

	STANDARD	Transmission Projects Delivery
---	-----------------	---

Title: **Environmental Requirements for
Contractors and/or Suppliers**

Document Identifier: **TPDMAN-ST-37**

Alternative Reference **240-113766234**
Number:

Area of Applicability: **Transmission Projects
Delivery**

Functional Area: **Environmental
Management**

Revision: **2**

Total Pages: **30**

Next Review Date: **May 2024**

Disclosure **Controlled Disclosure**
Classification:

Compiled by

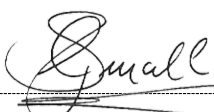


L Grobbelaar

**Senior Environmental
Advisor**

Date: 07/05/2021

Functional Responsibility



G Small

SHEQ Manager

Date: 2021-05-07

Authorized by



N Singh

General Manager

Date: 10-05-21

Table of Content

Content	Page
1. Introduction.....	4
2. Supporting Clauses	4
2.1 Scope	4
2.1.1 Purpose.....	4
2.1.2 Applicability	4
2.1.3 Effective date	4
2.2 Normative/Informative References	5
2.2.1 Normative	5
2.2.2 Informative	5
2.3 Definitions	5
2.4 Abbreviations	7
2.5 Roles and Responsibilities.....	7
2.5.1 The SHEQ Manager PDP shall be responsible for:.....	7
2.5.2 The Senior Environmental Advisor: Grid shall be responsible for:.....	7
2.5.3 The Contractor shall be responsible for:	8
2.6 Process for Monitoring.....	8
2.7 Related/Supporting Documents.....	8
3. Standard Requirements	8
3.1 Organisation Environmental Management System Requirements.....	8
3.2 Environmental Planning.....	9
3.3 Organisational Environmental Aspects and Impacts Registers	11
3.4 Application of Significant Aspects.....	12
3.5 Access to Premises, Facilities and Documentation/Information	12
3.6 Organisation Monitoring, Measurement, Analysis and Evaluation of Compliance.....	13
3.7 Environmental Documentation submission to Transmission Projects Delivery.....	13
3.7.1 Tender Evaluation phase	13
3.7.2 Organisation Assessment and/or Verification phase	14

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

3.7.3 Contract Award (Qualification) phase	14
3.7.4 Contract Execution phase	15
3.7.5 Contract/Order completion	16
3.8 Forms and Records	16
4. Acceptance	17
5. Revisions	17
6. Development Team	18
7. Acknowledgements	18
Appendix A – ASPECTS AND IMPACT REGISTER	19
Appendix B: TABLE 1 – 5	20
Appendix C: Tender returnable form	23
Appendix D: CONTRACTOR ENVIRONMENTAL REQUIREMENTS PROFORMA	24
Appendix E: METHOD STATEMENT TEMPLATE	25
Appendix F: PRE-AMBLE FOR TRANSGRESSIONS AND FINES	27

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

No part of this document may be reproduced without the expressed consent of the copyright holder, Eskom Holdings SOC
Hard copy printed on: 7 May 2021

1. Introduction

Transmission Projects Delivery's (TPD) position is to collaborate with Contractors/suppliers who fully demonstrate commitment to the development, implementation and maintenance of an environmental management system (EMS) that conforms to the requirements of ISO 14001: 2015. The priority is to encourage Contractors/suppliers to continually contribute to the improvement of Eskom Transmission Projects Delivery's EMS and improve their environmental management system and enhance service delivery by obtaining ISO 14001 certification. These requirements are in addition to the requirements stipulated in the project specific Environmental Management Programme (EMPr), any Environmental Authorisation (EA) including any other environmental permits, licenses and environmental legislation.

2. Supporting Clauses

2.1 Scope

This document stipulates the standard requirements, by which contractors/suppliers shall manage, implement and maintain an Environmental Management System (EMS) to ensure that legal and Eskom TPD's requirements are continuously adhered to.

This standard applies to the procurement of all products and services as well as in instances where technical requirements are also being specified.

2.1.1 Purpose

The intention of this document is to specify and describe the minimum environmental requirements for all existing and potential contractors/suppliers rendering product and or services to TPD, and to define the environmental criteria for the evaluation and selection of Contractors/suppliers.

2.1.2 Applicability

This document shall apply throughout Transmission Projects Delivery.

2.1.3 Effective date

This standard shall be effective from the date of the signature.

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

2.2 Normative/Informative References

Parties using this document shall apply the most recent edition of the documents listed in the following paragraphs.

2.2.1 Normative

- [1] ISO 9001 Quality Management Systems
- [2] ISO 14001: Environmental Management Systems
- [3] National Environmental Management Act No 107 of 1998
- [4] Project Specific Environmental Management Programmes
- [5] Project Specific Permits and Licenses (Construction stage)
- [6] PDPMAN-FM-20 Environmental Tender Evaluation Template
- [7] PDPMAN-FM-102 Environmental Evaluation for Site Readiness Check sheet

2.2.2 Informative

- [1] 240-133087117 Environmental Incident Management Procedure
- [2] PDPMAN-WN-14 Identification of Aspects and Assessments of Impacts
- [3] 32-736 Corporate Document
- [4] 32-727 Eskom SHEQ Policy
- [5] PDPMAN-SG-68 PDP SHEQ Statement of Commitment
- [6] 32-726 SHE Requirements for Commercial processes

2.3 Definitions

- 2.3.1 **Environmental Impact:** any change to the environment, whether adverse or beneficial, wholly or partially resulting from an organisation's environmental aspects.
- 2.3.2 **Environmental Authorisation:** authorisation obtained from a competent authority responsible for authorising listed activities in terms of the National Environmental Management Act No 107 of 1998.

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

2.3.3 **Environmental Management Programme:** it is a programme/plan of action for achieving organisational objectives relating to the mitigation of environmental impacts of its activities, products and services.

2.3.4 **Environmental Performance:** the measurable results of an organization's management of its environmental aspects.

2.3.5 **Organisation:** a company, corporation, firm, enterprise, authority or institution, or part or combination thereof, whether incorporated or not, public or private, that has its own functions and administration.

Note: For organisations with more than one operating unit, a single operating unit may be defined

2.3.6 **Record of Decision:** authorisation obtained from a competent authority responsible for authorising listed activities in terms of the Environmental Conservation Act No 73 of 1989.

2.3.7 **Contractor/Supplier Organisation:** organisation or person that provides a product or service.

EXAMPLE: Produces, distributor, retailer or vendor of a product, or provider of a service or information.

NOTE 1: A supplier can be internal or external to the organisation.

NOTE 2: In a contractual situation, a supplier is sometimes called "contractor".

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

2.4 Abbreviations

Abbreviation	Explanation
EA	Environmental Authorisation
ECO	Environmental Control Officer
EMPr	Environmental Management Programme
EMS	Environmental Management System
ISO	International Organisation for Standardization
MSDS	Material Safety Data Sheet
RoD	Record of Decision
TDP	Transmission Projects Delivery
SHE	Safety Health and Environmental
SHEQ	Safety Health Environment and Quality

2.5 Roles and Responsibilities

2.5.1 The SHEQ Manager PDP shall be responsible for:

2.5.1.1 Ensuring that all the Grids partake in the development and enforcement of these requirements;

2.5.1.2 Assessing the level of conformance of this document by the Grids;

2.5.1.3 Advising on the areas of improvement of this document.

2.5.2 The Senior Environmental Advisor: Grid shall be responsible for:

2.5.2.1 Ensure that this standard is issued out by the Project Managers and/or Procurement department during tender enquiry stage;

2.5.2.2 Evaluate compliance to the requirements of the standard during the various phases of the project life cycle.

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

No part of this document may be reproduced without the expressed consent of the copyright holder, Eskom Holdings SOC
Hard copy printed on: 7 May 2021

2.5.3 The Contractor shall be responsible for:

2.5.3.1 Prepare the documentation and Implementation of the requirements as stipulated in this standard;

2.5.3.2 Comply with all environmental permits and licences and if there is non-compliance, the transgressions and fines document (Appendix F) will be implemented.

2.6 Process for Monitoring

Compliance to this standard will be monitored during tender evaluations, periodic inspections and audits on projects.

2.7 Related/Supporting Documents

2.7.1 None

3. Standard Requirements

3.1 Organisation Environmental Management System Requirements

3.1.1 The Organisation shall have a fully documented, implemented and maintained environmental management system, which complies with the requirements of the ISO 14001 or their environmental management system shall carry valid certification from an acceptable EMS Certification body as indicated in the applicable Transmission Projects Delivery invitation.

3.1.2 The Organisation shall be responsible for ensuring that all their Supplier Organisation's environmental programmes comply with the Transmission Projects Delivery requirements. The supplier shall define the specific environmental control elements applicable to the scope of works.

3.1.3 The Organisation shall inform Transmission Projects Delivery of any changes to the environmental management system or staff that is relating to the scope of work that will affect the environmental system prior to implementation of these changes.

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

3.2 Environmental Planning

3.2.1 Contractors/suppliers shall produce either the Proof of Management Systems Accreditation/Certification or an Environmental Management System in accordance with the ISO 14001 and/or Integrated Management Systems standard as per the Environmental Tender Evaluation Template.

3.2.2 All production/service provision shall be carried out in accordance with documented environmental Aspects and Impacts registers and create procedures to deal with those Aspects that may have significant Impact on the Environment.

3.2.3 The Organisation's Environmental Management Plans / Programmes shall identify/indicate/define/reflect the following information relevant to the Organisation's scope of supply responsibility:

Scope of Work

3.2.3.1 Upon revision, be subjected to review and approval by all parties previously responsible, prior to implementation.

3.2.3.2 Be in any documented format deemed most suitable i.e. text, diagrammatic, matrix etc.

3.2.3.3 Be reviewed by TPD or its environmental representatives for acceptability and shall allow for the insertion of TPD specific requirements.

3.2.3.4 Any revisions to the plans/programmes shall require the agreement of TPD or its environmental representatives prior to the commencement of work involving an activity affected by such changes.

3.2.3.5 Form part of the Organisation's documented EMS, and shall be internally reviewed, and formally approved.

3.2.3.6 Cover each distinct stage of work performed/undertaken and it shall include but not be limited to:

- Site establishment
- Access control to site
- Site construction and installation work (civil, electrical, power lines etc.)
- Manufacturing (site, factory, temporary workshops etc.)

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

- Storage areas (plant, equipment, free issue material etc.)
- Waste Management Plan (or method statement)
- Site and Vegetation Clearing
- Handling of Hazardous Chemical substances
- Site management (water management, dust and noise, land owner liaison, final release and settlement of disputes and claims)
- Rehabilitation
- Site demobilization

3.2.3.7 Specific environmental monitoring/verification activities to be undertaken on its sub-contractors and/or suppliers.

3.2.3.8 Different physical locations where the Organisation's work will be performed, the nature and extent thereof and include work to be performed by contractors/suppliers.

3.2.3.9 Work to be performed by supplier Organisation's and their pre-determined scoping requirements.

3.2.3.10 Waste management plan/procedure that includes waste segregation and minimisation, waste disposal register, anticipated waste streams to be generated and related legal requirements applicable to waste management for specific TPD Projects.

3.2.3.11 Environmental records to be retained specific to the service/product, including the format and retention periods that will apply, shall include but not be limited to:

- Environmental Authorisation (including all other permits and licenses)
- Project specific Environmental Management Plan/Programme
- Aspects and Impacts register
- Incident register and Investigation reports
- Non – Conformance register
- Public Complaints register
- Waste statistics – (reused, recycled, donated and disposal records)
- Water use records

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

- Hazardous Substances registers and Material Safety Data Sheets
- Records of internal and external audits and inspections (reports, findings, action plans and close outs)
- Records of site inspections conducted (checklists and reports)
- ECO reports (where applicable)
- Energy Efficiency Checklists

NOTE: The above can be submitted and summarised in the form of a controlled register

3.2.3.12 The organisational structure indicating the current management hierarchy as per scope of work. The structure shall extend from the policy maker down to the supervisory level, within each of the different production/services facilities/operations. The structure must clearly show lines of responsibility and authority and shall reflect both the names of the appointed persons and their respective designations and positions.

3.2.3.13 The management representative (i.e. appointed responsible authority of site) having overall responsibility for environmental management and planning.

3.2.3.14 A qualified person (National Diploma or a degree in Environmental Sciences/Management or Nature Conservation or relevant Natural Sciences) having the responsibility for monitoring environmental planning and activities and their relationship within the management structure according to the project EMPr and/or EA requirements.

3.3 Organisational Environmental Aspects and Impacts Registers

3.3.1 The Organization Aspects and Impacts register shall identify/indicate/define/reflect the supplier's scope as per the requirements of ISO 14001.

3.3.2 TDP requires that the organisation's Aspects and Impacts documentation meet the additional requirements below as a minimum:

- Identify and list all environmental aspects per activity.
- Determine all the possible environmental impacts for each of the identified aspects.
- Apply significance criteria before and after controls.
- All aspects shall be assessed before and after controls.

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

- Identify significant Aspects and Impacts and establish programmes/ procedures how to address the impact to the environment, the latter shall be prioritised in these programmes/procedures.
- The impacts shall be rated and must be included in a compiled Environmental Aspects and Impacts register (See Appendix A).
- Approval of the Aspects and Impacts register by the contractors/suppliers management.
- It must be a revision-controlled document.
- An example of the Environmental Criteria for determining the significant impacts are explained in Appendix B as Table 1, 2, 3, 4, and 5.

3.4 Application of Significant Aspects

3.4.1 Significant aspects shall be considered in the setting of Objectives and Targets and the determination of the risks and opportunities at the project.

3.4.2 Planned actions and impact control (corrective) measures for the medium and high significant impacts shall be undertaken through management programmes and/or through operational controls.

3.5 Access to Premises, Facilities and Documentation/Information

3.5.1 TDP or its inspection agency or any other Eskom department shall be afforded access to all areas of the Organisation and its Supplier Organisation's premises and facilities to conduct environmental audits, surveillance or inspections to verify compliance with Project EMPr and/or EA and ISO14001: EMS requirements.

3.5.2 All environmental system documentation, records, reports etc. shall be made available for review when requested by TDP or its appointed inspection agency.

3.5.3 The Organisation shall provide suitable facilities to TDP or its appointed environmental agency, and shall supply any assistance necessary for the performance of any audit, surveillance and/or inspection activities.

3.5.4 The Organisation shall ensure a safe working environment to TDP or its appointed environmental agency by informing it of the necessary safety requirements and possible safety hazards.

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

3.6 Organisation Monitoring, Measurement, Analysis and Evaluation of Compliance

3.6.1 The Organization shall establish, implement and maintain a procedure / processes to monitor measure and analyse their activities that may have a significant environmental impact.

3.6.2 The procedure / process shall include the documenting of information to monitor performance, applicable operational controls (method statements) and conformity with the organization's environmental objectives and targets, Project EMPr and/or the EA.

3.6.3 The organization shall establish, implement and maintain a procedure(s)/process (es) for periodically evaluating compliance with applicable compliance obligations as well as the requirements of the Project EMPr and/or the EA. The organization may wish to combine this evaluation with the programmes that address their significant environmental Impacts.

3.6.4 The organization shall keep records of the results of the periodic evaluations, these shall be but not limited to:

- A procedure for Monitoring, Measurement, Analysis and Evaluation of Compliance
- Document specific checklists and registers
- Monitoring/Inspection reports
- Findings and close out reports
- Natural resource consumption (water, fuel, electricity usage etc.)

3.7 Environmental Documentation submission to Transmission Projects Delivery

3.7.1 Tender Evaluation phase

3.7.1.1 Documentation shall be prepared and submitted to TDP, in response to either of the following eventualities:

- An Eskom invitation to tender for a contract
- An Ad-hoc evaluation required by TDP. Documents to be submitted to TDP include, but may not be limited to the following:
 - The completed environmental enquiry checklist for Tender Returnables (Appendix C).
 - Proof of the Organisation's EMS or Certification.

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

- A controlled copy of the contractors/suppliers environmental plan / programme as stipulated in 3.7.3 of this standard.
- A controlled copy of the Organisation's proposed Aspects and Impacts including the rating criteria stipulated in Appendix B: Tables 1 - 5, as it relates to the product/service in question.
- Sample of Environmental Bill of Quantities.

3.7.1.2 Documents (i.e. Certificates of compliance and/or conformance) presented at the tender phase may be subjected to verification.

3.7.2 Organisation Assessment and/or Verification phase

3.7.2.1 Projects within TDP may be subjected to the mandatory implementation of the environmental management systems that may imply EMS implementation and assessments including inspections and audits. This assessment will be applicable to all medium to long term projects and also dependent on the risks of the scope of work.

3.7.2.2 The Organisation shall give written permission to its product and environmental management system certification bodies, and/or any inspection authority acting on its behalf, to make available all information at its disposal, and without any reservation, for review by TDP or its appointed inspection agency.

3.7.3 Contract Award (Qualification) phase

The following documents shall be prepared and maintained for the duration of the contract and/or qualification validity period, and shall be submitted to TDP or its inspection agency prior to commencement of the works. Documents to be submitted to TDP include, but may not be limited to the following:

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

3.7.3.1 A completed and signed contractor Environmental Requirements Pro – Forma (Appendix D).

3.7.3.2 Contractors/suppliers Environmental Plan / Programme and Aspects and Impact register in accordance with TDP specific requirements.

3.7.3.3 EMS documentation as required for the works.

3.7.3.4 All documentation shall be submitted to TDP for evaluation 14 days after contract award date.

3.7.4 Contract Execution phase

3.7.4.1 Organisation's EMS records.

3.7.4.2 TDP's accepted concessions / production permits as applicable.

3.7.4.3 Corrective actions taken because of non-conformances raised by either the Organisation or TDP.

3.7.4.4 Organisation's certificates of conformance.

3.7.4.5 The product/service in processing and/or final completed state of conformance to activities will include but not be limited to the following:

- Environmental Authorisation (including all other permits and licenses)
- Project specific Environmental Management Plan/Programme
- Aspects and Impacts register
- Incident register and Investigation reports
- Non – Conformance register
- Public Complaints register
- Waste Statistics – (reused, recycled, donated and disposal records)
- Water use records
- Hazardous Substances registers and Material Safety Data Sheets
- Records of internal and external audits and inspections (reports, findings, action plans and close out reports)

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

- Records of site inspections conducted (checklists and/or reports)
- ECO reports (where applicable)
- Energy Efficiency Checklists
- All organisational and service providers agreements/contracts (i.e. waste management services and water supply)

NOTE: The above can be submitted and summarised in a form of a controlled register

3.7.5 Contract/Order completion

Documents to be submitted to TPD on completion of scope of works, which shall accompany every shipment of product to its specified delivery destination(s) include, but may not be limited to the following:

3.7.5.1 Organisation certificates of conformance.

3.7.5.2 Organisation test certificates etc. as required by the applicable technical specification(s).

3.7.5.3 Inspection release reports issued by TPD or its inspection agency including but may not limited to:

- ECO close out report
- Final rehabilitation report
- Final site close out audit/inspection report/NCR close out

3.8 Forms and Records

TDP will issue a separate environmental returnable (PDPMAN-FM-120) form in conjunction with this standard on each occasion of a formal invitation to tender etc. The environmental schedule's primary objective is to provide the Organisation with a standardized means of providing TDP with a formal response in terms of its own organisational environmental practices, capabilities etc.

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

Appendixes

Appendix A – Aspects and Impacts register

Appendix B – Table 1 - 5

Appendix C – Tender returnable form

Appendix D – Environmental Requirements Pro-forma

Appendix E – Method Statement Template

Appendix F – Transgressions and Fines

4. Acceptance

This document has been seen and accepted by:

Name	Designation
Naresh Singh	General Manager
Geoffrey Small	Middle Manager SHEQ
Vusi Mthimunya	Middle Manager Inspectorate / Safety (Client) Agent
Makgwanya Maringa	Senior Manager
Johan Bornman	Senior Manager
Nozuko April	Senior Manager
Mosebo Dikgale	Senior Manager
Bob Naraghi	Senior Manager
Harish Mohabir	Senior Manager
Clint Fisher	Senior Manager

5. Revisions

Date	Rev.	Compiler	Remarks
June 2016	0	Tshinanne Mutshatshi	New document and also meant to replace PDPMAN-PC-11
October 2018	1	Lené Grobbelaar	Include transgressions and fines Appendix

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

No part of this document may be reproduced without the expressed consent of the copyright holder, Eskom Holdings SOC
Hard copy printed on: 7 May 2021

Date	Rev.	Compiler	Remarks
January 2021	2	Lené Grobbelaar	Document due for review and include Telecommunications and Asset Management Execution as well as update name of department

6. Development Team

The following people were involved in the development of this document:

- Lené Grobbelaar
- Trevor O'Donoghue
- Tshinanne Mutshatshi
- Takalani Thimisha
- Nombulelo Mabena
- Luckyboy Isaac
- Bukelwa Masiza

7. Acknowledgements

The compiler would like to acknowledge the TPD Environmental Management Team for putting this document together.

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

No part of this document may be reproduced without the expressed consent of the copyright holder, Eskom Holdings SOC
Hard copy printed on: 7 May 2021

Appendix A – ASPECTS AND IMPACT REGISTER

REFERENCE NUMBER:
ENVIRONMENTAL ASPECTS & IMPACTS REGISTER
COMPANY:
REV:
DATE:

1. Identify Aspects		2. Identify Impacts				3. Analyse Risks				4. Evaluate Risks				5. Treat Risks					
Activity	Aspects	No.	Impacts	Owner	Causes of the impact	What are the Consequences?	Existing Controls	RCE Risk Control Effectiveness	Environmental LIKELIHOOD	Priority Rating	Additional Tasks	Environmental LIKELIHOOD	Priority Rating	Monitoring Mechanisms	Control Owner	Control Impacts	Legal & other requirements (Prescription)		
			Actual	Potential	Positive														
Condition associated with an Aspect	An Aspect is anything that is likely to lead to an event that will have an adverse impact on the environment. An aspect can pose more than one impacts.		Any change to the environment whether adverse or beneficial, wholly or partially resulting from an organisation's environmental aspects.	Who is accountable for making sure the controls and monitors are: - in place, - implemented, - regularly reviewed for effectiveness.	What causes the impact to come into effect?	What is the unexpected adverse impact on the objective?	Include: - <u>Preventative Controls</u> (actions taken to eliminate aspects or reduce the likelihood of its occurring), and - <u>Reactive Controls</u> (action taken to reduce the immediate impact of the aspect occurring)				Include: - <u>Preventative Controls</u> (actions taken to eliminate Aspects or reduce the likelihood of its occurring), and - <u>Reactive Controls</u> (action taken to reduce the immediate impact of the aspect occurring)			How we know if we are succeeding. Include comments on effectiveness.	Person allocated the responsibility for implementing the agreed controls	What additional Impacts are presented by the chosen control. If significant, these will also require a formal Risk Assessment.	Where relevant, list the relevant legislative and or Eskom requirements that prescribe the control.		
Site Establishment	1. Vegetation clearing	PDP 1.1	Loss of biodiversity - cutting of protected trees	x			1. Executing the aspect	Loss of biodiversity	1. EMP	5	D	1. Ensure compliance to EMP/RoD. Permits to cut	2	D	1	EMP/RoD Audits	Contractor EO/EC	None	1. NEMBA, 2004 S 56 & 57 2. NFA, 1998 S 12 & 15
		PDP 1.2	Fauna habitat loss	x			1. Executing the aspect	Fauna habitat loss	1. EMP	5	D	1. Ensure compliance to EMP/RoD	3	C	1	EMP/RoD Audits	Contractor EO/EC	None	1. NEMBA, 2004 S 56 & 57
	2. Digging	PDP 2.1	Soil erosion		x		1. Not executing the rehabilitation plan	Soil erosion	1. Implementation of Rehabilitation Plan	5	C	1. Ensure compliance to EMP/RoD (rehabilitation plan)	3	C	1	EMP/RoD Audits	Contractor EO/EC	None	1. NEMA S 28
		PDP 2.2	Emission of dust	x			1. Executing the aspect 2. Not executing the aspect	Emission of dust	1. Implementation of Dust Management Plan	3	C	1. Ensure compliance to EMP/RoD (dust management plan)	2	C	1	EMP/RoD Audits	Contractor EO/EC	None	1. NEMA: AQAS 32
		PDP 2.3	Land pollution		x		1. Lack of knowledge (procedure); Waste Management &	Land pollution	1. Implementation of Waste Management Procedure	2	C	1. Implement procedure & Waste Manifest & reconciliations	1	D	1	EMP/RoD Audits	Contractor EO/EC	None	1. NEM: WA
Prepared by:	Signature:	Date:																	
Approved by:	Signature:	Date:																	
Authorised by:	Signature:	Date:																	

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

No part of this document may be reproduced without the expressed consent of the copyright holder, Eskom Holdings SOC
Hard copy printed on: 7 May 2021

Appendix B: TABLE 1 – 5

Table 1: Likelihood Criteria

Category	Criteria
<i>E</i>	<ul style="list-style-type: none">• 99% probability, or• impact is occurring now, or• could occur within “days to weeks”
<i>D</i>	<ul style="list-style-type: none">• >70% probability, or• balance of probability will occur, or• could occur within “weeks to months”
<i>C</i>	<ul style="list-style-type: none">• >20% probability, or• may occur shortly but a distinct probability it won’t, or• could occur within “months to years”
<i>B</i>	<ul style="list-style-type: none">• >5% probability, or• may occur but not anticipated, or• could occur in “years to decades”
<i>A</i>	<ul style="list-style-type: none">• <5% probability• occurrence requires exceptional circumstances• exceptionally unlikely, even in the long term future• only occur as a “100 year event”

Table 2: Environmental Consequence Criteria

Rating	Environment
6	<ul style="list-style-type: none">- Irreversible long term environmental harm.- Community outrage- potential large-scale class action.- Public inquiry by Government agency- Potential for significant legal sanctions against Eskom
5	<ul style="list-style-type: none">- Prolonged environmental impact.- High-profile community concerns raised – requiring significant rectification measures.- Government agency inquiry.
4	<ul style="list-style-type: none">- Measurable environmental harm – medium term recovery.- High potential for complaints from stakeholders and community.
3	<ul style="list-style-type: none">- Medium term recovery, immaterial effect on environment/community- Required to inform Government agency, (e.g.: noise, dust)
2	<ul style="list-style-type: none">- Short term transient environmental or community impact- some clean-up costs

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

No part of this document may be reproduced without the expressed consent of the copyright holder, Eskom Holdings SOC
Hard copy printed on: 7 May 2021

1	- Negligible impact on the environment - little action required.
----------	--

Table 3: Risk Matrix

Consequences	6	III	II	I	I	I
	5	III	II	II	I	I
	4	IV	III	II	I	I
	3	IV	III	II	II	I
	2	IV	IV	III	II	II
	1	IV	IV	III	III	III
		A	B	C	D	E
		Likelihood				

Table 4: Priority for Attention

Priority	Suggested timing of treatment	Authority for continued toleration of residual risk
I	Short term. Normally within 1 month.	Managing Directors, Chief Executive and Board
II	Medium term. Normally within 3 months.	Managing Directors, Senior General Managers and General Managers
III	Normally within 1 year	Senior General Managers, General Managers and Managers
IV	Ongoing control as part of a management system.	All staff

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

No part of this document may be reproduced without the expressed consent of the copyright holder, Eskom Holdings SOC
Hard copy printed on: 7 May 2021

Table 5: Risk Control Effectiveness

RCE	Guide
Fully effective	Nothing more to be done except review and monitor the existing controls. Controls are well designed for the Risk, are largely preventative and address the root causes and Management believes that they are effective and reliable at all times. Reactive controls only support preventative controls.
Partially effective	Most controls are designed correctly and are in place and effective. Some more work to be done to improve operating effectiveness or Management has doubts about operational effectiveness and reliability.
Ineffective	While the design of controls may be largely correct in that they treat most of the root causes of the Risk, they are not currently very effective. There may be an over-reliance on reactive controls. Or / Some of the controls do not seem correctly designed in that they do not treat root causes, those that are correctly designed are operating effectively.
Totally ineffective	Significant control gaps. Either controls do not treat root causes or they do not operate at all effectively. Controls, if they exist are just reactive.
None	Virtually no credible control. Management has no confidence that any degree of control is being achieved due to poor control design and/or very limited operational effectiveness.

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

No part of this document may be reproduced without the expressed consent of the copyright holder, Eskom Holdings SOC
Hard copy printed on: 7 May 2021

Appendix C: Tender returnable form

QUALITATIVE EVALUATION CRITERIA		WEIGHT AND SCORE
DOCUMENT REQUIREMENTS		% RESULT
SECTION A: Environmental Management System Requirements ISO 14001:2004 Option 1 Environmental Policy Manual as per Scope of Works PDPMAN-SP-37 Rev.0 Clause 4.4.1		
1 Environmental Policy Signed and Authorized (Clause 4.2)	1	Weighted 40
2 Planning (Clause 4.3)	1	Max Actual
3 Implementation and Operation (Clause 4.4)	1	
4 Checking (Clause 4.5)	1	
5 Environmental documentation (ISO 14001:2004 EMS manual)	1	
6 Management review (Clause 4.6)	1	
ISO 14001:2004 Mandatory Procedures		
1 Environmental Aspects (Clause 4.3.1)	1	
2 Environmental legal and other requirements (Clause 4.3.2)	1	
3 Competence training and awareness (Clause 4.4.2)	1	
4 Environmental Communication (Clause 4.4.3)	1	
5 Control of documents (Clause 4.4.5)	1	
6 Non-Conformity, corrective – and preventive action (Clause 4.5.3)	1	
7 Environmental Emergency and Response (Clause 4.4.7)	1	
8 Monitoring Measurement and evaluation of compliance (Clause 4.5.1, 4.5.2)	1	
9 Control of Records (Clause 4.5.4)	1	
10 Internal Audit (Clause 4.5.5)	1	
Sub-Section A Score	16	Max
Subsection A (Option 1) Result as Percentage = Score Obtained over Maximum Allocated X 100		
% X Weight		%
SECTION A: Environmental Management System Requirements ISO 14001:2004 Option 2 Valid certification of the Environmental Management System by an accredited body as per Scope of Works PDPMAN-SP-37 Rev.0 Clause 4.4.1		
1 Product/Service Scoping defined	1	Weighted 40
2 Approved and Authorized	1	Max Actual
3 Recognized International Accredited Affiliation	1	
4 Validity	1	
Sub-Section A Score	4	Max
Subsection A (Option 2) Result as Percentage = Score Obtained over Maximum Allocated X 100		
% X Weight		%
SECTION B: Environmental Planning Requirements PDPMAN-SP-37 Rev.0 Environmental Management Plan as per Scope of Works Clause 4.2.3		
4.2.3.1 Define Scope	1	Weighted 30
4.2.3.2 Form part of the Organization's documented EMS	1	Max Actual
4.2.3.3 Cover each distinct stage of work	1	
4.2.3.4 Customers formal approval	1	

4.2.3.5 Revision be subject to review	1	
4.2.3.6 Documented format	1	
4.2.3.7 Review process by Power Delivery Projects specific requirements	1	
4.2.3.8 Revisions to the plans shall require the agreement of Power Delivery Projects	1	
4.2.3.9 Specific Environmental Monitoring requirements	1	
4.2.3.10 Index of Relevant Environmental Aspects and Impacts	1	
4.2.3.11 Locations of the Organization's work to be done and work to be done by Sub-Organization	1	
4.2.3.12 Supplier Organization's and their pre-determined scoping requirements	1	
4.2.3.13 Waste man plan, segregation, separation, disposal register and predicted waste streams	1	
4.2.3.14 Environmental records to be retained specific to the scope and retention periods	1	
4.2.3.15 Organizational structure indicating the current management	1	
4.2.3.16 Management representative having overall responsibility for Environmental Management	1	
4.2.3.17 Personnel performing Environmental management on site implementing EWP and/or EA	1	
Sub-Section B Score	17	Max
Subsection B Results Percentage = Score Obtained over Maximum Allocated X 100 % X Weight		
% X Weight		%
SECTION C: Organizational Aspects and Impacts Registers PDPMAN-SP-37 Rev.0 Environmental Aspects and Impacts registers as per Scope of Works Clause 4.3		
4.3.1 ID & reflect the relevant to the supplier's scope and per clause 4.3.1 of ISO 14001:2004	1	Weighted 30
4.3.2.1 Identify and list all environmental Aspects per activity	1	Max Actual
4.3.2.2 Determine all the possible Environmental Impacts for each of the identified Aspects	1	
4.3.2.3 Apply significance criteria before and after controls	1	
4.3.2.4 All aspects shall be assessed before and after controls	1	
4.3.2.5 Identify significant Aspects and establish procedures for their control	1	
4.3.2.6 Impacts rated according to Eskom risk criteria, logged and registered (PDPMAN-PC-14)	1	
4.3.2.7 Significant aspects have been considered in setting of Environmental Objectives and Targets	1	
4.3.2.8 Approved by organizations management	1	
4.3.2.9 Revision controlled document	1	
Sub-Section C Score	10	Max
Subsection C Results Percentage = Score Obtained over Maximum Allocated X 100 % X Weight		
% X Weight		%
THRESHOLD The score that each tenderer receives will provide a numeric basis for tender comparison. The minimum weighted average score required for a tender to be considered must be 80% or above.		
FINAL TOTAL SCORE = (SECTION A - Option 1) or (Section A - Option 2) + (B) + (C) AS A PERCENTAGE		

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

No part of this document may be reproduced without the expressed consent of the copyright holder, Eskom Holdings SOC
Hard copy printed on: 7 May 2021

Appendix D: CONTRACTOR ENVIRONMENTAL REQUIREMENTS PROFORMA

CONTRACTOR ENVIRONMENTAL REQUIREMENTS PROFORMA		
		
Name of the Organisation		
Vendor Number		
Contract Number		
Scope of Work		
DECLARATION BY TRANSMISSION PROJECTS DELIVERY CONTRACTOR		
<p>1. I undertake to adhere to the requirements as set out in:</p> <ul style="list-style-type: none">- The project Environmental Management Programme, Environmental Authorisation and all relevant environmental permits applicable- Environmental Requirements for Organizations set out in PDPMAN – ST - 37 <p>2. I undertake to comply with all applicable environmental legal and other requirements</p> <p>3. I undertake to comply with Eskom 's environmental standards, policies and procedures where applicable</p> <p>4. I am fully aware and will comply with the environmental transgressions fine systems</p> <p>5. I pledge to inform all staff of their role in managing environmental impacts on site</p> <p>6. I am fully aware that incidents must be reported within 24 hours of occurrence</p> <p>7. I pledge to implement environmental best practice on site at all times during the contract</p> <p>8. I pledge that all non-conformances issued to us will be addressed promptly and appropriately so as to redeem / mitigate the damage.</p>		
<p>I----- (full name) acknowledge and accept the responsibility to comply and conform to all the above mentioned requirements.</p>		
Designation (Contractor)	Signature	Date:
Contact Number		
Eskom: Project Manager	Signature of Project Manager:	Date:

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

Appendix E: METHOD STATEMENT TEMPLATE

Document Reference	Revision no	Description of Revision	Author / Editor	Date

(Company logo)

Project Name

Method Statement Title

Compiled by	Authorised by	Approved by
Date	Date	Date
Signature	Signature	Signature

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

No part of this document may be reproduced without the expressed consent of the copyright holder, Eskom Holdings SOC
Hard copy printed on: 7 May 2021

1. Title

2. Purpose

3. Scope

4. Objective

5. Resources

6. Aspects & Impacts

NO	ASPECT (Act that might have an impact on the environment)	IMPACT	MITIGATION	REFERENCE DOCUMENTS
1				
2				
3				
4				
5				

7. Conclusion

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

No part of this document may be reproduced without the expressed consent of the copyright holder, Eskom Holdings SOC
Hard copy printed on: 7 May 2021

Appendix F: PRE-AMBLE FOR TRANSGRESSIONS AND FINES

The objective of the EMPr is to minimise destruction of the environment due to the project activities. It is the contractor's responsibility to ensure compliance to the EA, EMPr, environmental legislation and other environmental permits and requirements. The fines listed below will be issued to the contractor on environmental transgressions relating to the EMPr, EA, environmental legislation and other environmental permits and requirements. Such fines will be imposed in addition to remedial costs that might be required and therefore the contractor is not exempted from implementing the remediation measures where necessary. All the transgressions identified on site will be noted and both the site manager and the project manager will be informed of such transgressions. Eskom TPD project management can use their discretion to impose fines on any other transgressions and repeat incidents that are not listed below, but in their opinion could have been avoided. The list below can be used as a guide for such fines. The penalty fine will be administered per individual clients. The fines will be deducted from invoices submitted by the contractor.

TRANSGRESSIONS AND FINES

No	Transgression	Regulatory Control	(Minimum of) Fine in Rands
1	Damage to no go areas such as wetlands, rivers and heritage sites as a result of construction activities or employees	National Water Act 36 of 1998 & National Heritage Resources Act 25 of 1999	R100 000
2	Open fires in undesignated areas	EMPr	R50 000
3	Inappropriate disposal of waste	National Environmental Management Waste Act 59 of 2008	R100 000
4	Illegal burning of waste	National Environmental Management Waste Act 59 of 2008 & National Environmental Management Act 107 of 1998	R100 000

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

5	Pollution and/or discharge of wastewater, oil and concrete onto / into the land, surface or groundwater	National Water Act 36 of 1998 & National Environmental Management Act 107 of 1998	R100 000
6	Pollution and/or discharge of wastewater, oil and concrete onto/into the land, surface or groundwater	National Water Act 36 of 1998 & National Environmental Management Act 107 of 1998	R100 000
7	Illegal abstraction of water from a waterbody or borehole (without a permit)	National Water Act 36 of 1998	R100 000
8	Illegal mining e.g. borrow pits	Mineral and Petroleum Resources Development Act 28 of 2002	R200 000
9	Illegal river crossing (including seasonal or periodic rivers)	National Water Act 36 of 1998	R100 000
10	Altering a riverbed or river embankment without a permit	National Water Act 36 of 1998	R100 000
11	Leaving gates open or failure to lock gates	Fencing Act 31 of 1963	R50 000
12	Damage, bending, river over or cutting of landowner's fences without permission	Fencing Act 31 of 1963	R50 000
13	Damage, cutting or removal of protected and/or indigenous trees without a permit	National Forest Act 84 of 1998 / EA	R200 000
14	Killing of a landowner's animals or any other animals without permission	EA/EMPr	R50 000
15	Inadequate / no barricading	EMPr	R40 000
16	Using the veld as a toilet / failure to provide toilets at work stations	EA/EMPr	R50 000
17	Illegal harvesting of plants for medicinal / any other use	EA/EMPr	R50 000

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

18	Littering	National Environmental Management Waste Act 59 of 2008 & National Environmental Management Act 107 of 1998 / EA / EMPr	R10 000
19	Not adhering to agreed access roads	EA/EMPr	R30 000
20	Failure to conduct audits as per the EA requirements	EA	R50 000
21	Any repeat legal contravention	EOHS Management Procedure 32-95	R200 000
22	Use of exotic plant species for rehabilitation	EA / Conservation of Agricultural Resources Act 43 of 1983	R100 000
23	Failure to keep record as per the EA requirements	EA	R50 000
24	Activity commencement without approved method statements	EMPr	R50 000
25	Improper storage of hazardous substances as per the EA (bundling, labelling, quantities, compatibility)	EMPr	R100 000
26	Not implementing emergency procedures for handling spills / deliberate spills	EMPr	R50 000
27	Mixing of cement on a permeable surface	EMPr	R50 000
28	Sewage spills or incorrect disposal of sewage	EMPr	R50 000
29	Fixing or washing of vehicles on undesignated and unbunded areas	EMPr	R30 000
30	Mixing general and hazardous waste	National Environmental Management Waste Act 59 of 2008	R50 000

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

No part of this document may be reproduced without the expressed consent of the copyright holder, Eskom Holdings SOC
Hard copy printed on: 7 May 2021

31	Disposal of hazardous waste in a general landfill site	National Environmental Management Waste Act 59 of 2008	R100 000
32	Disposal of waste in an unregistered landfill site	National Environmental Management Waste Act 59 of 2008	R100 000
33	Non reporting of incidents and / or poor incident management	EOHS Management Procedure 32-95	R40 000
34	Failure to provide firefighting equipment	EMPr	R30 000
35	Failure to conduct environmental induction	EMPr	R20 000
36	Contravening any other environmental related legislation	Legislation	R10 000 – R300 000

CONTROLLED DISCLOSURE

When downloaded from the document management system, this document is uncontrolled and the responsibility rests with the user to ensure it is in line with the authorized version on the system.

No part of this document may be reproduced without the expressed consent of the copyright holder, Eskom Holdings SOC
Hard copy printed on: 7 May 2021