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TABLES

1. INTRODUCTION

The demineralised water production plant at Lethabo Power Station is deteriorating in terms of the physical plant condition. The impact of such deterioration is severe for the production and availability of the demineralised water production plant and influences the power station's production capability.

The Lethabo Water Treatment Plant (WTP) Refurbishment Project was initiated to reinstate the plant to a good state of operation. The scope for the refurbishment project includes the demineralised water production plant from the sand filter outlet to the outlet of the mixed bed ion exchange vessels, including the bulk chemical offloading, handling and chemical (acid and caustic) preparation and injection plants.

2. SUPPORTING CLAUSES

2.1 SCOPE

This document provides the tender technical evaluation strategy for the engineering solution required for the Lethabo Power Station Water Treatment Plant Refurbishment Project.

2.1.1 Purpose

The purpose of this tender technical evaluation strategy is to define the Mandatory Evaluation Criteria, Qualitative Evaluation Criteria and Technical Evaluation Team (TET) member responsibilities for the tender technical evaluation. The technical evaluation strategy serves as basis for the tender technical evaluation process.

2.1.2 Applicability

This document shall apply to the Lethabo Power Station Demineralised WTP Refurbishment Project.

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] 240-48929482: Tender Technical Evaluation Procedure

[2] 375-LET-BDDD-D00185-21: Lethabo Power Station Demineralised Water Treatment Plant Refurbishment Project Technical Specification

2.2.2 Informative

None

2.3 DEFINITIONS

2.3.1 Classification

Controlled Disclosure: Controlled Disclosure to external parties (either enforced by law, or discretionary).

2.4 ABBREVIATIONS

Abbreviation	Description
C&I	Control and Instrumentation
ECSA	Engineering Council of South Africa
EDWL	Engineering Design Work Lead
FAT	Factory Acceptance Test
LDE	Lead Discipline Engineer
TET	Technical Evaluation Team

2.5 ROLES AND RESPONSIBILITIES

As per 240-48929482: Tender Technical Evaluation Procedure

2.6 PROCESS FOR MONITORING

Not applicable.

2.7 RELATED/SUPPORTING DOCUMENTS

Not applicable.

3.3 MANDATORY TECHNICAL EVALUATION CRITERIA

Table 2: Mandatory Technical Evaluation Criteria

	Mandatory Technical Criteria Description	Reference to Technical Specification / Tender Returnable	Motivation for use of Criteria
1.	Submits a valid copy of ECSA certificate for mechanical engineering discipline. Lead Mechanical Engineer or Technologist, who will be responsible in authorising the designs and construction works, is to be professionally registered with the Engineering Council of South Africa (ECSA). Copy of a valid ECSA registration certificate is to be provided. If the Lead Mechanical Design Engineer or Technologist is not employed by the main Contractor, then a letter of intent signed by both parties where the subcontractor will be used for resources is to be submitted. The letter should be specific on the roles and responsibilities for the resources.	Section 23, Part A1	Confirmation that the design is being done by people deemed competent and will be taking the accountability for the design.
2.	Tenderer has submitted proof of ISO 3834 Part 2 Certification and included a signed letter of intent signed by both parties/companies should the welding company not be the main tenderer tendering. E-mail indicating the tenderer has been successful is not sufficient and will be discarded by the evaluation team. Minimum requirement on the ISO 3834-2 certificate is that the products stated on the certificate are relevant to this works information and include as a minimum, pressure vessels, piping and structural steel.	Section 23, Part A2 Section 8.4	Assurance that the welding, which is critical to plant safety and South African regulation, is executed to the quality that is required.

3.4 QUALITATIVE TECHNICAL EVALUATION CRITERIA

The qualitative criteria will be scored according to the scoring matrix set out in the 240-48929482: Tender Engineering Evaluation Procedure shows the scoring matrix that will be used.

Table 3: Qualitative Evaluation Criteria Score Scale

Score	(%)	Definition
5	100	COMPLIANT Meet technical requirement(s) AND; No foreseen technical risk(s) in meeting technical requirements.
4	80	COMPLIANT WITH ASSOCIATED QUALIFICATIONS Meet technical requirement(s) with; Acceptable technical risk(s) AND/OR; Acceptable exceptions AND/OR; Acceptable conditions.
2	40	NON-COMPLIANT Does not meet technical requirement(s) AND/OR; Unacceptable technical risk(s) AND/OR; Unacceptable exceptions AND/OR; Unacceptable conditions.
0	0	TOTALLY DEFICIENT OR NON-RESPONSIVE
Note 1: The scoring table does not allow for scoring of 1 and 3. Note 2: Foreseen acceptable and unacceptable risk(s), exceptions and conditions shall be unambiguously defined in the relevant Tender Technical Evaluation Strategy.		

Table 4: Qualitative Technical Evaluation Criteria with Criteria weighting and sub-weighting.

	Qualitative Technical Criteria Description		Reference to Technical Specification / Tender Returnable	Criteria Weighting (%)	Criteria Sub Weighting (%)	
1.	**General**			**10**		
	1.1	Tenderer is to submit an organogram for the entire project team – Design and Construction. To be verified prior to contract award.	Section 23, Part B7 point 1		**10**	5: Organogram submitted for 80% or more of the roles 4. Organogram submitted for 50% to 80% of the roles 2. Organogram submitted for less than 50% of the roles 0. No organogram submitted
	1.2	Project execution plan	Section 23, Section B7 point 2		**25**	5 Project execution plan provided for the different phases and portions of the scope of work and contains all the main bullet points. 4: Project execution plan provided with 70% or more of the main bullet points and is acceptable at tender phase.

						2: Project execution plan provided but covers less than 70% of the main bullet points or risk identified is unacceptable for tender phase 0: No project execution plan provided
	1.3	The tenderer is to submit a Project Schedule (Level 3) indicating the following as a minimum: ▪ Major milestones and elements of design, procurement, construction, testing, commissioning, etc. which is in accordance with Works Information. ▪ Breakdown and linking of all activities. ▪ High-level timelines for execution of activities. ▪ Critical path	Section 23, Section B7 point 3		**20**	5: Project schedule provided as per the requirements of the scope of work 4: Project schedule provided indicating 75% or more of the bullet points 2: Project schedule provided but covers less than 75% of bullet points and portions of the scope of work 0: No Project schedule provided
	1.4	Letter of guarantee	Section 23, Section B7 point 4 Section 16		**15**	5: Signed letter submitted with longer time period as specified by the NEC and all areas/disciplines covered as per section 16 of the technical specification's requirements 4: Signed letter submitted with the same period as specified by the NEC and all areas/disciplines covered as per section 16 of the technical specification's requirements 2: Signed letter submitted with less than NEC listed time period or 1 or more areas/disciplines not mentioned in the letter or no clear time period indicated on either one of the sections on the letter as per section 16 of the technical specification's requirements 0: No letter submitted
	1.5.1	Tenderer's relevant experience in design and construction of similar works or projects completed for <u>process:</u> Tenderer submits a list of verifiable reference projects (If main Tenderer does not have any experience on specific field, the tenderer can submit the sub-contractors' project experience list. If this is the case it is expected that both tenderer and sub-contractor sign a letter of intent and submits it in the tender file in the relevant section). (minimum of 1 projects or multiple projects which covers the full scope of work from below listed projects 1 - 2). Evidence of reference projects is to include with the following information: ▪ Project Name and Order number/project reference number for traceability purposes. ▪ Technical description of work performed. ▪ Project start and end date. ▪ See below typical size of project for reference (need to be specified). ▪ Name, designation and contact number of the reference person Projects completed for <u>process</u> experience to include as a minimum:	Section 23, Section B7 point 5		**10**	5: Tenderer has all relevant project experience and covers all the projects listed with 3 verified references covered 4: Tenderer has all relevant project experience and covers all the projects listed with at least 1 or 2 verified references covered. 2: Tenderer has less than 50% of the relevant project experience with at least 1 verifiable reference 0: Tenderer did not submit any list to verify any of his experience or none of the projects are verifiable at tender phase.

		1) Ion exchange vessel design, manufacture, installation, and refurbishment (Minimum throughput of 50m3/hr). 2) Replacement of chemical dosing systems (Chemical dosing rate of 300l/hr or above). All of these shall form the reference projects				
	1.5.2	Tenderer's relevant experience in design and construction of similar works or projects completed for <u>mechanical:</u> Tenderer submits a list of verifiable reference projects (If main Tenderer does not have any experience on specific field, the tenderer can submit the sub-contractors' project experience list. If this is the case it is expected that both tenderer and sub-contractor sign a letter of intent and submits it in the tender file in the relevant section). (Minimum of 1 project or multiple projects which covers the full scope of work from below listed projects 1 - 3). Evidence of reference projects is to include the following information: ▪ Project Name and Order number/project reference number for traceability purposes. ▪ Technical description of work performed. ▪ Project start and end date. ▪ See below typical size of project for reference (need to be specified). ▪ Name, designation and contact number of the reference person. Projects completed for <u>mechanical</u> to include as a minimum: 1) Manufacturing and installation of piping (200NB or above or total length of pipe replacement exceeding 100 meters). 2) Replacement and commissioning of pumps (55kW and above). 3) Design, manufacture, installation, and commissioning of vessel/s in accordance with PD5500 or equivalent international code (10m3 or larger) All of these shall form the reference projects	Section 23, Section B7 point 5		**10**	5: Tenderer has all relevant project experience and covers all the projects listed with 3 verified references covered 4: Tenderer has all relevant project experience and covers all the projects listed with at least 1 or 2 verified references covered or missed 1 project. 2: Tenderer has less than 50% of the relevant project experience with at least 1 verifiable reference 0: Tenderer did not submit any list to verify any of his experience or none of the projects are verifiable at tender phase.
	1.5.3	Tenderer's relevant experience in design and construction of similar works or projects completed for <u>corrosion protection:</u> Tenderer submits a list of verifiable reference projects (If main Tenderer does not have any experience on specific field, the tenderer can submit the sub-contractors' project experience list. If this is the case it is expected that both tenderer and sub-contractor sign a letter of intent and submits it in the tender file in the relevant section). Tenderer submits a list of verifiable reference projects (minimum of 1 projects or multiple projects which covers	Section 23, Section B7 point 5		**10**	5: Tenderer has all relevant project experience and covers all the projects listed with 3 verified references covered 4: Tenderer has all relevant project experience and covers all the projects listed with at least 1 or 2 verified references covered or missed 1 project. 2: Tenderer has less than 50% of the relevant project experience with at least 1 verifiable reference 0: Tenderer did not submit any list to verify any of his experience or none of the projects are verifiable at tender phase.

		the full scope of work from below listed projects 1 - 4). Evidence of reference projects is to include with the following information: ▪ Project Name and Order number/project reference number for traceability purposes. ▪ Technical description of work performed. ▪ Project start and end date. ▪ See below typical size of project for reference (need to be specified). ▪ Name, designation and contact number of the reference person. Projects completed for corrosion protection to include as a minimum: 1) Rubber lining of vessels of at least 200m^2. 2) Piping of at least 50m^2. 3) Seamless organic coating of at least 100m^2 4) Acid tiling/bricking of at least 100m^2. All of these shall form the reference projects				
2.	**Process**			**20**		
	2.1	Tenderer is to submit a process description, simulation report and process flow diagram for the existing plant	Section 23, Part B1 point 1 Section 5.3		**10**	5: All documents submitted by the Tenderer and acceptable 4: All document submitted by the Tenderer and acceptable with level of risk identified or 2 of the 3 documents submitted. 2: All documents submitted by the Tenderer but unacceptable due to unacceptable risk listed or only 1 of the documents submitted and acceptable. 0: None compliance/Nothing submitted
	2.2	Chemical ECSA registered engineer/technologist with sufficient experience in Ion-Exchange process design	Section 23, Part B1 point 2		**20**	5 – Proof of Professional Chemical ECSA registered engineer/technologist submitted with more than 6 years' experience. 4 - Proof of Professional Chemical ECSA registered engineer/technologist submitted and experience relevant with more than 1 year but less than 6 years' experience. 2 - Proof of Professional Chemical ECSA registered engineer/technologist submitted and experience relevant with less than 1 years' experience. 0 - ECSA Registered with no experience.
	2.3	Tenderer has shown full understanding of the battery limits of the process scope of work. (as per Appendix F2 - Marked up P&ID's) by submitting the marked-up P&ID's and highlighting scope covered by the tenderers proposal.	Section 23, Part B1 point 3		**20**	5: Marked-up P&ID's submitted in accordance to scope of work. 4: Marked-up P&ID's submitted in accordance to scope of work. but missed 1 P&ID. 2: Marked-up P&ID's submitted but missed more than 1 P&ID or not all areas highlighted as per scope of work requirement. 0: Marked-up P&ID's not submitted.
	2.4	Assessment of the risk associated with deviations listed on the Tenderer's signed letter indicating deviations to any Process requirements/standards	Section 23, Part B1 point 4 Section 4, 5 and 6		**50**	5: Written statement submitted stated - 100% compliance. 4: Written statement submitted stated with one or less than 5 deviations that will not impact the performance of process requirements or risks associated deemed acceptable as per table 7 & 9.

						2: Written statement submitted stated with more than 5 deviations that will not impact the performance of process requirements or risks associated deemed acceptable as per table 7 & 9. 0: No written definitive statement provided, or written statement submitted stated -1 or more deviations that will impact the process design deliverables directly.
3.	Mechanical			**20**		
	3.1	Tenderer has complied to the requirements of the scope of work. Assessment of the risks associated with deviations listed on the Tenderer's signed letter indicating deviations to any Mechanical requirements/standards.	Section 23, Part B2 point 1 Section 4, 5, 6 ,7, 8, 9, 10 & 11 (Scope of work)		**20**	5: Submitted signed letter with no deviations listed by the Tenderer. 4: Technical risks/deviations listed by Tenderer acceptable for the tender phase purpose and does not contain any of the risks listed in table 7 & 9. 2: Technical risks/deviations noted by Tenderer unacceptable for the tender phase purposes as they are listed under unacceptable risks in this strategy under table 7 & 9. 0: None compliance/Nothing submitted.
	3.2.1	Tenderer has submitted Detailed Method statement for the replacement of the Cation vessel covering the following bullet points: ▪ Proposed plant, equipment and tools ▪ Proposed removal method of the old vessels. ▪ Proposed installation method of new Cation vessel. ▪ Proposed tests, conditional visual inspections. ▪ Methodology for the required structural verification. ▪ Foreseen risks, concerns, and deviations. ▪ Required temporary works (if any)	Section 23, Part B2 point 2		**10**	5: Highly detailed method statement submitted covering all the bullet points 4: Highly detailed method statement covering 70% or more of the bullet points. 2: Method statement submitted but covers less than the 70% bullet points. 0: None compliance/Nothing submitted
	3.2.2	Tenderer has submitted Detailed Method statement for the upgrade of the Sinert base to a lateral system (as per works information) on the Weakbase Anion or Strongbase Anion vessel covering the following bullet points: ▪ Proposed plant, equipment and tools ▪ Proposed removal method of the current sinert bases. ▪ Proposed installation method of new lateral system. ▪ Proposed tests and conditional visual inspections. ▪ Methodology for the required structural verification. ▪ Foreseen risks, concerns, and deviations ▪ Required temporary works (if any)	Section 23, Part B2 point 2		**10**	5: Highly detailed method statement submitted covering all the bullet points. 4: Highly detailed method statement covering 70% or more of the bullet points. 2: Method statement submitted but covers less than the 70% bullet points. 0: None compliance/Nothing submitted
	3.3.1	Tenderer has submitted welding documents sample data pack of previous completed jobs	Section 23, Part B2 point 3		**10**	5: All document submitted by the Tenderer and acceptable 4: Submits 5 or more of the documents listed in section 23 part B2 point 3 by the Tenderer and acceptable with level of risk identified. 2: All document submitted by the Tenderer but unacceptable or Tenderer submitted less than 5 of the documents listed. 0: None compliance/Nothing submitted.
	3.3.2	Tenderer has submitted information on company and personnel performing Welding and NDT, Qualifications, Professional registrations, CV's	Section 23, Part B2 point 3		**10**	5: All document submitted by the Tenderer and acceptable 4: Submitted 3 or more acceptable documents with level of risk identified

						2: Submitted less than 3 of the listed documents or documents submitted deemed unacceptable 0: None compliance/Nothing submitted
	3.3.3	Tenderer has submitted letter of intent for NDT company	Section 23, Part B2 point 3		**5**	5: Letter submitted and accepted. 0: Submitted letter but not accepted due to not signed by both parties or nothing submitted
	3.4	Submit CV of Mechanical Professional ECSA registered engineer/technologist with sufficient experience on Vessel design.	Section 23, B2 point 4		**20**	5 – Submitted CV of ECSA professionally registered person with more than 6 years relevant experience. 4 – Submitted CV of ECSA professionally registered person with relevant experience of more than 1 year but less than 6 years 2 – Submitted CV of ECSA professionally Registered person with less than 1 year experience in relevant field. 0 – Submitted CV of ECSA Registered person but No Relevant experience even if ECSA registered or no CV submitted.
	3.5	Tenderer has submitted a copy of Appendix F1 – WTP Equipment list with all the Tenderers' proposed component specifications as per current layout of the spreadsheet.	Section 23, B2 point 5 Appendix F1 – WTP Equipment list		**10**	5: Complete spreadsheet submitted by the Tenderer and acceptable. 4: 80% or more of the spreadsheet submitted by the Tenderer and acceptable with level of risk identified. 2: Spreadsheet submitted by the Tenderer but unacceptable due to lack of information, or less than 80% components covered. 0: None compliance/Nothing submitted.
	3.6	Tenderer has Submitted data sheets for the following equipment proposed for the project scope: • Valves, • Actuators, • Pumps, • Blowers	Section 23, B2 point 6		**5**	5: All data sheets submitted by the Tenderer and acceptable with no level risk identified. 4: 3 of the 4 types of data sheets submitted by the Tenderer and acceptable with level of risk identified. 2: Less than 3 of the different types of data sheets submitted by the Tenderer or Data sheets submitted unacceptable due to non-conformance to the technical requirements or unacceptable due to unacceptable listed risk. 0: None compliance/Nothing submitted.
4.	**Civil**			**15**		
	4.1	The Tenderer submits a high-level technical proposal detailing the design and construction methodology, which is in accordance to the works information: The technical proposal is to include the following as a minimum: ▪ Proposed plant, equipment and tools for the entire works. ▪ Proposed tests for condition assessment ▪ Proposed repair methodology for concrete and structural works and repair materials. ▪ Methodology for the required structural verification. ▪ Foreseen risks, concerns and deviations	Section 11/High-level technical proposal		**70**	Score 5: Technical proposal details fully how scope will be met and provides comprehensive methodology of approach. All of the minimum requirements have been discussed. Score 4: Technical proposal describes how scope will be met and includes minor details on methodology of approach. Three of the minimum requirements have been discussed. Score 2: Technical proposal does not contain methodology of approach and only one of the minimum requirements has been discussed. Score 0: No submission made.
	4.2	Tenderer to submit the CV of the Lead Structural Design Engineer or Technologist as per the project organogram.	CV for lead Structural Design Engineer or Technologist		**15**	Score 5: 5 years or more relevant experience (i.e. concrete and/or structural steel) for lead structural engineer or technologist. A valid ECSA registration certificate was submitted

		Lead Structural Design Engineer or Technologist is to have a minimum of 5 years relevant design experience in concrete and/or structural steel works. The lead Civil Engineer or Technologist is to be professionally registered with the Engineering Council of South Africa (ECSA). Copy of valid ECSA registration certificate to be submitted. If the Lead Design Engineer or Technologist is not employed by the main Contractor, then a letter of intent signed by both parties where the subcontractor will be used for resources is to be submitted. The letter should be specific on the roles and responsibilities for the resources.	Valid ECSA registration certificate			Score 4: 4 years or more relevant experience (i.e. concrete and/or structural steel) for lead structural engineer or technologist. Valid ECSA registration certificate was submitted. Score 2: Less than 4 years relevant experience (i.e. concrete and/or structural steel) for lead structural engineer or technologist. A valid ECSA registration certificate was submitted Score 0: No submission made and/or experience is not related to concrete/structural steel works. No ECSA registration certificate was submitted
	4.3	**Contractor's relevant experience in conducting design and construction works related to concrete and structural steel works:** The Tenderer submits a list of verifiable references (minimum of 3 projects). The main Contractor must submit evidence of reference projects and/or the proposed sub-contractors that will be appointed to conduct the civil works, if the main Contractor does not have the required in-house capabilities. The list of verifiable references should contain the following information: ▪ Project Name ▪ Description of work performed ▪ Project start and end date ▪ Name, designation and contact number of the reference person	Completion certificates, testimonials (referral letter) and verifiable/contact information		**15**	Score 5: Work conducted on more than 3 projects of similar scope. Score 4: Work conducted on 2-3 projects of similar scope. Score 2: Work conducted on 1 projects of similar scope. Score 0: No work done on previous projects of similar scope and/or no submission made.
5	**Control & Instrumentation**			**10**		
	5.1	The Tenderer provides a completed instrument Schedule (Appendix D4) – Sodium, silica and conductivity analysers	Section 9		**20**	5 – The instrument schedule is complete. 4 – The instrument schedule is partially completed but columns D4, D5, D7, D8 D11, D14, D15 and D16 is completed. 2 – The instrument schedule is partially completed but D4, D5, D7, D8 D11, D14, D15 and D16 is partially completed to an acceptable level 0 – The instrument schedule is partially completed (not to an acceptable level). Also scores 0 for no submission.
	5.2	The Tenderer provides a completed instrument Schedule (Appendix D4) – All other instrumentation except instrumentation evaluated in 5.1	Section 9		**10**	5 – The instrument schedule is complete. 4 – The instrument schedule is partially completed but columns D4, D5, D7, D8 D11, D14, D15 and D16 is completed. 2 – The instrument schedule is partially completed but D4, D5, D7, D8 D11, D14, D15 and D16 is partially completed to an acceptable level 0 – The instrument schedule is partially completed (not to an acceptable level). Also scores 0 for no submission.
	5.3	The tenderer provides datasheets for conductivity transmitters	Section 9		**10**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 4 – The supplied datasheet is for the correct equipment and fit for purpose.

						2 – The supplied datasheet is for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent. 0 – No submission or unacceptable submission.
	5.4	The tenderer provides datasheets for all conductivity probes	Section 9		**10**	5 – The supplied datasheets are for the correct equipment and fit for purpose (all datasheets are provided). The models are already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 4 – The supplied datasheets are for the correct equipment and fit for purpose. 2 – The supplied datasheets are for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent or not all datasheets are provided. 0 – No submission or unacceptable submission.
	5.5	The tenderer provides datasheets for flow meter – open channel	Section 9		**2**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 4 – The supplied datasheet is for the correct equipment and fit for purpose. 2 – The supplied datasheet is for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent. 0 – No submission or unacceptable submission.
	5.6	The tenderer provides datasheets for flow meter – differential pressure	Section 9		**2**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 4 – The supplied datasheet is for the correct equipment and fit for purpose. 2 – The supplied datasheet is for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent. 0 – No submission or unacceptable submission.
	5.7	The tenderer provides datasheets for pressure transmitters	Section 9		**3**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 4 – The supplied datasheet is for the correct equipment and fit for purpose. 2 – The supplied datasheet is for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent. 0 – No submission or unacceptable submission.
	5.8	The tenderer provides datasheets for differential pressure transmitters	Section 9		**3**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 4 – The supplied datasheet is for the correct equipment and fit for purpose. 2 – The supplied datasheet is for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent. 0 – No submission or unacceptable submission.
	5.9	The tenderer provides datasheets for manifold	Section 9		**1**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores.

						4 – The supplied datasheet is for the correct equipment and fit for purpose. 2 – The supplied datasheet is for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent. 0 – No submission or unacceptable submission.
	5.10	The tenderer provides datasheets level transmitters	Section 9		**3**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. The transmitter utilises non-contact technology. 4 – The supplied datasheet is for the correct equipment and fit for purpose. The transmitter utilises non-contact technology for level measurement. 2 – The supplied datasheet is for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent or the transmitter utilises contact technology for level measurement. 0 – No submission or unacceptable submission.
	5.11	The tenderer provides datasheets for pressure gauges	Section 9		**2**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 4 – The supplied datasheet is for the correct equipment and fit for purpose. 2 – The supplied datasheet is for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent. 0 – No submission or unacceptable submission.
	5.12	The tenderer provides datasheets for flow switches	Section 9		**2**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 4 – The supplied datasheet is for the correct equipment and fit for purpose. 2 – The supplied datasheet is for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent. 0 – No submission or unacceptable submission.
	5.13	The tenderer provides datasheets for flow indicators	Section 9		**2**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 4 – The supplied datasheet is for the correct equipment and fit for purpose. 2 – The supplied datasheet is for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent. 0 – No submission or unacceptable submission.
	5.14	The tenderer provides datasheets for level switches	Section 9		**2**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 4 – The supplied datasheet is for the correct equipment and fit for purpose. 2 – The supplied datasheet is for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent. 0 – No submission or unacceptable submission.

	5.15	The tenderer provides datasheets for temperature transmitters	Section 9		**2**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 4 – The supplied datasheet is for the correct equipment and fit for purpose. 2 – The supplied datasheet is for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent. 0 – No submission or unacceptable submission.
	5.16	The tenderer provides datasheets for temperature gauges	Section 9		**2**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 4 – The supplied datasheet is for the correct equipment and fit for purpose. 2 – The supplied datasheet is for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent. 0 – No submission or unacceptable submission.
	5.17	The tenderer provides datasheets for silica analysers	Section 9		**10**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 0 – No submission or unacceptable submission.
	5.18	The tenderer provides datasheets for sodium analysers	Section 9		**10**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 0 – No submission or unacceptable submission.
	5.19	The tenderer provides datasheets for junction boxes, trunking & racking	Section 9		**2**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. All the datasheets are provided. 4 – The supplied datasheet is for the correct equipment and fit for purpose. All the datasheets are provided. 2 – The supplied datasheet is for the incorrect equipment or not completely fit for purpose but acceptable to a certain extent. Not all the datasheets are provided. 0 – No submission or unacceptable submission.
	5.20	The tenderer provides datasheets for instrument cabling	Section 9		**2**	5 – The supplied datasheet is for the correct equipment and fit for purpose. The model is already utilised at the power station or approved for use in another project at the power station or a stock item in the stores. 0 – No submission or unacceptable submission.
6	**Electrical**			**10**		
	6.1	The Contractor for the largest equipment type offered, completes and submits schedule B for the following Technical Schedules: ▪ SANS 1507 Cable test certificate ▪ 240-77100923 Motor Technical Schedule B ▪ 240-132875144 LV AC VFD Technical Schedule B	Section 23 Part B4 Point 1, Section 10		**40**	5 – SANS 1507 test certificate and both schedules provided. 4 – SANS 1507 test certificate and any of the two schedules provided. 2 – SANS 1507 test certificate or any of the two schedules provided 0 – No documentation provided

	6.2	The Tenderer submits a technical methodology and execution plan demonstrating compliance and any deviations for the electrical design, installation, commissioning and handover requirements specified in the electrical scope, section 10. The methodology in a form of a narrative and supportive documentation shall include the following as a minimum: ▪ Electrical reticulation, load allocation, redundancy philosophy, reuse and modification of *Employer's* points of electrical supply. ▪ Cabling and cable rack assessment methodology ▪ Compliance to motor requirements ▪ Compliance to variable frequency drives requirements ▪ Compliance to earthing and bonding requirements.	Section 23 Part B4 Point 2, Section 10		**40**	5 – Comprehensive narrative provided which explicitly details the Tenderers execution plan and compliance to the electrical Works without deviations. 4 – Narrative technical methodology and execution plan contains ambiguity and deviations with acceptable risk, exceptions, and conditions. 2 – Narrative methodology and execution plan is incomplete, unclear and non-complaint with unacceptable risk, exceptions and conditions. 0 – No documentation provided
	6.3	The Tenderer submits CV's and valid ECSA Certificates for the Electrical Engineer/Technologist with minimum of 5 years work experience.	Section 23 Part B4 point 3		**20**	5 – Valid CV and ECSA Certificate submitted with more than 5 years work experience. 4 – Valid CV and ECSA Certificate submitted with 1-4 years work experience. 2 – Valid CV and ECSA Certificate submitted with less than 1 years work experience. 0 – No submission.
7	**Corrosion Protection**			**15**		
	7.1	The intended corrosion protection personal, must be qualified to SAQCC/NACE (Corrosion Protection) or any relevant in-house training or similar qualification for all aspects of the corrosion protection work for the following roles: 1. Coating/lining Applicator 2. Rubber-liner 3. Acid tiling or Acid bricking Masonry 4. Coating Inspectors Level 2 (both site and shop inspections)	Section 7, Section 23 - B.6		**20**	5: All qualifications provided. 4. 1 of the roles from 2,3, and 4 not submitted. 2. Only 1 qualification provided from roles 2, 3, and 4 0. No qualifications submitted
	7.2	Provide material technical datasheets for all products to be used for corrosion protection to include: 1) Primer for coating, 2) Rubber material 3) Primer for rubber lining, 4) Adhesives for rubber lining, 5) Resins for acid tiling and acid brickwork, 6) Mortars for acid tiling and acid brickwork, 7) Laminates/mating compounds, 8) Grout/bedding material, 9) Acid tiles, 10) Acid bricks.	Section 7, Section 23 - B.6		**20**	5: All Datasheets are provided as per Corrosion Specifications. 4. 8 or more Datasheets are provided as per Corrosion Specifications. 2. Less than 8 Datasheets are provided as per Corrosion Specifications. 0. Nothing submitted.

	7.3	Provide a detailed procedures/method statements which detail all the steps, procedures, and activities of the corrosion protection system application processes: 1) Coating, 2) Internal lining, 3) Rubber lining 4) Acid proof tiling 5) Acid proof brickwork.	Section 7, Section 23 - B.6		**25**	5: Method statement provided for each respective system with all application steps. 4: Method statement provided for each respective system but missing one of the following systems: Internal lining, Rubber lining, Acid proof tiling or Acid proof brickwork. 2: Method statement provided for each respective system but missing two of the following systems: Internal lining, Rubber lining, Acid proof tiling or Acid proof brickwork. 0: No method statement provided or missed more than 2 of the following system: Internal lining, Rubber lining, Acid tiling or Acid proof brickwork.
	7.4	Provide a typical detailed quality control plan (QCP) detailing all documentation and material approvals, activity inspections and tests with acceptance criteria. 1) Coating, 2) Internal lining, 3) Rubber lining 4) Acid proof tiling 5) Acid proof brickwork.	Section 7, Section 23 - B.6		**25**	5: QCP submitted and covers all inspections and tests as stated in the technical specification with acceptance criteria provided. 4: QCP submitted but missing one of the following systems: Internal lining or rubber lining or acid proof tiling or acid proof brickwork **and** up to two of these specific QCP's (1,2,3,4 & 5) submitted missing some inspections and tests as per technical specification. 2: QCP submitted but missing two of the following systems: Internal lining or rubber lining or acid proof tiling or acid proof brickwork **and** up to three of these specific QCP's (1,2,3,4 & 5) submitted missing some inspections and tests as per technical specification. 0: No QCP provided or more QCP missed or more inspection and tests are missed than specified above criteria.
	7.5	Provide a list of deviations or exclusions from Eskom corrosion protection specifications in Appendix E of the Technical specification. If there are none then a definitive statement in this regard needs to be provided.	Section 7, Section 23 - B.6		**10**	5: Written statement submitted stated - 100% compliance 4: Written statement submitted stated with one or more deviation that will not impact the performance of corrosion protection. 0: No written definitive statement provided, or written statement submitted stated - 1 or more deviations that will impact the performance of corrosion protection.
				TOTAL: 100		

3.5 TET MEMBER RESPONSIBILITIES

Table 5: TET Member Responsibilities

Mandatory Criteria Number	TET 1	TET 2	TET 3	TET 4	TET 5	TET 6	TET 7	TET 8	TET 9	TET 10	TET 11
1	X	X									X
2	X	X									X
Qualitative Criteria Number	**TET 1**	**TET 2**	**TET 3**	**TET 4**	**TET 5**	**TET 6**	**TET 7**	**TET 8**	**TET 9**	**TET 10**	**TET 11**
1	X	X									
2	X	X	X								
3	X										X
4				X	X						
5						X	X				
6								X	X		
7	X	X								X	

3.6 FORESEEN ACCEPTABLE / UNACCEPTABLE QUALIFICATIONS

3.6.1 Risks

Table 6: Acceptable Technical Risks

Risk	Description
1.	**None**

Table 7: Unacceptable Technical Risks

Risk	Description
1.	Non-compliance to the scope of work
2.	No Execution Method Statement provided, or method statement does not provide the details on the construction with regards to working on the vessels and dosing skids while the plant is in operation
3.	Incorrect Assumptions made
4.	Unacceptable Deviations Listed
5.	Failure to adhere to Eskom Standards
6.	Failure to meet plant performance requirements as per standards referenced in the technical specification document.
7.	Failure to meet product water quality
8.	Key personnel not included on organogram with required qualifications and relevant experience that limits the execution of the project.
9.	The performance criteria letter submitted does not include the design criteria and parameters for both production as well as regeneration processes.
10.	The Tenderer does not have a NACE qualification for corrosion protection inspection
11.	The datasheets submitted does not satisfy the requirements of the technical specification
12.	The corrosion protection method statements does not have all the detail with respect to the surface preparation and application

3.6.2 Exceptions / Conditions

Table 8: Acceptable Technical Exceptions / Conditions

Risk	Description
1.	Main Tenderer uses references of a subcontractor provided the relationship between the parties are defined with proof by means of a signed letter by both parties.

Table 9: Unacceptable Technical Exceptions / Conditions

Risk	Description
1.	Impact to Demineralised Water Treatment Plant Operation during construction.
2.	Constructability Issues involving decommissioning and installation of equipment affecting plant operation.
3.	Negative feedback from references provided
4.	Work listed as references is not of similar type and complexity as the scope of work requirements.
5.	Deviations that are crucial to the execution of the works
6.	Deviations that are not deemed acceptable to the current water treatment plant demin production capability.