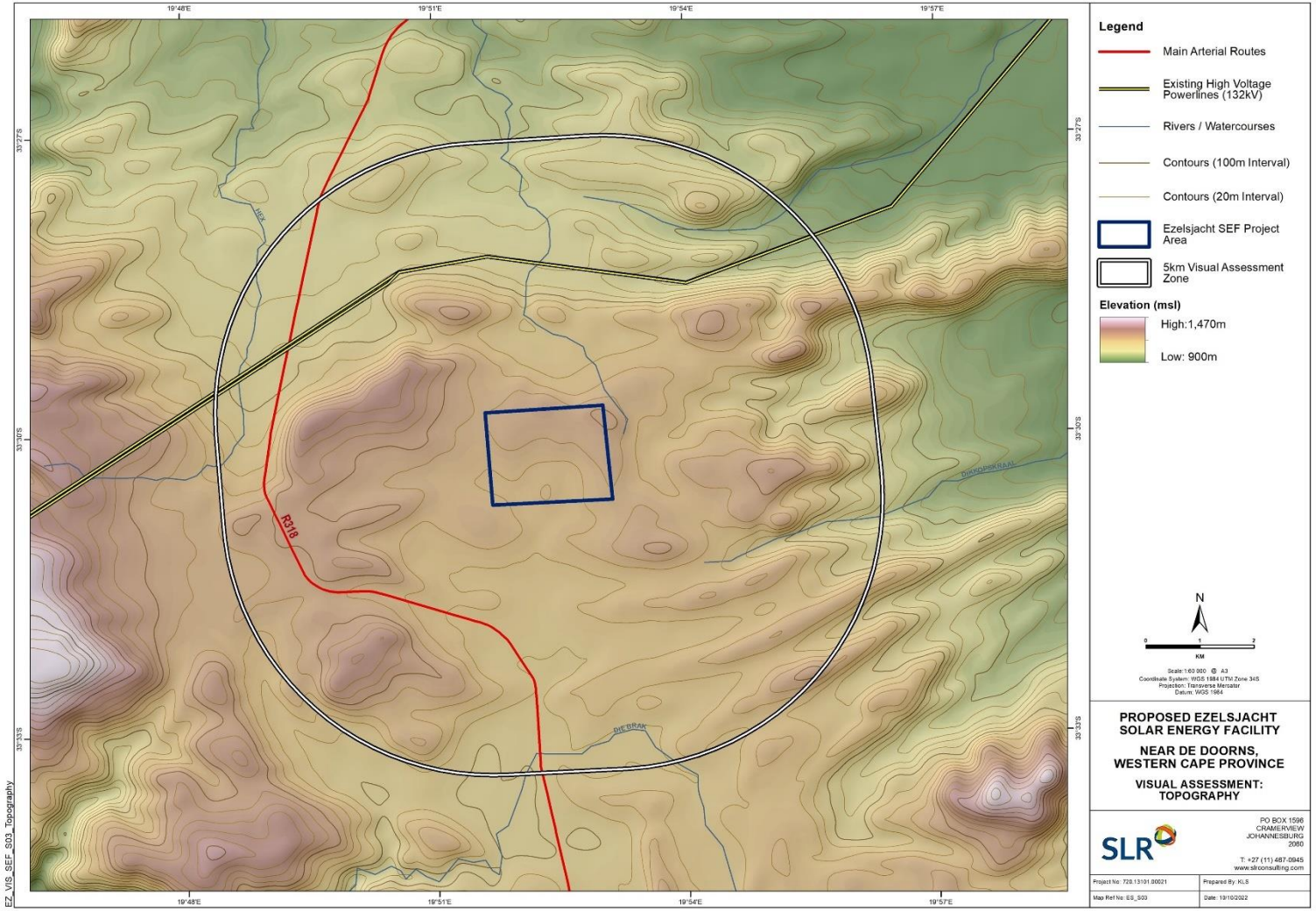


**Figure 7: Topography of the study area**

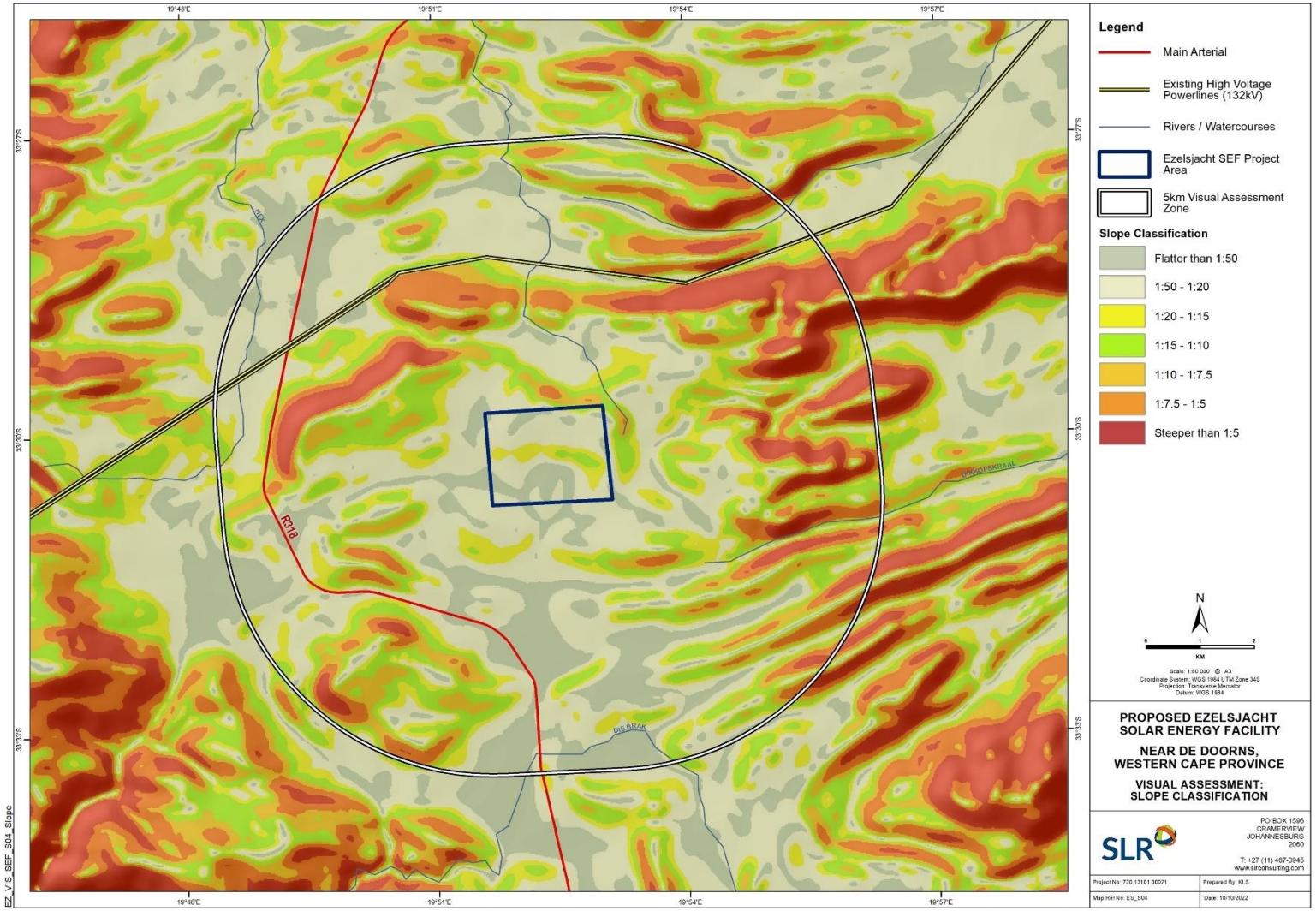


**Figure 8: Slope classification within the study area.**

**Visual Implications**

In general, views across the study area are constrained by the rolling hills and the Kwadousberg Mountain Range which enclose the visual envelope. Considering that PV panels are relatively large structures (potentially up to 5m in height), these could potentially be visible from some distance. However, in this instance, visibility would be reduced as a result of topographic shielding provided by the rolling hills across the study area.

GIS technology was used to undertake a preliminary visibility analysis for the proposed SEF project area. In the absence of a PV layout, a worst-case scenario was assumed when undertaking the analysis. This scenario assumed that PV arrays, with a maximum height of 5m (maximum height at blade tip) would be constructed across the entire site. The resulting viewshed, as shown in **Figure 9** indicates that the hilly terrain has resulted in significant portions of the study area being outside the viewshed for the proposed SEF and as such PV arrays would not be visible from any receptors located in these areas.

It should be noted that the visibility analysis is based entirely on topography and does not consider any existing vegetation cover or built infrastructure which may screen views of the proposed development. In addition, detailed topographic data was not available for the broader study area and as such the visibility analysis does not take into account any localised topographic variations which may constrain views. This analysis should therefore be seen as a conceptual representation or a worst-case scenario.

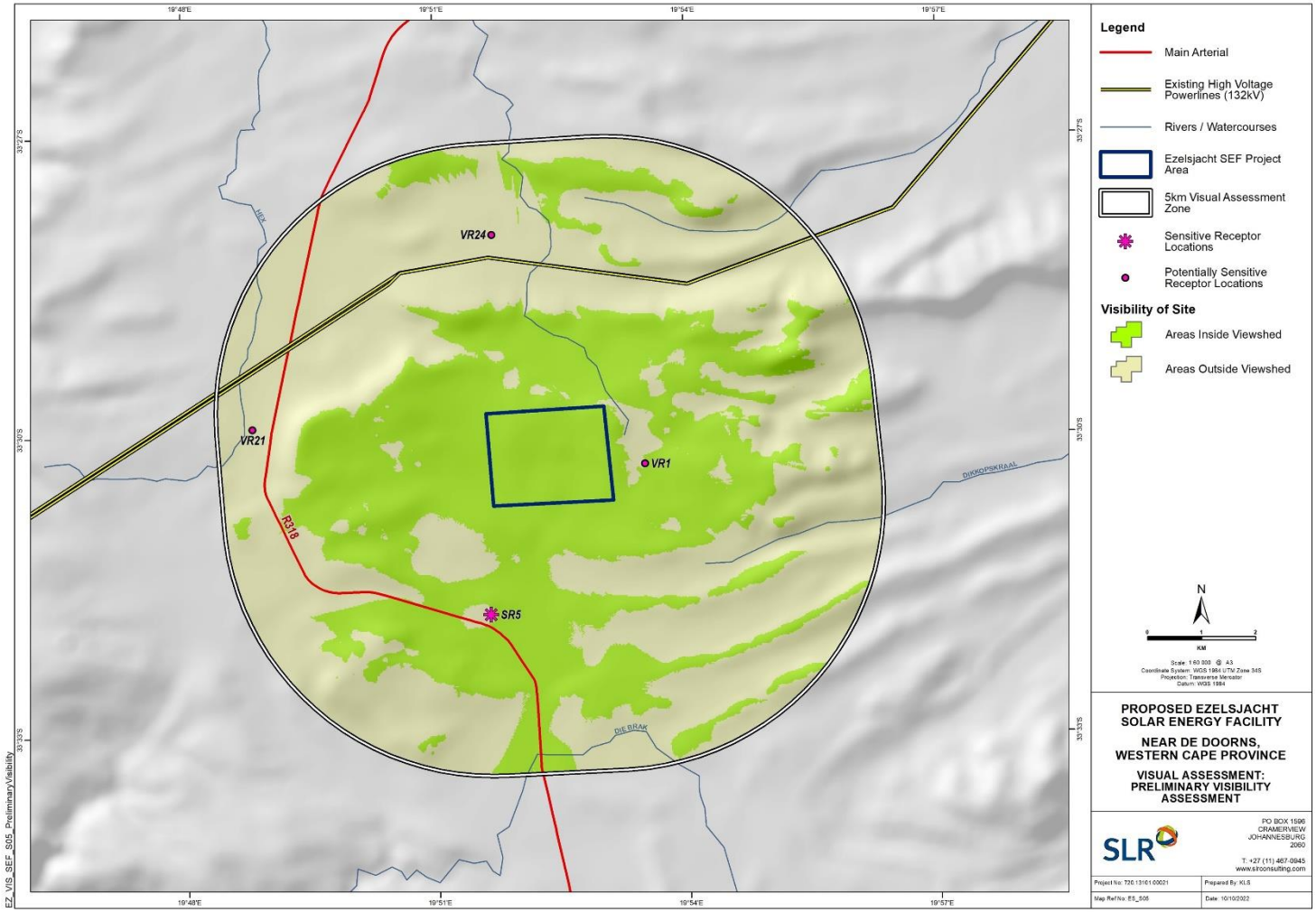


**Figure 9: Potential visibility of PV arrays.**

### 6.1.2 Vegetation

According to Mucina and Rutherford (2006), the most extensive vegetation type occurring in the study area is Matjiesfontein Shale Renosterveld (**Figure 10**) which is characterised by low, open to medium dense shrubland (**Figure 11**). The other vegetation types in the study area all fall within the Fynbos Biome and species present are typically short and sparse

Other vegetation cover includes exotic tree species and other typical garden vegetation established around farmsteads (**Figure 12**).

Much of the study area however is still characterised by natural low shrubland with transformation limited to a few isolated areas where pastoral activities such as livestock rearing and/or cultivation are taking place.

**Visual Implications**

Vegetation cover across the study area is predominantly short and sparse and thus will not provide any visual screening. In some instances, however, tall exotic trees planted around farmhouses will restrict views from receptor locations.

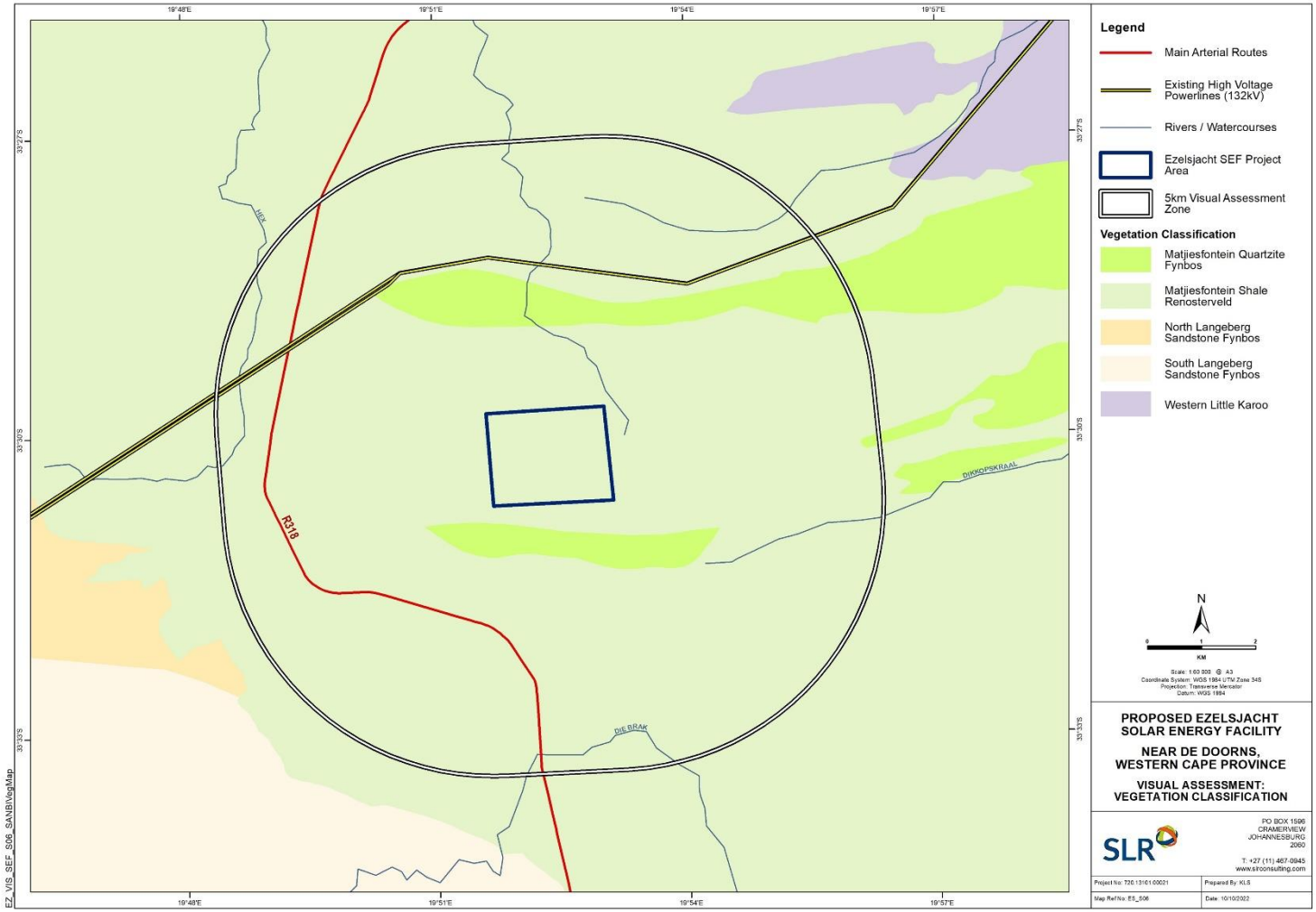


**Figure 10: Vegetation classification in the Study Area.**

**Figure 11: Typical vegetation cover in the study area.**

**Figure 12: Tall tree species and other typical garden vegetation established around farmsteads**

### 6.1.3 Land Use

According to the South African National Land Cover dataset (Geoterraimage 2018), much of the visual assessment area is classified as shrubland interspersed with patches of "Bare / Barren Land". While some of these bare / barren areas are representative of transformation due to human activity, in most cases these patches of land are merely undisturbed areas with very sparse vegetation cover (**Figure 13**).

Agricultural activity in the area is restricted by the arid nature of the local climate and areas of cultivation are largely concentrated on the flatter plains in the study area, with centre pivot irrigation being fairly common (**Figure 14**). As such, the natural vegetation has been retained across much of the study area. Livestock (sheep) farming is also fairly common (**Figure 15**) although farm properties are quite large and livestock densities are relatively. Thus, the area has a very low density of rural settlement, with relatively few isolated farmsteads in evidence. Built form in much of the study area is limited to isolated farmsteads (**Figure 16**), including farm worker's dwellings and ancillary farm buildings, gravel access roads, telephone lines, fences, and windmills.

Further human influence is visible in the area in the form of the R318 main road which traverses the study area in a north to south direction (**Figure 17**). In addition, existing, electrical infrastructure, including 132kV powerlines (**Figure 18**) are also significant man-made features in an otherwise undeveloped landscape. In addition, the Touws River Solar Energy Facility (SEF) extends into a small portion of land on the northern boundary of the study area, thus transforming a relatively isolated patch of transformed landscape.

The closest built-up area is the town of De Doorns which is situated approximately 18km north-west of the Ezelsjacht SEF application site. The town is outside the study area for this project and is thus not expected to have an impact on the visual character of the study area.

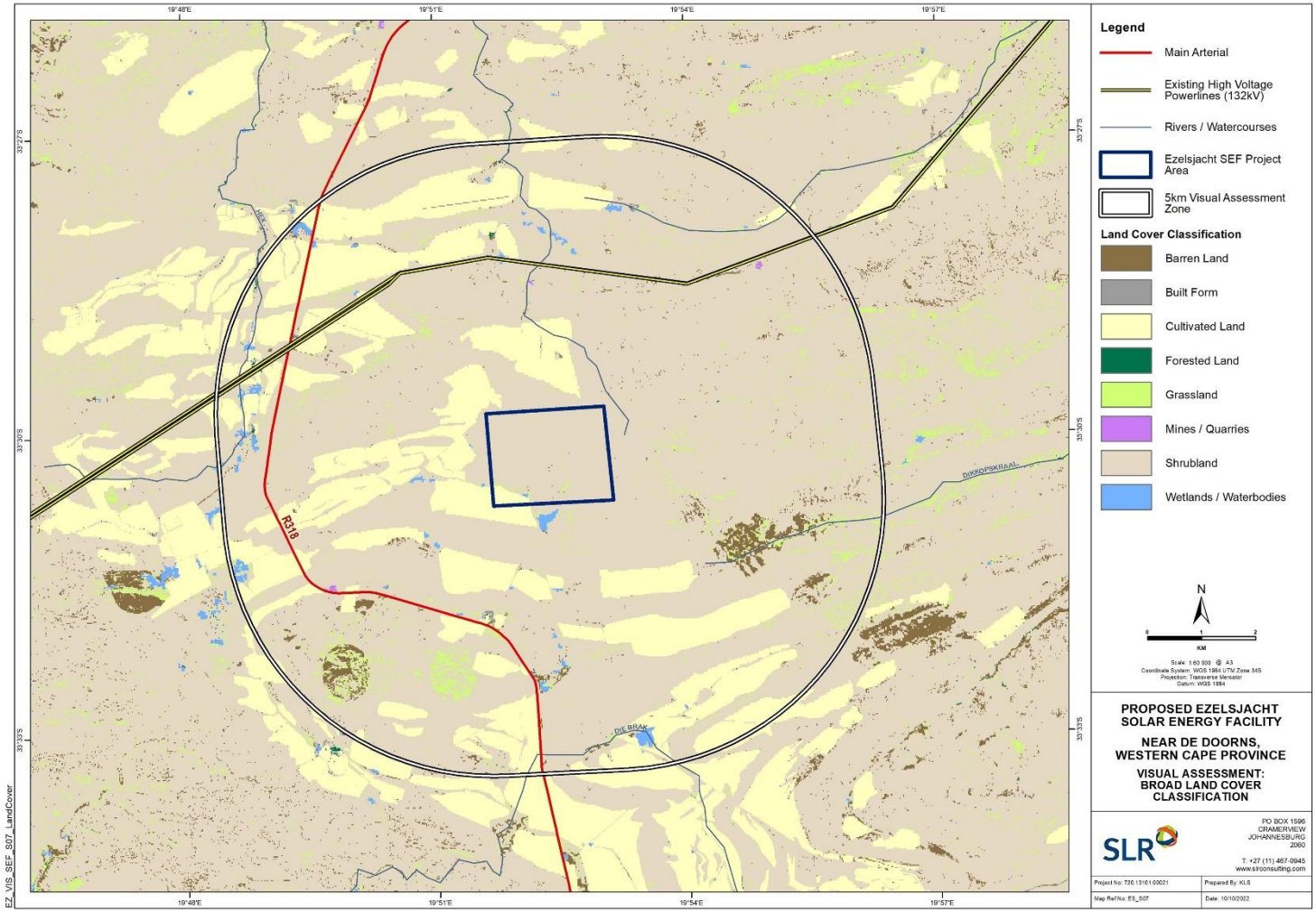


**Figure 13: Land cover classification in the study area.**

**Figure 14: Cultivated land adjacent to the R318 Main Road**

**Figure 15: Sheep grazing to the south of the Ezelsjacht SEF project area.**

**Figure 16: Isolated farmstead to the north of the SEF project area .**

**Figure 17: View northwards along the R318 Main Road which traverses the Ezelsjacht SEF study area.**

**Figure 18: 132kV powerlines traversing the north-western sector of the study area as seen from the R318 main road (*Source: Google Earth 2022*).**

**Visual Implications**

Sparse human habitation and the predominance of natural vegetation cover across much of the study area would give the viewer the general impression of a largely natural setting with some pastoral elements. In addition, there are no towns or settlements in the study area and thus, there are very low levels of human transformation and visual degradation across much of the study area.

The short, scrubby, or grassy vegetation that occurs over the entire study area offers no visual screening in itself, and thus terrain / topography is the most important factor in limiting vistas. Exceptions to this situation occur at some local farmsteads where trees and shrubs have been established around the farmstead, providing some screening from the surrounding areas.

The influence of the level of human transformation on the visual character of the area is described in more detail below.

## 6.2 VISUAL CHARACTER

The physical and land use-related characteristics of the study area as described above contribute to its overall visual character. Visual character largely depends on the level of change or transformation from a natural baseline in which there is little evidence of human transformation of the landscape. Varying degrees of human transformation of a landscape would engender differing visual characteristics to that landscape, with a highly modified urban or industrial landscape being at the opposite end of the scale to a largely natural undisturbed landscape. Visual character is also influenced by the presence of built infrastructure including buildings, roads and other objects such as telephone or electrical infrastructure. The visual character of an area largely determines the sense of place relevant to the area. This is the unique quality or character of a place, whether natural, rural or urban which results in a uniqueness, distinctiveness or strong identity.

The predominant land use in the area (sheep farming and cultivation) has not transformed the natural landscape across much of the study area to any significant degree and there are no towns or built-up areas in the study area influencing the overall visual character. Thus, there are low levels of human transformation and visual degradation across a significant portion of the study area and the natural character has been retained.

There are however prominent anthropogenic elements in the study area however which include the R318 Main Road and 132kV powerlines. Other, less prominent elements present in the area include lower voltage power lines, telephone poles, windmills, gravel farm access roads and farm boundary fences. The presence of this infrastructure is an important factor in this context, as the introduction of the proposed SEF would result in slightly less visual contrast where other anthropogenic elements are already present

The scenic quality of the landscape is also an important factor contributing to the visual character of an area or the inherent sense of place. Visual appeal is often associated with unique natural features or distinct variations in landform. As such, the largely natural, scenic landscapes which occur in the wider study area would increase the scenic appeal and visual interest in the area.

Cultural landscapes are becoming increasingly important concepts in terms of the preservation and management of rural and urban settings across the world. The concept of 'cultural landscape' is a way of looking at a place that focuses on the relationship between human activity and the biophysical environment (Breedlove, 2002). In this instance, the rural / pastoral landscape represents how the environment has shaped the predominant land use and economic activity practiced in the area, as well as the patterns of human habitation and interaction.

In light of this, it is important to assess whether the introduction of a SEF into the study area would be a degrading factor in the context of the prevailing character of the cultural landscape. Broadly speaking, it is anticipated that the proposed SEF will result in visual impacts on the cultural landscape of the broader area due to the fact that there are some tourism or nature-based facilities in the wider area, although the SEF is not expected to be visible from much the R318 Main Road.

A more detailed assessment of the potential impacts of the proposed SEF on the cultural landscape will be included in the Heritage Impact Assessment (HIA) undertaken by Asha Consulting for the EIA Phase in respect of the proposed project.

## 6.3 VISUAL SENSITIVITY ANALYSIS AND VERIFICATION

Visual sensitivity can be defined as the inherent sensitivity of an area to potential visual impacts associated with a proposed development. It is based on the physical characteristics of the area (i.e. topography, landform and land cover), the spatial distribution of potential receptors, and the likely value judgements of these receptors towards a new development (Oberholzer: 2005). A viewer's perception is usually based on the perceived aesthetic appeal of an area and on the presence of economic activities (such as recreational or nature-based tourism) which may be based on this aesthetic appeal.

In order to assess the visual sensitivity of the area, a matrix has been developed based on the characteristics of the receiving environment which, according to the Guidelines for Involving Visual and Aesthetic

Specialists in the EIA Processes, indicate that visibility and aesthetics are likely to be 'key issues' (Oberholzer: 2005).

Based on the criteria in the matrix (**Table 2**), the visual sensitivity of the area is classified according to the categories described below:

i. High - The introduction of a new development such as a SEF would be likely to be perceived negatively by receptors in this area; it would be considered to be a visual intrusion and may elicit opposition from these receptors.
ii. Moderate – Receptors are present, but due to the nature of the existing visual character of the area and likely value judgements of receptors, there would be limited negative perception towards the new development as a source of visual impact.
iii. Low - The introduction of a new development would not be perceived to be negative, there would be little opposition or negative perception towards it.

The table below outlines the factors used to rate the visual sensitivity of the study area. The ratings are specific to the visual context of the receiving environment within the study area.

**Table 2: Environmental factors used to define visual sensitivity of the study area**

| FACTORS | DESCRIPTION | RATING | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| | | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 |
| Pristine / natural / scenic character of the environment | Study area is largely natural with areas of scenic value and some pastoral elements. | | | | | | | | | | |
| Presence of sensitive visual receptors | Only one sensitive receptor has been identified in the study area. | | | | | | | | | | |
| Aesthetic sense of place / visual character | Visual character is typical of a rural / pastoral landscape. | | | | | | | | | | |
| Irreplaceability / uniqueness / scarcity value | There are areas of scenic value within the study area. | | | | | | | | | | |
| Cultural or symbolic meaning | Much of the area is typical of a rural / pastoral landscape. | | | | | | | | | | |
| Protected / conservation areas in the study area | No protected or conservation areas were identified in the study area. | | | | | | | | | | |
| Sites of special interest present in the study area | No sites of special interest were identified in the study area. | | | | | | | | | | |
| Economic dependency on scenic quality | Few tourism/leisure-based facilities in the study area | | | | | | | | | | |
| International / regional / local status of the environment | Study area is typical of rural / pastoral landscape | | | | | | | | | | |
| **Scenic quality under threat / at risk of change | Introduction of a SEF will alter the visual character and sense of place. In addition, the development of other renewable energy facilities in the broader area as planned will introduce an increasingly industrial character, giving rise to significant cumulative impacts | | | | | | | | | | |

**Any rating above '5' for this specific aspect will trigger the need to undertake an assessment of cumulative visual impacts.

| Low | | | | Moderate | | | | | High |
|---|---|---|---|---|---|---|---|---|---|
| 10 | 20 | 30 | 40 | 50 | 60 | 70 | 80 | 90 | 100 |

Based on the above factors, the total score for the study area is 56, which according to the scale above, would result in the area being rated as having a moderate visual sensitivity. It should be stressed however that the concept of visual sensitivity has been utilised indicatively to provide a broad-scale indication of whether the landscape is likely to be sensitive to visual impacts and is based on the physical characteristics of the study area, economic activities and land use that predominates. An important factor contributing to the visual sensitivity of an area is the presence, or absence of visual receptors that may value the aesthetic quality of the landscape and depend on it to produce revenue and create jobs.

No protected areas were identified in the study area and only one (1) sensitive receptor location was identified in the study area, this being the Ezelsjacht Guest Farm. In addition, relatively few potentially sensitive receptors were found to be present.

### 6.3.1 Specialist Sensitivity Assessment and verification

During the initial stages of the EIA, a site sensitivity assessment was undertaken to inform the site layout for the SEF. The aim of this exercise was to indicate any sections of the SEF project area which should be precluded from the development footprint. From a visual perspective, sensitive areas would be areas where the establishment of PV arrays would result in the greatest probability of visual impacts on sensitive or potentially sensitive visual receptors.

Using GIS-based visibility analysis, it was possible to determine that much of the SEF project area would not be visible from any of the receptor locations identified potentially sensitive receptors in the study area. In terms of visibility therefore, no sections of the site are more sensitive than any others. In addition, investigation determined that there are no sensitive or potentially sensitive receptors within the SEF project area or within 500 m of the project area boundary which would be affected by the development.

As such, no areas of visual sensitivity were identified within the SEF project area.

### 6.3.2 Sensitivities identified by the National Screening Tool: SEF

In assessing visual sensitivity of the proposed Ezelsjacht SEF, consideration was given to the Landscape Theme of the National Environmental Screening Tool. Under the Landscape Theme, as shown in **Figure 19** below, the tool identifies areas of Very High sensitivity in respect of SEF development on the Ezelsjacht SEF site. According to the Screening Tool, the high sensitivity rating applied to the SEF project area is associated with the presence of natural features such as mountain tops, high ridges and steep slopes. Based on these criteria, much of the northern and eastern portion of the site would be ruled out for SEF development.

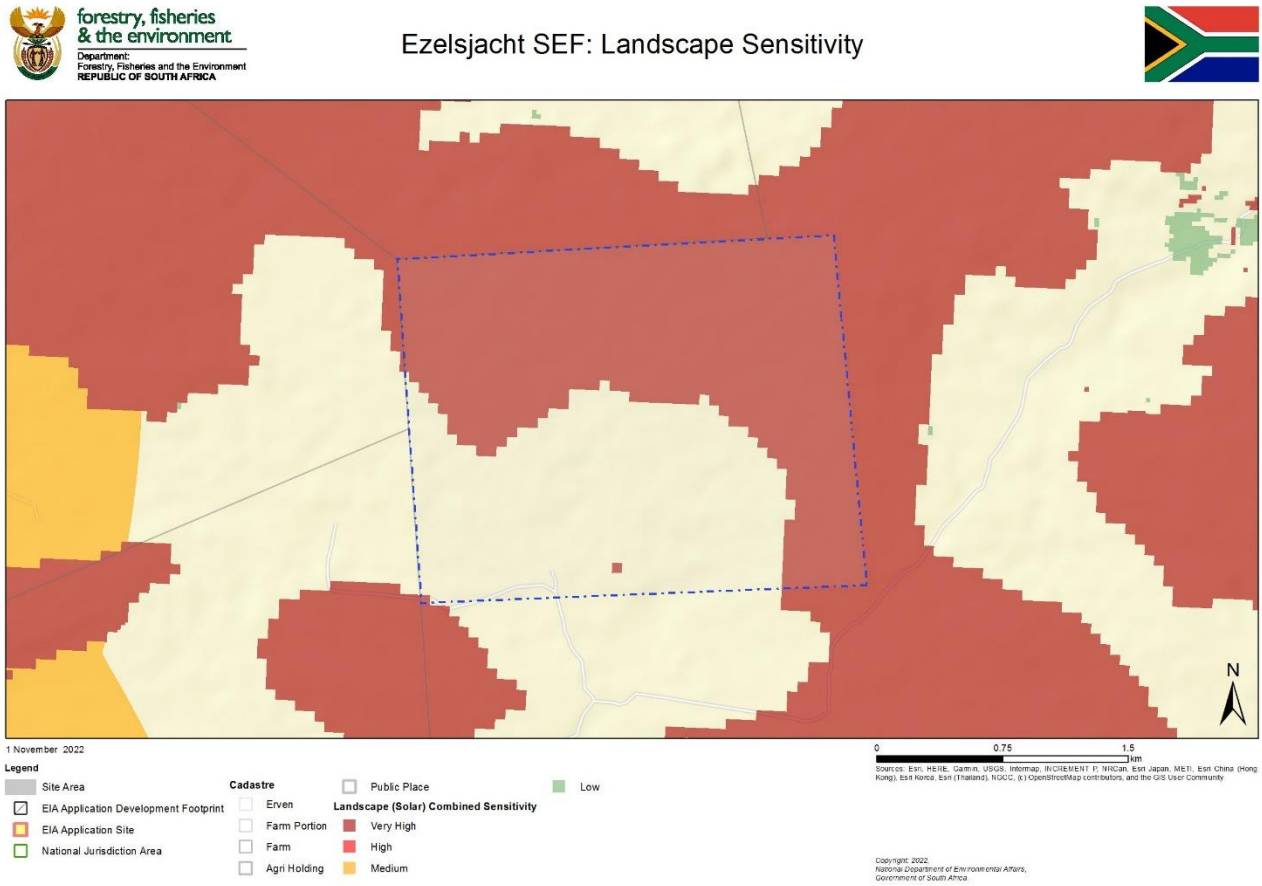


**Figure 19: Relative Landscape Sensitivity (November 2022)**

The Screening Tool provides a very high level, desktop assessment and as such the results of the study must be viewed against the findings of the field investigation as well as factors affecting visual impact, such as:

- the presence of visual receptors;
- the distance of those receptors from the proposed development; and
- the likely visibility of the development from the receptor locations.

### 6.3.3 Sensitivity Analysis Summary for SEF Development

Although the Screening Tool depicts areas of "very high" landscape sensitivity across most of the Ezelsjacht SEF project area, the site sensitivity verification exercise conducted in respect of this VIA (Appendix C) does not support this sensitivity rating. The desktop assessment, confirmed by the field investigation, showed that much of SEF project area is located on relatively flat to gently undulating terrain, with some areas of higher elevation occurring in the north. No mountain tops, high ridges or steep slopes were identified on the site.

In addition, very few receptors were identified within 5kms of the SEF project area and none of these is within 500m of the site boundary.

### 6.4 VISUAL ABSORPTION CAPACITY

Visual absorption capacity is the ability of the landscape to absorb a new development without any significant change in the visual character and quality of the landscape. The level of absorption capacity is largely based on the physical characteristics of the landscape (topography and vegetation cover) and the level of transformation present in the landscape.

Although the hilly nature of the topography in the study area would increase the visual absorption capacity, this would be offset by the lack of screening provided by the dominant shrubland vegetation. Portions of the study area have however undergone some transformation as a result of the farming activity, as well as high voltage powerlines and road infrastructure.

Visual absorption capacity in the study area is therefore rated as low to moderate.

## 7. TYPICAL VISUAL IMPACTS ASSOCIATED WITH SOLAR ENERGY FACILITES

In this section, the typical visual issues related to the establishment of a SEF as proposed are discussed. It is important to note that the renewable energy industry is still relatively new in South Africa and as such this report draws on international literature and web material (of which there is significant material available) to describe the generic impacts associated with SEFs.

### 7.1 SOLAR PV ARRAYS

The SEF will largely consist of PV panels, which grouped together form a 'solar field'. As mentioned above, each PV panel is a large structure that is typically between 1 and 5m high. The height of these objects will make them visible, especially in the context of a relatively flat landscape.

More importantly, the concentration of these panels will make them highly visible, depending on the number of panels in each solar field. Solar fields with a large spatial extent (footprint) will become distinctly visible features that contrast with the landscape, especially where the landscape is natural in character or undeveloped. In this context the solar field could be considered a visual intrusion, potentially altering the visual environment towards a more industrial character.

The establishment of PV facilities generally requires some levelling of the terrain and the clearance of taller shrubs and vegetation. This will intensify the visual prominence of the solar energy facility, particularly in natural locations where little transformation has taken place **Figure 20** below is an example of a visually prominent PV facility.

**Figure 20: Kathu Solar Power Plant (photo courtesy of "visits to the park"), near Kathu, Northern Cape Province.**

## 7.2 ASSOCIATED ON-SITE INFRASTRUCTURE

Typical impacts associated with the associated infrastructure (**Section 3.2.2**) are outlined below.

Substations are generally large, highly visible structures which are relatively industrial in character. As they are not features of the natural environment, but are representative of human (anthropogenic) alteration, substations will be perceived to be incongruous when placed in largely natural landscapes. Conversely, the presence of other anthropogenic objects associated with the built environment, especially other substations or power lines, may result in the visual environment being considered to be 'degraded' and thus the introduction of a substation into this setting may be less of a visual impact than if there was no existing built infrastructure visible. In this instance, the substation is intended to serve the proposed Ezelsjacht SEF project and as such, is likely to be perceived as part of the greater SEF development. Thus, the visual impact of the substation will be relatively minor when compared to the visual impact associated with the SEF development as a whole.

Surface clearance for cable trenches, access roads, laydown areas and other on-site infrastructure may result in the increased visual prominence of these features, thus increasing the level of contrast with the surrounding landscape. Buildings, BESS containers and associated infrastructure placed in prominent positions such as on ridge tops may break the natural skyline, drawing the attention of the viewer. In addition, security lighting on the site may impact on the nightscape (Section **8.2**).

The visual impact of the on-site infrastructure associated with a solar PV facility is generally not regarded as a significant factor when compared to the visual impact associated with PV arrays. The infrastructure would however increase the visual "clutter" on the SEF site and magnify the visual prominence of the development if located on ridge tops or flat sites in natural settings where there is limited tall wooded vegetation to conceal the impact.

# 8. SENSITIVE VISUAL RECEPTORS

A sensitive visual receptor location is defined as a location where receptors would potentially be impacted by a proposed development. Adverse impacts often arise where a new development is seen as an intrusion which alters the visual character of the area and affects the 'sense of place'. The degree of visual impact experienced will however vary from one receptor to another, as it is largely based on the viewer's perception.

A distinction must be made between a receptor location and a sensitive receptor location. A receptor location is a site from where the proposed development may be visible, but the receptor may not necessarily be adversely affected by any visual intrusion associated with the development. Less sensitive receptor locations include locations of commercial activities and certain movement corridors, such as roads that are not tourism routes. More sensitive receptor locations typically include sites that are likely to be adversely affected by the visual intrusion of the proposed development. They include tourism facilities, scenic sites and residential dwellings in natural settings.

The identification of sensitive receptors is typically based on a number of factors which include:

- the visual character of the area, especially taking into account visually scenic areas and areas of visual sensitivity;
- the presence of leisure-based (especially nature-based) tourism in an area;
- the presence of sites or routes that are valued for their scenic quality and sense of place;
- the presence of homesteads / farmsteads in a largely natural setting where the development may influence the typical character of their views; and
- feedback from interested and affected parties, as raised during the public participation process conducted as part of the EIA study.

As the visibility of the development would diminish exponentially over distance (refer to **Section 5.4** above), receptor locations which are closer to the SEF would experience greater adverse visual impacts than those located further away.

The degree of visual impact experienced will however vary from one inhabitant to another, as it is largely based on the viewer's perception. Factors influencing the degree of visual impact experienced by the viewer include the following:

- Value placed by the viewer on the natural scenic characteristics of the area.
- The viewer's sentiments toward the proposed structures. These may be positive (a symbol of progression toward a less polluted future) or negative (foreign objects degrading the natural landscape); and
- Degree to which the viewer will accept a change in the typical character of the surrounding area.

## 8.1 RECEPTOR IDENTIFICATION

Preliminary desktop assessment of the study area for the proposed Ezelsjacht SEF identified only four (4) potentially sensitive visual receptor locations within 5km of the SEF project area boundary. It should be noted that this assessment will be revised in the EIA phase to exclude all receptors that are located more than 5kms from the nearest PV array.

Although the findings of the desktop assessment were largely confirmed during the field investigation, it was not possible to confirm the presence of receptors at all the identified locations due to access restrictions. Notwithstanding this limitation, all the identified receptor locations were assessed as part of the VIA as they are still regarded as being potentially sensitive to the visual impacts associated with the proposed development.

One of the receptors identified was found to be linked to leisure-based (specifically nature-based) tourism and is therefore considered to be a sensitive receptor, this being Ezelsjacht Guest Farm (SR5). However, the visibility assessment found this receptor location to be outside the viewshed for the SEF project area. In addition, it is known that this receptor and the SEF development are located on land owned by the same landowner. As such, the property owner is has a vested interest in the SEF project.

The remaining three (3) receptors identified appear to be farmsteads which are regarded as potentially sensitive visual receptors as they are located within a mostly rural setting with natural vistas that will likely be altered by the proposed development. Local sentiments toward the proposed development are however unknown at this stage. All but one of these receptors were found to be outside the viewshed for the SEF and project area and although VR1 is inside the viewshed, the visibility assessment indicated that only a small section of the eastern boundary of the SEF project area would be visible from this location.

**Table 3** below provides a summary of receptors.

**Table 3: Receptor Summary**

| RECEPTOR TYPE | INSIDE VIEWSHED | OUTSIDE VIEWSHED | TOTAL |
|---|---|---|---|
| SENSITIVE RECEPTORS | 0 | 1 | 1 |
| POTENTIALLY SENSITIVE RECEPTORS | 1 | 2 | 3 |
| ***TOTAL*** | ***1*** | ***3*** | ***4*** |

In many cases, roads along which people travel, are regarded as sensitive receptors. The primary thoroughfare in the study area is the R318 Main Road which links Robertson to the south with the N1 national route to the north. This road is considered to have scenic and rural value and is utilised, to some extent, for its tourism potential. As a result, it is considered to be a potentially sensitive receptor road – i.e. a road being used by motorists who may object to the potential visual intrusion of the proposed SEF and associated infrastructure. However, the major portion of this road within the study area is outside the viewshed for the project area and as such motorists travelling along these sections of the route will not experience any impacts as a result of the development. Sections of the route that are within the viewshed are all more than 2km from the project area boundary and as such impacts affecting these sections of the route are expected to be low.

Other thoroughfares in the study area are primarily used as local access roads and do not form part of any scenic tourist routes. These roads are not specifically valued or utilised for their scenic or tourism potential and are therefore not regarded as visually sensitive.

The identified potentially sensitive visual receptor locations for the proposed SEF are indicated in **Figure 21**.

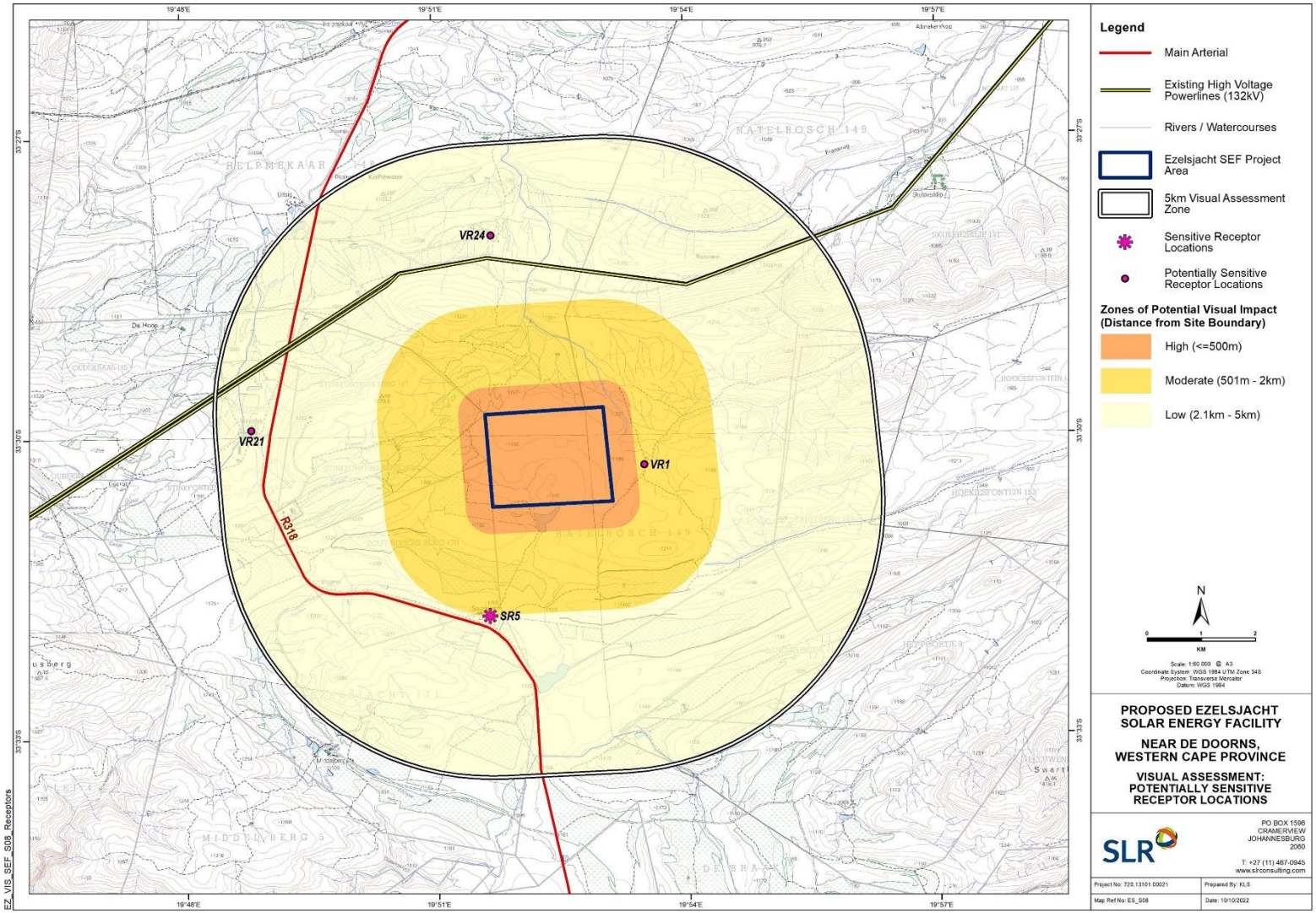


**Figure 21: Potentially sensitive receptor locations within 5kms of the Ezelsjacht SEF application site**

## 8.2 NIGHT-TIME IMPACTS

The visual impact of lighting on the nightscape is largely dependent on the existing lighting present in the surrounding area at night. The night scene in areas where there are numerous light sources will be visually degraded by the existing light pollution and therefore additional light sources are unlikely to have a significant impact on the nightscape. In contrast, introducing new light sources into a relatively dark night sky will impact on the visual quality of the area at night. It is thus important to identify a night-time visual baseline before exploring the potential visual impact of the proposed solar farm at night.

Much of the study area is characterised by natural areas with pastoral elements and low densities of human settlement. As a result, relatively few light sources are present in the broader area surrounding the proposed development site. The closest built-up area is the town of de Doorns which is situated approximately 18km north-west of the Ezelsjacht SEF Project Area and is thus too far away to have significant impacts on the night scene. At night, the general study area is therefore characterised by a picturesque dark starry sky and the visual character of the night environment across the broader area is largely 'unpolluted' and pristine. Sources of light in the area are limited to isolated lighting from surrounding farmsteads and transient light from the passing cars travelling along the R318 Main Road.

Given the scale of the proposed SEF, the operational and security lighting required for the proposed project is likely to intrude on the nightscape and create some glare, which will contrast with the extremely dark backdrop of the surrounding area.

## 8.3 CUMULATIVE IMPACTS

Although it is important to assess the visual impacts of the proposed Ezelsjacht SEF specifically, it is equally important to assess the cumulative visual impact that could materialise if other renewable energy facilities (both wind and solar facilities) and associated infrastructure projects are developed in the broader area. Cumulative impacts occur where existing or planned developments, in conjunction with the proposed development, result in significant incremental changes in the broader study area. In this instance, such developments would include renewable energy facilities and associated infrastructure development.

Renewable energy facilities have the potential to cause large scale visual impacts and the location of several such developments in close proximity to each other could significantly alter the sense of place and visual character in the broader region.

Four (4) additional renewable energy projects were identified within a 30 km radius of the proposed Ezelsjacht SEF project area (**Figure 22**), using the DFFE's Renewable Energy EIA Application Database for SA. All of these projects are SEFs and it is assumed that they include grid connection infrastructure, although details of this infrastructure were not available for all of the identified developments at the time of writing this report.

All of these projects are outside the assessment zone for the Ezelsjacht SEF and most are located in close proximity to main roads or built-up areas. In light of this and considering the hilly nature of the terrain, it is

not anticipated that these developments will result in any significant cumulative impacts affecting the landscape or the visual receptors within the assessment zone for the Ezelsjacht SEF project

A cumulative assessment must include the proposed Ezelsjacht WEF and associated grid connection project, both of which are located in close proximity to the Ezelsjacht SEF project area. From a visual perspective, the concentration of renewable energy facilities as proposed will further change the visual character of the area and alter the inherent sense of place, extending an increasingly industrial character into the broader area, and resulting in significant cumulative impacts. It is however anticipated that these impacts could be mitigated to acceptable levels with the implementation of the recommended mitigation measures. In addition, it is possible that these developments in close proximity to each other could be seen as one large Renewable Energy Facility (REF) rather than several separate developments. Although this will not necessarily reduce impacts on the visual character of the area, it could potentially reduce the cumulative impacts on the landscape.

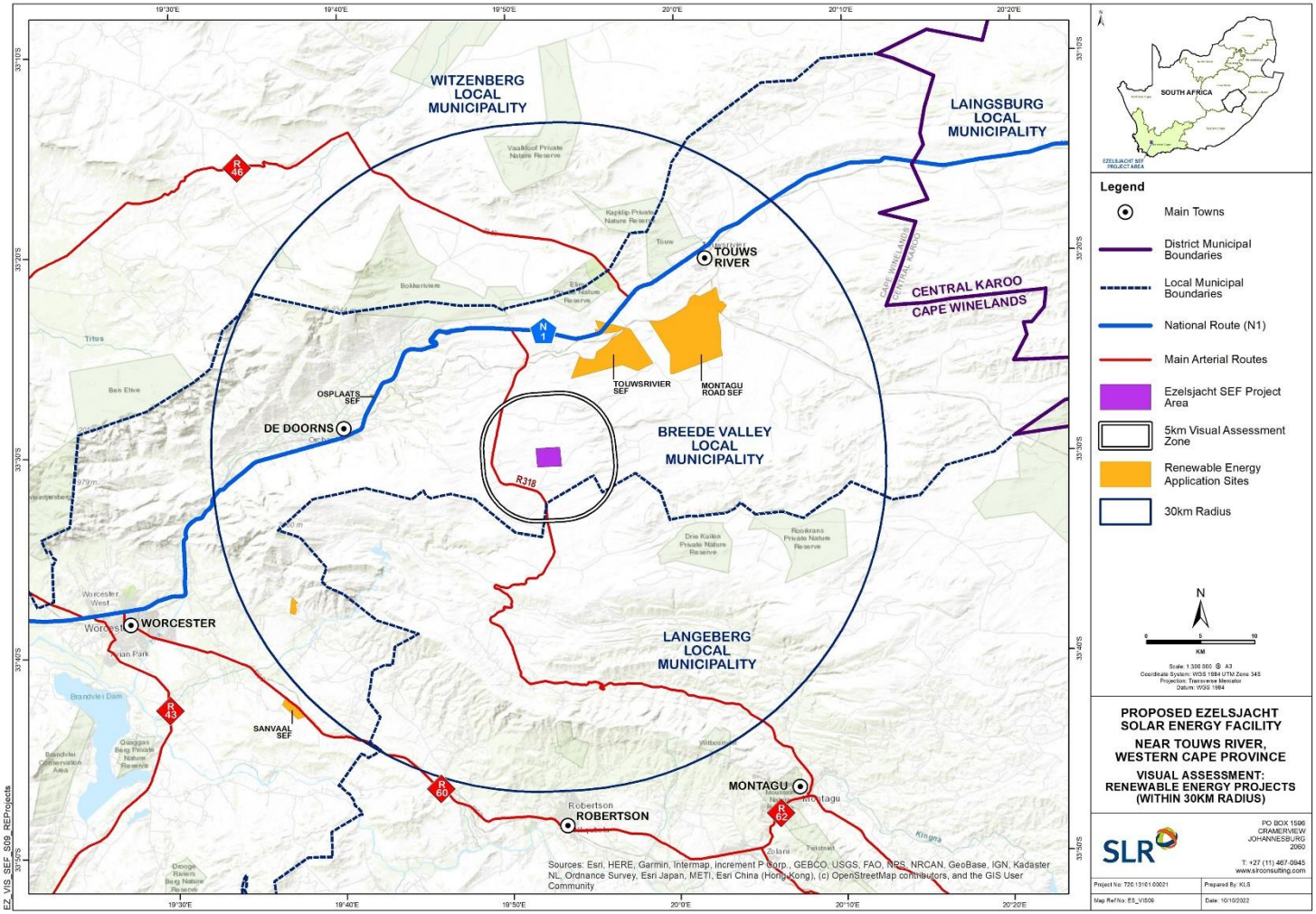


**Figure 22: Renewable energy facilities proposed within a 30km radius of the Ezelsjacht SEF project area**

## 8.4 IDENTIFICATION OF POTENTIAL IMPACTS

Potential visual issues / impacts resulting from the proposed Ezelsjacht SEF together with possible mitigation measures are outlined below.

### 8.4.1 Construction Phase

*Nature of the impact*

- Potential visual intrusion resulting from large construction vehicles and equipment;
- Potential visual effect of construction laydown areas and material stockpiles.
- Potential impacts of increased dust emissions from construction activities and related traffic;
- Potential visual scarring of the landscape as a result of site clearance and earthworks; and
- Potential visual pollution resulting from littering on the construction site

*Significance of impact*

The significance of visual impacts during construction are expected to be **Moderate**, but will be reduced to **Low** with the implementation of mitigation measures.

*Proposed mitigation measures*

- Carefully plan to minimise the construction period and avoid construction delays.
- Position laydown areas and related storage/stockpile areas in unobtrusive positions in the landscape, where possible.
- Minimise vegetation clearing and rehabilitate cleared areas as soon as possible.
- Vegetation clearing should take place in a phased manner.
- Make use of existing gravel access roads where possible.
- Limit the number of vehicles and trucks travelling to and from the proposed sites, where possible.
- Ensure that dust suppression techniques are implemented:
    - on all access roads;
    - in all areas where vegetation clearing has taken place;
    - on all soil stockpiles.
- Maintain a neat construction site by removing litter, rubble and waste materials regularly.

### 8.4.2 Operational Phase

*Nature of the impact*

- Potential alteration of the visual character of the area;
- Potential visual intrusion resulting from PV arrays;
- Potential visual clutter caused by substation and other associated infrastructure on-site.
- Potential visual effect on surrounding farmsteads;
- Potential glint and glare impacts resulting from PV arrays on passing motorists and nearby receptors; and
- Potential alteration of the night time visual environment as a result of operational and security lighting.

*Significance of impact*

Under a worst-case scenario where PV arrays are constructed across the entire project area, the significance of visual impacts during operation are expected to be **High**, and although mitigation measures will result in some minor reduction of visual impacts, the degree of significance will remain **High**. This rating could be reduced to **Moderate** with an appropriate PV array layout.

**Proposed mitigation measures**

- Restrict vegetation clearance on the site to that which is required for the correct operation of the facility.
- As far as possible, limit the number of maintenance vehicles which are allowed to access the site.
- Ensure that dust suppression techniques are implemented on all gravel access roads.
- As far as possible, limit the amount of security and operational lighting present on site.
- Light fittings for security at night should reflect the light toward the ground and prevent light spill (as far as possible).
- Lighting fixtures should make use of minimum lumen or wattage (whilst adhering to relevant safety standards).
- Mounting heights of lighting fixtures should be limited, or alternatively, foot-light or bollard level lights should be used (whilst adhering to relevant safety standards).
- If economically and technically feasible, make use of motion detectors on security lighting.
- Where possible, the operation and maintenance buildings should be consolidated to reduce visual clutter.
- The operations and maintenance (O&M) buildings should not be illuminated at night unless required by the relevant safety standards.
- The O&M buildings should be painted in natural tones that fit with the surrounding environment.

### 8.4.3 Decommissioning Phase

*Nature of the impact*

- Potential visual intrusion resulting from vehicles and equipment involved in the decommissioning process;
- Potential impacts of increased dust emissions from decommissioning activities and related traffic; and
- Potential visual intrusion of any remaining infrastructure on the site.

*Significance of impact*

The significance of visual impacts during decommissioning are expected to be **Moderate**, but will be reduced to **Low** with the implementation of mitigation measures.

*Proposed mitigation measures*

- All infrastructure that is not required for post-decommissioning use should be removed.
- Carefully plan to minimize the decommissioning period and avoid delays.
- Maintain a neat decommissioning site by removing rubble and waste materials regularly.

- Ensure that dust suppression procedures are maintained on all gravel access roads throughout the decommissioning phase.
- All cleared areas should be rehabilitated as soon as possible.

### 8.4.4 Cumulative Impacts

*Nature of the impact*

- Combined visual impacts from renewable energy development and associated grid connection infrastructure in the broader area could potentially alter the sense of place and visual character of the area; and
- Combined visual impacts from renewable energy development and associated grid connection infrastructure in the broader area could potentially exacerbate visual impacts on visual receptors.

*Significance of impact*

The significance of cumulative visual impacts are potentially **High**, but could be reduced to **Moderate** with the implementation of mitigation measures.

*Proposed mitigation measures*

- Implementation of the mitigation measures as recommended above.

## 8.5 OVERALL IMPACT RATING

The EIA Regulations, 2014 (as amended) require that an overall rating for visual impact be provided to allow the visual impact to be assessed alongside other environmental parameters. A full impact rating matrix for the proposed development will be presented in the EIA phase VIA.

# 9. CONCLUSION

A scoping level visual study was conducted to assess the magnitude and significance of the potential visual impacts associated with the development of the proposed Ezelsjacht SEF near De Doorns in the Western Cape Province. Overall, sparse human habitation and the predominance of natural vegetation cover across much of the study area would give the viewer the general impression of a largely natural setting with some pastoral elements. As such, a SEF development would alter the visual character and contrast significantly with the typical land use and/or pattern and form of human elements present across the broader study area. The level of contrast will however be slightly reduced in some areas by the presence of the R318 Main Road and existing high voltage power lines traversing the study area.

A broad-scale assessment of visual sensitivity, based on the physical characteristics of the study area, economic activities and land use that predominates, determined that the area would have a moderate visual sensitivity. However, an important factor contributing to the visual sensitivity of an area is the presence, or absence of visual receptors that may value the aesthetic quality of the landscape and depend on it to produce revenue and create jobs.

No protected areas were identified in the study area and only four (4) potentially sensitive visual receptor locations were identified within 5km of the SEF project area boundary. One of these receptors was found to be linked to leisure-based (specifically nature-based) tourism is therefore considered to be a sensitive receptor, this being Ezelsjacht Guest Farm (SR5). However, the visibility assessment found this receptor location to be outside the viewshed for the SEF project area. In addition, it is known that this receptor and the SEF development are located on land owned by the same landowner. As such, the property owner is has a vested interest in the SEF project.

The remaining three (3) receptors identified appear to be farmsteads which are regarded as potentially sensitive visual receptors as they are located within a mostly rural setting with natural vistas that will likely be altered by the proposed development. Local sentiments toward the proposed development are however unknown at this stage. All but one of these receptors were found to be outside the viewshed for the SEF and project area and although VR1 is inside the viewshed, the visibility assessment indicated that only a small section of the eastern boundary of the SEF project area would be visible from this location.

The R318 Main Road that traverses the study area is considered to have scenic and rural value and is utilised, to some extent, for its tourism potential. As a result, it is considered to be a potentially sensitive receptor road – i.e. a road being used by motorists who may object to the potential visual intrusion of the proposed SEF and associated infrastructure. However, the major portion of this road within the study area is outside the viewshed for the project area and as such motorists travelling along these sections of the route will not experience any impacts as a result of the development. Sections of the route that are within the viewshed are all more than 2km from the project area boundary and as such impacts affecting these sections of the route are expected to be low.

A preliminary assessment of overall impacts revealed that impacts associated with the proposed Ezelsjacht SEF are of **MODERATE** significance during both construction and decommissioning phases. During

operation, visual impacts from the SEF would be of **MODERATE** significance with relatively few mitigation measures available to reduce the visual impact.

Four (4) additional existing and proposed renewable energy developments and infrastructure projects were identified within a 30km radius of the Ezelsjacht SEF project. All of these projects are outside the assessment zone for the Ezelsjacht SEF and most are located in close proximity to main roads or built-up areas. In light of this and considering the hilly nature of the terrain, it is not anticipated that these developments will result in any significant cumulative impacts affecting the landscape or the visual receptors within the assessment zone for the Ezelsjacht SEF project.

However, a cumulative assessment must include the proposed Ezelsjacht WEF and associated grid connection project, both of which are located in close proximity to the Ezelsjacht SEF project area. From a visual perspective, the concentration of renewable energy facilities as proposed will further change the visual character of the area and alter the inherent sense of place, extending an increasingly industrial character into the broader area, and resulting in significant cumulative impacts. It is however anticipated that these impacts could be mitigated to acceptable levels with the implementation of the recommended mitigation measures. In addition, it is possible that these developments in close proximity to each other could be seen as one large Renewable Energy Facility (REF) rather than several separate developments. Although this will not necessarily reduce impacts on the visual character of the area, it could potentially reduce the cumulative impacts on the landscape.

In light of this and the relatively low level of human habitation in the study area however, cumulative impacts have been rated as **MODERATE**.

From a visual perspective, there are no fatal flaws associated with the proposed Ezelsjacht SEF.

## 9.1 EIA PHASE PLAN OF STUDY

The scoping phase VIA report has adequately assessed the visual impacts of the proposed Ezelsjacht SEF and no further field investigation will be required. The focus of the EIA phase assessment will be to update the scoping phase VIA report. This will entail:

- a review of the findings of the VIA in accordance with detailed site layouts;
- a review of the comparative assessment of the layout alternatives provided; and
- addressing any comments or concerns arising from the public participation process.

# 10. REFERENCES


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# APPENDIX A: TERMS OF REFERENCE

# APPENDIX B: SPECIALIST CV AND DECLARATION

# APPENDIX C: SITE SENSITIVITY VERIFICATION

Prior to commencing with the specialist assessment in accordance with Appendix 6 of the National Environmental Management Act (Act 107 of 1998, as amended) (NEMA) Environmental Impact Assessment (EIA) Regulations of 2014, a site sensitivity verification was undertaken in order to confirm the current land use and environmental sensitivity of the proposed Ezelsjacht Solar Energy Facility (SEF) as identified by the National Web-Based Environmental Screening Tool (Screening Tool). This site sensitivity verification was undertaken in adherence to the gazetted Environmental Assessment Protocols, specifically with 'Part A - General Protocol for the Site Sensitivity Verification and Minimum Report Content Requirements where a Specialist Assessment is required but no specific Environmental Theme Protocol has been prescribed' (GG 43110 / GNR 320, 20 March 2020),

The details of the site sensitivity verification are noted below:

| | |
|---|---|
| **Date of Site Visit** | 3 – 5 October 2022 |
| **Specialist Name** | Assessment undertaken by Kerry Schwartz (SLR Consulting)<br><br>Field investigation undertaken by Tshisevhe Tshifhango (SLR) |
| **Professional Registration Number** | South African Geomatics Council – GTc GISc 1187 |
| **Specialist Affiliation / Company** | SLR Consulting (South Africa) (Pty) Ltd; |

## 1 SITE SENSITIVITY VERIFICATION

A site sensitivity verification has been conducted in support of the Visual Impact Assessment (VIA) for the proposed Ezelsjacht SEF. The verification exercise is based on a desktop-level assessment supported by field-based observation and involved an assessment of factors as outlined below.

### 1.1 PHYSICAL LANDSCAPE CHARACTERISTICS

Physical landscape characteristics such as topography, vegetation and land use are important factors influencing the visual character and visual sensitivity of the study area. Baseline information about the physical characteristics of the study area was sourced from spatial databases provided by NGI, the South African National Biodiversity Institute (SANBI) and the South African National Land Cover Dataset (Geoterraimage – 2020). The characteristics identified via desktop analysis were then checked against the findings of the site visit.

### 1.2 IDENTIFICATION OF SENSITIVE RECEPTORS

Visual receptor locations and routes that are sensitive and / or potentially sensitive to the visual intrusion of the proposed development were identified by way of a desktop assessment as well as field-based investigation. Google Earth imagery (2022) was used to identify potential receptors within the study area and where possible, these receptor locations were then checked against the findings of the field investigation.

## 1.3 FIELDWORK AND PHOTOGRAPHIC REVIEW

A two (2) day site visit was undertaken between the 3rd and the 5th of October 2022 (early summer). The purpose of the site visit was to:

- verify the landscape characteristics identified via desktop means;
- conduct a photographic survey of the study area;
- verify, where possible, the sensitivity of visual receptor locations identified via desktop means;
- eliminate receptor locations that are unlikely to be influenced by the proposed development;
- identify any additional visually sensitive receptor locations within the study area; and
- inform the impact rating assessment of visually sensitive receptor locations (where possible).

## 1.4 SOURCE OF INFORMATION

The main sources of information utilised for this site sensitivity verification exercise included:

- Elevation data from 25m Digital Elevation model (DEM) from the National Geo-Spatial Information (NGI);
- 1:50 000 topographical maps of South Africa from the NGI;
- Land cover and land use data extracted from the 2020 South African National Land-Cover Dataset provided by GEOTERRAIMAGE;
- Vegetation classification data extracted from the South African National Biodiversity Institute's (SANBI's) VEGMAP 2018 dataset;
- Google Earth Satellite imagery 2022;
- South African Renewable Energy EIA Application Database from Department of Environmental Affairs (incremental release Quarter 2 2022);
- The National Web-Based Environmental Screening Tool, Department of Forestry, Fisheries and Environment (DFFE);

# 2 OUTCOME OF SITE SENSITIVITY VERIFICATION

Overall, sparse human habitation and the predominance of natural vegetation cover across much of the study area would give the viewer the general impression of a largely natural setting with some pastoral elements. As such, a SEF development would alter the visual character and contrast significantly with the typical land use and/or pattern and form of human elements present across the broader study area. The level of contrast will however be slightly reduced in some areas by the presence of the R318 Main Road and existing high voltage power lines traversing the study area.

A broad-scale assessment of landscape sensitivity, based on the physical characteristics of the study area, economic activities and land use that predominates, determined that the area would have a **MODERATE** visual sensitivity.

A site sensitivity assessment was undertaken to inform the site layout for the SEF. The aim of this exercise was to indicate any areas of the SEF project area which should be precluded from the development footprint. From a visual perspective, sensitive areas would be areas where the establishment of PV arrays would result in the greatest probability of visual impacts on sensitive or potentially sensitive visual receptors.

Using GIS-based visibility analysis, it was possible to determine that much of the SEF project area would not be visible from any of the receptor locations identified potentially sensitive receptors in the study area. In terms of visibility therefore, no sections of the site are more sensitive than any others. In addition, investigation determined that there are no sensitive or potentially sensitive receptors within the SEF project area or within 500 m of the project area boundary which would be affected by the development.

As such, no areas of visual sensitivity were identified within the SEF project area.

# 3 NATIONAL ENVIRONMENTAL SCREENING TOOL

In assessing visual sensitivity of the proposed Ezelsjacht SEF, consideration was given to the Landscape Theme of the National Environmental Screening Tool. Under the Landscape Theme, as shown in **Figure 2** below, the tool identifies areas of Very High sensitivity in respect of SEF development on the Ezelsjacht SEF site. According to the Screening Tool, the high sensitivity rating applied to the SEF project area is associated with the presence of natural features such as mountain tops, high ridges and steep slopes. Based on these criteria, much of the northern and eastern portion of the site would be ruled out for SEF development.

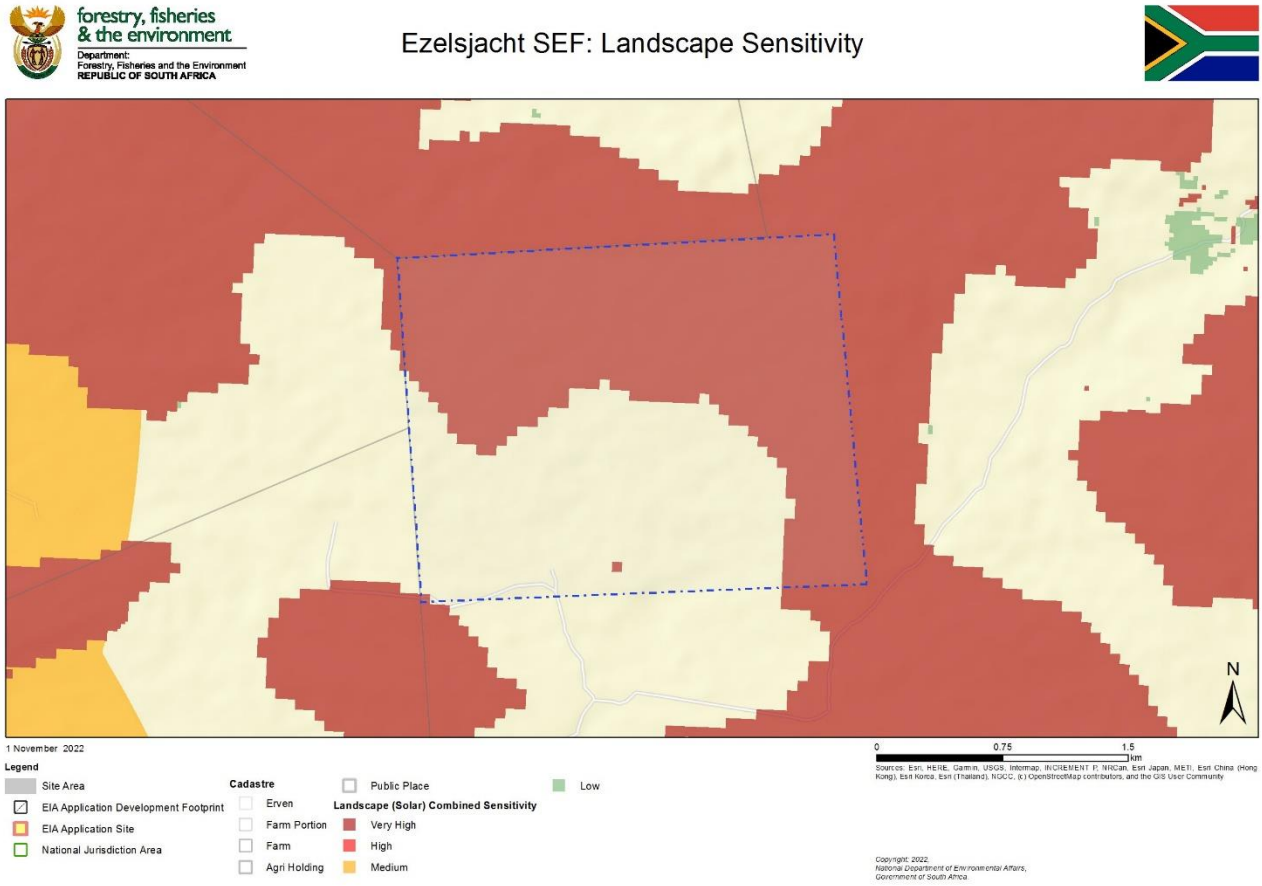


**Figure 2: Relative Landscape Sensitivity (November2022)**

The Screening Tool provides a very high level, desktop assessment and as such the results of the study must be viewed against the findings of the field investigation as well as factors affecting visual impact, such as:

- the presence of visual receptors;
- the distance of those receptors from the proposed development; and
- the likely visibility of the development from the receptor locations.

## 3.2 SENSITIVITY ANALYSIS SUMMARY FOR SEF DEVELOPMENT

Although the Screening Tool depicts areas of "very high" landscape sensitivity across the Ezelsjacht SEF project area, the site sensitivity verification does not support this sensitivity rating. The desktop assessment, confirmed by the field investigation, showed that much of SEF project area is located on relatively flat to gently undulating terrain, with some areas of higher elevation occurring in the north. No mountain tops, high ridges or steep slopes were identified on the site.

In addition, very few receptors were identified within 5kms of the SEF project area and none of these is within 500m of the site boundary.

# 4 CONCLUSION

A site sensitivity verification has been conducted in respect of the Visual Impact Assessment (VIA) for the proposed 110MW Ezelsjacht SEF near De Doorns in the Western Cape Province. This verification has been based on a desktop-level assessment supported by field-based observation.

As outlined above, the findings of the VIA have been further assessed and verified in relation to the sensitivities identified in terms of the Landscape Theme of the National Environmental Screening Tool.

# APPENDIX D: MAPS

# RECORD OF REPORT DISTRIBUTION

| | |
|---|---|
| SLR Reference: | 720.19118.0002 |
| Title: | Visual Impact Assessment for the Proposed Ezelsjacht Solar Energy Facility |
| Report Number: | 1 |
| Client: | Mainstream |

| Name | Entity | Copy No. | Date Issued | Issuer |
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