KHÂI-MA LOCAL MUNICIPALITY

TENDER NO: KH38-25/26

COMPLETION OF OUTSTANDING WORKS FOR THE MICROGRID PROJECT IN POFADDER

CLOSING DATE: DATE 17 JUNE 2026

CONTRACTOR (PRINT NAME)

ADDRESS OF TENDERER

TELEPHONE	CELL NUMBER

E-MAIL	DELIVERY PERIOD

TENDER AMOUNT (R) (INCL. VAT)	
TENDER AMOUNT (WORDS) (INCL. VAT)	

SIGNATURE OF TENDERER	DATE

EMPLOYER:

Khâi-Ma Local Municipality
21 Nuwe Street
POFADDER
8890

EMPLOYER'S AGENT:

MVD Kalahari
Consulting Engineers and Town Planners
P.O. Box 580
KIMBERLEY
8300

Municipal Manager : Mr KP Leserwane (054) 7933 0040
Consulting Engineer : Mr A Goliath 082 446 8025

JUNE 2026

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PART T: THE TENDER

SECTION 1

T1. TENDERING PROCEDURES

T1.1. TENDER NOTICE AND INVITATION TO TENDER

TENDERS ARE INVITED FOR: COMPLETION OF OUTSTANDING WORKS FOR THE MICROGRID PROJECT IN POFADDER

Bid documents can be downloaded at www.etenders.gov.za or www.khaima.gov.za 09:00 on 1 June 2026.

Tenders in sealed envelopes and clearly endorsed:

KH38-25/26 - COMPLETION OF OUTSTANDING WORKS FOR THE MICROGRID PROJECT IN POFADDER must be addressed to the Municipal Manager, and must be placed in the Tender Box, **Khâi-Ma Local Municipality, 21 Nuwe Street, POFADDER 8890 not later than 11:00 on Wednesday, 17Jun2026** Tenders will be opened in public on the same day in the old council chamber of the Khâi-Ma Local Municipality.

Only Tenderers who satisfy the eligibility criteria stated in the Tender Data are eligible to submit tenders. Tenders will be evaluated and adjudicated in line with the Supply Chain Management policy of the municipality using an 80/10/10 preference points system.

80/20 CRITERIA	
DESCRIPTION	**POINTS**
PRICE	**80**
SPECIFIC GOALS (BASED ON LOCALITY)	**10**
SPECIFIC GOALS (BASED ON HDI)	**10**
Total points for Price and SPECIFIC GOALS	**100**

Bids will be evaluated on Functionality: The bid will be evaluated on functionality with the following criterion:

	FUNCTIONALITY CRITERIA	**POINTS ALLOCATED**
A	Key personnel A1 3-Phase Installation Electrician	20
B	Key personnel A2 Electrical Construction Manager/Supervisor	20
C	Key personnel A3 PV Solar Installation Specialist	20
D	Key personnel A4 Site SHEQ officer	5
E	Company Experience B1 – Overhead Electrification	10
F	Company Experience B2 – PV Solar Off-Grid Installations	20
G	Bank rating (minimum C)	5
H	TOTAL	100

NB: Bidders must score a minimum of 70% to be considered for further evaluation.

Tenders must be registered with the CIDB in an EP Class of Construction Works **(Grade 4EP or Higher),** as stated in the Tender Data may submit tender offers.

Khâi-Ma Local Municipality reserves the right to accept a part of a Tender and does not bind itself to accept the lowest and/or any Tender. Their tenders must bind Tenderers for a period of **90 (Ninety) days after tender closing date.** No Tenders or copies of Tenders received by facsimile machine, electronic mail or per telegram will be considered. Tenderers attempting to influence the Client regarding the awarding of the Tender, after Tender closure, will automatically expose their Tenders to rejection.

A mandatory soft copy, on a read-only/write protected media must **accompany the hard copy document** of the respective bid submitted. Queries relating to the technical issues of this document may be addressed to, **Ronny Pasella,** email: **'pasellaelectrical@gmail.com** and al administrative enquiries to **Mrs. M Cloete**, email: **procurement@khaima.gov.za.** Any enquiries regarding the tender must be submitted before 10 June 2026. Any queries received thereafter will not be entertained.

Mr KP Leserwane (Municipal Manager)
Khâi-Ma Local Municipality
21 Nuwe Street
POFADDER
8890

MBD 1

INVITATION TO TENDER

YOU ARE HEREBY INVITED TO TENDER FOR REQUIREMENTS OF THE
KHÂI-MA LOCAL MUNICIPALITY

TENDER NUMBER: **KH38-25/26** CLOSING DATE: **DATE 17 JUNE 2026** CLOSING TIME: **11:00**

DESCRIPTION: **COMPLETION OF OUTSTANDING WORKS FOR THE MICROGRID PROJECT IN POFADDER**

The successful tenderer will be required to fill in and sign a written Contract Form (MBD 7).

TENDER DOCUMENTS MAY BE POSTED TO:
(Please ensure that the post arrives before the closing date as we will not be held responsible or accountable for not accepting the late submission).

DEPOSITED IN THE TENDER BOX SITUATED AT*:*

Khâi-Ma Local Municipality, 21 Nuwe Street, POFADDER 8890

Bidders should ensure that bids are delivered timeously to the correct address. If the tender is late, it will not be accepted for consideration.

The tender box is open from 08h00 – 16h00 workdays.

ALL BIDS MUST BE SUBMITTED ON THE OFFICIAL FORMS – (NOT TO BE RE-TYPED).

A MANDATORY SOFT COPY, ON A READ-ONLY/WRITE PROTECTED MEDIA MUST **ACCOMPANY THE HARD COPY DOCUMENT** OF THE RESPECTIVE BID SUBMITTED.

THIS TENDER IS SUBJECT TO THE PREFERENTIAL PROCUREMENT POLICY FRAMEWORK ACT AND THE PREFERENTIAL PROCUREMENT REGULATIONS, 2022, THE GENERAL CONDITIONS OF CONTRACT (GCC) AND, IF APPLICABLE, ANY OTHER SPECIAL CONDITIONS OF CONTRACT AND SUBJECT TO COMPLIANCE WITH THE BELOW CONDITIONS:

1. Attachment of a detailed tender with description of the service or items.
2. Relevant specifications.
3. Submission of detailed tender.
4. Value of money.
5. Adherence to the requirements of this notice / invitation.

THE FOLLOWING PARTICULARS MUST BE FURNISHED
(FAILURE TO DO SO MAY RESULT IN YOUR TENDER BEING DISQUALIFIED)

NAME OF TENDERER _____

POSTAL ADDRESS _____

STREET ADDRESS _____

TELEPHONE NUMBER CODE_____NUMBER_____

TENDERER:

Initial: Authorized Signatory/ies: 1 _____

2 _____

CLIENT

Initial: Khâi-Ma Local Municipality _____

Witness: _____

CELLPHONE NUMBER _____

E-MAIL ADDRESS _____

VAT REGISTRATION No _____

HAS AN ORIGINAL AND VALID TAX CLEARANCE CERTIFICATE BEEN ATTACHED? (MBD 2) **YES/NO**

ARE YOU REGISTERED ON THE CENTRAL SUPPLY DATABASE? **YES/NO**

IF YES PLEASE PROVIDE A COPY OF YOUR CSD CERTIFICATE

CSD NO:_____

ARE YOU THE ACCREDITED REPRESENTATIVE IN SOUTH AFRICA FOR THE GOODS/SERVICES/WORKS OFFERED? **YES/NO**

(IF YES ENCLOSE PROOF)

SIGNATURE OF TENDERER _____

DATE _____

CAPACITY UNDER WHICH THIS TENDER IS SIGNED _____

TOTAL TENDER PRICE _____

TOTAL NUMBER OF ITEMS OFFERED _____

ANY ENQUIRIES REGARDING THE TENDER PROCEDURE MAY BE DIRECTED TO:

Contact Person: Mr A Goliath
Tel: (053) 831-1889
Email: andries@mvdkalahari.co.za

T1.2. TENDER DATA

CLAUSE NUMBER	DATA
	The conditions of Tender are the Standard Conditions of Tender as contained in *Annex F* of the *CIDB Standard for Uniformity for Construction Procurement, Board Notice 136 Government Gazette No 38960 of 10 July 2015* (ANNEXURE F: STANDARD CONDITIONS OF TENDER*, page 14*). The Standard Conditions of Tender for Procurements make several references to the Tender Data for details that apply specifically to this Tender. The Tender Data shall have precedence in the interpretation of any ambiguity or inconsistency between it and the standard conditions of Tender. Each item of data given below is cross-referenced to the clause in the standard conditions of Tender to which it mainly applies.
F1.1 ACTIONS	The Employer is: **Khâi-Ma Local Municipality** **21 Nuwe Street** **POFADDER** **8890**
F1.2 TENDER DOCUMENTS	The Tender documents issued by the Employer comprise: **VOLUME 1 (FUNCTIONALITY)** **PART T: THE BID** **SECTION 1** T1 TENDERING PROCEDURES T1.1 TENDER NOTICE AND INVITATION TO TENDER T1.2 TENDER DATA T1.3 ANNEXURE F: STANDARD CONDITIONS OF TENDER **SECTION 2** T2 RETURNABLE DOCUMENTS T2.1 CHECKLIST FOR A RESPONSIVE TENDER T2.2 RETURNABLE SCHEDULES REQUIRED FOR TENDER EVALUATION PURPOSES T2.3 OTHER DOCUMENTS REQUIRED FOR TENDER EVALUATION PURPOSES T2.4 OTHER SCHEDULES AND AFFIDAVITS THAT WILL BE INCORPORATED INTO THE CONTRACT
	VOLUME 2 (FINANCIAL) **PART C: THE CONTRACT** **SECTION 3** C1 AGREEMENT AND CONTRACT DATA C1.1 FORM OF OFFER AND ACCEPTANCE C1.2 CONTRACT DATA C1.3 FORM OF GUARANTEE

CLAUSE NUMBER	DATA
	C1.4 AGREEMENT C1.5 AGREEMENT IN TERMS OF THE OCCUPATIONAL HEALTH AND SAFETY ACT, 1993 (ACT NO 85 OF 1993) C1.6 PRACTICAL COMPLETION CERTIFICATE C1.7 FINAL APPROVAL CERTIFICATE C2 HEALTH AND SAFETY ACT, 1993 (ACT NO. 85 OF 1993 C3 PRICING DATA C4 CONDITIONS OF CONTRACT C5 SPECIFICATIONS C5.1 STANDARD SPECIFICATIONS C5.2 PROJECT SPECIFICATIONS C5.3 PART A: PROJECT DESCRIPTION AND GENERAL INFORMATION C5.4 PART B: AMENDMENTS TO THE STANDARD SPECIFICATIONS C5.5 MANAGEMENT C5.6 PROCUREMENT C6 SITE INFORMATION **SECTION 4** FIGURES AND DRAWINGS STANDARD FORMS AND FORMATS (only available on soft copy on request) ENVIRONMENTAL MANAGEMENT PLAN
F1.4 COMMUNICATION AND EMPLOYER'S AGENT	The Employer's Agent is **Mr A Goliath** Name: **MVD Kalahari** Address: **P.O. Box 580** **Kimberley** **8300** Tel: **(053) 831-1889** E-mail: **andries@mvdkalahari.co.za** Cell: **082 446 8025**
F2.1 ELIGIBILITY	Only those Tenderers who score a minimum of **70% (70 points)** for the functionality criteria prescribed in clause F.3.11.9 of the tender data and requested in section T2.2 of this document, are eligible to have their tenders evaluated and; Only those Tenderers who are registered with the CIDB with a grading designation equal or higher than a grading of **4EP** or Higher class for construction work will be eligible to submit Tenders. Joint ventures are eligible to submit Tenders provided that: a. every member of the joint venture is registered with the CIDB. b. the lead partner has a grading designation in the **4EP** or Higher class of construction work; and c. the combined Contractor grading designation calculated in accordance with the Construction Industry Development Regulations is equal to or higher than a grading designation determined in accordance with the sum Tendered for a 4EP or higher class of construction work, is eligible to submit Tenders.
F2.7	The arrangement for a compulsory site inspection meeting is:

CLAUSE NUMBER	DATA
CLARIFICATION MEETING	Location: **Khâi-Ma Local Municipality, 21 Nuwe Street, POFADDER 8890** Date and Time: **Not Applicable**
F2.12 ALTERNATIVE TENDER OFFERS	If a Tenderer wishes to submit an alternative Tender offer, the only criteria permitted for such alternative Tender offer is that it demonstrably satisfies the Employer's standards and requirements, the details of which may be obtained from the Employer's Agent. Calculations, drawings and all other pertinent technical information and characteristics as well as modified or proposed Pricing Data must be submitted with the alternative Tender offer to enable the Employer to evaluate the efficacy of the alternative and its principal elements, to take a view on the degree to which the alternative complies with the Employer's standards and requirements and to evaluate the acceptability of the pricing proposals. Calculations must be set out in a clear and logical sequence and must clearly reflect all design assumptions. Pricing Data must reflect all assumptions in the development of the pricing proposal. Acceptance of an alternative Tender offer will mean acceptance in principle of the offer. It will be an obligation of the contract for the Tenderer, in the event that the alternative is accepted, to accept full responsibility and liability that the alternative offer complies in all respects with the Employer's standards and requirements. The modified Tender Data must include an amount equal to 5% of the amount Tendered for the alternative offer to cover the Employer's costs of confirming the acceptability of the detailed design before it is constructed.
F2.13.2 SUBMITTING A TENDER OFFER	Return all volumes of the tender document to the Employer after completion of the relevant sections of each volume in their entirety by writing in **black ink**. **No electronic submissions will be accepted.** All volumes are to be left intact in their original format, and no pages shall be removed or re-arranged.
F.2.13.3 SUBMITTING A TENDER OFFER	Parts of each tender offer communicated on paper shall be submitted as an original.
F2.13.7 SUBMITTING A TENDER OFFER	The Employer's Address for Delivery of Tender Offers and Identification Details To Be Shown On Each Tender Offer Package Are: Physical Address (Location of Tender Box):**Khâi-Ma Local Municipality, 21 Nuwe Street, POFADDER 8890** Tender Number: **KH38-25/26** Project Name: **COMPLETION OF OUTSTANDING WORKS FOR THE MICROGRID PROJECT IN POFADDER**
F2.13.8 SUBMISSION BY FAX OR EMAIL	Tender offers submitted by facsimile or email will be rejected by the employer.
F2.15 CLOSING TIME	The closing time for submission of Tender offers is: **11:00 on Wednesday, 17 June 2026** Telephonic, telegraphic, facsimile or e-mailed Tender offers will not be accepted.

CLAUSE NUMBER	DATA
F2.16 TENDER OFFER VALIDITY	The Tender offer validity period is **90 (Ninety) days after tender closing date**.
F2.18 PROVIDE OTHER MATERIAL	The Tenderer shall, when requested by the Employer to do so, any other material that has a bearing on the tender offer, the tenderer's commercial position (including notarized joint venture agreements), preferencing arrangements, or samples of materials, considered necessary by the employer for the purpose of a full and fair risk assessment. Should the tenderer not provide the material, or a satisfactory reason as to why it cannot be provided, by the time for submission stated in the employer's request, the employer may regard the tender offer as non-responsive. Dispose of samples of materials provided for evaluation by the employer, where required.
F2.20 SUBMIT SECURITIES, BONDS AND POLICIES	The Tenderer is required to submit with his tender a letter of intent from an approved insurer undertaking to provide the Performance Bond to the format included in Part T2.2 of this procurement document.
F2.23 CERTIFICATES	The Tenderer is required to submit with his/her Tender Annexure A: CIDB Registration Certificate of Registration issued by the *Construction Industry Development Board* Annexure B: Tax Clearance Certificate A valid *Tax Clearance Certificate* issued by the *South African Revenue Services* or a *Tax Compliance Status Pin Number (MBD 2)* Annexure C: A *VAT Registration Certificate* Annexure D: *COID Certificate* *(Compensation for Occupational Injuries and Diseases Act)* [Previously known as Workmen's Compensation] Annexure E: *Unemployment Insurance Certificate, Act of 1996* Annexure F: Sworn Affidavit *(See T2.4.3* Preferential Procurement Document in Terms of Preferential Procurement REGULATIONS, 2022 Annexure G: Official letter from Tenderer's Bank – NB! This letter should state time of involvement and credit rating. Annexure H: Shareholding Certificate (where applicable) Annexure I: Company Profile, Organogram and CVs Annexure J: Financial Statements (*see T2.3.2* Financial Statement)

CLAUSE NUMBER	DATA
	Annexure K: Municipal Rates Account A CURRENT (30 days) Business and all Director's Municipal account must be included in the Tender document even outside the Khâi-Ma Local Municipal boundaries. In case of leasing, a copy of the valid current signed lease agreement must be submitted, indicating who is responsible for the Rates, Water and Electricity, etc. In the case where the Tenderer is responsible for any municipal services a current municipal account must be submitted with the lease agreement included in the Tender document. No confirmation letter of lease agreement will be accepted. Annexure L: Documents of Incorporation A copy of the certificate of incorporation of the company, close corporation or partnership. In case of a joint venture between two or more firms, the Tenderer shall attach a copy of the document of incorporation of each partner of the joint venture as well as the joint venture agreement. Annexure M: Practical Completion Certificates and Project Reports The Tenderer shall attach the practical completion certificates for similar projects that were completed by the tender entity and the proposed subcontractors as well as complete the necessary project reports specified in T2.3.10 FUNCTIONALITY SCORE CARD (ELIGIBILITY CRITERIA) Annexure N: Letter confirming Hire of Construction Plant A confirmation letter from the plant hire company that the plant will be available for the project Annexure O: Central Supply Database Certificate (CSD) Information as requested inT2.3.10 Functionality Score Card (Eligibility Criteria*)* to be used during tender evaluation. Information as requested in *T2* RETURNABLE DOCUMENTS*.* These documents are to be bound separately and marked clearly with their annexure numbers as shown above.
F3.4 OPENING OF TENDER SUBMISSIONS	The time and location for opening of the Tender offers is: **11:00 on Wednesday,17 Jun 2026 at Khâi-Ma Local Municipality, 21 Nuwe Street, POFADDER 8890**
F3.5 TWO-ENVELOPE SYSTEM	A two-envelope procedure **will not** be followed.
F3.11 EVALUATION OF TENDER OFFER	**Method 2** will be used.
F3.11.5 EVALUATION OF TENDER OFFER	Financial offer, quality and preferences. $T_{EV} = W_1 \times N_{FO} + W_2 \times N_P + N_Q$

<table>
<tr><th>CLAUSE NUMBER</th><th>DATA</th></tr>
<tr><td></td><td>where:

T_{EV} is the total number of tender evaluation points
N_{FO} is the number of tender evaluation points awarded for the financial offer made in accordance with F.3.11.7 and W_1 is 80;
N_P is the number of tender evaluation points awarded for preferences claimed in accordance with F.3.11.8 and W_2 is 20;

N_Q is zero (the quality score is only calculated to reject all tender offers that fail to score the minimum number of points for quality according to F3.11.9)</td></tr>
<tr><td>F3.11.7
EVALUATION OF TENDER OFFER</td><td>The financial offer will be scored using Formula 2 (option 1) in Table F.1 where the value of W_1 is:

1) 80 where the financial value inclusive of VAT of all responsive tenders received have a value in excess of R50 000 000.00 or
2) Up to 100 minus W_1 tender evaluation points will be awarded to Tenderers who complete the preferencing schedule and who are found to be eligible for the preference claimed.</td></tr>
<tr><td>F3.11.9
EVALUATION OF TENDER OFFER</td><td>The quality criteria and maximum score in respect of each of the criteria are as follows:

<table>
<tr><th>Quality criteria</th><th>Maximum number of points</th></tr>
<tr><td>Key personnel A1 3-Phase Installation Electrician</td><td>20</td></tr>
<tr><td>Key personnel A2 Electrical Construction Manager/Supervisor</td><td>20</td></tr>
<tr><td>Key personnel A3 PV Solar Installation Specialist</td><td>20</td></tr>
<tr><td>Key personnel A4 Site SHEQ officer</td><td>5</td></tr>
<tr><td>Company Experience B1 – Overhead Electrification</td><td>10</td></tr>
<tr><td>Company Experience B2 – PV Solar Off-Grid Installations</td><td>20</td></tr>
<tr><td>Bank rating (minimum C)</td><td>5</td></tr>
<tr><td>Maximum possible score for quality (M_s)</td><td>100</td></tr>
</table>

The minimum number of evaluation points for quality is 70.</td></tr>
<tr><td>F3.13
ACCEPTANCE OF TENDER OFFER</td><td>Tender offers will only be accepted if:

i. The Tenderer has in his or her possession a valid Tax Clearance Certificate issued by the South African Revenue Services or a Tax Compliance Status Pin Number (MBD 2).

ii. The Tenderer submits a letter of intent from an approved insurer undertaking to provide the Performance Bond to the format included in T2.3 of this procurement document.</td></tr>
</table>

CLAUSE NUMBER	DATA
	iii. The Tenderer is registered with the *Construction Industry Development Board* in an appropriate contractor grading designation. iv. The Tenderer is in good standing with municipal rates and taxes and municipal service charges. v. The Tenderer or any of its directors is not listed on the Register of Tender Defaulters in terms of the *Prevention and Combating of Corrupt Activities Act of 2004* as a person prohibited from doing business with the public sector. vi. The Tenderer **has not** abused the Employer's Supply Chain Management System or **has not** failed to perform on any previous contract. vii. The Tenderer is registered and in good standing with the compensation fund or with a licensed compensation insurer. viii. The Employer/Agent is reasonably satisfied that the tenderer has in terms of the *Construction Regulation, 2014*, issued in terms of the *Occupational Health and Safety Act, 1993*, the necessary competencies and resources to carry out the work safely.
F3.18 PROVIDE COPIES OF THE CONTRACT	The number of paper copies of the signed contract to be provided by the Employer is **one.**

T1.3. ANNEXURE F: STANDARD CONDITIONS OF TENDER

As published in Annexure F of the CIDB Standard for uniformity in Construction Procurement in Board Notice 136 of 2015, in Government Gazette 38960 of July 2015 and the erratum notices issued thereafter.

F1. GENERAL

F1.1. Actions

F1.1.1 The employer and each tenderer submitting a tender offer shall comply with these conditions of tender. In their dealings with each other, they shall discharge their duties and obligations as set out in F.2 and F.3, timeously and with integrity, and behave equitably, honestly and transparently, comply with all legal obligations and not engage in anticompetitive practices.

F1.1.2 The employer and the tenderer and all their agents and employees involved in the tender process shall avoid conflicts of interest and where a conflict of interest is perceived or known, declare any such conflict of interest, indicating the nature of such conflict. Tenderers shall declare any potential conflict of interest in their tender submissions. Employees, agents and advisors of the employer shall declare any conflict of interest to whoever is responsible for overseeing the procurement process at the start of any deliberations relating to the procurement process or as soon as they become aware of such conflict and abstain from any decisions where such conflict exists or recuse themselves from the procurement process, as appropriate.

Note: 1) A conflict of interest may arise due to a conflict of roles which might provide an incentive for improper acts in some circumstances. A conflict of interest can create an appearance of impropriety that can undermine confidence in the ability of that person to act properly in his or her position even if no improper acts result.

2) Conflicts of interest in respect of those engaged in the procurement process include direct, indirect or family interests in the tender or outcome of the procurement process and any personal bias, inclination, obligation, allegiance or loyalty which would in any way affect any decisions taken.

F1.1.3 The employer shall not seek, and a tenderer shall not submit a tender without having a firm intention and the capacity to proceed with the contract.

F1.2. Tender Documents

The documents issued by the employer for the purpose of a tender offer are listed in the tender data.

F1.3. Interpretation

F1.3.1 The tender data and additional requirements contained in the tender schedules that are included in the returnable documents are deemed to be part of these conditions of tender.

F1.3.2 These conditions of tender, the tender data and tender schedules which are only required for tender evaluation purposes, shall not form part of any contract arising from the invitation to tender.

F1.3.3 For the purposes of these conditions of tender, the following definitions apply:

a) conflict of interest means any situation in which:

i) someone in a position of trust has competing professional or personal interests which make it difficult to fulfill his or her duties impartially;

ii) an individual or organisation is in a position to exploit a professional or official capacity in some way for their personal or corporate benefit; or

iii) incompatibility or contradictory interests exist between an employee and the organisation which employs that employee.

b) comparative offer means the price after the factors of a non-firm price and all unconditional discounts it can be utilised to have been taken into consideration;

c) corrupt practice means the offering, giving, receiving or soliciting of anything of value to influence the action of the employer or his staff or agents in the tender process;

d) fraudulent practice means the misrepresentation of the facts in order to influence the tender process or the award of a contract arising from a tender offer to the detriment of the employer, including collusive practices intended to establish prices at artificial levels;

e) organization means a company, firm, enterprise, association or other legal entity, whether incorporated or not, or a public body;

f) functionality means the totality of features and characteristics of a product or service that bear on its ability to satisfy stated or implied needs.

F1.4. Communication and Employer's Agent

Each communication between the employer and a tenderer shall be to or from the employer's agent only, and in a form that can be readily read, copied and recorded. Communications shall be in the English language. The employer shall not take any responsibility for non-receipt of communications from or by a tenderer. The name and contact details of the employer's agent are stated in the tender data.

F1.5. Cancellation and Re-Invitation of Tenders

F1.5.1 An organ of state may, prior to the award of the tender, cancel a tender if –

(a) due to changed circumstances, there is no longer a need for the services, works or goods requested; or
(b) funds are no longer available to cover the total envisaged expenditure; or
(c) no acceptable tenders are received.

F1.5.2 The decision to cancel a tender must be published in the CIDB website and in the government Tender Bulletin for the media in which the original tender invitation was advertised.

F1.6. Procurement Procedures

F1.6.1 General

Unless otherwise stated in the tender data, a contract will, subject to F.3.13, be concluded with the tenderer who in terms of F.3.11 is the highest ranked or the tenderer scoring the highest number of tender evaluation points, as relevant, based on the tender submissions that are received at the closing time for tenders.

F1.6.2 Competitive Negotiation Procedure

F.1.6.2.1 Where the tender data require that the competitive negotiation procedure is to be followed, tenderers shall submit tender offers in response to the proposed contract in the first round of submissions. Notwithstanding the requirements of F.3.4, the employer shall announce only the names of the tenderers who make a submission. The requirements of F.3.8 relating to the material deviations or qualifications which affect the competitive position of tenderers shall not apply.

F.1.6.2.2 All responsive tenderers, or not less than three responsive tenderers that are highest ranked in terms of the evaluation method and evaluation criteria stated in the tender data, shall be invited in each round to enter into competitive negotiations, based on the principle of equal treatment and keeping confidential the proposed solutions and associated information. Notwithstanding the provisions of F.2.17, the employer may request that tenders be clarified, specified and fine-tuned in order to improve a tenderer's competitive position provided that such clarification, specification, fine-tuning or additional information does not alter any fundamental aspects of the offers or impose substantial new requirements which restrict or distort competition or have a discriminatory effect.

F.1.6.2.3 At the conclusion of each round of negotiations, tenderers shall be invited by the employer to make a fresh tender offer, based on the same evaluation criteria, with or without adjusted weightings. Tenderers shall be advised when they are to submit their best and final offer.

F.1.6.2.4 The contract shall be awarded in accordance with the provisions of F.3.11 and F.3.13 after tenderers have been requested to submit their best and final offer.

F2. TENDERER'S OBLIGATIONS

F2.1. Eligibility

F2.1.1 Submit a tender offer only if the tenderer satisfies the criteria stated in the tender data and the tenderer, or any of his principals, is not under any restriction to do business with employer.

F2.1.2 Notify the employer of any proposed material change in the capabilities or formation of the tendering entity (or both) or any other criteria which formed part of the qualifying requirements used by the employer as the basis in a prior process to invite the tenderer to submit a tender offer and obtain the employer's written approval to do so prior to the closing time for tenders.

F2.2. Cost of Tendering

F2.2.1 Accept that, unless otherwise stated in the tender data, the employer will not compensate the tenderer for any costs incurred in the preparation and submission of a tender offer, including the costs of any testing necessary to demonstrate that aspects of the offer complies with requirements.

F2.2.2 The cost of the tender documents charged by the employer shall be limited to the actual cost incurred by the employer for printing the documents. Employers must attempt to make available the tender documents on its website so as not to incur any costs pertaining to the printing of the tender documents.

F2.3. Check Documents

Check the tender documents on receipt for completeness and notify the employer of any discrepancy or omission.

F2.4. Confidentiality and Copyright of Documents

Treat as confidential all matters arising in connection with the tender. Use and copy the documents issued by the employer only for the purpose of preparing and submitting a tender offer in response to the invitation.

F2.5. Reference Documents

Obtain, as necessary for submitting a tender offer, copies of the latest versions of standards, specifications, conditions of contract and other publications, which are not attached but which are incorporated into the tender documents by reference.

F2.6. Acknowledge Addenda

Acknowledge receipt of addenda to the tender documents, which the employer may issue, and if necessary, apply for an extension to the closing time stated in the tender data, in order to take the addenda into account.

F2.7. Clarification meeting

Attend, where required, a clarification meeting at which tenderers may familiarize themselves with aspects of the proposed work, services or supply and raise questions. Details of the meeting(s) are stated in the tender data.

F2.8. Seek clarification

Request clarification of the tender documents, if necessary, by notifying the employer at least five working days before the closing time stated in the tender data.

F2.9. Insurance

Be aware that the extent of insurance to be provided by the employer (if any) might not be for the full cover required in terms of the conditions of contract identified in the contract data. The tenderer is advised to seek qualified advice regarding insurance.

F2.10. Pricing the tender offer

F2.10.1 Include in the rates, prices, and the tendered total of the prices (if any) all duties, taxes (except Value Added Tax (VAT), and other levies payable by the successful tenderer, such duties, taxes and levies being those applicable 14 days before the closing time stated in the tender data.

F2.10.2 Show VAT payable by the employer separately as an addition to the tendered total of the prices.

F2.10.3 Provide rates and prices that are fixed for the duration of the contract and not subject to adjustment except as provided for in the conditions of contract identified in the contract data.

F2.10.4 State the rates and prices in Rand unless instructed otherwise in the tender data. The conditions of contract identified in the contract data may provide for part payment in other currencies.

F2.11. Alterations to Documents

Do not make any alterations or additions to the tender documents, except to comply with instructions issued by the employer, or necessary to correct errors made by the tenderer. All signatories to the tender offer shall initial all such alterations.

F2.12. Alternative Tender Offers

Unless otherwise stated in the tender data, submit alternative tender offers only if a main tender offer, strictly in accordance with all the requirements of the tender documents, is also submitted as well as a schedule that compares the requirements of the tender documents with the alternative requirements that are proposed.

F2.12.1 Accept that an alternative tender offer may be based only on the criteria stated in the tender data or criteria otherwise acceptable to the employer.

F2.12.2 An alternative tender offer may only be considered in the event that the main tender offer is the winning tender.

F2.13. Submitting a Tender Offer

F2.13.1 Submit one tender offer only, either as a single tendering entity or as a member in a joint venture to provide the whole of the works, services or supply identified in the contract data and described in the scope of works, unless stated otherwise in the tender data.

F2.13.2 Return all returnable documents to the employer after completing them in their entirety, either electronically (if they were issued in electronic format) or by writing legibly in non-

erasable black ink.

F.2.13.3 Submit the parts of the tender offer communicated on paper as an original plus the number of copies stated in the tender data, with an English translation of any documentation in a language other than English, and the parts communicated electronically in the same format as they were issued by the employer.

F2.13.3 Sign the original and all copies of the tender offer where required in terms of the tender data. The employer will hold all authorized signatories liable on behalf of the tenderer. Signatories for tenderers proposing to contract as joint ventures shall state which of the signatories is the lead partner whom the employer shall hold liable for the purpose of the tender offer.

F2.13.4 Seal the original and each copy of the tender offer as separate packages marking the packages as "ORIGINAL" and "COPY". Each package shall state on the outside the employer's address and identification details stated in the tender data, as well as the tenderer's name and contact address.

F2.13.5 Where a two-envelope system is required in terms of the tender data, place and seal the returnable documents listed in the tender data in an envelope marked "financial proposal" and place the remaining returnable documents in an envelope marked "technical proposal".

F2.13.6 Each envelope shall state on the outside the employer's address and identification details stated in the tender data, as well as the tenderer's name and contact address.

F2.13.7 Seal the original tender offer and copy packages together in an outer package that states on the outside only the employer's address and identification details as stated in the tender data.

F2.13.8 Accept that the employer will not assume any responsibility for the misplacement or premature opening of the tender offer if the outer package is not sealed and marked as stated.

F2.13.9 Accept that tender offers submitted by facsimile or e-mail will be rejected by the employer, unless stated otherwise in the tender data.

F2.14. Information and Data to be Completed in all Respects

Accept that tender offers, which do not provide all the data or information requested completely and, in the form, required, may be regarded by the employer as non-responsive.

F2.15. Closing Time

F2.15.1 Ensure that the employer receives the tender offer at the address specified in the tender data not later than the closing time stated in the tender data. Accept that proof of posting shall not be accepted as proof of delivery.

F2.15.2 Accept that, if the employer extends the closing time stated in the tender data for any reason, the requirements of these conditions of tender apply equally to the extended deadline.

F2.16. Tender Offer Validity

F2.16.1 Hold the tender offer(s) valid for acceptance by the employer at any time during the validity period stated in the tender data after the closing time stated in the tender data.

F2.16.2 If requested by the employer, consider extending the validity period stated in the tender data for an agreed additional period with or without any conditions attached to such extension.

F2.16.3 Accept that a tender submission that has been submitted to the employer may only be withdrawn or substituted by giving the employer's agent written notice before the closing time for tenders that a tender is to be withdrawn or substituted.

F2.16.4 Where a tender submission is to be substituted, submit a substitute tender in accordance with the requirements of F.2.13 with the packages clearly marked as "SUBSTITUTE" .

F2.17. Clarification of Tender Offer after Submission

Provide clarification of a tender offer in response to a request to do so from the employer during the evaluation of tender offers. This may include providing a breakdown of rates or prices and correction of arithmetical errors by the adjustment of certain rates or item prices (or both).

No change in the competitive position of tenderers or substance of the tender offer is sought, offered, or permitted.

Note: Sub-clause F.2.17 does not preclude the negotiation of the final terms of the contract with a preferred tenderer following a competitive selection process, should the Employer elect to do so.

F2.18. Provide other Material

F2.18.1 Provide, on request by the employer, any other material that has a bearing on the tender offer, the tenderer's commercial position (including notarized joint venture agreements), preferencing arrangements, or samples of materials, considered necessary by the employer for the purpose of a full and fair risk assessment. Should the tenderer not provide the material, or a satisfactory reason as to why it cannot be provided, by the time for submission stated in the employer's request, the employer may regard the tender offer as non-responsive.

F2.18.2 Dispose of samples of materials provided for evaluation by the employer, where required.

F2.19. Inspections, Tests and Analysis

Provide access during working hours to premises for inspections, tests and analysis as provided for in the tender data.

F2.20. Submit Securities, Bonds and Policies

If requested, submit for the employer's acceptance before formation of the contract, all securities, bonds, guarantees, policies and certificates of insurance required in terms of the conditions of contract identified in the contract data.

F2.21. Check Final Draft

Check the final draft of the contract provided by the employer within the time available for the employer to issue the contract.

F2.22. Return of other Tender Documents

If so instructed by the employer, return all retained tender documents within 28 days after the expiry of the validity period stated in the tender data.

F2.23. Certificates

Include in the tender submission or provide the employer with any certificates as stated in the tender data.

F3. THE EMPLOYER'S UNDERTAKINGS

F3.1. Respond to Requests from the Tenderer

F3.1.1 Unless otherwise stated in the tender Data, respond to a request for clarification received up to five working days before the tender closing time stated in the Tender Data and notify all tenderers who drew procurement documents.

F3.1.2 Consider any request to make a material change in the capabilities or formation of the tendering entity (or both) or any other criteria which formed part of the qualifying requirements used to prequalify a tenderer to submit a tender offer in terms of a previous procurement process and deny any such request if as a consequence:

a) an individual firm, or a joint venture as a whole, or any individual member of the joint venture fails to meet any of the collective or individual qualifying requirements;

b) the new partners to a joint venture were not prequalified in the first instance, either as individual firms or as another joint venture; or

c) in the opinion of the Employer, acceptance of the material change would compromise the outcome of the prequalification process.

F3.2. Issue Addenda

If necessary, issue addenda that may amend or amplify the tender documents to each tenderer during the period from the date that tender documents are available until three days before the tender closing time stated in the Tender Data. If, as a result a tenderer applies for an extension to the closing time stated in the Tender Data, the Employer may grant such extension and, shall then notify all tenderers who drew documents.

F3.3. Return Late Tender Offers

Return tender offers received after the closing time stated in the Tender Data, unopened, (unless it is necessary to open a tender submission to obtain a forwarding address), to the tenderer concerned.

F3.4. Opening of Tender Submissions

F3.4.1 Unless the two-envelope system is to be followed, open valid tender submissions in the presence of tenderers' agents who choose to attend at the time and place stated in the tender data. Tender submissions for which acceptable reasons for withdrawal have been submitted will not be opened.

F3.4.2 Announce at the meeting held immediately after the opening of tender submissions, at a venue indicated in the tender data, the name of each tenderer whose tender offer is opened and, where applicable, the total of his prices, number of points claimed for/on specific goals and time for completion for the main tender offer only.

F3.4.3 Make available the record outlined in F.3.4.2 to all interested persons upon request.

F3.5. Two-Envelope System

F3.5.1 Where stated in the tender data that a two-envelope system is to be followed, open only the technical proposal of valid tenders in the presence of tenderers' agents who choose to attend at the time and place stated in the tender data and announce the name of each tenderer whose technical proposal is opened.

F3.5.2 Evaluate functionality of the technical proposals offered by tenderers, then advise tenderers who remain in contention for the award of the contract of the time and place when the financial proposals will be opened. Open only the financial proposals of tenderers, who score in the functionality evaluation more than the minimum number of points for functionality stated in the tender data, and announce the score obtained for the technical proposals and the total price and any points claimed for/on specific goals. Return unopened financial proposals to tenderers whose technical proposals failed to achieve the minimum number of points for functionality.

F3.6. Non-Disclosure

Not disclose to tenderers, or to any other person not officially concerned with such processes, information relating to the evaluation and comparison of tender offers, the final evaluation price and recommendations for the award of a contract, until after the award of the contract to the successful tenderer.

F3.7. Grounds for Rejection and Disqualification

Determine whether there has been any effort by a tenderer to influence the processing of tender offers and instantly disqualify a tenderer (and his tender offer) if it is established that he engaged in corrupt or fraudulent practices.

F3.8. Test for Responsiveness

F3.8.1 Determine, after opening and before detailed evaluation, whether each tender offer properly received:

a) complies with the requirements of these Conditions of Tender,

b) has been properly and fully completed and signed, and

c) is responsive to the other requirements of the tender documents.

F3.8.2 A responsive tender is one that conforms to all the terms, conditions, and specifications of the tender documents without material deviation or qualification. A material deviation or qualification is one which, in the Employer's opinion, would:

a) detrimentally affect the scope, quality, or performance of the works, services or supply identified in the Scope of Work,

b) significantly change the Employer's or the tenderer's risks and responsibilities under the contract, or

c) affect the competitive position of other tenderers presenting responsive tenders, if it were to be rectified.

Reject a non-responsive tender offer, and not allow it to be subsequently made responsive by correction or withdrawal of the non-conforming deviation or reservation.

F3.9. Arithmetical Errors, Omissions and Discrepancies

F3.9.1 Check the highest ranked tender or tenderer with the highest number of tender evaluation points after the evaluation of tender offers in accordance with F.3.11 for:

a) the gross misplacement of the decimal point in any unit rate;

b) omissions made in completing the pricing schedule or bills of quantities; or

c) arithmetic errors in:

i) line item totals resulting from the product of a unit rate and a quantity in bills of quantities or schedules of prices; or

ii) the summation of the prices.

F3.9.2 The employer must correct the arithmetical errors in the following manner:

a) Where there is a discrepancy between the amounts in words and amounts in figures, the amount in words shall govern.

b) If bills of quantities or pricing schedules apply and there is an error in the line item total resulting from the product of the unit rate and the quantity, the line item total shall govern and the rate shall be corrected. Where there is an obviously gross misplacement of the decimal point in the unit rate, the line item total as quoted shall govern, and the unit rate shall be corrected.

c) Where there is an error in the total of the prices either as a result of other corrections required by this checking process or in the tenderer's addition of prices, the total of the prices shall govern and the tenderer will be asked to revise selected item prices (and their rates if bills of quantities apply) to achieve the tendered total of the prices.

Consider the rejection of a tender offer if the tenderer does not correct or accept the correction of the arithmetical error in the manner described above.

F3.10. Clarification of a Tender Offer

Obtain clarification from a tenderer on any matter that could give rise to ambiguity in a contract arising from the tender offer.

F3.11. Evaluation of Tender Offers

F3.11.1 General

Appoint an evaluation panel of not less than three persons. Reduce each responsive tender offer to a comparative offer and evaluate them using the tender evaluation methods and associated evaluation criteria and weightings that are specified in the tender data.

F3.11.2 Method 1: Price and Preference

In the case of a price and preference:

1) Score tender evaluation points for price
2) Score points for locality
3) Score points for HDI
4) Add the points scored for price, locality and HDI.

F3.11.3 Method 2: Functionality, Price and Preference

In the case of a functionality, price and preference:

1) Score functionality, rejecting all tender offers that fail to achieve the minimum number of points for functionality as stated in the Tender Data.

2) No tender must be regarded as an acceptable tender if it fails to achieve the minimum qualifying score for functionality as indicated in the tender invitation.

3) Tenders that have achieved the minimum qualification score for functionality must be evaluated further in terms of the preference points system prescribed in paragraphs 4 and 4 and 5 below.

The 80/20 preference point system for acquisition of services, works or goods up to Rand value of R 50,000,000

4)(a)(i) The following formula must be used to calculate the points for price in respect of tenders (including price quotation) with a rand value equal to, or above R 30 000 and up to Rand value of R 50,000,000 (all applicable taxes included):

$$P_s = 80\left(1 - \frac{Pt - Pm}{Pmin}\right)$$

Where

P_s = Points scored for comparative price of tender or offer under consideration.

P_t = Comparative price of tender or offer under consideration; and

P_{min} = Comparative price of lowest acceptable tender or offer.

(4)(a)(ii) An employer of state may apply the formula in paragraph (i) for price quotations with a value less than R30 000, if and when appropriate:

(4)(b) Subject to subparagraph(4)(c), points must be awarded to a tender for scoring for/on specific goals.

(4)(c) A maximum of 10 points may be allocated in accordance with subparagraph (4)(b).

(4)(d) The points scored by tender in respect of specific goals contemplated in contemplated in subparagraph (4) (b) must be added to the points scored for price as calculated in accordance with subparagraph (4)(a).

(4)(e) Subject to paragraph 4.3.8 the contract must be awarded to the tender who scores the highest total number of points.

The 90/ 10 preference points system for acquisition of services, works orgoods with a Rand value above R 50,000,000

The following formula must be used to calculate the points for price in respect of tenders with a Rand value above R 50,000,000 (all applicable taxes included):

$$P_s = 90\left(1 - \frac{Pt - Pmin}{Pmin}\right)$$

Where

P_s = Points scored for comparative price of tender or offer under consideration

P_t = Comparative price of tender or offer under consideration; and

P_{min} = Comparative price of lowest acceptable tender or offer.

5)(b) Subject to subparagraph(5)(c), points must be awarded to a tender for scoring for/on specific goals.

5)(c) A maximum of 10 points may be allocated in accordance with subparagraph (5)(b).

5)(d) The points scored by tender in respect of HDI contribution contemplated in contemplated in subparagraph (5)(b) must be added to the points scored for price as calculated in accordance with subparagraph (5)(a). (5)(e) Subject to paragraph 4.3.8 the contract must be awarded to the tender who scores the highest total number of points.

F3.11.4 Decimal Places

Score price, preference and functionality, as relevant, to two decimal places.

F3.11.5 Scoring Price

Score price of remaining responsive tender offers using the following formula:

$N_{FO} = W_1 \times A$

Where:

N_{FO} is the number of tender evaluation points awarded for price.

W_1 is the maximum possible number of tender evaluation points awarded for price as stated in the Tender Data.

A is a number calculated using the formula and option described in *Table F.1* as stated in the *Tender Data.*

Table F.1: Formulae for calculating the value of A

FORMULA	COMPARISON AIMED AT ACHIEVING	OPTION 1[a]	OPTION 2 [a]
1	Highest price or discount	$A = \left(1 + \frac{(P - Pm)}{Pm}\right)$	$A = \frac{P}{Pm}$
2	Lowest price or percentage commission / fee	$A = \left(1 + \frac{(P - Pm)}{Pm}\right)$	$A = \frac{Pm}{P}$
P_m is the comparative offer of the most favourable comparative offer.			
P is the comparative offer of the tender offer under consideration.			

F3.11.6 Scoring Preferences

Confirm that tenderers are eligible for the preferences claimed in accordance with the provisions of the tender data and reject all claims for preferences where tenderers are not eligible for such preferences. Calculate the total number of tender evaluation points for preferences claimed in accordance with the provisions of the tender data.

F3.11.7 Scoring Functionality

Score each of the criteria and sub-criteria for quality in accordance with the provisions of the Tender Data.

Calculate the total number of tender evaluation points for quality using the following formula:

$$N_Q = W_2 \times \frac{S_O}{M_S}$$

where:

S_O is the score for quality allocated to the submission under consideration

M_S is the maximum possible score for quality in respect of a submission; and

W_2 is the maximum possible number of tender evaluation points awarded for quality as stated in the tender data

F3.12. Insurance provided by the Employer

If requested by the proposed successful tenderer, submit for the tenderer's information the policies and / or certificates of insurance which the conditions of contract identified in the contract data, require the employer to provide.

F3.13. Acceptance of Tender Offer

Accept the tender offer, if in the opinion of the employer, it does not present any risk and only if the tenderer:

a) is not under restrictions, or has principals who are under restrictions, preventing participating in the employer's procurement,

b) can, as necessary and in relation to the proposed contract, demonstrate that he or she possesses the professional and technical qualifications, professional and technical competence, financial resources, equipment and other physical facilities, managerial capability, reliability, experience and reputation, expertise and the personnel, to perform the contract,

c) has the legal capacity to enter into the contract,

d) is not insolvent, in receivership, under Business Rescue as provided for in chapter 6 of the Companies Act, 2008, bankrupt or being wound up, has his affairs administered by a court or a judicial officer, has suspended his business activities, or is subject to legal proceedings in respect of any of the foregoing,

e) complies with the legal requirements, if any, stated in the tender data, and

f) is able, in the opinion of the employer, to perform the contract free of conflicts of interest.

F3.14. Prepare Contract Documents

F3.14.1 If necessary, revise documents that shall form part of the contract and that were issued by the employer as part of the tender documents to take account of:

a) addenda issued during the tender period,

b) inclusion of some of the returnable documents, and

c) other revisions agreed between the employer and the successful tenderer.

F3.14.2 Complete the schedule of deviations attached to the form of offer and acceptance, if any.

F3.15. Complete adjudicator's contract

Unless alternative arrangements have been agreed or otherwise provided for in the contract, arrange for both parties to complete formalities for appointing the selected adjudicator at the same time as the main contract is signed.

F3.16. Notice to Unsuccessful Tenderers

F3.16.1 Notify the successful tenderer of the employer's acceptance of his tender offer by completing and returning one copy of the form of offer and acceptance before the expiry of the validity period stated in the tender data or agreed additional period.

After the successful tenderer has been notified of the employer's acceptance of the tender, notify other tenderers that their tender offers have not been accepted.

F3.17. Provide Copies of the Contracts

Provide to the successful tenderer the number of copies stated in the Tender Data of the signed copy of the contract as soon as possible after completion and signing of the form of offer and acceptance.

F3.18. Provide written reasons for actions taken

Provide upon request written reasons to tenderers for any action that is taken in applying these conditions of tender but withhold information which is not in the public interest to be divulged, which is considered to prejudice the legitimate commercial interests of tenderers or might prejudice fair competition between tenderers.

F3.19. Transparency in the procurement process

F3.19.1 The CIDB prescripts require that tenders must be advertised and be registered on the CIDB i.Tender system.

F3.19.2 The employer must adopt a transparency model that incorporates the disclosure and accountability as transparency requirements in the procurement process.

F3.19.3 The transparency model must identify the criteria for selection of projects, project information template and the threshold value of the projects to be disclosed in the public domain at various intervals of delivery of infrastructure projects.

F3.19.4 The client must publish the information on a quarterly basis which contains the following information:

- Procurement planning process
- Procurement method and evaluation process
- Contract type
- Contract status
- Number of firms tendering
- Cost estimate
- Contract title
- Contract firm(s)
- Contract price
- Contract scope of work
- Contract start date and duration
- Contract evaluation reports

F3.19.5 The employer must establish a Consultative Forum which will conduct a random audit in the implementation of the transparency requirements in the procurement process.

F3.19.6 Consultative Forum must be an independent structure from the Tender committees.

F3.19.7 The information must be published on the employer's website.

F3.19.8 Records of such disclosed information must be retained for audit purposes.

SECTION 2

T2. RETURNABLE DOCUMENTS

The following documents are to be completed and returned as they constitute the Tender. Whilst many of the returnable documents are required for the purpose of evaluating the Tenders, some will form part of the subsequent contract, as they form the basis of the Tender offer. For this reason, it is very important that all Tenderers return all information.

T2.1. CHECKLIST FOR A RESPONSIVE TENDER

1. Make sure your Tender is signed on the front page.
2. Make sure the Form of Offer is completed and signed.
3. Make sure you **initial all** of the pages.
4. Make sure you include ~~a **valid** original Tax Clearance Certificate and~~ your tax compliance status pin number.
5. Make sure you claim VAT only if you are registered for VAT.
6. Make sure you claim the equity ownership points – or else no points will be granted.
7. Make sure you complete the Table of Ownership to substantiate your claim.
8. Make sure you read the Conditions of Contract carefully.
9. Make sure you comply with the specifications in full.
10. Make sure that your Declaration of Interest is signed.
11. Make sure that your Tender Document is **signed**.
12. Make sure you attached all copies of IDs **(certified).**
13. Make sure you have the capacity to complete the project.
14. Make sure you include the agreement with other sub-contractors.
15. Make sure you have provided all information for the T2.3.10 Functionality Score Card (Eligibility Criteria)
16. Make sure you include Audited Annual Financial Statements for the past three years.
17. Make sure you include a Certificate signed by the Tenderer certifying that the Tenderer has no undisputed commitments for Municipal Services.
18. Make sure you include particulars of any contracts awarded to the Tenderer by an organ of the State during the past five years.
19. Make sure you attach a statement indicating whether any portion of the goods or services are expected to be sourced from outside the Republic.
20. Khâi-Ma Local Municipality will verify all information.

TO BE COMPLETED IN THIS DOCUMENT:

SECTION	FORM	PAGE	COMPLETED & SIGNED	
			Yes	No
T2.1	CHECKLIST FOR A RESPONSIVE TENDER	28		
T2.2.1	ALTERATIONS BY TENDERER	31		
T2.2.2	SCHEDULES OF CONTRACTS SUCCESSFULLY COMPLETED	32		
T2.2.3	SCHEDULE OF CONSTRUCTION PLANT	33		
T2.2.4	PROPOSED DEED OF SECURITIES 1 & 2	34		
T2.2.5	CERTIFICATE FOR AUTHORITY OF SIGNATORY	46		
T2.2.6	CERTIFICATE OF AUTHORITY FOR JOINT VENTURES	36		
T2.2.7	AUTHORIZATION TO INVESTIGATE FINANCIAL STATEMENTS	38		
T2.2.8	DAY WORK SCHEDULE	39		
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TO BE ATTACHED IN A SEPARATELY BOUND DOCUMENT ORDERED BY ANNEXURE NUMBER:

SECTION	Attached	
	Yes	**No**
Annexure A: CIDB Registration		
Annexure B: ~~Tax Clearance Certificate or~~ Tax Compliance Status Pin		
Annexure C: A VAT Registration Certificate		
Annexure D: COID Certificate		
Annexure E: Unemployment Insurance Certificate, Act of 1996		
Error! Reference source not found. *Sworn Affidavit*		
Annexure G: Official letter from Tenderer's Bank		
Annexure H: Shareholding Certificate (where applicable)		
Annexure I: Company Profile, Organogram and CVs		
Annexure J: Financial Statements		
Annexure K: Municipal Rates Account		
Annexure L: Documents of Incorporation		
Annexure M: Practical Completion Certificates and Project Reports		
Annexure N: Letter confirming Hire of Construction Plant		
Annexure O: Central Supply Database Certificate (CSD)		

T2.2. RETURNABLE SCHEDULES REQUIRED FOR TENDER EVALUATION PURPOSES

T2.2.1. ALTERATIONS BY TENDERER

Should the Tenderer desire to make any departures from or modifications to the Special conditions of Contract, Specification, Bill of Quantities or Drawings, or to qualify his Tender in any way, he shall set out his proposals clearly hereunder or alternatively state them in a covering letter attached to his Tender and referred to hereunder, failing which the Tender will be deemed to be unqualified.

Should the Tenderer not desire to make any departures or modifications, he must state "NONE" in the schedule here under and sign it.

PAGE	CLAUSE OR ITEM

DATE: _____

_____
SIGNATURE OF TENDERER

_____
WITNESS

T2.2.2. SCHEDULES OF CONTRACTS SUCCESSFULLY COMPLETED

I/We, of _____

certify hereby that the following is a list representing contracts successfully completed by me/us in the recent past and that it is of a similar nature as the Works described in this document.

NATURE OF WORKS	VALUE OF WORKS	DURATION AND DATE OF COMPLETION	EMPLOYER AND CONTACT PERSON WITH TEL NO

DATE:

_____ _____

SIGNATURE OF TENDERER

_____

WITNESS

T2.2.3. SCHEDULE OF CONSTRUCTION PLANT

If my/our Tender is successful, I/we of _____
undertake/s to place the Following equipment on the site for the execution of the Works:

OWN CONSTRUCTION PLANT	
NAME AND DESCRIPTION	**NUMBER**
HIRED CONSTRUCTION PLANT	
NAME AND DESCRIPTION	**NUMBER**

I/we undertake not to remove any plant and/or equipment from the construction site without the written consent of the Engineer, which consent shall not be unreasonably withheld.

DATE: _____ _____
SIGNATURE OF TENDERER

_____
WITNESS

T2.2.4. PROPOSED DEED OF SECURITIES 1 & 2

We, the undersigned, hereby agree that, if the Client accepts this Tender, we will, when so required, provide and sign the necessary Deed of Securities to the amount of 10 (Ten) percent of the Tendered amount for the proper conducting of the Contract by the undersigned:

1. _____

2. _____

in accordance with the conditions and prescriptions of the Contract that will be entered into for the proper and prompt conducting of the Works as stated in the Tender documents attached hereto and we undertake to renounce the benefit or the exclusion of ordinis seu excussionis et divisionis de duobus vel pluribus reis debendi and all other lawful exclusions that may be brought against the validity of this security.

UNDERSIGNED AS PROOF ON THIS _____ DAY OF _____ 20 ____

UNDERSIGNED BY THE MENTIONED SURER:

1. NAME: _____
ADDRESS: _____
_____
_____
_____

2. NAME: _____
ADDRESS: _____
_____
_____
_____

IN MY CAPACITY AS: _____

IN MY CAPACITY AS: _____

AS WITNESS FOR THE SIGNATURE OF SECURITY NO 1

1. NAME: _____
ADDRESS: _____
_____
_____
_____

AS WITNESS FOR THE SIGNATURE OF SECURITY NO 2

2. NAME: _____
ADDRESS: _____
_____
_____
_____

T2.2.5. CERTIFICATE FOR AUTHORITY OF SIGNATORY

I/We the undersigned am/are authorized to sign the Tender form on behalf of:

_____

in accordance to the "Statute of Partnership/Resolution of the Board of Directors/Proxy"*, of which a certified copy is included herewith, or by virtue of:

_____

* Delete whichever is inapplicable.

DATE: _____ _____
SIGNATURE OF TENDERER

AS WITNESSES:

_____

_____

T2.2.6. CERTIFICATE OF AUTHORITY FOR JOINT VENTURES

We, the undersigned, are submitting this tender offer in Joint Venture and hereby authorise Mr/Ms _____ , authorised signatory

of the company _____, acting in the capacity of lead partner, to sign all documents in connection with the tender offer and any contract resulting from it on our behalf.

Name of Firm: _____

Address: _____

_____

_____

_____

Lead Partner : _____

CIDB Registration No.: _____

Duly Authorised Signatory: _____

Name: _____

Designation: _____

Signature: _____

Name of Firm: _____

Address: _____

_____

_____

_____

Lead Partner : _____

CIDB Registration No.: _____

Duly Authorised Signatory: _____

Name: _____

Designation: _____

Signature: _____

Name of Firm: _____

Address: _____

_____

_____

_____

Lead Partner : _____

CIDB Registration No.: _____

Duly Authorised Signatory: _____

Name: _____

Designation: _____

Signature: _____

Name of Firm: _____

Address: _____

_____

_____

_____

Lead Partner : _____

CIDB Registration No.: _____

Duly Authorised Signatory: _____

Name: _____

Designation: _____

Signature: _____

T2.2.7. AUTHORIZATION TO INVESTIGATE FINANCIAL STATEMENTS

I/We, the undersigned, hereby grant permission to the Engineer, or his authorized agent, who executes this contract on behalf of MVD Kalahari, namely:

Mr. A Goliath to investigate our financial statements for the possible awarding of above-mentioned contract. The permission is granted with the emphatic understanding that **all** information obtained under this grant of permission will be handled in the **strictest confidence**.

My/our bank account number is as follows:

Bank : _____

Branch : _____

Account No : _____

My/Our audited balance sheet can be obtained from:

Firm : _____

Address : _____

_____

_____

Contact person : _____

Date : _____

_____ _____
SIGNATURE OF TENDERER WITNESS

T2.2.8. DAY WORK SCHEDULE

This day work schedule shall be completed by the Contractor as fully detailed as possible since it is to be used to put a valuation upon additional or substituted work which by their nature cannot now conveniently be valued at the rates Tendered by the Contractor and where the Contractor has been instructed to carry out such work on a day work basis.

The Contractor is required to fill in the schedule listed below with prices for labour, plant and materials for the work which shall be executed in terms of *Clause 6.5* of the *GCC 2015*, forming portion of the Contract Documents.

ITEM	DESCRIPTION	UNIT	RATE
1.	**LABOUR**: In the rates Tendered, the Contractor shall allow for the use of all small tools, e.g. picks, shovels, hammers, etc.		
a.	Unskilled labourers	Hour	
b.	Skilled tradesmen	Hour	
c.	Gangers	Hour	
d.	Plant Operators	Hour	
2.	**MATERIALS**: For the supply and use including delivery charges on the site where the material is built into the permanent works.		Cost plus %
3.	**PLANT**: Under this heading, the Contractor is required to list the operating and standing charges for all the plant he proposes to use in terms of this Contract on day work and shall insert the rates for the use of such plant in terms of this Contract on a plant hire basis, priced per hour inclusive of all fuel, equipment, etc., but excluding the plant operator's cost which will be taken as listed above.		
4.	**GENERAL**: Under this item, the Contractor may list such other items of plant, labour, materials, etc. which have not been provided for in the items hereinbefore and which the Contractor considers he may require to properly execute work on a day work basis.		
5.	**SUPERVISION AND OVERHEADS**: Under this item, the Contractor must allow for all charges, inclusive to allow for proper supervision and all overheads, in connection with day work and this allowance shall be calculated on the percentage basis which must be indicated by the Contractor in the Schedule. The Contractor is to note that for the purpose of calculating the per-centage, the value of materials as listed under Item 2 (above) shall		

ITEM	DESCRIPTION	UNIT	RATE
	not be included in the total hereunder for establishing such percentage as aforesaid. Supervision and overheads		
			%

DATE: _____ _____
SIGNATURE OF TENDERER

AS WITNESSES:

1. _____

2. _____

T2.2.9. STAFFING PROFILE

Provide information on the staff that you have available to execute this contract. (Attach a separate list if the space provided is insufficient)

OWN STAFF: **GENDER AND RACE**	**NUMBER OF STAFF**
STAFF TO BE EMPLOYED FOR THE PROJECT: **GENDER AND RACE**	**NUMBER OF STAFF**

T2.2.10. PROPOSED KEY PERSONNEL

The Tenderer shall list below the key personnel (including first nominee and the second-choice alternate), whom he proposes to employ on the project should his Tender be accepted, both at his headquarters and on the site, to direct and for execution of the work, together with their qualifications, experience, positions held and their nationalities.

DESIGNATION	NAME OF NOMINEE ALTERNATE	NATIONALITY	SUMMARY OF		HDI Status YES/NO
			QUALIFICATIONS	EXPERIENCE AND PRESENT OCCUPATION	
Construction Monitoring Site Agent					
Engineer on Site					
Construction Supervisor (Give Designation)					
Other key staff (give designation)					

T2.2.11. PROPOSED SUB-CONTRACTORS

The Tenderer shall state hereunder the name of any sub-contractors that are proposed to complete certain sections of the Works. PLEASE NOTE: The Tenderer has to appoint a sub-contractor that is registered with the CIDB in a 1CE (or higher) class of construction work. The company profile(s) of the proposed sub-contractors have to be attached to Annexure I: Company Profile, Organogram and CVs *(page 10)*

NAME	SECTION OF WORK	VALUE OF ITEMS COVERED BY SUB-CONTRACTOR	% VALUE OF TOTAL WORK

DATE: _____ _____
SIGNATURE OF TENDERER

AS WITNESSES:

1. _____

2. _____

T2.2.12. DETAILS OF TRAINING OFFERED

The Tenderer shall indicate the type and level of training that will be offered to the local labourers. The schedule should include on-site training or skills transfer by the tender entity or by his suppliers as well as any accredited training proposed for the project.

DESCRIPTION OF ON-SITE TRAINING AND SKILLS TRANSFER (NON-ACCREDITED TRAINING)	NUMBER TO BE TRAINED
DESCRIPTION OF ACCREDITED TRAINING (ATTACHED QUOTATION AND TRAINING CODE)	**NUMBER TO BE TRAINED**

DATE: _____ _____
SIGNATURE OF TENDERER

AS WITNESSES:

1. _____

2. _____

T2.3. OTHER DOCUMENTS REQUIRED FOR TENDER EVALUATION PURPOSES

T2.3.1. CERTIFICATE OF INSPECTION OF THE SITE

This is to certify that I, _____ representative of Contractor in the company of **Mr A Goliath**, visited the site at **Not Applicable**. The Contract Documents and Drawings were discussed, and the Site conditions were emphasised.

I have made myself familiar with all local conditions likely to influence the work and the cost thereof and state that no misrepresentations have been made to me regarding the ground and other local conditions.

I further **CERTIFY** that I am satisfied with the description of the work and explanations given by the said Engineer and that I perfectly understand the work to be done, as specified and implied, in the execution of this contract.

NOT APPLICABLE

DATE: _____ _____

SIGNATURE OF TENDERER

_____

SIGNATURE OF ENGINEER

T2.3.2. FINANCIAL STATEMENT

Kindly provide the following information:

ANNEXURE	INFORMATION	RESPONSE	
		ATTACHED	NOT ATTACHED
J 1(a)	Audited annual financially statements for the past three (3) years; (if applicable, kindly attach statements as *Annexure J 1(a)* **or**		
J 1(b)	Since your establishment – if established during the past three years; (if applicable, kindly attach audited statements as *Annexure J 1(b)*		
J 2	A certificate signed by the tenderer certifying that the Tenderer has no undisputed commitments towards other service providers in respect of which payment is overdue for more than 30 days e.g. SARS, Department of Labour etc.; (kindly attach certificate as *Annexure J 2*)		
J 3	Particular of any contracts awarded to the Tenderer by an Organ of State during the past five years, including particulars of any materials non-compliance or dispute concerning the execution of such contract; (Kindly provide particulars and attach as *Annexure J 3*)		
J 4	A statement indicating whether any portion of the goods or services are expected to be sourced from the outside the Republic and, if so, what portion of the payment us expected to be transferred out of the Republic and informing the Department of Trade and Industry. (if applicable, kindly attach statement as *Annexure J 4*)		

T2.3.3. TAX CLEARANCE CERTIFICATE REQUIREMENT

MBD 2

TAX CLEARANCE CERTIFICATE REQUIREMENTS

It is a condition of Tender that the taxes of the successful Tenderer must be in order, or that satisfactory arrangements have been made with South African Revenue Service (SARS) to meet the Tenderer's tax obligations.

1. Previously a taxpayer (Supplier) was required to submit a valid, original paper Tax Clearance Certificate (TCC), the taxpayer **MUST** now submit a TAX COMPLIANCE STATUS PIN NO even if a paper TCC was submitted. Tenders will not be considered if the correct PIN NO and Tax Reference Number is included in this document.

2. Applications for the Tax Clearance Certificates MUST be made via eFiling. In order to use this provision, taxpayers will need to register with SARS as eFilers through the website www.sars.gov.za or contact the SARS Contact Centre on 0800007277

3. The Tenderer (Name) _____
hereby grants Khâi-Ma Local Municipality permission to use the following

TAX COMPLIANCE STATUS PIN NO _____

with reference to the following Tax Reference Number _____

4. The Tenderer (Name) _____
hereby further grants SARS permission to disclose the Tenderers **TAX COMPLIANCE STATUS** to Khâi-Ma Local Municipality on an on-going basis during the Contract Term.

5. A Tenderer who appoints a sub-contractor/Joint Venture/Consortia to execute a portion of a contract (Contractor in excess of National Treasury threshold) must ensure that each appointment is **TAX COMPLIANT** and remains **TAX COMPLIANT** for the duration of the contract. Successful Tenderers must provide Khâi-Ma Local Municipality authority from their appointments confirming that SARS may, on an on-going basis during the contract term, disclose the appointed sub-contractor/Joint Venture/Consortia **TAX COMPLIANCE STATUS.**

6. A Tenderer who acts on behalf of an undisclosed principal must disclose such a fact upon submission of a Tender as well as identity of that principal. The **TAX COMPLIANCE STATUS** of that principle must be verified in the same manner as that of the Tenderer. The same principle applies mutatis mutandis to any sub-contractor / Joint Venture / Consortia appointed by a successful Tenderer to execute a portion of a contract.

7. The **TAX COMPLIANCE STATUS** of all parties must be disclosed and verified if the Tenderer consist of a partnership and

8. A Tenderer who is not resident in the Republic of South Africa, must apply for **TAX CLEARANCE** at **SARS.**

NOT APPLICABLE

SIGNATURE OF TENDERER _____ DATE: _____

CAPACITY UNDER WHICH THIS TENDER IS SIGNED: _____

WITNESS 1 _____ DATE: _____

WITNESS 2 _____ DATE: _____

TAX CLEARANCE

TCC 001

Application for a Tax Clearance Certificate

Purpose

Select the applicable option ..... Tenders ☐ Good standing ☐

If "Good standing", please state the purpose of this application

Particulars of applicant

Name (Initials & Surname or registered name)

Trading name (if applicable)

ID/Passport no

Company/Close Corp. registered no

Income Tax ref no

PAYE ref no 7

VAT registration no 4

SDL ref no L

Customs code

UIF ref no U

Telephone no CODE NUMBER

Fax no CODE NUMBER

E-mail address

Physical address

Postal address

Number of copies of certificates required

Particulars of representative

Surname

First names

ID/Passport no

Income Tax ref no

Telephone no CODE NUMBER

Fax no CODE NUMBER

E-mail address

Physical address

NOT APPLICABLE

Particulars of tender (If applicable)

Tender number

Tender amount R ,

Expected duration of the tender year(s)

Particulars of the 3 largest tenders previously dealt with

Date started	Date finalised	Company	Contact person	Telephone number	Amount

Audit

Are you currently aware of any Audit investigation against you/the company? ..... YES NO

If "YES" provide details

Declaration

I declare that the information furnished in this application as well as the supporting documents is true and correct in every respect.

Appointment of representative/agent

I the undersigned confirm that I require a Tax Clearance Certificate in respect of Tenders or Goodstanding.

I hereby authorise and instruct to apply to and receive from SARS the applicable Tax Clearance Certificate on my/our behalf.

Signature of representative/agent Date C C Y Y – M M – D D

Name of representative/ agent

Signature of applicant Date C C Y Y – M M – D D

Name of applicant

NOT APPLICABLE

Notes:

1. It is a serious offence to make a false declaration.
2. Section 75 of the Income Tax Act, 1962, states: Any person who
   (a) fails or neglects to furnish, file or submit any return or document as and when required by or under this Act; or
   (b) without just cause shown by him, refuses or neglects to-
      (i) furnish, produce or make available any information, documents or things;
      (ii) reply to or answer truly and fully, any questions put to him ...
   As and when required in terms of this Act ... shall be guilty of an offence ..."
3. **SARS will, under no circumstances, issue a Tax Clearance Certificate unless this form is completed in full.**

T2.3.4. LISTING CRITERIA

KHÂI-MA LOCAL MUNICIPALITY
LISTING CRITERIA

THE FOLLOWING INFORMATION MUST BE PROVIDED IF TENDERER IS NOT REGISTERED ON DATA BASE. IF THE TENDERER IS REGISTER A PROOF (COPY) OF THE DATA BASE REGISTRATION MUST BE SUBMITTED WITH THE TENDER DOCUMENT AND THE DATA BASE REGISTRATION NUMBER MUST BE PROVIDED

DATA BASE REGISTRATION NUMBER: _____

1. **Company Name:** _____

2. **Contact Details:** Tel No: _____ Fax No: _____

   Cell phone: _____ Email Address: _____

   Contact Person: _____

3. **Postal Address**: _____

4. **VAT Registered**: Yes ☐ No ☐ If registered, VAT Registration No: _____

5. **Settlement Discount Allowed**: _____% for payment within _____days

6. **Bank Name**:_____ **Branch code**: _____

7. **Account No**: _____ **Type of Account**: _____

Location in Northern Cape Area: Yes ☐ No ☐

8. **% owned by black male**: _____% **% owned by black female**: _____%

   % owned by black youth: _____% **% owned by white female**: _____%

   % owned by disabled persons _____%

9. **Indicate Main Sector/ Please select *one* only:**

☐ Agriculture	☐ Mining and Quarrying
☐ Manufacturing	☐ Electricity, Gas, Water
☐ Construction	☐ Retail & Motor Trade & Repairs
☐ Wholesale Trade, Commercial Agents and Allied Services	☐ Catering & Accommodation & other Trade
☐ Transport, Storage & Communications	☐ Finance and Business Services
☐ Community, Social and Personal Services	

10. **Amount of full time employed staff:** _____

Annual Turnover: R_____

Asset Value (*excluding fixed property):* *R*_____

11. It is the responsibility of the Tenderer to inform Khâi-Ma Local Municipality of any changes, during the contract period.

T2.3.5. MBD 4 : DECLARATION OF INTEREST

MBD 4

DECLARATION OF INTEREST

1. No tender will be accepted from persons in the service of the state[1].

2. Any person, having a kinship with persons in the service of the state, including a blood relationship, may make an offer or offers in terms of this invitation to bid. In view of possible allegations of favouritism, should the resulting bid, or part thereof, be awarded to persons connected with or related to persons in service of the state, it is required that the tenderer or their authorised representative declare their position in relation to the evaluating/adjudicating authority.

3 In order to give effect to the above, the following questionnaire must be completed and submitted with the bid.

3.1 Full Name of tenderer or his or her representative: _____

3.2 Identity Number: _____

3.3 Position occupied in the Company (director, trustee, hareholder[2]): _____

3.4 Company Registration Number: _____

3.5 Tax Reference Number: _____

3.6 VAT Registration Number: _____

3.7 The names of all directors / trustees / shareholder's[2] members, their individual identity numbers and state employee numbers must be indicated in paragraph 4 below.

3.8 Are you presently in the service of the state? **YES / NO**

3.8.1 If yes, furnish particulars.

_____

_____

3.9 Have you been in the service of the state for the past twelve months? **YES / NO**

3.9.1 If yes, furnish particulars.

_____

_____

[1] MSCM Regulations: "in the service of the state" means to be –
(a) a member of –
  (i) any municipal council;
  (ii) any provincial legislature; or
  (iii) the national Assembly or the national Council of provinces;

(b) a member of the board of directors of any municipal entity;
(c) an employee of any national or provincial department, national or provincial public entity or constitutional institution within the meaning of the Public Finance Management Act, 1999 (Act No.1 of 1999);
(d) a member of the accounting authority of any national or provincial public entity; or
(e) an employee of Parliament or a provincial legislature.

[2] Shareholder" means a person who owns shares in the company and is actively involved in the management of the company or business and exercises control over the company.

3.10 Do you have any relationship (family, friend, other) with persons in the service of the state and who may be involved with the evaluation and or adjudication of this bid? **YES / NO**

3.10.1 If yes, furnish particulars.

_____

_____

3.11 Are you, aware of any relationship (family, friend, other) between any other tenderer and any persons in the service of the state who may be involved with the evaluation and or adjudication of this bid? **YES/NO**

3.11.1 If yes, furnish particulars.

_____

_____

3.12 Are any of the company's directors, trustees, managers, principal shareholders, or stakeholders in service of the state? **YES / NO**

3.12.1 If yes, furnish particulars.

_____

_____

3.13 Are any spouse, child or parent of the company's directors' trustees, managers, principle shareholders or stakeholders in service of the state? **YES / NO**

3.13.1 If yes, furnish particulars.

_____

_____

3.14 Do you or any of the directors, trustees, managers, principal Shareholders, or stakeholders of this company have any interest in any other related companies or business whether or not they are bidding for this contract. **YES / NO**

3.14.1 If yes, furnish particulars:

_____

_____

3.15 Full details of directors / trustees / members / shareholders.

Full Name	Identity Number	State Employee Number

Full Name	Identity Number	State Employee Number

SIGNATURE **DATE**

CAPACITY **NAME OF BIDDER**

T2.3.6. PROOF OF REGISTRATION WITH THE CONSTRUCTION INDUSTRY DEVELOPMENT BOARD (CIDB)

The Tenderer is to submit in the separately bound annexures as *Annexure A:* CIDB Registration written proof of their registration with the CIDB in a contractor grading designation equal or higher than a contractor grading of 4EP class for civil construction work.

In the instance of a Joint Venture, all Joint Venture partners must provide proof of registration with the CIDB.

Note:

Failure to submit such documentation as prescribed shall result in this Tender not being further considered for the award of the contract.

T2.3.7. MBD 9: CERTIFICATE OF INDEPENDENT TENDER DETERMINATION

MBD 9

CERTIFICATE OF INDEPENDENT TENDER DETERMINATION

1. This Tendering Document (MBD) must form part of all Tenders[1] invited.

2. Section 4(1)(b)(iii) of the Competition Act No. 89 of 1998, as amended, prohibits an agreement between, or concerted practice by, firms, or a decision by an association of firms, if it is between parties in a horizontal relationship and if it involves collusive bidding (or bid rigging).[2] Collusive bidding is a *per se* prohibition meaning that it cannot be justified under any grounds.

3. Treasury Regulation 16A9 prescribes that accounting officers and accounting authorities must take all reasonable steps to prevent abuse of the supply chain management system and authorizes accounting officers and accounting authorities to:

   a. disregard the bid of any Tenderer if that Tenderer, or any of its directors have abused the institution's supply chain management system and or committed fraud or any other improper conduct in relation to such system.

   b. cancel a contract awarded to a supplier of goods and services if the supplier committed any corrupt or fraudulent act during the bidding process or the execution of that contract.

4. This MBD serves as a certificate of declaration that would be used by institutions to ensure that, when bids are considered, reasonable steps are taken to prevent any form of bid-rigging.

5. In order to give effect to the above, the attached Certificate of Bid Determination (MBD 9) must be completed and submitted with the bid:

[1] Includes price quotations, advertised competitive bids, limited bids and proposals.

[2] Tender rigging (or collusive bidding) occurs when businesses, that would otherwise be expected to compete, secretly conspire to raise prices or lower the quality of goods and / or services for purchasers who wish to acquire goods and / or services through a bidding process. Tender rigging is, therefore, an agreement between competitors not to compete.

CERTIFICATE OF INDEPENDENT TENDER DETERMINATION

I, the undersigned, in submitting the accompanying bid:

_____
(Tender Number and Description)

in response to the invitation for the tender made by:

_____
(Khâi-Ma Local Municipality)

do hereby make the following statements that I certify to be true and complete in every respect:

I certify, on behalf

of: _____ that:
(Name of Bidder)

1. I have read and I understand the contents of this Certificate;

2. I understand that the accompanying tender will be disqualified if this Certificate is found not to be true and complete in every respect;

3. I am authorized by the tenderer to sign this Certificate, and to submit the accompanying bid, on behalf of the bidder;

4. Each person whose signature appears on the accompanying tender has been authorized by the tenderer to determine the terms of, and to sign, the bid, on behalf of the bidder;

5. For the purposes of this Certificate and the accompanying bid, I understand that the word "competitor" shall include any individual or organization, other than the bidder, whether or not affiliated with the bidder, who:

   (a) has been requested to submit a tender in response to this tender invitation;

   (b) could potentially submit a tender in response to this tender invitation, based on their qualifications, abilities or experience; and

   (c) provides the same goods and services as the tenderer and/or is in the same line of business as the bidder

6. The tenderer has arrived at the accompanying tender independently from, and without consultation, communication, agreement or arrangement with any competitor. However communication between partners in a joint venture or consortium[3] will not be construed as collusive bidding.

7. In particular, without limiting the generality of paragraphs 6 above, there has been no consultation, communication, agreement or arrangement with any competitor regarding:

   (a) prices;

   (b) geographical area where product or service will be rendered (market allocation)

   (c) methods, factors or formulas used to calculate prices;

   (d) the intention or decision to submit or not to submit, a bid;

   (e) the submission of a tender which does not meet the specifications and conditions of the bid; or

   (f) bidding with the intention not to win the bid.

8. In addition, there have been no consultations, communications, agreements or arrangements with any competitor regarding the quality, quantity, specifications and conditions or delivery particulars of the products or services to which this tender invitation relates.

9. The terms of the accompanying tender have not been, and will not be, disclosed by the bidder, directly or indirectly, to any competitor, prior to the date and time of the official tender opening or of the awarding of the contract.

10. I am aware that, in addition and without prejudice to any other remedy provided to combat any restrictive practices related to bids and contracts, bids that are suspicious will be reported to the Competition Commission for investigation and possible imposition of administrative penalties in terms of section 59 of the Competition Act No. 89 of 1998 and or may be reported to the National Prosecuting Authority (NPA) for criminal investigation and or may be restricted from conducting business with the public sector for a period not exceeding ten (10) years in terms of the Prevention and Combating of Corrupt Activities Act No. 12 of 2004 or any other applicable legislation.

_____ _____
Signature Date

_____ _____
Position Name of Bidder

[3] Joint venture or Consortium means an association of persons for the purpose of combining their expertise, property, capital, efforts, skill, and knowledge in an activity for the execution of a contract.

T2.3.8. MBD 8: DECLARATION OF TENDERER'S PAST SUPPLY CHAIN MANAGEMENT PRACTICES

MBD 8

DECLARATION OF TENDERER'S PAST SUPPLY CHAIN MANAGEMENT PRACTICES

1 This Standard Bidding Document must form part of all Tenders invited.

2 It serves as a declaration to be used by this entity in ensuring that when goods and services are being procured, all reasonable steps are taken to combat the abuse of the supply chain management system.

3 The Tender of any Tenderer may be rejected if that Tenderer, or any of its directors have:

a. abused the entity's supply chain management system or committed any improper conduct in relation to such system;
b. been convicted for fraud or corruption during the past five years;
c. willfully neglected, reneged on or failed to comply with any government, municipal or other public sector contract during the past five years; or

4 In order to give effect to the above, the following questionnaire must be completed and submitted with the Tender.

ITEM	QUESTION	YES	NO
4.1	Is the Tenderer or any of its directors listed on the National Treasury's database as a company or person prohibited from doing business with the public sector? **(Companies or persons who are listed on this database were informed in writing of this restriction by the National Treasury after the *audi alteram partem* rule was applied).** The Database of Restricted Suppliers now resides on the National Treasury's website **www.treasury.gov.za** and can be accessed by clicking on its link at the bottom of the home page	☐	☐
4.1.1	If so, furnish particulars:		
4.2	Is the Tenderer or any of its directors listed on the Register for Tender Defaulters in terms of section 29 of the Prevention and Combating of Corrupt Activities Act (No 12 of 2004)? **(To register for Tender Defaulters can be accessed on the National Treasury's website www.treasury.gov.za, by clicking on its link at the bottom of the home pasge.**	☐	☐
4.2.1	If so, furnish particulars:		
4.3	Was the Tenderer or any of its directors convicted by a court of law (including a court of law outside the Republic of South Africa) for fraud or corruption during the past five years?	☐	☐
4.3.1	If so, furnish particulars:		

ITEM	QUESTION	YES	NO
4.4	Was any contract between the Tenderer and any organ of state terminated during the past five years on account of failure to perform on or comply with the contract?		
4.4.1	If so, furnish particulars:	☐	☐

CERTIFICATION

I, THE UNDERSIGNED (FULL NAME) _____

CERTIFY THAT THE INFORMATION FURNISHED ON THIS DECLARATION FORM TRUE AND CORRECT.

I ACCEPT THAT, IN ADDITION TO THE CANCELLATION OF A CONTRACT, ACTION MAY BE TAKEN AGAINST ME SHOULD THIS DECLARATION PROVE TO BE FALSE.

_____ _____
Signature Date

_____ _____
Position Name of Tenderer

T2.3.9. CONTRACT FORM: RENDERING OF SERVICES

MBD 7.2

CONTRACT FORM - RENDERING OF SERVICES

THIS FORM MUST BE FILLED IN DUPLICATE BY BOTH THE SERVICE PROVIDER (PART 1) AND THE PURCHASER (PART 2). BOTH FORMS MUST BE SIGNED IN THE ORIGINAL SO THAT THE SERVICE PROVIDER AND THE PURCHASER WOULD BE IN POSSESSION OF ORIGINALLY SIGNED CONTRACTS FOR THEIR RESPECTIVE RECORDS.

PART 1 (TO BE FILLED IN BY THE SERVICE PROVIDER)

1. I hereby undertake to render services described in the attached bidding documents to (name of the institution)_____ in accordance with the requirements and task directives / proposals specifications stipulated in Tender Number_____at the price/s quoted. My offer/s remain binding upon me and open for acceptance by the Purchaser during the validity period indicated and calculated from the closing date of the bid.

2. The following documents shall be deemed to form and be read and construed as part of this agreement:

   (i) Bidding documents, *viz*
   - Invitation to bid;
   - Tax clearance certificate;
   - Pricing schedule(s);
   - Filled in task directive/proposal;
   - Preference claims for Broad Based Black Economic Empowerment Status Level of Contribution in terms of the Preferential Procurement Regulations 2022
   - Declaration of interest;
   - Declaration of Bidder's past SCM practices;
   - Certificate of Independent Tender Determination;
   - Special Conditions of Contract;

   (ii) General Conditions of Contract; and
   (iii) Other (specify)

3. I confirm that I have satisfied myself as to the correctness and validity of my bid; that the price(s) and rate(s) quoted cover all the services specified in the bidding documents; that the price(s) and rate(s) cover all my obligations and I accept that any mistakes regarding price(s) and rate(s) and calculations will be at my own risk.

4. I accept full responsibility for the proper execution and fulfilment of all obligations and conditions devolving on me under this agreement as the principal liable for the due fulfillment of this contract.

5. I declare that I have no participation in any collusive practices with any tenderer or any other person regarding this or any other bid.

6. I confirm that I am duly authorised to sign this contract.

NAME (PRINT) _____

CAPACITY _____

SIGNATURE _____

NAME OF FIRM _____

DATE _____

WITNESSES

1 _____

2 _____

DATE: .....

CONTRACT FORM - RENDERING OF SERVICES

PART 2 (TO BE FILLED IN BY THE PURCHASER)

1. I_____ in my capacity as_____

   accept your tender under reference number **KH38-25/26** dated_____ the rendering of services indicated hereunder and/or further specified in the annexure(s).

2. An official order indicating service delivery instructions is forthcoming.

3. I undertake to make payment for the services rendered in accordance with the terms and conditions of the contract, within 30 (thirty) days after receipt of an invoice.

DESCRIPTION OF SERVICE	PRICE (ALL APPLICABLE TAXES INCLUDED)	COMPLETION DATE	MINIMUM THRESHOLD FOR LOCAL PRODUCTION AND CONTENT (if applicable)

4. I confirm that I am duly authorised to sign this contract.

SIGNED AT _____ ON _____

NAME (PRINT) _____

SIGNATURE _____

OFFICIAL STAMP

WITNESSES

1 _____

2 _____

DATE: ……..

T2.3.10. FUNCTIONALITY SCORE CARD (ELIGIBILITY CRITERIA)

1. PROJECT INFORMATION

PLEASE COMPLETE THE FOLLOWING PROJECT INFORMATION THAT IS REQUIRED FOR THE FUNCTIONALITY EVALUATION SCORECARD

The Tenderer has to list projects of similar construction activities that were **successfully completed** by their construction company and/or the proposed subcontractors (if applicable) within the past **ten years**.

The value of the project as well as the value of the specific construction activity under consideration have to be indicated. Please note that additional **projects of similar construction** work can be attached for consideration during the evaluation process.

A bid will not be evaluated further if it fails to meet the minimum threshold of total 70 points out of maximum 100 points for functionality as prescribed in the following tables and a minimum of 70% per sub-section.

NOTE:

THIS SPECIAL CONDITIONS OF TENDER IS REGARDED AS A REPONSIVNESS CRITERIA, THUS FAILURE TO COMPLETE AND COMPLY WILL LEAD TO THE DISQUALIFICATION OF YOUR TENDER

Individuals must be identified for each of the key personnel listed below. The individuals with respect to key personnel for categories A1, A2, A3 and A4 could not be the same person.

In order to be considered for an appointment in terms of this tender, the tenderer must have the following key personnel who will be the single point of accountability and responsibility for the management of the construction works in its employment at the close of tender. Alternatively, a signed undertaking from an organisation having the required personnel, stating that they will undertake the necessary work on behalf of the tenderer in terms of a sub-consultant agreement, will be acceptable.

KEY PERSONNEL-A1: 3-PHASE INSTALLATION ELECTRICIAN

Where the key personnel are no longer accessible to undertake the necessary work after the award of the tender, the Contractor shall within a period of 10 working days replace the key personnel listed under Annexure A: Schedule of Key Personnel with a person with equivalent competencies and subject to approval by the Employer. Such approval shall not be unreasonably withheld.

A suitably qualified and experienced 3-Phase Installation Electrician who will be the single point of account-ability and responsibility for the management of the construction works and who possesses, as a minimum, the following qualifications and experience:

A: Individual qualification – A1 as listed in Annexure A: Schedule of Key Personnel

- Registration as a 3-phase installation electrician at the Department of Employment and Labour – Any Electrical Installation, AND
- Valid registration for ORHVS regulations

B: Individual experience as – A1 as listed in Annexure A: Schedule of Project Experience of Key Personnel

- The Curriculum Vitae of the 3-phase installation electrician, must be submitted with the tender submission, appended to Annexure D: Schedule of Project Experience of Key Personnel.

KEY PERSONNEL-A2: ELECTRICAL CONSTRUCTION MANAGER/SUPERVISOR

Where the key personnel are no longer accessible to undertake the necessary work after the award of the tender, the subcontractor shall within a period of 10 working days replace the key personnel listed in Annexure A: Schedule of Key Personnel – Electrical Construction Manager/Supervisor with a person with equivalent competencies and subject to approval by the employer. Such approval shall not be unreasonably withheld.

A suitably qualified and experienced Construction Manager/Supervisor and who possesses as a minimum the following qualifications:

A: Individual qualification – A2 as listed in Annexure A: Schedule of Key Personnel

- A Trade Certificate (Electrician Construction) in the electrical infrastructure environment with a minimum of 10 years' experience, AND
- Valid registration for ORHVS regulations

B: Individual experience – A2 as listed in Annexure B: Schedule of Project Experience of Key Personnel

- The Curriculum Vitae of the Electrical Construction Manager/Supervisor must be submitted with the tender submission, appended to Annexure B: Schedule of Project Experience of Key Personnel.

KEY PERSONNEL-A3: PV SOLAR INSTALLATION SPECIALIST

Where the key personnel are no longer accessible to undertake the necessary work after the award of the tender, the subcontractor shall within a period of 10 working days replace the key personnel listed in Annexure A: Schedule of Key Personnel – PV Solar Installation Specialist with a person with equivalent competencies and subject to approval by the employer. Such approval shall not be unreasonably withheld.

A suitably qualified and experienced PV Solar Installation Specialist and who possesses as a minimum the following qualifications:

A: Individual qualification – A3 as listed in Annexure A: Schedule of Key Personnel

- Registration as a 3-phase installation electrician at the Department of Employment and Labour – Any Electrical Installation, AND

B: Company Accreditation – A3 as listed in Annexure A: Schedule of Key Personnel

- Valid installer accreditation for all three **Sigenergy, Sunsynk** and **Victron** products with a minimum of 2 years PV Solar experience

C: Individual Experience/ Company Installer Accreditation – A3 as listed in Annexure D: Schedule of Project Experience of Key Personnel / Company installer accreditation

- The Curriculum Vitae of the PV Solar Installation Specialist must be submitted with the tender submission, appended to Annexure D: Schedule of Project Experience of Key Personnel / Company Installer Accreditation.

KEY PERSONNEL-A4: SHEQ OFFICER

Where the key personnel are no longer accessible to undertake the necessary work after the award of the tender, the subcontractor shall within a period of 10 working days 11 replace the key personnel listed in Annexure A: Schedule of Key Personnel – SHEQ Officer with a person with equivalent competencies and subject to approval by the employer. Such approval shall not be unreasonably withheld.

A suitably qualified and experienced SHEQ Officer and who possesses as a minimum the following qualifications:

A: Individual qualification as – A4 as listed in Annexure A: Schedule of Key Personnel

- Valid Registration Certificate with SACPCMP as a Health and Safety Officer in the built environment with a minimum of 3 years' experience

B: Individual experience as – A4 as listed in Annexure B: Schedule of Project Experience of Key Personnel

- The Curriculum Vitae of the SHEQ officer must be submitted with the tender submission, appended to Annexure D: Schedule of Project Experience of Key Personnel.

BANK RATING

In order to be eligible for award in terms of this tender, tenderers must submit a bank rating from a recognized financial institution (not older than 3 months at tender closing date) which indicates that the bidder possesses the minimum following bank code:

- Bank rating of minimum Code C: Good for amount quoted if strictly in the way of business – Unlikely to commit themselves beyond their means

CERTIFICATES CONFIRMING EDUCATIONAL QUALIFICATIONS OF KEY PERSONNEL

Tenderers are required to submit certified copies of educational qualifications of key personnel. A certified copy is considered to be valid when the certification is less than three months old on the date of closing of bids. Failure to submit certified copies of key personnel qualifications will result in the bid being deemed non-responsive

Stage 1 Functionality

Functionality of responsive bids submitted will be evaluated according to the predetermined criteria described below.

A bid will not be evaluated further if it fails to meet the minimum threshold of total 70 points out of maximum 100 points for functionality as prescribed in the following tables and a minimum of 70% per sub-section

	FUNCTIONALITY CRITERIA	**POINTS ALLOCATED**
A	Key personnel A1 3-Phase Installation Electrician	20
B	Key personnel A2 Electrical Construction Manager/Supervisor	20
C	Key personnel A3 PV Solar Installation Specialist	20
D	Key personnel A4 Site SHEQ officer	5
E	Company Experience B1 – Overhead Electrification	10
F	Company Experience B2 – PV Solar Off-Grid Installations	20
G	Bank rating (minimum C)	5
H	TOTAL	100

A Key Personnel		
Points are allocated for required competencies and qualifications of allocated personnel for the project in consideration / Required key personnel are Installation Electrician / Contracts Manager, Construction Manager/ PV Solar Installation Specialist / Site SHEQ Officer		
A1 3-Phase Installation Electrician		
Description of Criteria - Qualifications	Points	Total points
Qualifications: Registration as a 3-phase installation electrician at the Department of Employment and Labour, AND Registration for ORHVS regulations.	5	5
The tenderer has failed to address the question and has not proved qualification of the proposed electrical contractor.	0	
Description of Criteria - Experiences	Points	Total points
One (1) to Two (2) projects. 3-Phase Installation Electrician experience on overhead electrification projects with minimum electrical contract value of R4 million each or above appointed as an electrical contractor	15	15
Two (2) to Three (3) projects. 3-Phase Installation Electrician experience on overhead electrification projects with minimum value of R2.5million each or above appointed as an electrical contractor.	12	
Three (3) or more projects. 3-Phase Installation Electrician experience on overhead electrification projects with minimum value of R1.5 million each or above appointed as an electrical contractor.	10	
The tenderer has failed to address the question and has not proved experience of the proposed contract manager	0	
SUB-TOTAL A1		**20**

A2 Electrical Construction Manager / Supervisor		
Description of Criteria - Qualifications	Points	Total points
Qualifications: Trade certificate in the Electrical Infrastructure field of study, AND Registration for ORHVS regulations.	5	5
The tenderer has failed to address the question and has not proved qualification of the proposed Construction Manager/Supervisor	0	
Description of Criteria – Experiences	Points	Total points
One (1) to Two (2) projects. Electrical Construction management experience on projects with minimum value of R4 million each or above appointed as an Electrical Construction Manager / Supervisor	15	15
Two (2) to Three (3) projects. Electrical Construction management experience on projects with minimum value of R2.5 million each or above appointed as an Electrical Construction Manager / Supervisor	12	

Three (3) or more projects. Electrical Construction management experience on projects with minimum value of R1.5 million each or above appointed as an Electrical Construction Manager / Supervisor	10	
The tenderer has failed to address the question and has not proved experience of the proposed Electrical Construction Manager/ Supervisor	0	
SUB-TOTAL A2		**20**

A3 PV Solar Installation Specialist		
Description of Criteria - Qualifications	Points	Total points
Qualifications: Registration as a 3-phase installation electrician at the Department of Employment and Labour.	5	5
The tenderer has failed to address the question and has not proved qualification of the proposed electrical contractor.	0	
Description of Criteria - Experiences	Points	Total points
One (1) to Two (2) projects. PV Solar Off-Grid Installation experience on projects with minimum electrical contract value of R10 million each or above appointed as an electrical contractor	15	15
Two (2) to Three (3) projects. PV Solar Off-Grid Installation experience on projects with minimum value of R8million each or above appointed as an electrical contractor.	12	
Three (3) or more projects. PV Solar Off-Grid Installation experience on projects with minimum value of R4 million each or above appointed as an electrical contractor.	10	
The tenderer has failed to address the question and has not proved experience of the proposed contract manager	0	
SUB-TOTAL A3		**20**

A4 Site SHEQ Officer		
Description of Criteria - Qualifications	Points	Total points
Qualification: A Registration Certificate with SACPCMP	2	2
The tenderer has failed to address the question and has not proved qualification of the proposed SHEQ Officer	0	
Description of Criteria - Experience	Points	Total points
One (1) to Two (2) projects. SHEQ experience on projects with minimum value of R4 million each or above appointed as Site SHEQ Officer	3	3
Two (2) to Three (3) projects. SHEQ experience on projects with minimum value of R2.5million each or above appointed as SHEQ Officer	2	

The tenderer has failed to address the question and has not proved experience of the proposed SHEQ Officer	0	
SUB-TOTAL A4		**5**
TOTAL A		**65**

NB: Tenders are required to submit CVs with contactable references and certified qualifications of proposed key personnel. Failure to submit will result in the tenderer not being awarded points on the above criteria. All copies of qualifications must be certified not older than three months at tender closing.

B1 Experience of bidder – Overhead Electrification Projects		
Tenderers are required to demonstrate relevant past experience and competency and attach practical completion certificates or reference letters. Tenderers are required to submit full details of, and reliable contactable references for relevant overhead electrification projects which were successfully completed. Projects relevant must be of similar scope, nature and size, completed within the last ten (10) years. Tenderers are required to submit full details of, and reliable contactable references for relevant projects which were successfully completed within the contract period.		
Successful completion of similar or comparative projects in the last ten (10) years		
Description of Criteria	Points	Total points
One (1) or more similar and or comparative projects successfully executed by the tenderer within the contract period in the past 10 years for the minimum value of R 4 million each or above.	10	10
Two (2) or more similar and or comparative projects successfully executed by the tenderer within the contract period in the past 10 years for the minimum value of R 2.5 million each or above.	8	
Three (3) or more similar and or comparative projects successfully executed by the tenderer within the contract period in the past 10 years for the minimum value of R 1.5 million each or above.	7	
The Tenderer has failed to address the question and has not provided proof of completing similar electrical infrastructure projects	0	
TOTAL B1		**10**

B2 Experience of bidder – PV Solar Off Grid Installation (with ground mount PV Array) Projects	
Tenderers are required to demonstrate relevant past experience and competency and attach practical completion certificates or reference letters. Tenderers are required to submit full details of, and reliable contactable references for relevant overhead electrification projects which were successfully completed. Projects relevant must be of similar scope, nature and size, completed within the last ten (10) years. Tenderers are required to submit full details of, and reliable contactable references for relevant projects which were successfully completed within the contract period.	
Successful completion of similar or comparative projects in the last ten (10) years	

Description of Criteria	Points	Total points
One (1) or more similar and or comparative projects successfully executed by the tenderer within the contract period in the past 10 years for the minimum value of R 10 million each or above.	20	20
Two (2) or more similar and or comparative projects successfully executed by the tenderer within the contract period in the past 10 years for the minimum value of R 8 million each or above.	17	
Three (3) or more similar and or comparative projects successfully executed by the tenderer within the contract period in the past 10 years for the minimum value of R 4 million each or above.	14	
The Tenderer has failed to address the question and has not provided proof of completing similar electrical infrastructure projects	0	
TOTAL B2		**20**
TOTAL B		**30**

C Bank Rating		
Description of Criteria	Points	Total points
Tenderers are required to submit a Bank rating of minimum Code C	5	5
The Tenderer has failed to address the question and has not submitted the required bank rating.	0	
TOTAL C		**5**
GRAND TOTAL		**100**
MINIMUM THRESHOLD		**70**

The tenderer must complete the schedules listed under Annexures C, D and E, failing which the Tenderer will not score the relevant functionality points.

NOTE: The project must be listed with specific reference to the quality of work within the particular category and the value of construction work in the specific category.

PLEASE NOTE THAT THE TENDERER HAS TO ATTACH THE PRACTICAL COMPLETION CERTIFICATES OR REFERNCE LETTERS FOR THE PROJECTS THAT ARE LISTED FOR THE EVALUATION OF FUNCTIONALITY CONSTRUCTION EQUIPMENT COMMITTED TOWARDS THE PROJECT

T2.4. OTHER SCHEDULES AND AFFIDAVITS THAT WILL BE INCORPORATED INTO THE CONTRACT

T2.4.1. FORM CONCERNING FULFILMENT OF THE CONSTRUCTION REGULATIONS, 2014

1. In terms of Regulation 5(1) of the Construction Regulations, 2003 (hereafter referred to as the Regulation), promulgated on 7 February 2014 in terms of Section 43 of the Occupational Health and Safety Act, 1993 (Act No 85 of 1993) the Employer shall not appoint a contractor to perform construction work unless the Contractor can satisfy the Employer that his/her firm has the necessary competencies and resources to carry out the work safely and has allowed adequately in his/her Tender for the due fulfilment of all the applicable requirements of The Act and the Regulations.

2. I confirm that I am fully conversant with the Regulations and that my company has (of will acquire/procure) the necessary competencies and resources to timeously, safely and successfully comply with all of the requirements of the Regulations.

YES		NO	

(Please Tick√):

3. Proposed approach to achieve compliance with the Regulations (Please Tick√):

Own resources, competent in terms of the Regulations (refer to 3 below)	
Own resources, still to be hired and/or trained (until competency is achieved)	
Specialist subcontract resources (competent) – specify:	

4. Provide details of proposed key persons, competent in terms of the Regulations, who will form part of the Contract team as specified in the Regulations (**CVs to be attached**):

5. Provide details of proposed training (if any) that will be undergone:

_____

_____

_____

_____

6. Potential key risks identified and measures for addressing risks:

_____

_____

_____

_____

_____

7. I have fully included in my Tendered rates and prices (in the appropriate payment items provided in the Bill of Quantities) for all resources, actions, training and any other costs required for the due fulfilment of the Regulations for the duration of the construction and defects repair period.

YES		NO	

(Please Tick√):

SIGNATURE OF PERSON(S) AUTHORISED TO SIGN THIS BID:

1. _____ ID NO: _____

2. _____ ID NO: _____

T2.4.2. RECORD OF ADDENDA TO TENDER DOCUMENTS

We confirm that the following Communications received from the Employer's Agent before the submission of this Tender offer, amending the Tender documents, have been taken into account in this Tender offer:

	DATE	TITLE OR DETAILS
1		
2		
3		
4		
5		
6		
7		
8		
9		
10		

Attach additional pages if more space is required.

SIGNED ON BEHALF OF TENDERER:

_____ _____

SIGNED **DATE**

_____ _____

NAME **POSITION**

T2.4.3. MBD 6.1: PREFERENTIAL PROCUREMENT DOCUMENT IN TERMS OF PREFERENTIAL PROCUREMENT REGULATIONS, 2022 (PREFERENTIAL PROCUREMENT POLICY FRAMEWORK ACT, ACT NO 5 OF 2000)

MBD 6.1

PREFERENCE POINTS CLAIM FORM IN TERMS OF THE PREFERENTIAL PROCUREMENT REGULATIONS 2022

This preference form must form part of all tenders invited. It contains general information and serves as a claim form for preference points for specific goals.

NB: BEFORE COMPLETING THIS FORM, TENDERERS MUST STUDY THE GENERAL CONDITIONS, DEFINITIONS AND DIRECTIVES APPLICABLE IN RESPECT OF THE TENDER AND PREFERENTIAL PROCUREMENT REGULATIONS, 2022

1. GENERAL CONDITIONS

1.1 The following preference point systems are applicable to invitations to tender:

- the 80/20 system for requirements with a Rand value from R2000 up to R50 000 000 (all applicable taxes included); and
- the 90/10 system for requirements with a Rand value above R50 000 000 (all applicable taxes included).

1.2 **To be completed by the organ of state**

(*delete whichever is not applicable for this tender*).

a) The applicable preference point system for this tender is the 90/10 preference point system.

b) The applicable preference point system for this tender is the 80/20 preference point system.

c) Either the 90/10 or 80/20 preference point system will be applicable in this tender. The lowest/ highest acceptable tender will be used to determine the accurate system once tenders are received.

1.3 Points for this tender (even in the case of a tender for income-generating contracts) shall be awarded for:

(a) Price; and

(b) Specific Goals.

1.4 **To be completed by the organ of state:**

The maximum points for this tender are allocated as follows:

	POINTS
PRICE	**80**
SPECIFIC GOALS	**20**
Total points for Price and SPECIFIC GOALS	**100**

1.5 Failure on the part of a tenderer to submit proof or documentation required in terms of this tender to claim points for specific goals with the tender, will be interpreted to mean that preference points for specific goals are not claimed.

1.6 The organ of state reserves the right to require of a tenderer, either before a tender is adjudicated or at any time subsequently, to substantiate any claim in regard to preferences, in any manner required by the organ of state.

2. DEFINITIONS

(a) **"tender"** means a written offer in the form determined by an organ of state in response to an invitation to provide goods or services through price quotations, competitive tendering process or any other method envisaged in legislation;

(b) **"price"** means an amount of money tendered for goods or services, and includes all applicable taxes less all unconditional discounts;

(c) **"rand value"** means the total estimated value of a contract in Rand, calculated at the time of bid invitation, and includes all applicable taxes;

(d) **"tender for income-generating contracts"** means a written offer in the form determined by an organ of state in response to an invitation for the origination of income-generating contracts through any method envisaged in legislation that will result in a legal agreement between the organ of state and a third party that produces revenue for the organ of state, and includes, but is not limited to, leasing and disposal of assets and concession contracts, excluding direct sales and disposal of assets through public auctions; and

(e) **"the Act"** means the Preferential Procurement Policy Framework Act, 2000 (Act No. 5 of 2000).

3. FORMULAE FOR PROCUREMENT OF GOODS AND SERVICES

3.1 POINTS AWARDED FOR PRICE

3.1.1 THE 80/20 OR 90/10 PREFERENCE POINT SYSTEMS

A maximum of 80 or 90 points is allocated for price on the following basis:

80/20 **or** **90/10**

$Ps = 80\left(1 - \frac{Pt - P\,min}{P\,mi}\right)$ or $Ps = 90\left(1 - \frac{Pt - P\,m}{P\,min}\right)$

Where

Ps = Points scored for price of tender under consideration

Pt = Price of tender under consideration

Pmin = Price of lowest acceptable tender

Where

Ps = Points scored for price of tender under consideration

Pt = Price of tender under consideration

Pmin = Price of lowest acceptable tender

3.2 FORMULAE FOR DISPOSAL OR LEASING OF STATE ASSETS AND INCOME GENERATING PROCUREMENT

3.2.1 POINTS AWARDED FOR PRICE

A maximum of 80 or 90 points is allocated for price on the following basis:

80/20 **or** **90/10**

$$Ps = 80\left(1 + \frac{Pt - P\,ma}{P\,max}\right) \quad \text{or} \quad Ps = 90\left(1 + \frac{Pt - P\,m}{Pmax}\right)$$

Where

Ps = Points scored for price of tender under consideration

Pt = Price of tender under consideration

Pmax = Price of highest acceptable tender

4. POINTS AWARDED FOR SPECIFIC GOALS

4.1 In terms of Regulation 4(2); 5(2); 6(2) and 7(2) of the Preferential Procurement Regulations, preference points must be awarded for specific goals stated in the tender. For the purposes of this tender the tenderer will be allocated points based on the goals stated in table 1 below as may be supported by proof/ documentation stated in the conditions of this tender:

4.2 In cases where organs of state intend to use Regulation 3(2) of the Regulations, which states that, if it is unclear whether the 80/20 or 90/10 preference point system applies, an organ of state must, in the tender documents, stipulate in the case of—

(a) an invitation for tender for income-generating contracts, that either the 80/20 or 90/10 preference point system will apply and that the highest acceptable tender will be used to determine the applicable preference point system; or

(b) any other invitation for tender, that either the 80/20 or 90/10 preference point system will apply and that the lowest acceptable tender will be used to determine the applicable preference point system,

then the organ of state must indicate the points allocated for specific goals for both the 90/10 and 80/20 preference point system.

Table 1: Specific goals for the tender and points claimed are indicated per the table below.

(Note to organs of state: Where either the 90/10 or 80/20 preference point system is applicable, corresponding points must also be indicated as such.

***Note to tenderers: The tenderer must indicate how they claim points for each preference point system.*)**

Specific Goal 1: Locality

Local area of supplier	**Number of Points for Preference**	
	80/20	**90/10**
Within the boundaries of the Khai-Ma Local Municipality	10	5
Within the boundaries of Namakwa District Municipality	6	3
Within the boundaries of the Northern Cape	4	2
Outside of the boundaries of the Northern Cape	0	0

Proof of Evidence to submit to claim preference points:

- Where the tenderer is the owner of the property or the business: A Municipal account registered in the name of the tenderer not older than 3 months must be submitted.

- Where the tenderer is not the owner of the property of the business, a valid lease Agreement signed by both parties must be submitted.
- Where the tenderer does not comply to bullet 1 or 2, A Sworn Affidavit must be submitted, stating reason to why not having a Municipal account.
- Please note a tenderer who fail to submit these documents will not claim points for locality.

Specific Goal 2: HDI- Unfairly discriminated by race

HDI –Unfairly discriminated by race	Achievement level	Total number of points that may be claimed [80/20] Tenderer should marked in the ap-propriate column	Total number of number that may be [90/10] Tenderer should marked in appropriate column
	100% Black Owned	10	5
	75%-99% Owned	8	4
	60%-74% Owned	6	3
	51%-59% Owned	3	2
	0%-50% Owned	0	0

- A sworn affidavit by the person or person acting on behalf of an enterprise indicating the level of ownership in the enterprise by persons historically disadvantaged by unfair discrimination on the basis of race; or
- Ownership Certificate issued by the Companies and Intellectual Property Commission (CIPC) / Sworn Affidavit or B-BBEE

DECLARATION WITH REGARD TO COMPANY/FIRM

4.3 Name of company/firm ……..

……..

……..

4.4 Company registration number: ……..

4.5 TYPE OF COMPANY/ FIRM

- ☐ Partnership/Joint Venture / Consortium
- ☐ One-person business/sole propriety
- ☐ Close corporation
- ☐ Public Company
- ☐ Personal Liability Company
- ☐ (Pty) Limited
- ☐ Non-Profit Company
- ☐ State Owned Company

[TICK APPLICABLE BOX]

4.6 I, the undersigned, who is duly authorised to do so on behalf of the company/firm, certify that the points claimed, based on the specific goals as advised in the tender, qualifies the company/ firm for the preference(s) shown and I acknowledge that:

i) The information furnished is true and correct;

ii) The preference points claimed are in accordance with the General Conditions as indicated in paragraph 1 of this form;

iii) In the event of a contract being awarded as a result of points claimed as shown in paragraphs 1.4 and 4.2, the contractor may be required to furnish documentary proof to the satisfaction of the organ of state that the claims are correct;

iv) If the specific goals have been claimed or obtained on a fraudulent basis or any of the conditions of contract have not been fulfilled, the organ of state may, in addition to any other remedy it may have –

(a) disqualify the person from the tendering process;

(b) recover costs, losses or damages it has incurred or suffered as a result of that person's conduct;

(c) cancel the contract and claim any damages which it has suffered as a result of having to make less favourable arrangements due to such cancellation;

(d) recommend that the tenderer or contractor, its shareholders and directors, or only the shareholders and directors who acted on a fraudulent basis, be restricted from obtaining business from any organ of state for a period not exceeding 10 years, after the *audi alteram partem* (hear the other side) rule has been applied; and

(e) forward the matter for criminal prosecution, if deemed necessary.

.....

SIGNATURE(S) OF TENDERER(S)

SURNAME AND NAME: .....

DATE: .....

ADDRESS: .....

.....

.....

T2.4.4. COMPLIANCE WITH OHSA (ACT 85 OF 1993)

Tenderers are required to satisfy the Employer and the Engineer as to their ability and available resources to comply with the above by answering the following questions and providing the relevant information required below.

1.	Is the Tenderer familiar with the OHSA (ACT 85 of 1993) and its Regulations?	**YES / NO**
2.	Who will prepare the Tenderer's Health and Safety Plan? (Provide a copy of the person/s curriculum vitae/s or company profile attached under *Annexure I:* Company Profile, Organogram and CVs)	_____
3.	Does the Tenderer have a health and safety policy? (if yes, provide a copy). How is this policy communicated to all employees?	**YES / NO**
4.	Does the Tenderer keep records of safety aspects of each construction site? If yes, what records are kept?	**YES / NO**
5.	Does the Tenderer conduct monthly safety meetings? If yes, who is the chairperson of the meeting, and who attend these meetings?	**YES / NO**
6.	Does the Tenderer have a safety officer in his employment, responsible for the overall safety of his company? If yes, please explain his duties and provide a copy of his CV attached under *Annexure I:* Company Profile, Organogram and CVs).	**YES / NO**
7.	Does the Contractor have trained first aid employees? If yes, indicate, who.	**YES / NO**
8.	Does the Tenderer have a safety induction-training programme in place? (If yes, provide a copy under *Annexure I:* Company Profile, Organogram and CVs).	**YES / NO**

Authorized Signatory: _____

PART C: THE CONTRACT

SECTION 3

C1. AGREEMENT AND CONTRACT DATA

C1.1. FORM OF OFFER AND ACCEPTANCE

SHORT DESCRIPTION OF WORKS: **COMPLETION OF OUTSTANDING WORKS FOR THE MICROGRID PROJECT IN POFADDER**

The Employer, identified in the acceptance signature block, has solicited offers to enter into a contract for the procurement of:

_____

_____

The Tenderer, identified in the offer signature block, has examined the documents listed in the Tender Data and addenda thereto as listed in the Tender schedules and by submitting this offer has accepted the conditions of Tender.

By the representative of the Tenderer, deemed to be duly authorized, signing this part of this form of offer and acceptance, the Tenderer offers to perform all of the obligations and liabilities of the Contractor under the contract including compliance with all its terms and conditions according to their true intent and meaning for an amount to be determined in accordance with the conditions of contract identified in the Contract Data.

THE OFFERED TOTAL OF THE PRICES INCLUSIVE OF VALUE ADDED TAX IS

_____Rand (In words)

R _____in figures (or other suitable wording).

This offer may be accepted by the Employer by signing the acceptance part of this form of offer and acceptance and returning one copy of this document to the Tenderer before the end of the period of validity stated in the Tender date, whereupon the Tenderer becomes the party named as the Contractor in the conditions of contract identified in the Contract Data.

Signature(s) _____ _____

Name(s) _____ _____

Capacity _____ _____

for the Tenderer

_____

(Name and address of organization)

_____

(Name and signature of witness)

Date _____

TENDERER: **CLIENT**

Initial: Authorized Signatory/ies: 1 _____ Initial: Khâi-Ma Local Municipality _____

2 _____ Witness: _____

C1.1.1. ACCEPTANCE

By signing this part of this form of offer and acceptance, the Employer identified below accepts the Tenderer's offer. In consideration thereof, the Employer shall pay the Contractor the amount due in accordance with the conditions of contract identified in the Contract Data. Acceptance of the Tenderer's offer shall form an agreement between the Employer and the Tenderer upon the terms and conditions contained in this agreement and in the contract that is the subject of this agreement.

The terms of the contract are contained in:

C1 AGREEMENT AND CONTRACT DATA

C2 HEALTH AND SAFETY ACT, 1993 (*ACT NO 85 OF 1993*)

C4 CONDITIONS OF CONTRACT

C5 SPECIFICATIONS

and drawings and documents or part thereof, which may be incorporated by reference into the above.

Deviations from and amendments to the documents listed in the Tender Data and any addenda thereto as listed in the Tender schedules as well as any changes to the terms of the offer agreed by the Tenderer and the Employer during this process of offer and acceptance, are contained in the schedule of deviations attached to and forming part of this agreement. No amendments to or deviations from said documents are valid unless contained in this schedule, which must be signed by the authorised representative(s) of both parties.

The Tenderer shall within two weeks after receiving a completed copy of this agreement, including the schedule of deviations (if any), contact the Employer\s agent (whose details are given in the Contract Data) to arrange the delivery of any bonds, guarantees, proof of insurance any other documentation to be provided in terms of the conditions of contract identified in the Contract Data at, or just after the date this agreement comes into effect. Failure to fulfil any of these obligations in accordance with those terms shall constitute a repudiation of this agreement.

Notwithstanding anything contained herein, this agreement comes into effect on the date when the Tender received one fully completed original copy of this document, including the schedule of deviations (if any). Unless the Tenderer (now Contractor) within 5 (five) days of the date of such receipt notifies the Employer in writing of any reason why he cannot accept the contents of this agreement, this agreement shall constitute a binding contract between the parties.

Signature(s) _____ _____

Name(s) _____ _____

Capacity _____ _____

for the Employer

_____

(Name and address of organization)

_____

(Name and signature of witness)

Date _____

C1.1.2. SCHEDULE OF DEVIATIONS

Notes:

1. The extent of deviations from the Tender documents issued by the Employer before the Tender closing date is limited to those permitted in terms of the conditions of Tender.

2. A Tenderer's covering letter shall not be included in the final contract document. Should any matter in such letter, which constitutes a deviation as aforesaid, become the subject of agreements reached during the process of offer and acceptance, the outcome of such agreement shall be recorded here.

3. Any other matter arising from the process of offer and acceptance either as a confirmation, clarification or change to the Tender documents and which it is agreed by the Parties becomes an obligation of the contract shall also be recorded here.

4. Any change or addition to the Tender documents arising from the above agreements and recorded here shall also be incorporated into the final draft of the contract.

Subject _____

Details _____

Subject _____

Details _____

Subject _____

Details _____

Subject _____

Details _____

By the duly authorised representatives signing this schedule of deviations, the Employer and the Tenderer agree to and accept the foregoing schedule of deviations as the **only** deviations from and amendments to the documents listed in the Tender Data and addenda thereto as listed in the Tender schedules, as well as any confirmation, clarification or change to the terms of the offer agreed by the Tenderer and the Employer during this process of offer and acceptance.

It is expressly agreed that no other matter whether in writing, oral communication or implied during the period between the issue of the Tender documents and the receipt by the Tenderer of a completed signed copy of the agreement shall have any meaning or effect in the contract between the parties arising from this agreement.

For the Tenderer:

Signature(s) _____ _____

Name(s) _____ _____

Capacity _____ _____

_____
(Name and address of organization)

_____
Name and signature of witness

Date _____

For the Employer:

Signature(s) _____ _____

Name(s) _____ _____

Capacity _____ _____

_____
(Name and address of organization)

_____
Name and signature of witness

Date _____

C1.2. CONTRACT DATA

	CLAUSE	(GCC 2015, 3rd Edition)
Special Conditions*		See PART C: THE CONTRACT, C4, C4.1
Name of the Contractor	1.1.1.9	
Name of Employer	1.1.1.15	**Khâi-Ma Local Municipality**
Name of Employers Agent	1.1.1.16	MVD KalahariConsulting Engineering & Town Planning
The Pricing Strategy is	1.1.1.26	Re-measurement Contract
Address of the Client	1.2.1.2	21 Nuwe Street POFADDER 8890 Tel. No. (054) 7933 0040
Address of the Engineer	1.2.1.2	P.O. Box 580 Kimberley 8300 Tel. No. (053) 831-1889
Address of the Contractor	1.2.1.2	
		Contact
		Tel. No.
Subcontracting		
Commencement of the Contract	5.2.1	The starting date is 14 (Fourteen) days after the date of issuance (exclusive) of the award letter.
The documentation required before commencement of Works execution is:	5.3.1 5.6.1	Health and Safety Plan (Refer to Clause 4.3) Initial Programme of Works (Refer to Clause 5.6) *Within 14 Days of Commencement Date* Insurance (Refer to Clause 8.6) *Within 14 Days of Commencement Date* Letter from Contractor whether he accepts the appointment. Signing of the Contract Documents

	CLAUSE	(GCC 2015, 3rd Edition)
The time to submit the documentation required before commencement of Works execution is:	5.3.2	7 days for Acceptance Letter 14 days for security and insurance documents 21 days for Signing of the Tender document
Time for completion		16 Weeks
Special non-working days	5.8.1	Sundays and all public holiday as well as year-end breaks
The Penalty for failing to complete the Works is	5.13.1	The amount due to the Client by the Contractor for damages incurred because of delays as defined in Clause 5.13 of the GCC 2015, amounts to the contract value x (5.75 c per R 100.00 per calendar day).
The latent defects period is:	5.16.3	10 years for Civil Works 5 years for Building Works 3 years for Electrical and Mechanical Works
Amount of Security	6.2.1	10 (Ten) % of the Contract Value
Time within which Security to be Provided	6.2.2	14 (Fourteen) days from the contract appointment date
Duration of Security*	6.2.3	Until issue of Practical Completion Certificate/Final Certificate
Minimum amount of monthly certificates	6.10.1	10 (Ten) % of contract value
The Percentage advanced on materials not yet build into the Permanent Works is	6.10.1.5	80 (Eighty) %
Percentage advanced on material brought onto site (MOS)	6.10.2	80 (Eighty) %
Limit of retention money	6.10.3	10 (Ten) % of contract value
Defects Liability Period	6.10.5	The defects date is 12 (Twelve) Months after Completion of the whole of the works
Rendering of Contractor's final Payment Certificate	6.10.9	Within 14 (fourteen) days after the date of final approval
Minimum amount of Third Party Insurance	8.6	Contract value
Special Risk Insurance (Political riot insurance) *	8.6.1	Required/~~Not required~~
If required, to be arranged by*	8.6.1	Contractor/~~Client~~
Amount of Special Risk Insurance	8.6.1	Contract Value
Minimum amount of Liability Insurance	8.6.1	R 1,000,000.00 (One Million Rand)

	CLAUSE	(GCC 2015, 3rd Edition)
The amount to cover professional fees for repairing damages and loss to be included in the insurance sum	8.6.1.1.3	1 (One) % of the Contract Value
The limit of indemnity Liability for Insurance	8.6.1.3	R 5,000,000.00 per claim, claims unlimited during construction and defects liability period
The number of Adjudication Board Members to be appointed is	10.5.3	3 (three)
Settlement of disputes to be referred to*	10.7.1	Arbitration Law 1965 (Law No 42/1965) as amended
Period of validity of Tender		90 (Ninety) days after tender closing date.

* Delete whichever is inapplicable
** Information to be provided by the Tenderer

Signature _____

on behalf of _____

Address _____

_____

_____

Date: _____

C1.3. FORM OF GUARANTEE

EMPLOYER : **KHÂI-MA LOCAL MUNICIPALITY**

CONTRACTOR : _____

DESCRIPTION OF CONTRACT: **COMPLETION OF OUTSTANDING WORKS FOR THE MICROGRID PROJECT IN POFADDER**

I/We, the undersigned, _____ (Bank or Insurance Co.) do hereby bind ourselves as surety and co-principal debtors in solidum for the due performance of the Contract by the above named Contractor and for all losses, damages and expenses that may be suffered or incurred by the Employer as a result of non-performance of the Contract by the Contractor, renouncing all benefits from the legal exceptions ordinis seu excussionis et divisionis de duobus vel pluribus reis debendi "No value received" and all other exceptions which might or could be pleaded against the validity of this guarantee, with the meaning and effect of which exceptions we declare ourselves to be fully acquainted; provided that the liability of the undersigned under this guarantee is limited to (specify amount of bond) (R_____) and will lapse thirty days after issuing of the Completion Certificate in terms of the Contract, unless the Surety is advised in writing by the Employer before issue of the said Certificate of his intention to institute claims and the particulars thereof, in which event this guarantee shall remain in force until all such claims are paid or settled.

FOR AND ON BEHALF OF

_____

(Surety)

AT _____ ON THIS _____ DAY OF _____ 20____.

CAPACITY _____

Full Address _____

_____

AS WITNESSES: 1. _____

2. _____

C1.4. AGREEMENT

THIS AGREEMENT made between **Khâi-Ma Local Municipality, 21 Nuwe Street, POFADDER, 8890** (hereinafter called "the Employer") of the one part and

_____

of

_____

(hereinafter called "The Contractor") of the other part.

WHEREAS the Employer is desirous that certain Works should be constructed,

viz **COMPLETION OF OUTSTANDING WORKS FOR THE MICROGRID PROJECT IN POFADDER**

and has accepted a Tender for the supply, installation, testing, commissioning and maintenance of such Works for the duration of the Contract.

NOW THIS AGREEMENT WITNESSES as follows:

1. In the Agreement words and expressions shall have the same meanings as are respectively assigned to them in the General Conditions of Contract hereinafter referred to.

2. The following documents shall be deemed to form and be read and constructed as part of this Agreement, viz:

    2.1. The said Tender

    2.2. The General and Special Conditions of Contract

    2.3. The Specification and Health & Safety Specification

    2.4. The priced Bill of Quantities

    2.5. The Schedule of Rates and Prices

    2.6. The Drawings and Scope of Works

    2.7. The Letter of Acceptance

    2.8. Other (Stipulate)

3. In consideration of the payments to be made by the **Employer** to the **Contractor** as hereinafter mentioned the Contractor covenants with the Employer to supply, install, test and commission and maintain the Works in conformity in all respects with the provisions of the Contract.

4. The **Employer** hereby covenants to pay the **Contractor** in consideration of the supply, installation, testing, commissioning and maintenance of the Works the Contract Price at the times and in the manner prescribed by the Contract.

IN WITNESS whereof the parties hereto have set their hands and seals (if any) in the presence of the subscribing witnesses:

TENDERER:			**CLIENT**		
Initial: Authorized Signatory/ies:	1	_____	Initial:	Khâi-Ma Local Municipality	_____
	2	_____		Witness:	_____

AT _____ for and on behalf of the EMPLOYER

on this _____ day of _____ 20____.

WITNESSES

_____ 1. _____
SIGNATURE OF EMPLOYER

_____ 2. _____
CAPACITY

AT_____ for and on behalf of the CONTRACTOR

on this _____ day of _____ 20____.

WITNESSES

_____ 1. _____
SIGNATURE OF CONTRACTOR

_____ 2. _____
CAPACITY

C1.5. AGREEMENT IN TERMS OF THE OCCUPATIONAL HEALTH AND SAFETY ACT, 1993 (ACT NO 85 OF 1993)

THIS AGREEMENT made at _____

on this the _____ day of _____ in the year _____ between **Khâi-Ma Local Municipality, 21 Nuwe Street, POFADDER, 8890** (hereinafter called "the Employer")

the one part, herein represented by

_____

in his capacity as _____

and

_____

(hereinafter called "the Mandatory") of the other part, herein represented by

_____

in his capacity as _____

WHEREAS the Employer is desirous that certain works be constructed, viz **COMPLETION OF OUTSTANDING WORKS FOR THE MICROGRID PROJECT IN POFADDER**

And has accepted a Tender by the Mandatory for the **construction**, **completion,** and **maintenance** of such Works and whereas the Employer and the Mandatory have agreed to certain arrangements and procedures to be followed in order to ensure compliance by the Mandatory with the provisions of the *Occupational Health and Safety Act, 1993 (Act 85 of 1993)*.

NOW THEREFORE THIS AGREEMENT WITNESSES AS FOLLOWS:

1. The Mandatory shall execute the work in accordance with the Contract Documentation pertaining to this Contract.

2. This agreement shall hold good from its Commencement Date, which shall be the date of written notice from the Employer or Engineer requiring him to commence the execution of the Works, to either:

    a. the date of the Final Approval Certificate issued in terms of *Clause 5.16.1* of the *General Conditions of Contract 2015* (hereafter referred to as "the *GCC 2015*"),

    b. the date of termination of the Contract in terms of *Clause 9.1, 9.2 or 9.3* of the *GCC 2015*.

3. The Mandatory declares himself to be conversant with the following:

    a. All the requirements and standards of the *Occupational Health and Safety Act (Act 85 of 1993)*, hereinafter referred to as "*The Act*", together with its amendments and with special reference to the following Sections of *The Act*:

        i. *Section 8 :* General duties of employers to their employees
        ii. *Section 9 :* General duties of employers and self-employed persons other than employees
        iii. *Section 37:* Acts or omissions by employees or mandatories,
        iv. *Sub-Section 37(2)* relating to the purpose and meaning of this Agreement

b. The procedures and safety rules of the Employer as pertaining to the Mandatory and to all his Contractor.

4. In addition to the requirements of *Clause 8.4* of the *GCC 2015* and all relevant requirements of the abovementioned *Volume 3*, the Mandatory agrees to execute all the Works forming part of this Contract and to operate and utilise all machinery, plant and equipment in accordance with *The Act*.

5. The Mandatory is responsible for the compliance with *The Act* by all his Contractor, whether or not selected and/or approved by the Employer.

6. ***The Mandatory warrants that all his and his Contractor' workmen are covered in terms of the Compensation for Occupational Injuries and Disease Act, 1993 which cover shall remain in force whilst any such workmen are present on site. A letter of good standing from the Compensation Commissioner to this effect must be produced to the Employer upon signature of agreement.***

7. The Mandatory undertakes to ensure that he and/or Contractor and/or their respective employers will at all times comply with the following conditions:

   The Mandatory shall assume the responsibility in terms of *Section 16.1* of the *Occupational and Safety Act*. The Mandatory shall not delegate any duty in terms of *Section 16.2* of this *Act* without the prior written approval of the Employer. If the Mandatory obtains such approval and delegates any duty in terms of *Section 16.2* a copy of such written delegation shall immediately be forwarded to the Engineer.

   All incidents referred to in the *Occupational Health and Safety Act* shall be reported by the Mandatory to the Department of Labour as well as to the Employer. The Employer will further be provided with copies of all written documentation relating to any incident.

   The Employer hereby obtains an interest in the issue of any formal inquiry conducted in terms of *Section 32* of the *Occupational Health and Safety Act* into any involving the Mandatory and/or his employees and/or his Contractor.

8. ***The contact details of the Occupational Health and Safety Agent for*** Khâi-Ma Local Municipality ***are to be issued at a later stage.*** In witness thereof, the parties hereto have set their signatures hereon in the presence of the subscribing witnesses:

WITNESSES

_____ 1. _____
MANDATORY

_____ 2. _____
DATE

WITNESSES

_____ 1. _____
EMPLOYER

_____ 2. _____
DATE

C1.6. PRACTICAL COMPLETION CERTIFICATE

TO: _____

(Name of Contractor)

SHORT DESCRIPTION OF CONTRACT WORK: **COMPLETION OF OUTSTANDING WORKS FOR THE MICROGRID PROJECT IN POFADDER**

In accordance with *Clause 5.14.1* of the *General Conditions of Contract for Construction Work (GCC 2015)*, we hereby certify that the Contract Works described above, has been inspected by us and that it has been completed in accordance with the contract for all practical purposes and that, where applicable, has passed all final tests, excluding the outstanding items as listed below and any defects that have not been found.

This certificate is being issued subject to the conditions that the Contractor undertakes to do acceptable remedial work in connection with the outstanding Items before _____.

The Defect Liability Period, in accordance with *Clause 5.14.5.2,* shall commence on

_____ and if the repair work has not been done before the set date, it will be lengthened accordingly.

Outstanding Items

The Contractor undertook to do and complete the following work before the date as given above for the completion of the remedial work as said:

_____

_____

_____

_____ _____

DATE: SIGNATURE OF CLIENT

_____ _____

DATE: SIGNATURE OF ENGINEER

_____ _____

DATE: SIGNATURE OF CONTRACTOR

C1.7. FINAL APPROVAL CERTIFICATE

TO: _____

(Name of Contractor)

SHORT DESCRIPTION OF CONTRACT WORK: **COMPLETION OF OUTSTANDING WORKS FOR THE MICROGRID PROJECT IN POFADDER**

In accordance with *Clause 5.16.1* of the *General Conditions of Contract for Construction Work (GCC 2015)*, we hereby certify that all the Contract Works have been completed according to stipulations of the Contract and to our satisfaction and, where specified, been maintained and the Contractor certifies that he has no further claims against the Employer.

DATE: _____ _____

SIGNATURE OF CLIENT

DATE: _____ _____

SIGNATURE OF ENGINEER

DATE: _____ _____

SIGNATURE OF CONTRACTOR

C2. HEALTH AND SAFETY ACT, 1993 (*ACT NO 85 OF 1993*)

HEALTH AND SAFETY SPECIFICATION

This Specification shall be used in conjunction with all other applicable safety specifications, legislation and *Regulations* in force at the time of the contract. Where unique site specifications are in force, those site specifications shall take precedence over this Specification.

NOTE: The Contractor will not be allowed to start with any construction or related work before submission and approval of a Health and Safety Plan.

C2.1. CONTENTS

C2.1.1. SCOPE OF SPECIFICATION

This specification covers the principles, duties, responsibilities, liabilities, and requirements applicable in respect of health and safety in the workplace on construction work.

This document constitutes the Health and Safety Specification as defined in the Construction Regulations, 2014 of the Occupational Health and Safety Act (Act 85 of 1993).

C2.1.2. PURPOSE OF SPECIFICATION

The purpose of this Health and Safety Specification is to:

- provide the framework within which the Principal Contractor is required to demonstrate compliance with certain requirements of occupational health and safety established by the Occupational Health and Safety Act of 1993 and its Regulations during construction.

Note - This specification establishes requirements to enable the client and the Principal Contractor to satisfy aspects of the Occupational Health and Safety Act, 1993 (Act No. 85 of 1993) and the Construction Regulations, 2014. The Principal Contractor is required to develop, implement and maintain specific health and safety plan and health and safety file. Accordingly, this specification on its own cannot ensure compliance with the requirements of the aforementioned Act.

It must also be noted that the Client / Agent on its behalf may stop any contractor from executing construction work, which is not in accordance with the client's health and safety specifications or rules for the project or which poses a threat to the health and safety of any person.

C2.1.3. DESCRIPTION OF WORK / PROJECT

The Microgrid works to be undertaken is as follows:

- Design, manufacture, supply, deliver, off-load, safe storage, install, commission and 12-month monitoring of a 33.3kWp PV Solar Off-Grid installation consisting of a containerised Inverter and BESS system with mechanical air-conditioning, fire detection/protection and small power and lighting, including a ground mount fixed -angle PV Solar Array structure.
- Design, manufacture, supply, deliver, off-load, safe storage, install and commissioning of an overhead low voltage distribution system consisting of ABC conductor on timber poles in the street front with overhead service connections consisting of split concentric airdac and split pre-payment PLC meters, including a TN-C-S earthing system.
- Training of Municipal staff with respect to the operation and maintenance of the PV Solar Off-grid system.
- 12 Month Monitoring of the PV Solar off-grid system including a monthly report based on data.
- 12 Month maintenance of the PV Solar off-grid system.
- Compliance with Health and Safety based on latest construction health and safety requirements.

C2.1.4. DESCRIPTION OF CONSTRUCTION SITE

The Principal Contractor must take cognizance that the construction will be conducted on an active community, traffic and access roads sites, so detailed planning and risk assessments must be conducted to always accommodate and protect the public.

The principal contractor must ensure that the construction site is suitably and sufficiently fenced off between the active site and the construction works/activities site.

C2.1.5. SUPPORTING SPECIFICATION

This document is to be read and understood in conjunction with the following, inter alia:

a) Occupational Health and Safety Act, 1993, and its regulations which shall include, but shall not be limited to the following:

- Construction Regulations, 2014,
- General Safety Regulations,
- General Administrative Regulations, 1996,
- Driven Machinery Regulations, 1988,
- Electrical Installation Regulations, 1992,
- Electrical Machinery Regulations, 1988,
- Environmental Regulations for Workplaces, 1987, and
- Facilities Regulations, 1990.

b) SANS codes and standards referred to by the Occupational Health and Safety Act

c) Compensation for Occupational Injuries and Disease Act, 1997.

C2.1.6. APPLICATION

This specification contains clauses that are applicable to the occupational health and safety requirements of the Occupational Health and Safety Act, 1993 and its Regulations, in particular the Construction Regulations, 2014 promulgated on 07 February 2014 in terms of Section 43 of the Act.

C2.1.7. IMPLEMENTATION

This Health and Safety Specification forms an integral part of the Contract, and Principal Contractor shall make it an integral part of their Contracts with Sub Contractors and Suppliers. Principal Contractor employed by the Client to ensure that the provisions of the Health and Safety Specification are applied both on the site and in respect of all off site activities relating to the project, in particular the transport activities and project dedicated off site fabrication works.

The Principal Contractor shall enforce the provision of the Health and Safety Specification amongst all subcontractors and supplies for the project.

C2.2. INTERPRETATION

- The Act and its associated regulations shall have precedence in the interpretation of any ambiguity or inconsistency between it and this specification.
- Compliance with the requirements of this specification does not necessarily result in compliance with the provisions of the Act.

C2.3. REQUIREMENTS IN TERMS OF OHS ACT AND REGULATIONS

C2.3.1. CONSTRUCTION WORK PERMIT

Application of permit not required by the Client for this project due to the value of the work.

C2.3.2. NOTIFICATION OF INTENTION TO COMMENCE CONSTRUCTION WORK

The contractor shall notify the Provincial Director of the Department of Employment & Labour in writing using a form similar to that contained in Annexure 2 of the Construction Regulations issued in terms of the Act before construction work commences and retain proof of such notification in the health and safety file where the work includes:

C2.3.3. GOOD STANDING WITH THE COMPENSATION FUND OR LICENSED COMPENSATION INSURER

Good standing with the compensation fund or a licensed compensation insurer The contractor shall before commencing with any works on the site provide the employer's health and safety representative with proof of good standing with the compensation fund or with a licensed compensation insurer.

C2.3.4. HEALTH AND SAFETY PLAN

The contractor shall prepare and ***submit site specific health and safety plan*** for acceptance to the employer's health and safety agent and an emergency procedure which include but are not limited to spills, accidents to employees, exposure to hazardous substances.

C2.3.5. HEALTH AND SAFETY FILE

The contractor shall establish and maintain on site a health and safety file which contains all relevant copies. The health and safety file shall be made available for inspection by any inspector, the contract manager, the employer's health and safety agent or employee of the contractor upon the request of such persons. The health and safety file shall be updated to ensure that its contents always reflect the latest available information. The contractor shall hand over a copy of the health and safety file to the employer's health and safety agent upon completion of the contract.

C2.3.6. MANAGEMENT AND SUPERVISION OF CONSTRUCTION WORK

The Principal Contractor must, in writing, appoint:

C2.3.7. CONSTRUCTION MANAGER – CR 8(1)

The Principal Contractor shall appoint a full-time competent person as the construction manager to manage all the construction work on site, including the duty of ensuring occupational health and safety compliance.

C2.3.8. ASSISTANT CONSTRUCTION MANAGER – CR 8(2)

The Principal Contractor shall upon considering the size of the project, in writing appoint one or more assistant construction managers for different sections thereof.

C2.3.9. CONSTRUCTION HEALTH AND SAFETY OFFICER – CR 8(5)

A part time safety officer registered with SACPCMP shall be appointed for implementation of the health and safety plan.

C2.3.10. CONSTRUCTION SUPERVISORS – CR 8(7)

The construction manager shall in writing appoint construction supervisors responsible for construction activities and ensuring occupational health and safety compliance on the construction site.

C2.3.11. RISK ASSESSOR – CR 9(1)

A competent risk assessor shall be appointed in writing to perform risk assessments before any work is commenced.

C2.3.12. INCIDENT INVESTIGATOR – GAR 9(2)

A competent incident investigator shall be appointed in writing to appoint all incidents which must be recorded in terms of the General Administrative Regulations 9.

C2.3.13. FIRST AIDER – GSR 3(4)

Where there are more than 10 employees employed the employer shall appoint a first aider in possession of a valid first aid certificate for every group up to 50 employees.

C2.3.14. SHE REP – OHSA 17(1)

Every employer who has 20 employees or more in his employment shall appoint a SHE representative for every 50 employees.

The competency of each of these appointed competent persons must be provided and should include knowledge, training, experience & qualifications specific to the appointment.
No work involving any of the listed appointments may be performed without the knowledge and approval of an appointed competent person

C2.3.15. COMPETENCY FOR CONTRACTOR'S RESPONSIBLE PERSONS

The Principal Contractor's responsible persons shall be competent in health and safety and be familiar with the Occupational Health and Safety Act 1993, and applicable regulations. Valid proof of pertinent health and safety courses attended by such persons will be required to be presented.

Compensation of Occupational Injuries and Diseases Act 130 of 1993 (COIDA).

The Principal Contractor shall submit to the Client a valid letter of good standing with the Compensation Insurer prior to appointment.

C2.3.16. OCCUPATIONAL HEALTH AND SAFETY POLICY

The Principal Contractor shall submit their Health and Safety Policy, signed by the Chief Executive Officer. The Policy must outline objectives and how they will be achieved and implemented within the operations.

C2.3.17. HEALTH AND SAFETY ORGANOGRAM

The Principal Contractor shall submit an organogram, outlining the Health and Safety Site Team that will be assigned to the project.

In cases where appointments have not been made, the organogram shall reflect the position. The organogram shall be updated when there is a change in the site team.

C2.3.18. HAZARDS IDENTIFICATION AND RISK ASSESSMENT

C2.3.18.1 BASELINE RISK ASSESSMENT

A Baseline risk assessment is drafted as prescribed by Construction Regulation 5(1) and will be issued to the principal contractor. The Baseline risk assessment shall be reviewed as required and re-issued to the principal contractor.

The Principal Contractor shall ensure that should he employ sub-contractors, the sub-contractor must be issued with the Baseline assessment as prescribed in Construction Regulation 7(1).

C2.3.18.2 ISSUE BASES (TASK SPECIFIC) RISK ASSESSMENT

The Principal Contractor shall conduct Hazard Identification and Risk Assessments anticipated and/or encountering during the project. The Risk Assessment must include the Safe Working Procedure, and Method Statement.

The Principal Contractor shall ensure that during any construction work or work associated with the aforesaid construction work; ensure that a Task Specific Risk Assessment is undertaken by a competent appointed person. These risk assessments shall be communicated to all employees involved in the task before commencement of the task.
Safe operating procedures (SOP's) / safe working procedures (SWP'S) shall be generated based on the task specific risk assessments and communicated to all employees. Planned task observations (PTO's) shall be generated based on the SOP's.

C2.3.19. SAFE WORK PROCEDURE

Safe Work Procedures are to form part of the Risk Assessment and must be compiled for all the Identified activities.

The safe work procedures must address the following elements:

- The work method to be followed to conduct work safely
- Mitigation of identified risks
- Reducing and controlling risks and hazards that have been identified
- Responsibilities of competent persons
- Required personal protective equipment
- Correct equipment/tools/machinery to be used

C2.3.20. HEALTH AND SAFETY REPRESENTATIVE(S)

The Principal Contractor shall ensure that Health and Safety Representative is elected and trained to carry out his/her functions, as per legislation.

The Health and Safety Representation shall carry out regular inspections, keep records and report to the supervisor to take appropriate action. He/she shall attend Health and Safety Committee Meetings. The Health and Safety Representative shall be part of the team that will investigate incidents, accidents and non-conformances.

C2.3.21. MEDICAL CERTIFICATE OF FITNESS

The Principal Contractor must ensure that their employees on site have a valid medical certificate of fitness, issued by an occupational health practitioner.
Medical examinations must be done on all employees based on the exposure identified on the Annexure 3 as specified in the Construction Regulations. The *Annexure 3,* must be completed based on the scope of works and submitted to the occupational medicine practitioner / occupational health nursing practitioner.

The *Annexure 3* must be attached to all medical certificates of fitness. No employees will be allowed to perform any work on site if found unfit. Due to the fact that the medical is only valid for one year the principal contractor and contractors must keep the duration of the project in consideration when developing the OHS budget. Medicals will be conducted:

- Before the start of a project
- During a project (Annually)
- Exit medical – once the project is completed / contract is terminated / employee resigned.

The following employees must be declared medically fit without any conditions:

- Employees working at heights
- Driven machinery operator
- Workers working in confined spaces
- Scaffold erectors and inspectors

If an employee was declared fit with prescribe restrictions and recommendations it is the responsibility of the employer to constantly monitor the employee. Based on Section 14 of the OHS Act an employee that was declared fit with restrictions and recommendations is responsible to look after his own health and safety. This refers to taking medication when needed, using correct PPE prescribed and avoiding restricted areas that might have an influence on the health of an employee.

C2.3.22. TRAINING, AWARENESS AND COMPETENCE

C2.3.22.1. INDUCTION

All persons on site to attend general induction training presented by the contractor. Attendance registers to be signed by all attendees and kept on safety file.

C2.3.22.2. AWARENESS

The Principal Contactor must also conduct periodic toolbox talks on site, preferably weekly or before any hazardous work takes place. The talks shall cover the relevant activity and an attendance register must be signed by all attendees and kept on safety file.

C2.3.22.3. COMPETENCY

After the Contractor has identified the training to be conducted as part of the competency requirement and based on Risk Assessment, he shall send the relevant person on appropriate courses and keep certificate of training for reference. Familiarity with the Health and Safety Act and Regulations is an integral part of the definition of competence.

C2.3.23. GENERAL RECORD KEEPING

The Principal Contractor shall keep and maintain Health and Safety records to demonstrate compliance with the Health and Safety Specifications and the Occupational Health and Safety Act.

The Contractor shall ensure that all records of incidents, inspections, audits, registers, training etc. are kept on site.

C2.3.24. GENERAL INSPECTION, MONITORING AND REPORTING

The Principal Contractor shall carry out monthly inspections and auditing of the construction site.
Monthly reports applicable to the project must be drafted and send to the CHS Agent by the 20th of each month. The monthly report must include:

- Total Employees on site
- Number of Injuries
- Incidents reported
- Corrective actions taken for deviations identified during the CHS Agent's audit.

C2.3.25. AUDITS

Monthly audits shall be conducted by CHS Agent to verify compliance to legal and other requirements. Based on the audit and deviations identified, action plans shall be drawn up by Principal Contractor's responsible person and due date.

The principal contractor shall conduct monthly self-audits to identify gaps, shortcomings and to ensure continual improvement.
The principal contractor shall conduct monthly audit on all contractors. Action plans will be drawn up, discussed with subcontractors.

Audit reports compiled during external audits, self-audits and audits on contractors shall be minted and discussed during the OHS committee meeting.

C2.3.26. FIRST AID BOX AND FIRST AID EQUIPMENT

The Principal Contractor shall provide first aid box and appoint, in writing, First Aider for this project with a valid certificate.

First Aid box must be adequately stocked at all time, accessible and be controlled by a qualified First Aider.

C2.3.27. ACCIDENT / INCIDENT MANAGEMENT

C2.3.27.1. RECORDING OF INCIDENTS

All incidents that occur, whether a near miss, first aid case, medical case or section 24 incident, shall be recorded and investigated by a competent person as prescribed by the General Administrative Regulations 9. (GAR 9)

Section 24 incidents must be investigated within 7 days by a competent person and be finalized as soon as possible. The findings of the investigation must be entered in to *Annexure 1* of the GAR 9. All records of the investigation must be examined during the OHS committee meeting and actions implemented and followed up to prevent reoccurrences.

During the investigation process it is important that following processes are properly executed but not limited to:

- Access the situation
- Collect as much data as possible

C2.3.27.2. REPORTING OF INCIDENTS

Incidents shall be reported as follows:

Type of incident	Reporting
Near Miss	- Principal contractor to follow internal reporting procedure as indicated in the OHS plan

Type of incident	Reporting
Near Miss that could have resulted in a section 24 incident	- Principal contractor to follow internal reporting procedure as indicated in the OHS plan - Report to the CHS Agent
First Aid case	- Principal contractor to follow internal reporting procedure as indicated in the OHS plan
Medical treatment case	- Principal contractor to follow internal reporting procedure as indicated in the OHS plan - FEM / Compensation commissioner
Lost Time Injury	- Principal contractor to follow internal reporting procedure as indicated in the OHS plan - Report to the OHS Agent - FEM / Compensation commissioner
Section 24 incidents	- Principal contractor to follow internal reporting procedure as indicated in the OHS plan - Report to the OHS Agent - FEM / Compensation commissioner - DOL – within 7 days for section 24 incidents / within 14 days for occupational diseases. Notification must be done via email on similar means of communication.

C2.3.27.3. RECORDS KEEPING

The following records but not limited to should be kept up to date and available for inspections and audits;

- Up to date incident register
- Up to date dressing record
- WCL 1 & 2 forms
- Incident investigation forms with supporting documents
- *Annexure 1* (GAR): Should be kept for at least 3 years

C2.3.28. OCCUPATIONAL HEALTH AND SAFETY SIGNAGE

The Principal Contractor shall ascertain and provide adequate on-site health and safety signage.

This signage shall include, but not be limited to, Hard Hat Area; Safety Shoes to be worn on site; Dust Masks to be worn in areas where there might be exposure to excessive dust; Ear.

Plugs/Muffs to be worn where there might be noise exposure over 85 db.; Glovers; Safety Goggles; Safety Harness, Excavation, etc.

The Contractor shall be responsible to maintain the quality and replacement of signage.

C2.3.29. CONSTRUCTION VEHICLE AND MOBILE PLANT

The Principal Contractor must ensure that:

- Operators are appointed in writing.
- Operators shall be trained and authorised to operate mobile plant / vehicles.
- Operators shall be declared medically fit without restrictions to operate any mobile plant.
- Mobile plant supervisor shall be appointed to supervise all mobile plant.

- Induction shall be done with all operators / drivers
- All plant shall be inspected, authorised and approved before working on sites.
- All test certificates shall be valid. Maintenance records as well as pre – use inspection checklists shall be available on site for inspections.
- All plant / vehicles shall be fitted with an orange light and a reverse alarm.
- All plant shall be inspected daily before use.
- Operators /drivers shall not talk on cell phones while operating plant.

C2.3.30. HAZARDOUS CHEMICAL SUBSTANCES (HCS)

The Principal Contractor must ensure that-

- Competent person to be appointed in writing to coordinate and control all HCS.
- All HCS to be stored in a proper HCS store. Store must be well ventilated.
- Signage to be displayed and fire extinguishers to be available at the storage area.
- Material safety data sheet shall be available for chemicals
- Employees using chemicals shall be trained in the material safety data sheets
- Employees to wear PPE as required by the MSDS.

C2.3.31. HOUSEKEEPING AND GENERAL SAFEGUARDING

The contractor must ensure that suitable housekeeping is continuously implemented on each construction site, including the proper storage of materials and equipment;the removal of scrap, waste and debris at appropriate intervals; ensuring that materials which are no longer required for use, do not accumulate on and are removed from the site at appropriate intervals;

C2.3.32. STACKING OF MATERIALS

The contractor must ensure that -

- a competent person is appointed in writing with the duty of supervising all stacking and storage on a construction site;
- adequate storage areas are provided;
- there are demarcated storage areas; and
- storage areas are kept neat and under control.

C2.3.33. CONSTRUCTION EMPLOYEE' FACILITIES

A Principal Contractor must provide;

- at least one sanitary facility for each sex and for every 30 workers;
- changing facilities for each sex;
- sheltered eating area.

C2.3.34. WASTE MANAGEMENT

The contractor must ensure that:

- Provide sufficient bins. Lids to be provided and used where necessary.
- Schedule for the removal of waste is established and followed.
- Drip trays are used for generators / mobile plant.

C2.3.35. PERSONAL PROTECTIVE EQUIPMENT (PPE)

The Principal Contractor must conduct a PPE survey and based on the risks identified and MSDS requirements provide employees with the correct PPE. The following PPE should be used but not limited to: Overall with reflectors, Safety shoes, Hard hat, Ear protection, Safety goggles, Dust Masks, Gloves

A PPE issue register should be completed for all employees. Employees must sign PPE issue registers as proof that PPE was received.

Employees to receive training on the correct use of PPE. Attendance registers to be completed as proof that training was received.

PPE shall be checked monthly and recorded in the appropriate register. Procedure to be compiled and implemented to manage redundant PPE.

C2.3.36. PUBLIC HEALTH AND SAFETY

The Principal Contractor shall ensure that non-employees affected by the construction work area made aware of the dangers likely to arise from the construction work and of the precautionary measures to be observed in order to avoid or minimise those dangers. This applies to:

- Non-employees entering the site
- Surrounding communities
- Bypassers

C2.3.37. OCCUPATIONAL HEALTH

Exposure of workers to occupational health hazards and risk are very common in any work environment, especially in construction. Occupational health hazards and risks exposure is a major problem and all Contractors are to ensure that proper health and hygiene measures are put in place to prevent exposure to these hazards and risks.
The occupational hazards and risks may enter the body in three ways:

- Inhalation through breathing e.g. cement dust;
- Ingestion through swallowing maybe through food intake;
- Absorption through the skin (pores) e.g. painting or use of thinners.

The Principal Contractor is required to ensure that all his personnel are medically fit prior to being allowed onto the work site.

C2.3.38. BARRICADING

The Principal Contractor must ensure that:

- Orange safety netting shall be used to barricade stacking and storage areas.
- Orange netting shall also be used to barricade excavations.
- danger tape shall be used to barricade areas where lifting practices takes place and where overhead work is done.

C2.3.39. SOCIAL DISTANCING MEASURES

NOT APPLICABLE

Physical distancing is important because COVID-19 is most likely to spread through close contact with a person who has a confirmed infection. Physical distancing means keeping people apart.

The following physical distancing must be implemented:

- Keeping a distance of at least 1.5 to 2 metres between people.

NOT APPLICABLE

- Queuing strategies - e.g. marking out spacing on the floor with tape or pens.
- Limiting the amount of people who can enter a confined space/office.
- Implement contactless deliveries.
- Have a responsible person for ensuring everyone is keeping the required distance from each other.
- Move workstations, desks and tables further apart.

C2.3.40. HEALTH AND SAFETY MEASURES

The following measures must be put in place to ensure the health and safety of employees and visitors on site.

- **Screening:**

- Screening process must be done by trained person who will act as compliance officer for COVID-19.
- Screen any worker to ascertain any symptoms associated with COVID-19, namely fever, cough, sore throat, redness of eyes or shortness of breath.
- Screen all workers, visitors and service providers entering and leaving the site, with non-contact thermometer.

- **Hand sanitizer:**

- Hand sanitizing must be done.
- Spray bottle of hand sanitiser will be placed at all points of entry/exit.
- Hand sanitisers to be sprayed on every person entering and leaving the site.

- **Hand washing:**

- Hand soap to be placed at a strategic position next to the water.
- Workers to wash their hands regularly with soap and water.

- **Personal Protective Equipment**

- The types of PPE required for COVID-19 outbreak, presently, is face mask.
- Provide each employee with 2 cloth face masks.
- Employees to wear mask while at work and while commuting to and from work.
- Employees to wash their cloth face mask daily.
- Regularly inspect, maintain and replaced them when necessary.

- **Site Access:**

- Access control rules must be displayed at the entrance.

C2.3.41. SITE MEETINGS

Organizers of meetings need to think about the potential risk from COVID-19 because:

- There is a risk that people attending the meeting might be unwittingly bringing the COVID-19 virus to the meeting.
- Others might be unknowingly exposed to COVID-19.

Therefore, before the meeting:

- Consider whether the meeting is necessary or whether it could be postponed or replaced with a tele or video conference.
- Can it be scaled down so that fewer people attend?

C2.3.42. WHAT TO DO IN SUSPECTED CASES

If there is a suspicion that you or your colleagues may have become infected by COVID-19, you should take the following steps:

- Bring the employee to a separate and closed room.
- Inform the supervisor / foreman / manager.
- Inform the Department of Health and the Department of Employment and Labour.
- Support the authorities / HR department in determining who the person has been in contact with, and in implementing any other measures.

C2.3.43. VULNERABLE WORKERS / VISITORS

Workers that is more susceptible to complications and death due to Corona Virus is as follow:

- Co-morbidities such as Cardiovascular disease, Diabetes, Respiratory Illnesses, Immune Deficiencies, etc. Age >60.

The following control measures must be followed:

- Visitors that fall under criteria above, must not be allowed into Building or onto any site.
- Personnel that falls under above criteria, must work from home if possible, work alone if needed to be on site or at office, attend meeting via Video or Telephone Conference, keep social distancing at all times, drive alone in a vehicle and wear face mask at all times

C2.3.44. HYGIENE FACILITIES AND COMMUNAL AREAS E.G. CANTEEN / EATING AREA / LOCKER ROOMS

The following must be available at these facilities: Paper Towels, Bins to dispose paper towels, Hand Sanitiser, Water and Soap People must ensure that they wash their hands when entering and leaving the facility.

C2.3.45. TRANSPORT OF EMPLOYEES

Where possible only one person may travel inside a vehicle. Where more than one person is traveling inside a vehicle, all people must wear face masks. Where possible people must walk from point A to Point B and minimise transport with other to the minimum Vehicle that is used to transport personnel must be sanitised after each trip.

C2.3.46. CONSTRUCTION HEALTH AND SAFETY BUDGET

The principal contractor shall provide a sufficient OHS budget that shall include a complete breakdown of all OHS costs.

It is crucial that the principal contractor takes the requirements set out in these specifications and all legal and other requirements in consideration when developing the OHS budget. The principal contractor should especially look at but not limited to:

- The standard of OHS required.
- Competent OHS officer registered with SACPCMP shall be appointed to manage the project.
- Medicals
- Required training
- Provision of construction employees' facilities
- Personal Protective Equipment

- Stacking and storing requirements

C2.4. BASELINE HAZARD IDENTIFICATION & RISK ASSESSMENT

See attached 0, page 132.

C2.4.1. CONSTRUCTION HEALTH AND SAFETY BUDGET

The principal contractor shall provide a sufficient OHS budget that shall include a complete breakdown of all OHS costs.

It is crucial that the principal contractor takes the requirements set out in these specifications and all legal and other requirements in consideration when developing the OHS budget. The principal contractor should especially look at but not limited to:

- The standard of OHS required.
- Competent OHS officer registered with SACPCMP shall be appointed to manage the project.
- Medicals
- Required training
- Provision of construction employees' facilities
- Personal Protective Equipment
- Stacking and storing requirements
- Construction employee's facilities
- Mobile plant requirements
- Emergency requirements
- Signage and barricading requirements.

C2.4.2. AGREEMENT WITH MANDATORY

OCCUPATIONAL HEALTH AND SAFETY ACT, (Act No 85 of 1993)

AGREEMENT WITH MANDATORY

In terms of Section 37(1) and (2)

WRITTEN AGREEMENT ENTERED INTO AND BETWEEN

_____

(Hereinafter referred to as the Client/Client/Company)

AND

_____

(Hereinafter referred to as The Contractor)

Compensation Fund Number : _____

Project / Contract Name: **COMPLETION OF OUTSTANDING WORKS FOR THE MICROGRID PROJECT IN POFADDER**

Definition of Mandatory

Includes an agent, a Contractor or sub-Contractor for work, but without derogating from his status in his own right as an Client or user.

Occupational Health and Safety Act (No. 85 of 1993)

1. You are requested to, as far as reasonably can, comply with the requirements of the OHS ACT 93 and Construction Regulations 2014.

2. Your attention is drawn to "General Duties of Clients to their Employees" as required by Sect 8 of the Act

3. You are required to:

   3.1 Sign a written "Agreement with Mandatory" as required by Sect 37(1)(2) of the Act with us before you commence any work on my / our premises / site.

   3.2 Provide the client / Principal Contractor with a documented health and safety plan.

   3.3 Provide the client / Principal Contractor with written appointment of the person who is going to supervise the construction work as per Construction Regulation 6(1).

   Note: Electrician to provide copy of certificate of registration as per Elect. Install Reg. 9(3).

   3.4 Provide the client / Principal Contractor with written designation of your nominated Health and Safety Representative as per Sect 17(1).

   3.5 If you employ more than five (5) persons, you are required to provide your own First Aid Box. (General Safety Regulation 3 (2).)

   3.6 If you employ more than ten (10) persons, you are required to provide your own qualified First Aider as per General Safety Regulation 3(4).

   3.7 When working with hazardous chemical substances, comply with Hazardous Chemical Substances Regulation 3. Note: Asbestos and Lead regulations are separate.

   3.8 When using a Materials Hoist, comply with Construction Regulation 19.

   3.9 When using Lifting Machines and Lifting Tackle, comply with Cranes Regulation 22.

   3.10 When using Explosive actuated fastening devices, comply with Construction Regulation 21.

   3.11 When using Scaffolding, Formwork and support work, comply with Construction Regulation 12 and 16.

   3.12 When Excavating and Demolishing work, comply with Construction Regulation 13 and 14.

   3.13 When Welding, Flame Cutting, Soldering, comply with General Safety Regulation 9.

   3.14 When working in confined spaces, comply with General Safety Regulation 5.

4. You are responsible for providing your own legal safety documents and registers to comply with the Act's requirements. A copy of the OHS Act of 1993 should be available in the main Contractors office.

5. Personal protective equipment which will allow them to carry out their work in a safe manner, e.g. hard hats, safety belts, gloves, safe footwear, eye protection, ear protection, waterproof clothing etc.

6. Reporting of Incidents and Occupational Diseases shall be done as per General Admin. Regulation 6. (Also see Sect 26 of the Act.)

Compensation for Occupational Injuries and Diseases Act (No 130 of 1993)

You are required to provide the client proof of registration with the Compensation Commissioner/Federated Client's Mutual within seven (7) days after signing this agreement. Failure to do so would result in the client notifying the agent of the Commissioner to investigate and make an assessment of your wage return and the applicable levy you have to pay, which will be liable for a deduction from your monthly progress payments and paid over to the Commissioner. (Copies of proof of payment will be provided to the Contractor) See Section 89(1) of the COID Act.

AGREEMENT WITH MANDATORY In terms of Section 37 (1) and (2)

Section 37 (1)	Whenever an employee does or omits to do any act which it would be an offence in terms of this Act for the Client of such employee or a user to do or omit to do, then unless it is proved that – (a) in doing or omitting to do that act the employee was acting without the connivance or permission of the Client or any such user; (b) it was not under any condition or in any circumstance within the scope of the authority of the employee to do or omit to do an act, whether lawful or unlawful, of the character of the act or omission charged; and (c) all reasonable steps were taken by the Client or any such user to prevent any act or omission of the kind in question, the Client or any such user himself shall be presumed to have done or omitted to do that act, and shall be liable to be convicted and sentenced in respect thereof; and the fact that he issued instructions forbidding any act or omission of the kind in question shall not, in itself, be accepted as sufficient proof that he took all reasonable steps to prevent the act or omission.
Section 37 (2)	The provisions of subsection (1) shall "mutatis mutandis" apply in the case of a mandatory of any Client or user, except if the parties have agreed in writing to the arrangements and procedures between them to ensure compliance by the mandatory with the provisions of the Act.

I,…….(Responsible person) for, ……(Company)

appoint, ……(Contractor) at the following premises / site: ……

……..

Period:……

AUTHORISED SIGNATORY FOR THE CLIENT / CLIENT / COMPANY

Signature	Designation	Date

ACCEPTANCE SIGNATORY FOR THE CONTRACTOR

I ..... hereby acknowledge receipt of and accept and understand the requirements of this agreement and shall ensure compliance with the OHS Act 85, of 1993.

Signature	Designation	Date

C2.4.3. BASELINE HAZARD IDENTIFICATION & RISK ASSESSMENT

(For Risk & Probability Explanations See Annexure 4)

TASK #	TASK / ACTIVITY DESCRIPTION	HAZARDS / ASPECT / FAILURE	POTENTIAL RISK / IMPACT	PRE-TREATMENT RISK RATING See attached page			RECOMMENDED CONTROLS / ACTIONS	APPLICABLE LEGISLATION	RESPONSIBLE PERSON	STATUS / DATE COMPLETED	RESIDUAL RISK RATING See attached page		
				SEVERITY	PROBABILITY	RISK RATING					SEVERITY	PROBABILITY	RISK RATING
1.	**Designs**	Inadequate/ unsafe design	Fatalities Injury Property damage Reputational harm	3	E	Medium	Design of contract to be awarded to the appointed Designer by Client. Designer to be either an qualified Architect or a registered and appointed Engineer. Health & Safety Specifications and Baseline Risk Assessment to be provided to the designer. Designer to take Health & Safety into consideration when designing.	Construction Regulation 5 & 6 / OHSACT Section 8 & 37	Client	Open	2	E	Low
1.1		Contractor incompetent in interpreting design.	Fatalities Injury Property damage Reputational harm	3	E	Medium	Contractor to be evaluated prior to awarding the tender. Contractor to be appointed in terms of CR 5(1)(K) OF CR 2014 and terms of Section 37(2) of the OHS Act 85 0f 1993.	Regulation 5 & 6 / OHSACT Section 8 & 37	Client	Open	2	E	Low
2.	**Procurement**	Inadequate provision made for Health and Safety	Fatalities Injury Property damage Reputational harm	3	B	High	Provision have to be made for Health & Safety in tender document. When a prospective contractor tenders for the project, his tender submission is to be evaluated to ensure that he has made provision adequate Health and Safety resources.	Regulation 5 / OHSACT Section 16	Client / CHSA / PC	Open	3	D	Medium

TENDERER: **CLIENT**

Initial: Authorized Signatory/ies: 1 _____ Initial: Khâi-Ma Local Municipality _____

2 _____ Witness: _____

TASK #	TASK / ACTIVITY DESCRIPTION	HAZARDS / ASPECT / FAILURE	POTENTIAL RISK / IMPACT	PRE-TREATMENT RISK RATING See attached page			RECOMMENDED CONTROLS / ACTIONS	APPLICABLE LEGISLATION	RESPONSIBLE PERSON	STATUS / DATE COMPLETED	RESIDUAL RISK RATING See attached page		
				SEVERITY	PROBABILITY	RISK RATING					SEVERITY	PROBABILITY	RISK RATING
2.1		Incompetent employees appointed in statutary positions	Fatalities Injury Property damage Reputational harm	3	B	High	All prospective employees that will be apppointed in statutory positions must be evaluated by the contractor as part of their selection process. The CV's and qualifications of these employees are to be submitted as part of the OHS File to the Clients Representative to evaluate and approve.	Regulation 5 / OHSACT Section 16	Client / CHSA / PC	Open	3	D	Medium
2.2		Inadequate / Unsafe plant, materials and equipment procured.	Fatalities Injury Property damage Reputational harm	3	B	High	All plant, materials and equipment schedules to be included into the OHS File when submitting for review and approval. Maintenance records / service history of plant to be evaluated.	Regulation 5 / OHSACT Section 16	Client / CHSA / PC	Open	3	D	Medium
3.	**Demolition of Structures**	Air borne contaminats	Occupational Illness Injury	3	A	Extreme	If asbestos containing materials are present, they have to be removed by registered Asbestos Contractor and air monitoring to be carried out by **Approved Asbestos Inspection Authority.**	Asbestos Regulation	Client / PC	Open	3	C	High
3.1	**Site Access**	Unauthorised access granted to Contractor	Civil Unrest Property damage Reputational harm	3	A	Extreme	Client to grant access in writing to the contractor. Public Participation and consultation meetings to be held with the community informing them about the intended works. NB! No Site establishment will be allowed until the Safety File has been approved. Contractors to ensure that access to construction areas are restricted along The Contractor must also ensure that access to the construction areas are restricted during the night. Public liability insurance to be placed in the contractor safety files.	OHS Act Section 8	Client / CHSA / PC	Open	3	C	High
4	**Transportation of material, equipment, and containers to and from site**	Untrained driver	Fatalities Injury Property damage Civil Claim	3	C	High	Driver to be licensed, authorised and appointed. Induction to be done.	Construction Regulation 23 / OHS Act Section 8 / National Road Traffic Act	PC		3	D	Medium

TASK #	TASK / ACTIVITY DESCRIPTION	HAZARDS / ASPECT / FAILURE	POTENTIAL RISK / IMPACT	PRE-TREATMENT RISK RATING See attached page			RECOMMENDED CONTROLS / ACTIONS	APPLICABLE LEGISLATION	RESPONSIBLE PERSON	STATUS / DATE COMPLETED	RESIDUAL RISK RATING See attached page		
				SEVERITY	PROBABILITY	RISK RATING					SEVERITY	PROBABILITY	RISK RATING
4.1		Unroadworthy vehicle	Fatalities Injury Property damage Reputational harm Civil Claim	3	C	High	Vehicle to be inspected every time before coming onto site. Pre use inspection to be done. Vehicle to be fitted with a orange rotating light and reverse alarm.	Construction Regulation 23 / OHS Act Section 8 / National Road Traffic Act	PC	Open	3	D	Medium
4.2		Material/ equipment / containers not properly secured	Fatalities Injury Property damage Reputational harm Civil Claim	3	C	High	Material/equipment to be properly secured. Load to be inspected before arriving on site	Construction Regulation 23 / OHS Act Section 8 / National Road Traffic Act	PC	Open	3	D	Medium
4.3		Collision with other vehicles / property	Fatalities Injury Property damage Reputational harm Civil Claim	3	C	High	Driver to adhere to speed limits and road signs. If driving on site vehicle to be escorted to the designated area. Head Lights to be on, as well as strobe light. Flagman to be identified and visible when in congested area. Areas where trucks will stop for delivery should be properly barricaded. Signs should be displayed along the roads to ensure that they are visible to the public and flowing traffic..	Construction Regulation 23 / OHS Act Section 8 / National Road Traffic Act	PC	Open	3	D	Medium
5.	**Site Establishment**	Exposure to hazardous materials Exposure to moving machinery and vehicles	Fatalities Injury Property damage Reputational harm	3	C	High	Management to ensure site layout be approved by relevant engineer to consider site traffic, plant movement and other interfacing contractor site layouts	General Safety Regulations / General Administrative Rags / OHS Act Section 8 / Construction Regulations 5 & 7	PC	Open	3	D	Medium
5.1		Unauthorised access onto propert	Fatalities Injury Property damage Reputational harm Civil Unrest	3	C	High	Client to grant access in writing to the contractor. Public Participation and consultation meetings to be held with the community informing them about the intended works. NB! No Site establishment will be allowed until the Safety File has been approved.		PC	Open	3	D	Medium

TASK #	TASK / ACTIVITY DESCRIPTION	HAZARDS / ASPECT / FAILURE	POTENTIAL RISK / IMPACT	PRE-TREATMENT RISK RATING See attached page			RECOMMENDED CONTROLS / ACTIONS	APPLICABLE LEGISLATION	RESPONSIBLE PERSON	STATUS / DATE COMPLETED	RESIDUAL RISK RATING See attached page		
				SEVERITY	PROBABILITY	RISK RATING					SEVERITY	PROBABILITY	RISK RATING
5.2		Damaging existing services e.g. sewerage	Property damage Reputational harm Occupational Illness / Disease	3	C	High	Where possible existing service provider to be used to ensure knowledge of existing services. If not, a alternative service provider to be used and to be monitored. Municipalities are to be consulted regarding the location of existing services.		PC	Open	3	D	Medium
6.	**Environment Control**	Chemical Spillage	Ground and water pollution	3	C	High	Ensure all spills are reported immediately Ensure drip trays are used when the risk to spillage is high Ensure area housing hazardous waste is bunded to prevent run-off and absorption into the ground water systems	General Safety Regulations /General Administrative Rags /OHS Act Section 8 / Construction Regulations 5 & 7, NEMA Act	PC	Open	3	D	Medium
6.1		Poor refuse removal / No removal	Property damage Reputational harm Occupational Illness / Disease	3	C	High	Refuse removal service provider to be appointed upon establishment. Waste removal / disposal slips to be kept within the OHS File. A detailed Waste Management Plan is to be established and employees are to be trained.		PC	Open	3	D	Medium
6.2		Poor Planning	Injuries Property damage Reputational harm	3	C	High	Activity to be planned properly and instructions to be given to a delegated person nominated by the Contractor and the Client's Representative.		PC	Open	3	D	Medium
7.	**Loading / offloading of material / equipment by hand**	Nip / pinch point	Injuries Property damage	3	C	High	Employees to take instructions from one person. Employees to ensure safe placement of hands. Employees to wear leather gloves.	OHS Act Section 8	PC	Open	3	D	Medium

TENDERER: **CLIENT**

Initial: Authorized Signatory/ies: 1 _____ Initial: Khâi-Ma Local Municipality _____

2 _____ Witness: _____

TASK #	TASK / ACTIVITY DESCRIPTION	HAZARDS / ASPECT / FAILURE	POTENTIAL RISK / IMPACT	PRE-TREATMENT RISK RATING See attached page			RECOMMENDED CONTROLS / ACTIONS	APPLICABLE LEGISLATION	RESPONSIBLE PERSON	STATUS / DATE COMPLETED	RESIDUAL RISK RATING See attached page		
				SEVERITY	PROBABILITY	RISK RATING					SEVERITY	PROBABILITY	RISK RATING
7.1		Employee handling material / equipment that is to heavy	Injuries Property damage	3	C	High	No employee to handle bulky or heavy objects alone. In this case other employee/plant to assist. Bend knees, feet apart, back straight. Get mechanical help e.g. Lifting machine.		PC	Open	3	D	Medium
7.2		Slipping / tripping	Injury	3	C	High	Pre work inspection of area and walkways to be done to ensure no tripping hazards in walkways.		PC	Open	3	D	Medium
7.3		Poor communication	Injuries Property damage	3	C	High	One person gives orders. If the person has to leave the area he is to delegate the responsibility to another employee.		PC	Open	3	D	Medium
8.	**Stacking & Storage of materials and equipment**	Nip / pinch point	Injuries Property damage	3	C	High	Employees to wear leather gloves. Employees to ensure safe placement of hands.	OHS Act Section 8 Construction Regulations 8	PC	Open	3	D	Medium
8.1		Unsafe stacking practices	Injuries Property damage	3	C	High	Employees to be trained in the stacking Procedure. The base of a stack to be 3 times the height. Walkways of at least 1,5 m to be left between stacks		PC	Open	3	D	Medium
8.2		Snake/insect bites	Fatality	3	C	High	Employees to check area before handling material. Do visual inspection of stacks, stamp feet, turn material over with plant or feet. Hooks to be used to minimize exposure to insects/ snakes. All grass/ weeds to be kept short.		PC	Open	3	D	Medium

TENDERER: **CLIENT**

Initial: Authorized Signatory/ies: 1 _____ Initial: Khâi-Ma Local Municipality _____

2 _____ Witness: _____

TASK #	TASK / ACTIVITY DESCRIPTION	HAZARDS / ASPECT / FAILURE	POTENTIAL RISK / IMPACT	PRE-TREATMENT RISK RATING *See attached page*			RECOMMENDED CONTROLS / ACTIONS	APPLICABLE LEGISLATION	RESPONSIBLE PERSON	STATUS / DATE COMPLETED	RESIDUAL RISK RATING *See attached page*		
				SEVERITY	PROBABILITY	RISK RATING					SEVERITY	PROBABILITY	RISK RATING
8.3		No walkways between stacked materials	Injuries Property damage	3	C	High	Walkways of at least 1,5m between stacks to be left to ensure effective movement. Walkways and driveways to be properly barricaded to restrict interaction between public an stacked areas.		PC	Open	3	D	Medium
9	**Excavations and trenches**	Unsafe Plant	Fatality Injuries Property damage	3	C	High	A Plant used to be inspected by the GMR 2 and to be approved and tagged as per Procedure. Plant to be inspected daily before use by the operator. Operator to report any deviation to the supervisor immediately.	Construction Regulation 10 / OHS Act Section 8 / Construction Regulation 13 / General Safety Regulation 2A	PC	Open	3	D	Medium
9.1		Untrained Operator	Fatality Injuries Property damage	3	C	High	Operator to be trained, appointed and authorised to operate the machine.		PC	Open	3	D	Medium
9.2		Plant to close to the edge of an existing excavation or trench	Fatality Injuries Property damage	3	C	High	When plant is driving past an excavation or trench they must be further than 5 meters where possible, if not the operator/ driver is to slow down and pass with the help of a spotter that must assist him and monitor the ground conditions while he passes.		PC	Open	3	D	Medium
9.3		Underground service	Injuries Property damage	3	C	High	Refer to Construction Regulation 13		PC	Open	3	D	Me-
10.	**Concrete Works**	Poor communication	Fatality Injuries Property damage Cementosis	3	C	High	Supervisor to communicate task at hand clearly to all before task commences. If supervisor has to leave area, he is to delegate his authority to another employee until he returns to the area. Employee handling holding discharge point of concrete truck to ensure effective communication with operator of pump	Environmental Workplace Rags / OHS Act Sec 8 / DMR 18 / Construction Regulations	PC	Open	3	D	Medium

TENDERER:

Initial: Authorized Signatory/ies: 1 _____

2 _____

CLIENT

Initial: Khâi-Ma Local Municipality _____

Witness: _____

TASK #	TASK / ACTIVITY DESCRIPTION	HAZARDS / ASPECT / FAILURE	POTENTIAL RISK / IMPACT	PRE-TREATMENT RISK RATING See attached page			RECOMMENDED CONTROLS / ACTIONS	APPLICABLE LEGISLATION	RESPONSIBLE PERSON	STATUS / DATE COMPLETED	RESIDUAL RISK RATING See attached page		
				SEVERITY	PROBABILITY	RISK RATING					SEVERITY	PROBABILITY	RISK RATING
10.1		Unsafe discharging of concrete	Fatality Injuries Property damage Cementosis	3	C	High	Employees not to stand within "line of fire "when discharging concrete.		PC	Open	3	D	Medium
10.2		Concrete spills	Ground and ground water pollution	3	D	Medium	Employees to ensure that concrete is discharged and chute cleaned properly before the truck leaves the area. Concrete trucks to be washed at wash bays as agreed with the Engineer.		PC	Open	2	E	Low
10.3		Concrete burns	Injuries	3	D	Medium	Employees to wash their gloves and overalls regularly and to let it dry. If concrete lands on any part of the body, it is to be washed of immediately.		PC	Open	2	E	Low
11.	**Brick Work**	Operating Moffatt unsafely when delivering bricks.	Fatality Injuries Property damage	3	D	Medium	Operators Competency to be verified / Risk Assessment to be communicated with employee. Operator to be medically fit.	Environmental Workplace Rags / OHS Act Sec 8 / DMR 18 / Construction Regulations	PC	Open	2	E	Low
11.1		Heavy objects	Injuries	3	D	Medium	Do ergonomic survey on employees. Do internal training on correct lifting methods . Ensure that employees take enough breaks and that employees constantly rotate. Conduct medical surveillance on employees.		PC	Open	2	E	Low

TASK #	TASK / ACTIVITY DESCRIPTION	HAZARDS / ASPECT / FAILURE	POTENTIAL RISK / IMPACT	PRE-TREATMENT RISK RATING See attached page			RECOMMENDED CONTROLS / ACTIONS	APPLICABLE LEGISLATION	RESPONSIBLE PERSON	STATUS / DATE COMPLETED	RESIDUAL RISK RATING See attached page		
				SEVERITY	PROBABILITY	RISK RATING					SEVERITY	PROBABILITY	RISK RATING
11.2		Overloaded wheel barrow	Injuries Property damage	3	D	Medium	Supervisor to ensure that wheelbarrows are not overloaded. Walkways used are clear from superfluous materials. Ramps over excavations are stable. Ensure that there is a close distance between the concrete mixer an the actual brick work. Toolbox talk to be done on safe use of a wheelbarrow. Wheelbarrow to be placed on a register. Inspections to be done on wheelbarrows.		PC	Open	2	E	Low
11.3		No walkways between stacked materials	Injuries Property damage	3	C	High	Walkways of at least 1,5m between stacks to be left to ensure effective movement. Walkways and driveways to be properly barricaded to restrict interaction between public an stacked areas.		PC	Open	3	D	Medium
12.	**Excavations and trenches**	Unsafe Plant	Fatality Injuries Property damage	3	C	High	A Plant used to be inspected by the GMR 2 and to be approved and tagged as per Procedure. Plant to be inspected daily before use by the operator. Operator to report any deviation to the supervisor immediately.	Construction Regulation 10 / OHS Act Section 8 / Construction Regulation 13 / General Safety Regulation 2A	PC	Open	3	D	Medium
12.1		Untrained Operator	Fatality Injuries Property damage	3	C	High	Operator to be trained, appointed and authorised to operate the machine.		PC	Open	3	D	Medium
12.2		Plant to close to the edge of an existing excavation or trench	Fatality Injuries Property damage	3	C	High	When plant is driving past an excavation or trench they must be further than 5 meters where possible, if not the operator/ driver is to slow down and pass with the help of a spotter that must assist him and monitor the ground conditions while he passes.		PC	Open	3	D	Medium
12.3		Underground service	Injuries Property damage	3	C	High	Refer to Construction Regulation 13		PC	Open	3	D	Medium

TASK #	TASK / ACTIVITY DESCRIPTION	HAZARDS / ASPECT / FAILURE	POTENTIAL RISK / IMPACT	PRE-TREATMENT RISK RATING See attached page			RECOMMENDED CONTROLS / ACTIONS	APPLICABLE LEGISLATION	RESPONSIBLE PERSON	STATUS / DATE COMPLETED	RESIDUAL RISK RATING See attached page		
				SEVERITY	PROBABILITY	RISK RATING					SEVERITY	PROBABILITY	RISK RATING
13.	**Portable Electrical tools**	Employees (users) untrained	Injuries Electrical Shock Burns / Wounds Property damage	3	D	Medium	All users to be appointed, authorised and competent. All users to undergo formal accredited training.	Construction Regulation 24 / Electrical Installation Regulations	PC	Open	2	E	Low
13.1		Unsafe equipment	Injuries Electrical Shock Burns / Wounds Property damage	3	D	Medium	All equipment to be inspected prior to use by the user. All defective equipment to be reported and store man not allowed to issue. Defective equipment to be quarantined until such time that it has been fixed by a qualified person.		PC	Open	2	E	Low
13.2		Working in wet conditions	Injuries Electrical Shock Burns / Wounds Property damage	3	D	Medium	No working with Electrical tools in wet conditions.		PC	Open	2	E	Low
14.	**Brick Work**	Operating Moffatt unsafely when delivering bricks.	Fatality Injuries Property damage	3	D	Medium	Operators Competency to be verified / Risk Assessment to be communicated with employee. Operator to be medically fit.	Environmental Workplace Rags / OHS Act Sec 8 / DMR 18 / Construction Regulations	PC	Open	2	E	Low
14.1		Heavy objects	Injuries	3	D	Medium	Do ergonomic survey on employees. Do internal training on correct lifting methods . Ensure that employees take enough breaks and that employees constantly rotate. Conduct medical surveillance on employees.		PC	Open	2	E	Low
14.2		Overloaded wheel barrow	Injuries Property damage	3	D	Medium	Supervisor to ensure that wheelbarrows are not overloaded. Walkways used are clear from superfluous materials. Ramps over excavations are stable. Ensure that there is a close distance between the concrete mixer an the actual brick work. Toolbox talk to be done on safe use of a wheelbarrow. Wheelbarrow to be placed on a register. Inspections to be done on wheelbarrows.		PC	Open	2	E	Low

TASK #	TASK / ACTIVITY DESCRIPTION	HAZARDS / ASPECT / FAILURE	POTENTIAL RISK / IMPACT	PRE-TREATMENT RISK RATING See attached page			RECOMMENDED CONTROLS / ACTIONS	APPLICABLE LEGISLATION	RESPONSIBLE PERSON	STATUS / DATE COMPLETED	RESIDUAL RISK RATING See attached page		
				SEVERITY	PROBABILITY	RISK RATING					SEVERITY	PROBABILITY	RISK RATING
15.	**Electrical Installations**	Appointment of an incompetent electrical contractor	Installation will fail to meet expected standards Delay in project completion	3	D	Medium	Ensure that the required CIDB grading of the electrical contractor is included in the tender documentation and that thorough checks are done before appointment.	Construction Regulation 24 / Electrical Installation Regulations	PC	Open	2	E	Low
15.1		Use of substandard materials.	Installation will fail and performance will be compromised	3	D	Medium	Ensure adequate material quality checks and approvals during construction.		PC	Open	2	E	Low
15.2		Unsafe installation	Injuries Electrical Shock Burns / Wounds Property damage	3	D	Medium	All temporary and permanent installation are to be inspected at minimum quarterly intervals by a registered Electrician with a Wireman's license. Registers to be kept.		PC	Open	2	E	Low
15.3		Untrained employee installing	Injuries Electrical Shock Burns / Wounds Property damage	3	D	Medium	Electrician with a Wireman's license must install, commission and inspect all electrical installations. Employee to be authorised, competent and appointed.		PC	Open	2	E	Low
16.	**Portable Electrical tools**	Employees (users) untrained	Injuries Electrical Shock Burns / Wounds Property damage	3	D	Medium	All users to be appointed, authorised and competent. All users to undergo formal accredited training.	Construction Regulation 24 / Electrical Installation Regulations	PC	Open	2	E	Low
16.1		Unsafe equipment	Injuries Electrical Shock Burns / Wounds Property damage	3	D	Medium	All equipment to be inspected prior to use by the user. All defective equipment to be reported and store man not allowed to issue. Defective equipment to be quarantined until such time that it has been fixed by a qualified person.		PC	Open	2	E	
16.2		Working in wet conditions	Injuries Electrical Shock Burns / Wounds Property damage	3	D	Medium	No working with Electrical tools in wet conditions.		PC	Open	2	E	

TENDERER:

Initial: Authorized Signatory/ies: 1 _____

2 _____

CLIENT

Initial: Khâi-Ma Local Municipality _____

Witness: _____

TASK #	TASK / ACTIVITY DESCRIPTION	HAZARDS / ASPECT / FAILURE	POTENTIAL RISK / IMPACT	PRE-TREATMENT RISK RATING *See attached page*			RECOMMENDED CONTROLS / ACTIONS	APPLICABLE LEGISLATION	RESPONSIBLE PERSON	STATUS / DATE COMPLETED	RESIDUAL RISK RATING *See attached page*		
				SEVERITY	PROBABILITY	RISK RATING					SEVERITY	PROBABILITY	RISK RATING
16.3		Unsafe / poor lock out practices	Injuries Electrical Shock Burns / Wounds Property damage	3	D	Medium	All Electrical power tools to be fitted with a "Dead Man Switch". When user is not using the tool the tool is to be unplugged.		PC	Open	2	E	

ANNEXURE A - RISK RATING.

The risk rating of a risk is established by assessing the severity of the risk and its probability of occurring.

Severity

Level	Descriptor	Example detail description
1	Insignificant	Near Miss; No measurable impact / legal requirements – none
2	Minor	First Aid Treatment; Short term impact; easy to rehabilitate /legal requirements – warning
3	Moderate	Medical Treatment; Medium term impact; difficult to rehabilitate /legal requirements – forced compliance
4	Major	Serious Injury; Long term impact; extreme difficult to rehabilitate / legal requirements – fine
5	Catastrophic	Fatality; Permanent damage; not rehabilitated / legal requirements – prosecution

Probability

Level	Descriptor	Description
A	Almost certain	Is expected to occur in most circumstances
B	Likely	Will probably occur in most circumstances
C	Possible	Might occur at some time
D	Unlikely	Could occur at some time
E	Rare	May occur only in exceptional circumstances

Risk Rating

Probability	**SEVERITY**				
	Insignificant 1	**Minor 2**	**Moderate 3**	**Major 4**	**Catastrophic 5**
A (almost certain)	H	H	E	E	E
B (likely)	M	H	H	E	E
C (possible)	L	M	H	E	E
D (unlikely)	L	L	M	H	E
E (rare)	L	L	M	H	H

Legend

E = Extreme risk; immediate senior management action required

H = High risk; management attention needed

M = Medium risk; management responsibility must be specified

L = Low risk; manage by routine procedures

ANNEXURE 1

[In terms of Regulation 3(2) of Construction Regulations, 2014]

APPLICATION FOR A PERMIT TO DO CONSTRUCTION WORK

This application must be submitted with the following documents:

1. Health and Safety Specification.
2. Health and Safety Plan.
3. Baseline Risk Assessment

---

1. Name, postal address and telephone numbers of the client:

   _____

   _____

2. Details of the Agent:

   a. Title, Surname, and Initials: _____
   b. Identity number / Passport number: _____
   c. Registration number with SACPCMP: _____
   d. Office Tel. number and/or Mobile number: _____
   e. Postal address: _____

   _____

   _____

3. Name, postal address and telephone numbers of the appointed principal contractor:

   _____

   _____

   _____

4. Name, postal address and telephone numbers of designer of the project:

   _____

   _____

   _____

5. Name. postal address and telephone numbers of the following persons:
   a) Construction Manager:

   _____

   _____

   _____

b) Construction Health & Safety Manager:

_____

_____

_____

c) Construction Health & Safety Officer:

_____

_____

_____

6. Exact physical address of the construction and the site office:

_____

_____

_____

7. Nature of construction work:

_____

_____

_____

8. Expected commencement date:

_____

_____

_____

9. Expected completion date:

_____

10. Estimated number of persons on the construction site:

_____

11. Planned number of contractors on site accountable to the principal contractor:

_____

12. Name(s) of contractors appointed:

_____

_____

_____

_____ _____

Signature of Principal Contractor Signature of Client/Client`s Agent

FOR OFFICE ONLY

Authorization	Labour Centre	Official Approval Stamp

13. Date of application: _____

14. Submitted documents prescribed in Construction Regulation 5(4) (Please tick √):

CR 5(1)(a)		CR 5(1)(b)		CR 5(1),(C-S)	

15. Result of the application (Please Tick√):

Approved		**Declined**	

16. Reason for declining application:

_____

_____

_____

Signature of the supervisor

_____

Signature of revoking Officer/Inspector

LIST OF ITEMS (WHERE APPLICABLE AND NOT LIMITED) TO BE SUBMITTED WITH THE CONSTRUCTION WORK PERMIT APPLICATION

Document to be submitted		Legal Reference
1.	Annexure 1 - Application for a permit to do construction work	CR 3(1)
2.	Baseline risk assessment)	CR 3(5)(a) read with 5(1)(a
3.	Site specific health and safety specification (SSHSS)	CR 3(5)(a) read with 5(1)(b)
4.	Proof of appointment of competent CHS Agent plus proof of registration with SAC-PCMP	CR 3(5)(b)(i) read with CR 5(5)
5.	Proof in writing has been submitted that regulation 5(1)(c), (d), (e), (f), (g) and (h) has been complied with.	CR 3(5)(b)(iii)
6.	Designer's appointment outlining duties in terms of CR 6(1) as have been agreed upon	CR 3(5)(b)(iii) read with CR 5(1)(e) and 6(1)
7.	Temporary works designer's appointment duties in terms of CR 6(2) as have been agreed upon plus	CR 3(5)(b)(iii) read with CR 5(1)(e) and6(2)
8.	Evidence that the SSHSS was included in the contract documents	CR 3(5)(b)(iii) read with CR 5(1)(f)
9.	Evidence that the contractor has made adequate provision for the cost of H&S.	CR 3(5)(b)(iii) read with CR 5(1)(g)
10.	Evidence that the principal contractor has necessary resources and competencies to carry out construction work safely	CR 5(1)(h)
11.	Valid Letter(s) of Good Standing for the appointed Principal Contractor(s)	CR 3(5)(b)(ii) read with CR 5(1)(j)
12.	Written appointment(s) of Principal Contractor(s)	CR 5(1)(k)
13.	Principal Contractor's health and safety plan approved by the client.	CR 5(1)(l)

ANNEXURE 2

OCCUPATIONAL HEALTH AND SAFETY ACT, 1993
(Regulation 4 of the Construction Regulations, 2014)

NOTIFICATION OF CONSTRUCTION WORK

1. (a) Name and postal address of principal contractor:

_____

(b) Name and telephone nr. of Principal Contractor's contact person:

_____

2. (a) Principal Contractor's Compensation Registration Number:

_____

3. (a) Name and postal address of Client:

_____

(b) Name and telephone nr. of Client's contact person or agent:

_____

4. (a) Name and postal address of Designer(s) for the Project:

_____

(b) Name and telephone nr. of Designer(s) contact person:

_____

5. Name and telephone nr. of Principal Contractor's Construction Supervisor on Site as appointed in terms of Regulation 8(1):

_____

6. Name(s) of Principal Contractor's Sub-Ordinate Supervisors on site as appointed in terms of Regulation 8(2):

_____

7. Exact physical address of the Construction Site or Site Office:

_____

8. Nature of the construction work:

_____

_____

_____

9. Expected commencement date:

_____

10. Expected completion date:

_____

11. Estimated maximum number of persons on the Construction Site:

Total:_____Male:_____Female:_____

12. Planned number of Contractors on the Construction Site accountable to Principal Contractor:

_____

13. Name(s) of Contractors already selected:

_____

_____

_____

_____ _____

Principal Contractor **Date**

_____ _____

Client's Agent (where applicable) **Date**

_____ _____

Client's **Date**

THIS DOCUMENT IS TO BE FORWARDED TO THE OFFICE OF THE DEPARTMENT OF LABOUR **PRIOR TO COMMENCEMENT OF WORK ON SITE.**

Annexure 3

OCCUPATIONAL HEALTH AND SAFETY ACT, 85 OF 1993
CONSTRUCTION REGULATIONS, 2014

Medical Certificate of Fitness

Name of Employee_____ID Number_____Co Number_____

*** Occupation** e.g General worker, Welder, Brick-layer, Steel fixer, Mobile crane opera-tor, etc	*** Possible Exposure** e.g Noise, Heat, Fall risk, Confined spaces, etc	*** Job Specific Requirements** e.g Operating mobile crane, Digging trenches, Erecting formwork, and sup-port work etc	*** Protective Clothing** e.g Dust respirator, Welding gloves, etc

*** The Employer to complete the information in the spaces marked with an * before sending the Employee for a medical examination.**

Declaration by the Medical Examiner:

I certify that I have, by examination and testing, using the above criteria specified by the employer, satisfied myself that the abovementioned employee is fit to performthe duties as described by the employer in the matrix above.

Occupational Medicine Practitioner / Occupational Health Nursing Practitioner: _____

Signature_____Practice Number_____Date_____

Address_____

This Medical Certificate of Fitness is valid for one

C3. PRICING DATA

C3.1. PREAMBLE

GENERAL REFERENCES

1. The work scheduled below is described in more detail in the specifications and drawings. Where certain items are referred to the GCC 2015 or Specification or a certain drawing number for more information, the Contractor is referred to the complete GCC 2015, Specification and Drawings and it must not be presumed that the references are complete.

2. If a Bill of Quantities (or Bill of Quantities or schedule of rates) applies and there is an error in the line-item total resulting from the product of the unit rate and the quantity, the line-item total shall govern, and the rate shall be corrected. Where there is an obviously gross misplacement of the decimal point in the unit rate, the line-item total as quoted shall govern, and the unit rate will be corrected.

3. Where there is an error in the total of the prices either as a result of other corrections required by this checking process or in the Tenderer's addition of prices, the total of the prices shall govern, and the Tenderer will be asked to revise selected item prices (and their rates if a Bill of Quantities applies) to achieve the Tendered total of the prices.

4. The price quoted in the Rate Column next to each item, shall be assumed the all-inclusive price for the work to be executed as referred to in the item.

5. The prices as Tendered in the Bill of Quantities shall be taken as being valid for the full duration of the Tender, unless otherwise stated in the Tender.

6. Should no rate be given, "Included Elsewhere" must be written in the Amount Column. Should this not be done, it will be assumed that the item was accidentally not priced, and the average rate of the other Tenderers will be written in next to the item. See *Volume 1, T2.1.1 Alterations by Tenderer.*

7. No deviation that may be requested by the Contractor from the above, or from the GCC 2015, Specification, Bill of Quantities, Tender form and conditions, shall be considered, unless **clearly** indicated on *Volume 1, T2.1.1 Alterations by Tenderer* when the Tender document is submitted.

8. The costs to comply with all the conditions, obligations and liabilities and as described in the GCC 2015 and Specifications shall be assumed as being all inclusive in this Bill of Quantities, except if indicated differently in *Volume 1, T2.1.1 Alterations by Tenderer.*

9. The Bill of Quantities must be filled in **BLACK INK** and must not be removed from the bound set of documents.

10. No correction fluid may be used.

C3.2. METHOD OF PRICING AND PRICE ADJUSTMENT

MBD 3.2

METHOD OF PRICING AND PRICE ADJUSTMENTS

THIS TENDER WILL NOT BE CONSIDERED IF THIS DOCUMENT (MBD 3.2)

IS NOT FULLY COMPLETED.

CONTRACT REF NO: KH38-25/26

PLEASE INDICATE IF PRICES ARE FIRM OR NOT FIRM FOR THE DURATION OF THIS CONTRACT.

SELECT NUMBER 1 OR NUMBER 2

1. ☑ Prices are firm for the duration of this contract (including prices subject to Rates of Exchange or any other reasons) Variations will not be considered.

2. ☐ Prices not firm for the duration of this contract and price variations are applicable

If prices are not firm and number 2 was selected, select only one of the following options (A, B or C).

One of the options MUST be selec prices are not firm. If none or more than one (1) options were selected it will disqualify nder.

A. ☐ NON-FIRM PRICES SUB O ESCALATION

1. IN CASES OF PERI NTRACTS, NON FIRM PRICES WILL BE ADJUSTED (LOADED) WITH T SESSED CONTRACT PRICE ADJUSTMENTS IMPLICIT IN NON FIRM PRI HEN CALCULATING THE COMPARATIVE PRICES

2. IN THIS CATE PRICE ESCALATIONS WILL ONLY BE CONSIDERED IN TERMS OF THE OWING FORMULA:

NOT APPLICABLE

$$Pa = (1-V)Pt\left(D1\frac{R1t}{R1o} + D2\frac{R2t}{R2o} + D3\frac{R3t}{R3o} + D4\frac{D4t}{D4o}\right) + VPt$$

Where:

Pa	=	The new escalated price to be calculated.
(1-V)Pt	=	85% of the original Tender price. **Note that Pt must always be the original Tender price and not an escalated price.**
D1, D2	=	Each factor of the Tender price eg. labour, transport, clothing, footwear, etc. The total of the various factors D1,D2…etc. must add up to 100%.

R1t, R2t…… = Index figure obtained from new index (depends on the number of factors used).

R1o, R2o = Index figure at time of tendering.

VPt = 15% of the original Tender p… This portion of the Tender price remains firm i.e. it is no…ject to any price escalations.

3. The following index/indices must be used to calc… your Tender price:

Index_____ Dated_____ Inde…_____ Dated_____

Index_____ Dated_____ In…_____ Dated_____

Index_____ Dated_____ …x_____ Dated_____

4. FURNISH A BREAKDOWN OF YOUR PR…IN TERMS OF ABOVE-MENTIONED FORMULA. THE TOTAL OF THE VARIOUS F…ORS MUST ADD UP TO 100%.

FACTOR (D1, D2 etc. eg. Labour, transport	PERCENTAGE OF TENDER PRICE

NOT APPLICABLE

B. ☐ PRICES SUBJECT TO R… F EXCHANGE VARIATIONS

C.

1. **Please furnish full parti… of your financial institution, state the currencies used in the conversion of the prices of …ems to South African currency, which portion of the price is subject to rate of exchange va…s and the amounts remitted abroad.**

PARTICULARS OF FINANCIAL …ITUTION	ITEM NO	PRICE	CURRENCY	RATE		PORTION OF PRICE SUBJECT TO ROE	AMOUNT IN FOREIGN CURRENCY REMITTED
				ZAR=			
				ZAR=			
				ZAR=			
				ZAR=			
				ZAR=			

				ZAR=				

2. Adjustments for rate of exchange variations during the co t period will be calculated by using the average monthly exchange as issued by your commercial bank for the periods indicated hereund roof from bank required)

AVERAGE MONTHLY EXCHANGE RATES FOR THE PERIOD:	**DATE DOCUMEN-TATION MUST BE SUBMITTED TO THIS OFFICE**	**WHICH NEW CAL-CULATED PRICE WILL BECOME EFFECTIVE**	**DATE UNTIL WHICH NEW CAL-CULATED PRICE WILL BE EFFEC-TIVE**

D. ☐ None firm prices based on doc tary evidence (including actual supplier's invoices, motivations and rs of confirmation from the Tenderer's supplier)

NOT APPLICABLE

I/WE AGREE TO THE CONDITIONS AS SET OUT I ATTACHED SPECIFICATIONS AND CONDITIONS OF TENDERER

SIGNATURE OF TENDERER: _____

NAME OF COMPANY: _____

ADDRESS: _____

_____

CELL TELEPHONE NO: _____ FAX NO. _____

E-MAIL ADDRESS: _____

AS WITNESSES: _____Name Print _____

2. _____Name Print _____

DATE: _____

NB: This fo must be signed by the Tenderer and witnesses. Removal of any of the details from the Tender documents may disqualify the Tenderer.

AMENDMENTS AND ALTERATIONS: ANNEXURE A

If the Tenderer desires to amend, vary or alter any of the specifications, conditions of contract, schedule of prices, he/she is to state so hereunder and is to set out clearly the details and character of any amendments, variations or alterations he proposes, together with the variation in cost from his Tender price, if there be any variation.

Unless noted in this page when tendering or supported by a covering letter attached to this bid, no variations or alterations which the Tenderer desires to put forward or into effect, will be executed strictly in accordance with these documents.

SIGNATURE OF TENDERER _____

DATE: _____

ANY ENQUIRIES REGARDING THE TENDERING PROCEDURE MAY BE DIRECTED TO:

Firm	:	MVD Kalahari
Contact Person	:	Mr A Goliath
Tel	:	053 831 1889
Cell	:	082 446 8025

C3.3. LOCAL LABOUR EMPLOYMENT

The Tenderer shall list the local labourers and artisans that the tender entity proposes to use to complete the project. The policy of the Employer is to employ local labourers for any unskilled construction work and to complete construction activities with labour-intensive construction methods whenever possible.

DESCRIPTION	RATE	NUMBER
"Community Liaison Officer"	R 5,000/month	
Artisans		
Guards / Security (minimum 2)		
Unskilled Labour	R 200/day	
Other: (specify)		
Other: (specify)		
Other: (specify)		

DATE: _____ _____
SIGNATURE OF TENDERER

AS WITNESSES:

1. _____

2. _____

C3.4. FUNDING ARRANGEMENTS

The Department of Mineral Resources and Energy (DMRE) is the designated funder of the project, and project funding has been secured. Tenderers shall take cognisance of the fact that disbursement of funds will occur in tranches as set out below, and shall make appropriate provision in their programme, including preliminaries and general (P&G) costs, as well as cash flow planning:

- End of June 2026: 9%
- End of July 2026: 36%
- End of November 2026: 27%
- End of March 2027: 27%.

C3.5. SCHEDULE OF QUANTITIES

Tender No: KH38-25/26

KHâI-MA LOCAL MUNICIPALITY: COMPLETION OF OUTSTANDING WORKS OF THE MICROGRID PROJECT IN POFADDER

Schedule of Quantities

BILL 1: PRELIMINARY AND GENERAL

ITEM NO	DESCRIPTION	UNIT	QTY	RATE	AMOUNT	
					R	c
	BILL NO 1: PRELIMINARY AND GENERAL Allow for all preliminary and general items required to provide the electrical and civil installation for this project, but excluding items priced elsewhere in these Bills (These amounts will be paid pro rata to the rest of the amounts claimed by the contractor relative to the tender amount) FIXED CHARGE ITEMS Contractual requirements, establish facilities on site:					
1.1	Office and storage sheds	L/Sum	1			
1.2	Living accommodation	L/Sum	1			
1.3	Ablution and toilet facilities	L/Sum	1			
1.4	Water supplies, electric power & access	L/Sum	1			
1.5	Allow for Setting out of works	L/Sum	1			
1.6	Allow Survey and pegging of works	L/Sum	1			
1.7	Allow for all construction signs and notices	L/Sum	1			
1.8	Remove Contractor's site on completion	L/Sum	1			
1.9	Allow for project notice board	L/Sum	1			
1.10	Allow for co-operation and programming with other parties that may be working on site.	L/Sum	1			
1.11	Allow for submission for revisions of Works programme with critical path schedule.	L/Sum	1			
1.12	Allow for the submission of instruction manuals and record drawings.	L/Sum	1			
1.13	Allow for the required surety of 10 % of the contract amount.	L/Sum	1			
1.14	Allow for the required finance and retention.	L/Sum	1			
1.15	Allow for test and commissioning of the complete installation.	L/Sum	1			
1.16	Allow for off-loading and storage of material and equipment.	L/Sum	1			
1.17	Allow for on-site security guards.	L/Sum	1			
1.18	Allow for the compliance with all statutory requirements as specified.	L/Sum	1			
Total Carried Forward						

Tender No: KH38-25/26

KHâI-MA LOCAL MUNICIPALITY: COMPLETION OF OUTSTANDING WORKS OF THE MICROGRID PROJECT IN POFADDER

Schedule of Quantities

BILL 1: PRELIMINARY AND GENERAL

ITEM NO	DESCRIPTION	UNIT	QTY	RATE	AMOUNT	
					R	c
Brought Forward						
	HEALTH AND SAFETY The Contractor shall, as a condition of the contract ensure that the site of the Works and the Works at all times comply with all relevant legislation regarding Health and Safety of employees, as well as public legimately on the Site or in the vicinity of the Site, while preventing unauthorised access to the Site of the Works. Contractor to comply to the OHS Act 1993 and as amended.					
1.19	Training	L/Sum	1			
1.20	Health and Safethy Plan (documentation)	L/Sum	1			
1.21	Safety clothes and equipment (PPE), including for local labour.	L/Sum	1			
1.22	OHS Safety Officer	L/Sum	1			
1.23	PC Amount for OHS Officer by the Engineer	PC Sum	1	100,000.00	100,000	00
	TIME RELATED ITEMS Allow for the following insurance:					
1.24	Of the Works	L/Sum	1			
1.25	Public liability	L/Sum	1			
1.26	Plant and equipment	L/Sum	1			
1.27	Common law liability	L/Sum	1			
1.28	Any other insurance	L/Sum	1			
1.29	Specify:	L/Sum	1			
	Supervision and Maintenance:					
1.30	Allow for supervision	L/Sum	1			
1.31	Allow for maintenance	L/Sum	1			
1.32	Allow for project management	L/Sum	1			
1.33	PC Amount for salary of CLO (10 months)	PC Sum	1	100,000.00	100,000	00
	Contractual Requirements, establish facilities on site:					
1.34	Vehicles	L/Sum	1			
1.35	Living accomodation	L/Sum	1			
Total Carried Forward						

Tender No: KH38-25/26

KHâI-MA LOCAL MUNICIPALITY: COMPLETION OF OUTSTANDING WORKS OF THE MICROGRID PROJECT IN POFADDER

Schedule of Quantities

BILL 1: PRELIMINARY AND GENERAL

ITEM NO	DESCRIPTION	UNIT	QTY	RATE	AMOUNT	
					R	c
Brought Forward						
1.36	Telephone and fax facilities	L/Sum	1			
	Specify other related obligations not covered above:					
1.37	Specify:	L/Sum	1			
Total Carried Forward To Summary						

Tender No: KH38-25/26

KHâI-MA LOCAL MUNICIPALITY: COMPLETION OF OUTSTANDING WORKS OF THE MICROGRID PROJECT IN POFADDER

Schedule of Quantities

BILL 2: LOW VOLTAGE DISTRIBUTION AND SERVICE CONNECTIONS

ITEM NO	DESCRIPTION	UNIT	QTY	RATE	AMOUNT	
					R	c
2	**BILL 2: LOW VOLTAGE DISTRIBUTION AND SERVICE CONNECTIONS** LOW VOLTAGE DISTRIBUTION (400V) AND SERVICE CONNECTIONS (230V) **Supply, excavate, erect, install and compact low voltage poles and strut poles, including strutpole hardware as specified in the Distribution Standard.**					
2.1	9 m Wood poles, 160 mm to 179 mm top, with plant depth at 1,5 m - MATERIAL	No	8			
2.2	9 m Wood strut poles (including strut bracket,stay plate, soil anchor & anticlimbing barrier) (D-DT-0342)	No	1		Rate Only	
	Supply, excavate, erect, install, backfill and compact low voltage stays:					
2.3	Stay (D-DT-0341)	No	1		Rate Only	
	Low voltage ABC structures complete, including supply and attachment of hardware to structures and the bonding of earths to poles, excluding the pole measured above.					
2.4	Intermediate/Suspension assembly (D-DT-1100)	No	1		Rate Only	
2.5	Terminal assembly (D-DT-1120)	No	1		Rate Only	
2.6	Strain assembly <60 degrees (D-DT-1121)	No	1		Rate Only	
2.7	Strain assembly >60 degrees (D-DT-1122)	No	1		Rate Only	
2.8	T-off assembly from intermediate (D-DT-1140)	No	1		Rate Only	
	Supply, erect, install and string LV conductors complete including the splicing, clamping, terminating, tensioning, sagging and attachment to line hardware at all types of LV structures. Excavate, lay, backfill and compact low volt insulated cable and make good.					
2.9	35 mm² Aerial, bare neutral, Bundle Conductor	m	1		Rate Only	
2.10	70 mm² Aerial, bare neutral, Bundle Conductor	m	1		Rate Only	
	Earthing					
2.11	Supply, excavate, install, lay and connect the single earth peg to the low voltage network as per the Distribution Standard (including backfilling and compacting)	No	5			
Total Carried Forward						

Tender No: KH38-25/26

KHâI-MA LOCAL MUNICIPALITY: COMPLETION OF OUTSTANDING WORKS OF THE MICROGRID PROJECT IN POFADDER

Schedule of Quantities

BILL 2: LOW VOLTAGE DISTRIBUTION AND SERVICE CONNECTIONS

ITEM NO	DESCRIPTION	UNIT	QTY	RATE	AMOUNT	
					R	c
Brought Forward						
2.12	Supply, excavate, install, lay and connect the three point star earthing to the LV network as per the Distribution Standard (including backfilling and compacting) at container	No	1			
2.13	Supply, excavate, install, lay and connect the single point star earthing to the House Ready Board with UPVC conduit to outsideincluding 1,5 m copper coated earth peg, earth peg clamp, 16 mm² insulated earth wire (including backfilling and compacting)	No	20			
	Low Voltage Distribution Cable					
	Supply, delivery and installation of the following copper cables between the various distribution points in galvanised pipes bandit strapped to the pole including delivery on site, unloading and storing. Stranded copper core, PVC/PVC/SWA/PVC 600/1000V copper cables:					
2.14	35 mm² x 4-core copper core PVC/PVC/SWA/PVC cable between container and 9 m ABC pole.	m	45			
2.15	25 mm² bare copper earth wire between container and 9 m ABC pole	m	45			
2.16	50 mm Ø Galvanised pipe including stainless steel bandit strapping at 500 mm intervals	m	6			
	Supply, delivery and installation of the following copper cable terminations and glands:					
2.17	35 mm² x 4-core copper core PVC/PVC/SWA/PVC cable cable to aluminium ABC, including bi-metal (Cu/AL) ferrules with zero halogen heat shrink UV protected joints, including hydraulic crimping only with compression bi-metal ferrules in staggered formation, complete with cable boots and other accessories	No	1			
2.18	35 mm² x 4-core copper core PVC/PVC/SWA/PVC cable termination and gland at AC DB	No	1			
Total Carried Forward						

Tender No: KH38-25/26

KHâI-MA LOCAL MUNICIPALITY: COMPLETION OF OUTSTANDING WORKS OF THE MICROGRID PROJECT IN POFADDER

Schedule of Quantities

BILL 2: LOW VOLTAGE DISTRIBUTION AND SERVICE CONNECTIONS

ITEM NO	DESCRIPTION	UNIT	QTY	RATE	AMOUNT	
					R	c
Brought Forward						
	Low Voltage Pole Mounted Boxes					
	Supply, delivery and installation of **type ALLBRO low voltage pole mounted boxes**, including UV stable coating, pole mounted brackets, orange toggle curve 1 CBI circuit breaker (6kA), Conlog BEC44 PLC split pre-payment smart meter, 16 mm² UV protected copper tails, terminations and all wiring, door stay, connectors, surge arrestors, etc, as per detail drawing attached to this specification.					
2.19	Pole mounted ALLBRO, pole-top box equipped with 1 x 30A, 1-Pole MCB, and 1 x Conlog split meter, 1-connection	No	1		Rate Only	
2.20	Pole mounted ALLBRO, pole-top box equipped with 2 x 30A, 1-Pole MCB, and 2 x Conlog split meter, 2-connections	No	4			
2.21	Pole mounted ALLBRO, pole-top box equipped with 3 x 30A, 1-Pole MCB, and 3 x Conlog split meter, 3-connections	No	4			
2.22	Pole mounted ALLBRO, pole-top box equipped with 4 x 30A, 1-Pole MCB, and 4 x Conlog split meter, 4-connections	No	1		Rate Only	
2.23	Pole mounted ALLBRO, pole-top box equipped with 5 x 30A, 1-Pole MCB, and 5 x Conlog split meter, 5-connections	No	1		Rate Only	
2.24	Pole mounted ALLBRO, pole-top box equipped with 6 x 30A, 1-Pole MCB, and 6 x Conlog split meter, 6-connections	No	1		Rate Only	
	Supply and installation of overhead service connections including airdac, hardware and pre-payment meters as specified in the Distribution Standard					
2.25	Supply and installation of 10 mm² split concentric airdac from pole top box to pre-paid key pad in house.	m	450			
2.26	Supply and installation of complete 10 mm² split concentric airdac termination at pole top box (including strain clamp and connection to pre-paid meter)	No	9			
2.27	Supply and installation of complete 10 mm² split concentric airdac termination at house (including pig-tail, strain clamp and connection to pre-paid meter key pad).	No	9			
Total Carried Forward						

Tender No: KH38-25/26

KHâI-MA LOCAL MUNICIPALITY: COMPLETION OF OUTSTANDING WORKS OF THE MICROGRID PROJECT IN POFADDER

Schedule of Quantities

BILL 2: LOW VOLTAGE DISTRIBUTION AND SERVICE CONNECTIONS

ITEM NO	DESCRIPTION	UNIT	QTY	RATE	AMOUNT	
					R	c
Brought Forward						
2.28	Supply and installation of split concentric airdac suspension clamp amd pig tail at pole complete with bolt and nuts, etc.	No	9			
2.29	Issue COC for each service connection in terms of SANS 10142-1	No	20			
2.30	Obtain and compile customer information sheets for 20 x households as specified	No	20			
	General					
	Testing and Commissioning					
2.31	Allow for the testing, recording and commissioning of the LV network	Sum	1			
	Any item which the contractor deems necessary for the successful completion of the assessment stage (state in detail):					
2.32		Sum	1			
2.33		Sum	1			
2.34		Sum	1			
2.35		Sum	1			
2.36		Sum	1			
2.37		Sum	1			
Total Carried Forward To Summary						

Tender No: KH38-25/26

KHâI-MA LOCAL MUNICIPALITY: COMPLETION OF OUTSTANDING WORKS OF THE MICROGRID PROJECT IN POFADDER

Schedule of Quantities

BILL 3: PV SOLAR OFF-GRID INSTALLATION

ITEM NO	DESCRIPTION	UNIT	QTY	RATE	AMOUNT	
					R	c
	BILL 3: PV SOLAR OFF-GRID INSTALLATION					
	FACEBRICK CLADDING TO RECTIFY SKEW PV ARRAY FOOTINGS					
	Site Preparation & Setting Out					
3.1	Clear and prepare ground around all existing concrete footings.	Sum	1			
3.2	Setting out of all brick wall alignment to achieve straight and level finish.	Sum	1			
	Foundation Works					
3.3	Excavate trench for brick wall foundation to 300mm depth x 400mm wide with top of foundation 100mm below ground level. Allow for pneumatic or hydraulic jack hammer equipment to reach required depth of all excavations.	m³	16			
3.4	Cast concrete strip footing of 200mm depth x 400mm wide(20 MPa mix) with proper compaction and curing.	m³	16			
3.5	Allow for levelling of footing tops with 10MPa concrete mix to align with new brick skin.	m³	2			
3.6	Foundations to be stepped in 85mm increments to keep all brickwork level.	Sum	1			
	Brickwork Construction					
3.7	Supply and lay clay **FBS facebricks** (SABS/SANS approved) in stretcher bond - measured per square meter brick work	m²	72			
3.8	All Mortar mix: 1:5 cement:sand ratio, compliant with SANS 2001-CM1.	Sum	1			
3.9	Provide **brickforce reinforcement** every second course.	m	650			
3.10	Construct wall to clad all protruding footings, maintaining alignment despite skew footing positions.	Sum	1			
3.11	Alow for Soldier course (vertical brick finish) to top row of all brick walls for neat aesthetic finish - brickwork measured above	Sum	1			
	Filling & Packing Between Wall and Footings					
3.12	Fill gaps between new brick skin and existing concrete footings with 10 MPa concrete packing.	m³	7			
Total Carried Forward						

Tender No: KH38-25/26

KHâI-MA LOCAL MUNICIPALITY: COMPLETION OF OUTSTANDING WORKS OF THE MICROGRID PROJECT IN POFADDER

Schedule of Quantities

BILL 3: PV SOLAR OFF-GRID INSTALLATION

ITEM NO	DESCRIPTION	UNIT	QTY	RATE	AMOUNT	
					R	c
Brought Forward						
3.13	Fill gaps between new brick skin and existing concrete footings with mortar packing (Mortar mix: 1:5 cement:sand ratio, compliant with SANS 2001-CM1)	m³	7			
3.14	Compact and finish all filling to ensure stability and alignment.	Sum	1			
	Finishes					
3.15	Pointing of all joints flush and neat.	Sum	1			
3.16	Clean down all brickwork on completion.	Sum	1			
3.17	Ensure compliance with SANS 10400 Part K: Walls for structural and aesthetic standards.	Sum	1			
	PV SOLAR CONTAINER WITH EQUIPMENT					
3.18	PC Sum for the complete PV Container with inverter and BESS system including equipment as specified by an approved specialist.	PC Sum	1	1,200,000.00	1,200,000	00
3.19	Profit and attendance on the above	%	1200000.00			
3.20	PC Sum for the manufacturing and erection of a PV array steel structure by an approved specialist.	PC Sum	1	550,000.00	550,000	00
3.21	Profit and attendance on the above	%	550000.00			
3.22	Aluminium purlins, type photon solar struct mounting rail complete as per the structural drawings including all bolts, nuts, etc.	m	135			
3.23	Supply and install PV solar module alluminium anti-theft mid-clamps with earth stud for frame earth bonding, complete with all bolts and nuts, etc.	No	112			
3.24	Supply and install PV solar module alluminium anti-theft end-clamps with earth stud for frame earth bonding, complete with all bolts and nuts, etc.	No	16			
3.25	Supply and install JAM 565W MBB 144 half-cell PV modules	No	60			
3.26	Supply and install complete earth point consisting of 1,5 m copper plated single-earth rods, including earth clamps, excavations, compaction, terminations and connections to PV array steel structure columns, including 16 mm² PVC insulated copper conductors as specified and shown on the drawings.	No	4			
Total Carried Forward						

Tender No: KH38-25/26

KHâI-MA LOCAL MUNICIPALITY: COMPLETION OF OUTSTANDING WORKS OF THE MICROGRID PROJECT IN POFADDER

Schedule of Quantities

BILL 3: PV SOLAR OFF-GRID INSTALLATION

ITEM NO	DESCRIPTION	UNIT	QTY	RATE	AMOUNT	
					R	c
Brought Forward						
3.27	Supply and install 6 mm² black and red Cu PV cable including all 10 mm UPVC black cable ties, terminations and connections.	m	240			
3.28	Supply and install 6 mm² green-yellow Cu PV earth cable including all 10 mm UPVC black cable ties, terminations and connections.	m	34			
3.29	Supply and install MC4 crimp connectors complete.	No	120			
3.30	Supply and install P9000 trunking	m	10			
3.31	Supply and install DC string isolators per Dc string consisting of 2 x 1000V DC fuses, 1 x 32A DP on-load rotating lock-out DC isolator and IP67 UPVC weatherproof enclosure to house the isolator points.	No	4			
	YARD STONE					
3.32	Supply, deliver, spread, and compact 19 mm crushed stone aggregate to yard areas of PV solar array, in accordance with SANS 1083 requirements. Material to be clean, durable, and free of deleterious matter. Layer thickness 100mm, compacted to provide stable, well-drained surface suitable for access and maintenance.	m³	27			
	CABLE EXCAVATIONS Excavations as specified including backfilling and compaction					
3.33	Earth	m³	1		Rate Only	
3.34	Hard Rock	m³	9			
3.35	Imported bedding	m³	4			
3.36	Danger Tape	m	30			
	CABLE SLEEVES Double wall corrugated complete with all couplings, fittings, bends, glavanised draw wire and accessories installed in cable trenches					
3.37	110 mm Ø HDPe	m	5			
3.38	75 mm Ø HDPe	m	1		Rate Only	
3.39	50 mm Ø HDPe	m	1		Rate Only	
Total Carried Forward						

Tender No: KH38-25/26

KHâI-MA LOCAL MUNICIPALITY: COMPLETION OF OUTSTANDING WORKS OF THE MICROGRID PROJECT IN POFADDER

Schedule of Quantities

BILL 3: PV SOLAR OFF-GRID INSTALLATION

ITEM NO	DESCRIPTION	UNIT	QTY	RATE	AMOUNT	
					R	c
Brought Forward						
	SECURITY FENCE					
	Survey, setting out, supply, delivery, off-loading and installation of the complete 2,1 m high galvanised Cochrane ClearVu fence including pad-lockable sliding gate, excavations, concrete footings and compaction					
	Pole Bases / Foundations (ClearVu Fence)					
3.40	The foundations shall be excavated to the dimensions and positions indicated on the drawings. Concrete of grade 20 MPa shall be placed, compacted, and finished in accordance with standard specifications. Adequate compaction of the surrounding soil and concrete shall be ensured to achieve stability and durability of the pole bases. Allow for hydraulic or pneumatic jack hammer to excavate foundations to required dimensions.	m^3	4			
3.41	23 x 2,1 m High x 3,39 m wide clear fence panels with apertures 76 x 12 x 3 x 4 mm, 24 x 2.7 m height posts 100 x 60 mm, 24 x pole caps, 192 x fixators and tek screws (8 per post) CLASS A GALVANISED x 1 x tool bits.	m	71			
3.42	2,4 m High x 3 m wide clear fence panels with apertures 76 x 12 x 3 x 4 mm, sliding gate COMPLETE to match the fence CLASS A GALVANISED	No	1			
	COMMISSIONING AND TESTING					
3.43	Commission complete electrical installation	Sum	1			
3.44	Test and certify electrical installation according to SANS 10142	Sum	1			
	TRAINING AND MONITORING					
	Complete training, monitoring and maintenance as specified					
3.45	12-Month Monitoring and monthly report	Sum	1			
3.46	Training of technical personnel	Sum	1			
Total Carried Forward To Summary						

Tender No: KH38-25/26

KHâI-MA LOCAL MUNICIPALITY: COMPLETION OF OUTSTANDING WORKS OF THE MICROGRID PROJECT IN POFADDER

Schedule of Quantities

BILL 4 : CONTINGENCIES

ITEM NO	DESCRIPTION	UNIT	QTY	RATE	AMOUNT	
					R	c
	BILL 4: CONTINGENCIES					
4.1	Provide an amount that can be used in total or partially to cover for unforseen or additional work as instructed in writing by the Engineer. This amount will be duducted from the contract amount should it not be required. Amount = 0,10 (Sum of Bills 1 to 3) = 0,10 x R..... Amount = R.....	%	10			
Total Carried Forward To Summary						

KHÂI-MA LOCAL MUNICIPALITY

TENDER NO: KH38-25/26

COMPLETION OF OUTSTANDING WORKS OF THE MICROGRID PROJECT IN POFADDER

SCHEDULE OF QUANTITY SUMMARY

BILL	DESCRIPTION	AMOUNT
1	PRELIMINARY AND GENERAL	R -
2	LOW VOLTAGE DISTRIBUTION AND SERVICE CONNECTIONS	R -
3	PV SOLAR OFF-GRID INSTALLATION	R -
4	CONTINGENCIES	R -
	Nett Tender Total **Excluding** VAT	R -
	ADD : VAT @ 15% on Nett Tender Total	R -
	TOTAL CARRIED TO TENDER FORM, **INCLUDING VAT @ 15%**	R -

C4. CONDITIONS OF CONTRACT

The contract entered into for the work as described herein, shall comply to the *General Conditions of Contract, 2015 Third Edition*, as drawn up by the *South African Institution of Civil Engineering (SAICE)*, the *Institution of Municipal Engineering in Southern Africa (IMESA*) and the *South African Federation of Civil Engineering Contract (SAFCEC),* of which the documents will be open to inspection at the offices of the Consulting Engineer or can be obtained from anyone of the abovementioned Institutes.

C4.1. SPECIAL CONDITIONS OF CONTRACT, 2015 (GCC 2015)

The following definite conditions will be applicable to this specific contract. The description hereafter of items as specified in the *GCC 2015*, serves as extensions to the different items and must not be seen as a replacement of the *GCC 2015*.

Where any contradictions appear between the Standard Specifications of all trades, as described elsewhere in the document, the *GCC 2015* and the Tender Data, the Tender Data will be accepted as the correct specification and shall be applicable to these works.

C4.1.1. EMPLOYER (CLAUSE 1.1.1.15)

Clause 1.1.1.15 of the *GCC 2015* denotes Khâi-Ma Local Municipality**.** For the purpose of this Tender "Client" shall have the same meaning as "Employer" and the other way around.

C4.1.2. ENGINEER (CLAUSE 1.1.1.16)

"**Engineer**" means "**Any Partner, Associate or Professional Engineer**" whom is generally or specifically assigned by a Partner of MVD Kalahari to fulfil the function as Engineer on behalf of MVD Kalahari, Consulting Engineers, in terms of the GCC 2015 for the execution of this Contract.

The Engineer shall also act as the Client's Agent with contact details as stipulated under *Volume 1, T1.2 Tender Data.*

C4.1.3. ENGINEER'S REPRESENTATIVE (CLAUSE 1.1.1.17)

Should the Engineer have a Representative on site, he shall notify the Contractor in writing accordingly. For the purpose of this contract, the Representative shall, as appointed by the Engineer in writing, have the same authority as the Engineer. However, the Engineer's decision will be binding should any dispute take place.

No decision by the Representative or any work approved by the Representative shall exempt the Contractor from his responsibilities. The Engineer reserves the right to revoke any work approved by the Representative, without additional remuneration to the Contractor.

C4.1.4. VARIATION ORDERS (CLAUSE 6.3 AND 6.4)

Any work that the Contractor must or would like to do for which he would expect to receive compensation and for which no allowance has been made in this Bill of Quantities, must only be executed if written, Client approved variation orders have been issued to the Contractor. Work done for which no variation order has been issued and that has not been allowed for in the Bill of Quantities shall be done at the Contractor's own expense. Should the Contractor ask for changes or additional work without supplying the cost implications with his request, it will be accepted that there are no cost implications.

C4.1.5. AMBIGUITY IN DOCUMENTS (CLAUSE 2.4)

Should there be any contradictions, obscurities, or doubt in the text of the Tender Document or drawings, or if any obvious errors or illegible figures are found, the Contractor must, **before submitting the Tender**, get a written, signed declaration of the correct meaning of such descriptions, figures, clauses, etc. from the Engineer.

The Contractor shall not be permitted to submit any claims against the Client and/or Engineer after closing of Tender due to the abovementioned reasons.

The Contractor must examine the Tender Documents to ensure that it contains all the applicable pages and that a complete set of drawings has been issued. The Contractor must notify the Engineer accordingly should any pages and/or drawings not be there. The Engineer shall then immediately supply a complete set of Tender Documents and/or drawings in exchange of the incomplete set of Tender Documents and/or drawings.

Only information that was **formally** issued in **writing** by the Engineer to Tenderers during the Tender period will form part of the Tender. **No information** that was given **orally** to Tenderers ~~during the site inspection and/or~~ during the Tender period will be binding to the Tender and will not be deemed to be part of the Tender document. During the site inspection, certain additional information will, if deemed necessary, be included in the minutes of the site inspection, which will be issued to all Tenderers.

All information contained in the minutes of the site inspection and/or that was formally issued in writing by the Engineer to Tenderers during the Tender period will be binding to the Tender and deemed to be part of the Tender document.

C4.1.6. BASIS OF CONTRACT (CLAUSE 2)

Add the following to Clause 2:

2.1.4 The several documents forming the contract shall rank in the following order of precedence:

a. Contract Document;
b. Tender Form and Appendix;
c. Special Conditions of Contract;
d. Project Specifications;
e. General Conditions of Contract;
f. Standardised Specifications (SANS 1200) and particular specifications;
g. Drawings;
h. Schedule of Quantities and Summary;
i. Statutory Regulations and Requirements;
j. Standard SANS Specifications (not SANS 1200);
k. Other Standard Specifications

C4.1.7. SUB-CONTRACTING (CLAUSE 4.4)

Add to Clause 4.4.4:

Where so instructed by the Engineer, an independent sub-contractor shall execute work.

The independent sub-contractor for the prescribed work shall serve as sub-contractor. The Contractor for the contract shall do everything in his power and to the satisfaction of the Engineer to ensure that the incorporation of the sub-contractor with the contract will run smoothly.

The Contractor has the opportunity to allow for remuneration for his supervision and help to the sub-contractor in the Bill of Quantities and this will be taken as complete remuneration of the Contractor to comply with these instructions. The Contractor shall pay the Sub- contractor, unless differently instructed by the Engineer. Payment to the sub-contractor shall be made within 7 (seven) days after the Contractor

has received his payment. Should this not take place, interest will be paid at prime rate plus 2 (two) percent. Interest will be deducted from payment to the Contractor. The sub-contractor must supply written proof that all previous payments have been made to him before a subsequent payment will be made to the Contractor.

After expiry of the retention period, the Contractor must, when requested by the Engineer in writing, hand over a bank guaranteed cheque in favour of the Contractor to the value of the retention monies due to the Contractor, to the Engineer. The Engineer will not hand the cheque over to the Contractor until such time as the Client has paid the outstanding retention monies to the Contractor.

The Contractor shall be held responsible for any losses suffered by the Client due to delays of the sub-contractor or any other losses suffered by the Client due to actions, conduct, etc. by the Contractor or any of his staff.

C4.1.8.SECURITY (CLAUSE 6.2)

It shall be expected of the Contractor to make use of the Surety Forms included in this Tender. No sureties shall be accepted from companies in which the Contractor or his fellow partners or directors are involved.

Add the following *Sub-Clause 6.2.4* to the existing *Clause 6.2. of the GCC 2015*:

6.2.4 Should any such guarantee, Company or Bank -

a. be sequestrated, go into liquidation or be placed in execution (preliminary or finally), or
b. does not respond to a lawful finding within 7 (seven) days, or
c. enter or try to enter into a general agreement with his/their creditors, or
d. in general, does not promptly comply with his/their liabilities, or
e. give the Employer reason to being doubtful about his/their ability or preparedness to meet his/their responsibilities as in Sub-Clause (1) of this Clause [the Employer shall be entitled to ask the Contractor to supply a new surety or sureties, or a new guarantee from an Insurance- or any Registered Company or Bank within 7 (seven) days and the definition of Sub-Clause (1) of this Clause will be applicable mutates mutandis with regard to such surety, sureties or guarantee. Payment shall be in *Section A: General in the Bill of Quantities*].

C4.1.9.COMMENCEMENT OF THE WORKS (CLAUSE 5.3)

The Engineer, in writing a letter of appointment shall, inform the successful Contractor that the Client has accepted his Tender. Immediately after receiving the Engineer's letter of appointment, but no later than 7 (seven) days after the date of the letter of appointment, the Contractor shall notify the Engineer whether he accepts the appointment or not.

Should the Contractor accept the appointment, he will have 14 (fourteen) days from the date of the letter of appointment to supply the necessary sureties in favour of the Client, to the Engineer.

A suitable date for the signing of the Tender document shall be decided upon by mutual agreement, but the date of signing must be within 21 (twenty one) days after the date of the letter of appointment.

Unless the Contractor has been informed to the contrary in writing, the date of signing of the contract shall be taken as the commencement date for the period of completion in accordance with Clause 5.5.1 of the GCC 2015. The site, Tender document and drawings shall be handed over to the Contractor on this date.

The letter of appointment shall, unless the Contractor is notified to the contrary in writing, be taken as written instruction in accordance with Clause 5.6 of the GCC 2015 to commence with the work on the date of signing of the Tender. The Contractor must commence with the work within 14 (fourteen) days of the commencement date.

C4.1.10. INSTRUCTIONS (CLAUSE 5.9)

One set of drawings shall be issued together with the Tender documents. The drawings may also be inspected at the office of the Engineer during normal office hours.

The Contractor shall receive 3 (three) complete sets of drawings and 2 (two) blank documents at the handing over of the site. 1 (One) complete set of drawings and 1 (one) blank document of abovementioned drawings and documents must always be available on site for the **exclusive use** of the Engineer. Any additional drawings and documents will be supplied to the Contractor at his own expense.

Add Sub-Clause 5.9.8 to Clause 5.9:

"Only dimensions shown on the drawings may be used for the construction of the Works. **No** dimensions may be scaled down from the drawings without **written consent** from the Engineer".

C4.1.11. CONTRACTOR TO BE COMPENSATED (CLAUSE 4.5.4)

It shall be accepted that the Contractor provide for payment of Clause 4.5.4 under Section A of the **Bill of Quantities**. No further payments will be made to the Contractor under this Clause.

C4.1.12. FACILITIES FOR OTHERS (CLAUSE 4.8)

Add Sub-Clause 4.8.3 to Clause 4.8:

"The Contractor's attention is drawn to the fact that other Works by independent sub-contractor may be done simultaneously with this project.

The other Work that may be done simultaneously with this contract by independent sub-contractor is not limited.

The Contractor must ensure that neither his own nor his employees' operations interfere or place hindrances in the way of operations to be performed by the Employer or other sub-contractor. The Contractor herewith safeguards the Employer should any claims arise in this matter.

Any claims arising due to damages to existing services or works or any obstructions or hindrances caused by the sub-contractor and other parties, shall be the responsibility of the Contractor.

Any repair work, improvements or replacing of unsatisfactory work, shall be at the expense of the Contractor and to the Engineer's satisfaction".

C4.1.13. INFORMATION IN RESPECT OF EMPLOYEES (CLAUSE 4.10.2)

Replace the contents of Clause 4.10.2 with the following:

"The Contractor must supply a detailed list of supervising staff and employees taken into service for the execution of this contract, according to their respective categories, to the Engineer on a monthly basis. Such a report must be supplied during the **monthly site meeting**".

C4.1.14. QUALITY OF CONSTRUCTION EQUIPMENT (CLAUSE 7.1)

Add Clause 7.1.2 to Clause 7.1:

"The Contractor must supply a detailed inventory of construction equipment on site to the Engineer on a monthly basis. Distinction must be made between working and non-working equipment on a daily basis. Such a report must be supplied during the monthly site meeting".

C4.1.15. TESTS (CLAUSE 7.4.3)

Water pipes will be tested to ***SANS 1200*** and evaluation of density tests shall be done in accordance with ***TRH5***. There will however be no conditional acceptance of test results. Only tests requested in writing by the Engineer and that has been accepted by the Engineer, shall be considered for payment.

C4.1.16. NOTICE TO BE GIVEN WHEN READY FOR TESTING (CLAUSE 7.5.3)

The Contractor must give the Engineer at least 48 (forty-eight) hours' notice should an inspection be needed.

C4.1.17. VESTING OF PLANT AND MATERIALS (CLAUSE 6.9)

Material on site, for which the Contractor has received payment, becomes the **property** of the Client and may not be removed from the site without written consent from the Engineer. Decisions about whether material on site shall be paid, depends solely on the Engineer. Material on site shall also only be paid for if it is stored in a safe and secure place and at the discretion of the Engineer. Payment for material on site shall only be done if the Contractor supplies **invoices** to the Engineer.

The Engineer reserves the right to withhold payment for material on site, until the Contractor can supply, on request of the Engineer, **written** proof of **ownership** from the Supplier of material on site.

C4.1.18. PROTECTION OF THE WORKS (CLAUSE 8.1)

The Contractor must ensure at all times, **especially at night**, that all excavations are properly safeguarded with the necessary road signs, chevron safety bands, lights, etc. The Engineer reserves the right to instruct the Contractor to supply **additional safety measures**, **without additional payment**. Remuneration to comply with these requirements must be included in the Tendered amounts in ***Section A of the Bill of Quantities*** and no additional payment will be made.

The possible cost of shoring of excavation sides must be included in the cost of excavations. The Engineer reserves the right to request shoring or to strengthen any shoring without additional remuneration to the Contractor.

C4.1.19. INSURANCE (CLAUSE 8.6)

i. GENERAL

Remuneration of Tendered amounts for insurance under Section A of the Bill of Quantities will not be certified, unless the Contractor can prove that instalments have been paid. Engineer can at any time request proof of payment. Receipts will not be accepted as sufficient evidence. Written proof from the Insurer shall be required.

ii. INSURANCE AGAINST "POLITICAL RIOTING" ADD (*CLAUSE 8.6.1.2*)

Insurance against "Political Rioting" must be taken out on the contract. "Political Rioting" risks must be considered only as the risks for which the South African Special Risk Insurance Association provides for, according to their Regulations that are valid for the duration of the Tender.

The Client must submit any delays of the contract as a direct result of riots to the Engineer for consideration. The Engineer and the Client shall consider every case on merit.

The Contractor must indemnify the Client against all damages as a result of riots under Section A in the Bill of Quantities. The Client shall not compensate the Contractor for any damages due to rioting.

With the stipulation of the insured amount in accordance with *Clause 8.6.1.1* of the *GCC 2015*, an amount equal to at least 10 (ten) % of the contract value must be supplied for Professional fees for *Clause 8.6.1.1.2* of the *GCC 2015*.

C4.1.20. PROGRESS OF THE WORKS (CLAUSE 5.7)

Add the following to Sub-Clause 5.7.1:

"No instruction of the Engineer to the Contractor to speed up the progress of the work, shall entitle the Contractor to additional remuneration, unless such instruction specifically mentions that the Contractor is entitled to additional remuneration, as well as the amount of remuneration, or in which way such remuneration will be calculated".

C4.1.21. TIME FOR PRACTICAL COMPLETION (CLAUSE 5.5.1)

The Time for Practical Completion specified for all sub-sections of this contract shall be specified by the Contractor in the Contract Data.

C4.1.22. EXTENSION OF TIME DUE TO ABNORMAL CLIMATIC CONDITIONS (CLAUSE 5.12.2.2)

Should there be any **abnormal rain and/or wet conditions** during the period of completion of the Works or any extension of time, as granted under *Clause 5.10* of the *GCC 2015*, an extension of time will be granted in accordance with Clause 5.10 of the *GCC 2015* by the Client in accordance with the following formula for each calendar month or part thereof:

$$V = (Nw - Nn) + \frac{(Rw - Rn)}{X}$$

V	=	Delay due to rain in calendar days for the calendar month under consideration.
Nw	=	Actual number of days during the calendar month on which a rainfall of Y mm or more per day has been recorded.
Nn	=	Average number of days, as derived from existing official records, on which a rainfall of Y mm or more has been recorded for the calendar month.
Rw	=	Actual rainfall measured in mm for the calendar month under consideration.
Rn	=	Average rainfall in mm as derived from official records for the calendar month.

Nn, Rn, X and Y's values shall be as given hereunder.

The total extension of time granted due to abnormal rainfall and/or wet conditions, according to *Clause 5.12.2.2* of the *GCC 2015,* shall be the algebraically sum of all monthly totals for the time under consideration. **Should the figure be negative due to less than average rainfall, the time for completion will not be reduced.** Extension of time for part of a month will be determined with a pro-rata value for Nn and Rn.

The abovementioned comparison does not provide for flood damages that might have further or concurrent delays. Possible claims due to flood damages will be handled separately with regard to extension of time.

The factor (Nw-Nn) shall be considered to represent a fair allowance for variations from the average number of days during which rainfall exceeds Y mm. The factor (Rw-Rn)/X shall be considered to represent a fair allowance for variations from the average in the number of days during which the rainfall did not exceed Y mm, but wet conditions prevented or disrupted work.

Below are the values that must be used for determining the extension of time due to abnormal rain.

MONTH	Rn	Nn	
JANUARY	83	7	
FEBRUARY	83	9	
MARCH	81	9	
APRIL	50	6	
MAY	20	3	
JUNE	7	2	X = 10 mm
JULY	3	1	Y = 5 mm
AUGUST	8	2	
SEPTEMBER	6	1	
OCTOBER	27	4	
NOVEMBER	43	6	
DECEMBER	46	6	

Accurate rain gauging's shall be taken at a suitable point on the site daily at **08:00** unless otherwise agreed to by the Engineer and the Contractor shall, at his own expense, take all necessary precautions to ensure that the rain gauges cannot be interfered with by unauthorized persons.

Information regarding existing rainfall records, if available from a suitable rainfall station near the site, will be supplied in the project specifications together with calculations of rain delays for previous years in accordance with the above formula. The average of these delays will be regarded as normal rain delays which the Contractor shall accommodate in his programme, and for which no extension of time will be considered.

If no suitable rainfall records are available, the above formula will not apply.

C4.1.23. PENALTY FOR DELAYS (CLAUSE 5.13)

The amount due to the Client by the Contractor for damages incurred because of delays as defined in Clause 5.13 of the GCC 2015, amounts to the contract value x (5.75 c per R 100.00 per calendar day). The Employer reserves the right to recover actual losses where applicable.

Add Sub-Clause 5.13.3 to Clause 5.13:

"Notwithstanding abovementioned, should the construction fall behind with regard to the construction program as submitted in terms of *Clause 5.6*, or any changes in terms of *Clause 5.5,* then, after written instruction has been given in this matter, the Engineer will give the Contractor 7 (seven) days grace to catch up. Should the Contractor fail to catch up with the construction program, **the Client will have the right to appoint any other Contractor to help the Contractor to catch up on lost time, or to complete the outstanding work on behalf of the Contractor under this Contract**.

In the event where such an additional contractor gets appointed to complete the outstanding work, the Contractor shall be obliged to remunerate the additional Contractorfor such work in terms of this Contract. Any difference in costs as asked by the additional Contractor and the cost of the concerned work as Tendered by the Main sub-contracto rand as adjusted by the Price Adjustment Formula, where applicable, shall be carried by the Contractor".

C4.1.24. METHOD OF MEASUREMENT (CLAUSE 6.7.5)

The Engineer shall do measurement for the monthly payment certificates. Where ways of calculating for quantities for the Bill of Quantities differ from ways of calculating as set out under Standard Specifications, the way it has been set out in the Bill of Quantities, shall be used. Measuring shall be done in accordance with the **drawings** or the **altered drawings**.

C4.1.25. ADDITIONAL WORK (CLAUSE 6.3.1.5)

Only additional work, for which the Contractor received **written notification** from the Engineer, shall be remunerated. The Contractor must **apply** in writing to **request** remuneration for additional work. Also see *C4.1.4* Variation Orders (Clause 6.3 And 6.4)*, page 162*

C4.1.26. INTERIM PAYMENT (CLAUSE 6.10.1)

Payment shall be done in accordance with ***Clause 6.10.1*** of the *GCC 2015*.

C4.1.27. VARIATIONS EXCEEDING 15% (CLAUSE 6.11)

For the purpose of this Tender the abovementioned Clause shall change so that **15** (fifteen) % reads **20** (twenty) %.

C4.1.28. COMPLETION (CLAUSE 5.14)

The Engineer is entitled to approve work as it is completed. Work that has been approved shall not be taken as acceptable for *taking-over* with regard to **retention purposes**, unless a certificate has been issued in this regard. Taking-over with retention in mind, shall only take place with the completion and approval of the Works.

C4.1.29. DEFECTS LIABILITY PERIOD (CLAUSE 1.1.1.13)

The duration of the Defects Liability Period of the Works, as set out in ***Clause 1.1.1.13*** of the *GCC 2015*, are 12 (twelve) months from the **date of completion** of the Works as certified by the Engineer.

C4.1.30. TERMINATION BY EMPLOYER (CLAUSE 9.2)

Further to ***Clause 9.2*** of the *GCC 2015,* the Contractor shall supply the Engineer with a complete list of equipment, as well as a declaration of ownership of such equipment, i.e. also rented equipment. It is necessary that the ownership of the equipment be declared, especially with reference to confiscation when the Works are set foot on by the Employer in terms of ***Clause 9.2*** of the *GCC 2015.*

C4.1.31. QUALITY MANAGEMENT SPECIFICATION

The Contractor is required to prepare and submit a Quality Control Plan (QCP) for review and approval by the Engineer prior to commencing any work on the project.

Additionally, the Contractor must compile a Construction Databook for the works. The Client or Engineer will provide the approved Construction Databook Index at the start of the project as a guideline.

The completed Construction Databook must be delivered in both hard copy (physical file) and electronic format. The electronic version must adhere to the structure and sequence outlined in the provided Construction Databook Index.

C5. SPECIFICATIONS

C5.1. STANDARD SPECIFICATIONS

The ***Standard Specifications*** on which this contract is based are scheduled below. Although not bound or issued with this document, the following sections of the *Standardised Specifications* shall form part of this contract:

Topic	**Document**
Aerial Bundled Conductor	SABS 1418, Part 1 to 3 DTS 0105 (NRS 018)
Bolts and Nuts	SABS 135
Bolts, Eye	SABS 178
Busbars	SABS 1195
CNE	SABS 1268:1979 NRS 016:1991
Cables, installation of electric	SABS 0198:1988
Cables, low voltage	NRS 012:1991
Cables, medium voltage	NRS 013:1991
Cable (house service split concentric)	DTS 0084 (NRS 017)
Cable Glands	SABS 808
Cable Ties	DTS 0086 (NRS 020)
Clamps (strain for split concentric)	
Clamps (suspension for split concentric)	
Clamps Strain	SABS 178
Clevis Tongue Adaptor (twisted)	SABS 178
Clips for Wiring	
Compression Fittings	BS 3288 Part 1 (Tests)
Concrete Poles	SABS 470
	DTS 0106
Conductor ACSR/AAC and AAAC	SABS 182
Conductor, Covered	DTS 0087 (NRS 021)
Conduit Saddles	
Conduit	
Connectors, lug/termination	NRS 028
Connectors, insulation piercing	EDF 6737/HN 33 E60 (Main cable 350 mm² to 70 mm², takeoff 6 mm² to 35mm²)
Connectors, mid-span/full tension	BS 3288 (Tests)
Connectors, mid-span/no tension	SABS 0162
Connectors	SABS 1200 H/HA
Cross Arm Braces	

Topic	Document
Cross Arms	SABS 0162
	SABS 1200 H/HA
D Fuses	DTS 0048 Rev 0
Earthing Rods	SABS 1063
	SABS 0199
Electricity Dispenser	SABS 1524-1
	NRS 009-1
Fittings (strain and suspension)	
ABC	DTS 0105 (NRS 018)
Fuse Holder	SABS 172
Fuses	BS 88
Galvanizing	SABS 763:1988
	SABS 935
Harness Wiring	
Insulator Hardware	IEC/NWS 1536
Insulator Spindle	DTS 0092
Isolators	SABS 0162
	SABS 1200 H/HA
Line Construction	NWS 1512
Links Trilinks	IEC/NWS 1536
Links, ganged 3 phase (isolators)	IEC/NWS 1536
Links, pull Stick (knife links)	IEC/NWS 1536
Links, single Pole "Huklinks"	IEC/NWS 1536
Long Rod Insulators	DTS 0092
Miniature Circuit Breakers OHASA Act (1993) and it's regulations and amendments	SABS 156
Pole Top Service Box	DTS 0104 (NRS 032)
Post Insulators	DTS 0092
Preformed Tension Wraps	SABS 178
Preformed Ties	
Ready Boards	DTS 0085 (NRS 019)
Reticulation LV	DTS 0090 (NRS 023)
Road crossing standard	DTS0060
Safety on Construction Sites	NWS 1058
Service box	DTS 0104 (NRS 032)
Stainless Steel Straps and Buckles	
Stay Assemblies	BS 16
Stay Attachment Brackets	SABS 0162
Stay Insulators	
Stay Wires	SABS 182, Part 5
Surfix Wiring	SABS 1507

Topic	Document
Surge Diverters	NWS 1108
Symbolic Safety Signs	SABS 1186:1978
Thimbles	BS 464
Transformers, 100 kVA self-protected	DTS 0080 (NRS 027)
Transmission line hardware	NWS 1827
Washers	SABS 135
Wire, PVC Covered	SABS 182
Wire Rope Grips	BS 462
Wire, Stranded Copper, bare	
Wood Poles, pine gum	SABS 753
	SABS 754

Title	Document
The wiring of premises; Part 1: Low Voltage Installations	SANS 10142-1: 2012: Edition 1.8 and as amended
Additional special requirements for low voltage small scale embedded generator installations connected in parallel to the normal electrical supply	SANS 10142-1-2: 2012: The wiring of premises; Part 1-2
Requirements for special installations or locations-Solar PV power supply systems	IEC 60364-7-712
UPS Systems-General and Safety Requirements for UPS used in operator access areas	IEC 62040-1-1. Fist Edition
Electronic Equipment for use in Power Installations	IEC 62103:2003. Edition1
Limits for harmonic current emissions	IEC 61000-6-2, IEC 61000-6-3, IEC 61000-3-11, IEC 61000-3-12
Characteristics of the Utility Interface	IEC 61727
Safety of Static Inverters	IEC 62109
Testing procedure of Islanding Prevention Methods for Utility-Interactive Photovoltaic Inverters	IEC 62116
Photovoltaic (PV) arrays - Design requirements	IEC 62548-1: 2023
Photovoltaic (PV) systems - Requirements for testing, documentation and maintenance - Part 2: Grid connected systems - Maintenance of PV systems	IEC 62446-2:2020
Grid interconnection of embedded generation Part 2: small-scale embedded generation	NRS 097-2-1:2017 Edition 2

Title	Document
Overhead Reticulation: Recommended Practice for Low Cost Urban Reticulation	NRS 023 : 1991 (DTS 0090)
Electrification Standard: Volumes 1 & 2.	
Code of Practice for the Application of CNE on Low Voltage Distribution Systems.	NRS 016 : 1991 (DTS 0103)
Power Line Crossings of Proclaimed Roads, Railway Lines, Tramways and Important Communication Lines.	DTS 0060 z
Code of Practice for the Joint use of Structures for Power and Telecommunication Lines.	NRS 043 of 1997

Document	Rev./Issue	Title and Publisher
Act no. 43	1983	Conservation of Agricultural Resources Act.
Act no. 73	1989	Environmental Conservation act.
Act no. 31	1963	Fencing Act.
Act no. 122	1984	Forest Act.
TRH14	1985	Guidelines for road construction materials
Act no. 63	1970	Mountain Catchments areas act.
Act no. 85	1993	Occupational health and safety act.
SAISC	1990	South African Steel Construction Handbook
NWP 3109		Standard drawing practice
NWS 1017		Accident Prevention
NWS 1494	3	Fire prevention and protection of contractors and premises on Engineering sites
NWS 1060		Injury prevention and protection
NWS 1814/C1		Quality assurance requirements for civil and building contracts
NWS 1058	4	Safety at construction sites: Requirements to be met by Contractors

C5.2. PROJECT SPECIFICATIONS

The Project Specification, consisting of two parts, forms an integral part of the Contract and supplements the Standard Specifications.

Part A contains a description of the project, general information and a general description of the works, the site and the requirements to be met.

Part B contains variations, amendments and additions to the Standardised Specifications and, if applicable, the Particular Specifications.

In the event of any discrepancy between a part or parts of the Standardised and Project Specifications, the ***Project Specifications*** shall take precedence and shall govern. In the event of a discrepancy between the Specifications (including the Project Specifications and the drawings and/or Schedule of Quantities, the discrepancy shall be resolved by the Engineer before the execution of the works under the relevant item.

C5.3. PART A: PROJECT DESCRIPTION AND GENERAL INFORMATION

C5.3.1. SCOPE AND OVERVIEW OF THE WORKS

The Microgrid installation entails the following:

a) Design, manufacture, supply, deliver, off-load, safe storage, install, commission and 12-month mon-itoring of a 33.3kWp PV Solar Off-Grid installation consisting of a containerised Inverter and BESS system with mechanical air-conditioning, fire detection/protection and small power and light-ing, in-cluding a ground mount fixed -angle PV Solar Array structure. A PC sum is allowed for this item in the bills of quantities.

b) Supply, deliver, off-load, safe storage, install and commissioning of overhead service connections consisting of split concentric airdac and split pre-payment PLC meters, including a TN-C-S earthing system.

c) Training of Municipal staff with respect to the operation and maintenance of the PV Solar Off-grid system.

d) 12 Month Monitoring of the PV Solar off-grid system including a monthly report based on data.

e) 12 Month maintenance of the PV Solar off-grid system.

f) Compliance with Health and Safety based on latest construction health and safety requirements.

C5.3.2. EXTENT OF THE WORKS

The Works should be executed in total to Employer's discretion, as per designs and in accordance with the relevant specifications and Employer standards.

GENERAL

a) The Khâi-Ma Local Municipality is the Supply Authority.
b) The systems voltages are 11kV, 400V and 230V.
c) No MV network installations will be required.
d) Design and erection of an off-grid PV solar installation including a containerized Inverter/BESS sys-tem with the required mechanical air-conditioning, small power and lighting, fire detection and sup-pression installation, and Wi-Fi connection. A PC sum is allowed for this item in the bills of quantities.

e) Erection of a ground mount fixed-angle PV array structure with PV solar modules. A PC sum is allowed for the PV array steel structure in the bills of quantities.
f) Erection of an earthing/bonding system for the PV Array and Container
g) Erection of new overhead service connections with split pre-payment PLC meters, type Conlog which must comply with the vendor group code of the Khâi-Ma Local Municipality, including eart peg installations at each house.
h) Testing and commissioning of the complete installation which includes the LV ABC backbone, which is already constructed, including issuing of COC's, "as built" drawings and O & M manuals.
i) Training of Municipal staff with respect to the operation and maintenance of the PV Solar Off-grid system and ancillary systems system.
j) 12-Month Monitoring of the PV Solar off-grid system including a monthly report based on data.
k) 12 Month maintenance of the PV Solar off-grid system.
l) Compliance with Health and Safety based on latest construction health and safety requirements.

All electrification material will comply with standards as per Distribution Standards, Part 9. Conductors should not be marked.

- **Drawings**

The reduced scale drawings that form part of the tender documents shall be used only for tender purposes. Only "Approved for Construction" drawings may be used for the execution of the Contract. It must be noted that certain specifications which may appear on the drawings are not necessarily repeated in the Project Specifications. Where applicable certain items in the Schedule of Quantities refer to the drawings.

ELECTRICAL DRAWINGS	
Drawing number	Description
3094/K/D/D/001	DRAWING LIST
3094/K/G/L/001	MICROGRID SITE LAYOUT
3094/K/G/L/002	INVERTER/BATTERY CONTAINER LAYOUTS
3094/K/G/SLD/001	PV SOLAR OFF-GRID INSTALLATION -SINGLE LINE DIAGRAM
3094/K/G/D/001	POLES SPECIFICATIONS DETAIL SHEET
3094/K/G/D/002	CLEARVU DETAIL
3094/S/S/L/001	CONCRETE AND STEEL LAYOUT
3094/S/S/S/001	SECTIONS
3094/S/R/L/001	CONCRETE REINFORCEMENT LAYOUT
3094/S/S/D/001	CONNECTION DETAILS SHEET 1 OF 2
3094/S/S/D/002	CONNECTION DETAILS SHEET 2 OF 2

C5.3.3. LOCATION OF THE WORKS

The project is located within Khâi-Ma Local Municipality; the project coordinates are as follows.

GIS reference:

DESCRIPTION	LATITUDE	LONGITUDE
Pofadder Microgrid Site	29° 7'47.57"S	19°23'8.90"E

The following conditions prevail at the site:

a) Height above sea level: 992m
b) Maximum atmospheric temperature: 45°C
c) Minimum atmospheric temperature: -5°C

All equipment supplied and installed for this project shall be suitable for continuous operation at full capacity under the above conditions.

C5.3.4. OTHER GENERAL REQUIREMENTS

C5.3.4.1. PROGRAMME ALLOWANCES

The Contractor's programme shall take the following into consideration:

i) expected normal climatic weather conditions;
ii) special non-working days as stipulated in the Contract Data;
iii) expected value of the work performed for each activity;
iv) stipulate any other information required by the engineer.
v) the disbursement of funding as noted under Funding Arrangements, see item C3.4

C5.3.4.2. PROCEDURES DURING CONSTRUCTION

The Contractor to supply, keep up to date and keep the following documents on-site on a daily basis:

I. A full set of the latest construction drawings to be on-site permanently for use by the Engineer and others;
II. The Contractor to supply and keep on-site an A4 triplicate site instruction book, which must be presented to the engineer at all site meetings and site inspections;
III. The Contractor is to supply an A4 duplicate diary on-site to be signed off by the Engineers representative. The Contractor to keep a daily diary, with at least the following information:
- Weather condition
- Record of any accidents and detail
- Record of construction activities of the day with associated units measures of progress for each activity.
- Record of resources (labour, materials, plant, etc.) utilized daily.
- Information of any strikes
- Any other relevant information

C5.3.4.3. SITE FACILITIES AVAILABLE

C5.3.5.3.1 Source of Water Supply

The Contractor is to make his own arrangements with the local authorities to supply water for construction purposes.

C5.3.5.3.2 Source of Power Supply

The Contractor is to make his own arrangements with the local authorities for the supply of electricity from a metered point on the existing electrical network at the current electricity rates as stipulated by the Municipality.

C5.3.5.3.3 Location of Camp and Depot

The Contractor is responsible for his own secure campsite and should make arrangements with the local authority. The Contractor shall make his own arrangements for the accommodation of labour.

C5.3.5.3.4 Borrow pit for gravel and bedding material

Bedding and blanket material can be obtained from the municipal borrow pits. If not suitable, material must be imported.

C5.3.4.4. TIME-RELATED ITEMS

An approved extension of time (other than an extension of time granted in terms of Clause 5.12 of the Conditions of Contract) will entitle the Contractor to submit a claim for additional payment. Any such approved additional payment will be made for proven additional costs for each relevant time-related item but will be limited to a maximum amount determined from the sum tendered for such item and from the designated operation, the period stated for the completion of the item or the tendered contract period, as applicable.

C5.3.4.5. PROJECT NAME BOARD

The Contractor must make provision for two (2) project name boards as per the drawings bound in the document, and the position of the name boards must be communicated with the Employer.

C5.3.4.6. PROTECTION FROM STORMS AND FLOODS

The sum allowed for in the Bills of Quantities shall be deemed to be full compensation for any damage to the Works due to storms, rain, floods, stormwater or subsurface water.

Under no circumstances shall the Contractor be entitled to any additional payment in this regard. The Contractor shall accept full responsibility and costs to handle water from any source on the Site. The preceding shall imply that the Contractor shall also be responsible for the necessary arrangements with regard to the provision of Special Risk Insurance to address any such of the abovementioned occurrences, and the sum allowed for in the Schedule of Quantities shall be deemed to be full compensation for maintaining any such insurance during the full period of the contract.

C5.3.4.7. EXISTING SERVICES

It shall be the full responsibility of the Contractor to obtain Way Leaves from the Local Authorities or any other Service Provider Institutions (Eskom, Telkom, etc) regarding any existing services that will have an impact on the Works or the execution thereof. The Contractor shall make further investigations to determine the exact locality, size and depth of existing connections and/or pipelines before commencing with construction to ensure that no damage is done to any existing pipes or fittings.

The Contractor shall take all reasonable precautions to protect existing pipelines/services during construction and during relocation of such services. Way-leave arrangements to be made with Telkom, Eskom, Provincial roads and Municipality on the identification of existing services.

Any pipe, cable, conduit or other services of any nature whatsoever indicated to the Contractor and subsequently damaged as a result of the Contractor's operations shall be repaired and reinstated forthwith by the Contractor or by the authority concerned, all at the expense of the Contractor and to the satisfaction of the Engineer. Whenever services are encountered which interfere with the execution of the Works and which require removing and relocating, the Contractor shall advise the Engineer, who will determine the extent of the work, if any, to be undertaken by the Contractor in removing, relocating, and reinstating such services.

Any work required to be undertaken by the Contractor in the moving and relocation of services for which no provision is made in the contract documents or for which no applicable tender rates exist will be classed and paid for as "Daywork" as prescribed in the General Conditions of Contract.

The Contractor shall work in close co-operation with personnel of the Municipality controlling services that must be protected, removed or relocated. No undertaking can be given as to the exact time of commencement or of completion of the relocation, removal or protection of services, which have to be carried out by the Board or controlling authorities themselves. The Contractor is to make an allowance in his programme for this contingency.

Where services have to be removed or relocated, or protected, the Engineer will, at the request of the Contractor, notify or negotiate with the Municipality or authorities controlling those services, but the Employer does not accept liability for any costs resulting from delays in the relocation, removal or protection of any service, or delays as a result of delays in negotiations. The sum allowed for in the Schedule of Quantities shall be deemed to be full compensation for the location and protection of existing services.

C5.3.4.8. MUNICIPAL STANDARDS

The distribution system shall be operated and maintained by the Khâi-Ma Local Municipality of Pofadder. Hence the standard of workmanship and the standard of the materials are subject to approval by the Head of the Electrical Division of the Council of Khâi-Ma Local Municipality. This approval shall be obtained via the Electrical Consultant

C5.3.4.9. PC AMOUNTS

PC amounts have been provided in the Schedule of Quantities. Such PC amounts are to be used at the sole discretion and direction of the Engineer. The electrical contractor shall have no claim against the Client if such PC amounts, in part or total, are not expended on the Contract Works

C5.3.4.10. ITEMS FOR APPROVAL

Where the specification refers to specific items, manufacture type and where specified "of equal quality and approval", written approval shall be obtained from the Engineer, prior to the deviation of the specification for the equipment.

No equipment shall be installed without being approved by the Engineer. On request, the contractor shall submit samples of equipment for approval. If necessary, tests shall be carried out as to determine the quality of such samples.

C5.3.4.11. SWITCHING AND POWER OUTAGE

Switching shall be carried out by the electrical maintenance division of the Municipality. No unauthorised switching shall be allowed. Switching shall be kept to a minimum once the electricity distribution system has been handed over and throughout the retention period. If further switching is necessary, it shall be carried out in collaboration with the Municipality. All switching shall be executed via a formal switching permit system.

C5.3.4.12. ACCOMMODATION OF TRAFFIC AND PUBLIC ACCESS

During all his operations and when using his machinery, plant and equipment, the Contractor shall at all times take the necessary care to protect the public and to facilitate the traffic flow. The Contractor must make provision under the designated tariff in the Preliminary and General cost to allow for the following:

I. To create temporary access for both vehicles and pedestrians

II. To provide detours where necessary

III. To provide, install and maintain traffic- and warning signs as required

C5.3.4.13. SETTING OUT OF WORKS

All setting out required to carry out the work shall be undertaken by the Contractor. Setting out of the Works to be priced for in the item provided. The Contractor shall provide for two (2) surveyor assistants to be made available to the Engineer or his representative during the works. The survey equipment must be available on-site for the full duration of the works.

C5.3.4.14. TEMPORARY OFFICE AND COMMUNICATION FACILITIES

No office shall be specifically required for the Engineer or his representative, but the site office of the contractor must be made available and so equipped that the Engineer, his representative or the Community Liaison Officer can perform their work undisturbed at any time during the works. The Contractor shall make provision at his own cost for efficient communication between his site office and the office of the Engineer for the duration of the contract as provided for in the Preliminary and General cost items.

C5.3.4.15. SAFEGUARDING OF MATERIAL, EQUIPMENT AND PROPERTY

The contractor is responsible for providing the necessary precautionary measures to ensure the safety and protect the Works against any losses and vandalism that can occur. The Contractor shall make provision at his own cost for precautionary safeguarding measures for the duration of the contract as provided for in the Preliminary and General cost items.

C5.3.4.16. SANITARY CONDITIONS

The Contractor shall ensure that, during the period of construction, sanitary conditions prevail on the site and surrounding areas. Unhygienic behaviour that may cause contamination of the works or the surrounding area is strictly prohibited, and the Contractor shall bear full responsibility for providing sanitary facilities in accordance with the regulations of Local Authorities and Specifications within the contract.

C5.3.4.17. DEALING WITH WATER

The occurrence of rainwater and/or seepage in pipe trenches and excavated ponds after abnormal rainfall shall be removed, and treatment of water shall be executed by the Contractor at his own cost. The extension

of time granted for abnormal rainfall conditions shall be taken as sufficient compensation for the removal of rainwater or seepage and/or for the treatment of water in trenches and ponds as a result of seepage or rainwater accumulation after the occurrence of abnormal rainfall.

C5.3.4.18. CONSTRUCTION IN CONFINED AREAS

It may be necessary for the Contractor to work within confined areas, and no additional payment will be made for work done in restricted areas. The method of construction in these confined areas will depend largely on the Contractor's construction plant. However, the Contractor shall note that measurement and payment will be only in accordance with the specified cross-sections and dimensions and that the tendered rates and amounts shall include full compensation for all special equipment and construction methods and for all difficulties encountered during working in confined areas and narrow widths, and at or around obstructions, and that no extra payment will be made nor will any claim for additional payment be considered in such cases.

C5.3.4.19. DENSITY TESTS / CONCRETE CUBES

The Contractor shall carry out his own density tests on each compacted layer, and these tests shall be submitted to the Engineer for scrutiny and approval before commencing with the construction of the following item and/or stage. The sum allowed for in the Schedule of Quantities shall be deemed to be full compensation for the full-time instalment of the required testing equipment and for the cost of all required testing procedures to be carried out on-site for the duration of the works.

The Contractor also needs to do his own concrete cube tests, which are to be handed to the Engineer for scrutiny and approval. The Engineer may order that further control tests are to be taken.

The Engineer may order that control tests be taken by his own or another independent laboratory. A provisional sum is provided in the Bills of Quantities to allow for the cost of control tests.

The sum allowed shall, however, be under the control of the Engineers, and payment shall only be made to the Contractor on receipt of proof of expenses incurred by the contractor for the tests, i.e. payments to be made to an independent laboratory.

Should these control tests indicate failure to obtain the required standards, the cost of the tests shall be for the Contractor’s account. The required Cube tests and Density tests carried out by the Contractor in the normal course of his work shall not be covered by this Sum and shall be carried out at his own expense. The tendered rates in the Bills of Quantities shall be deemed full compensation for the testing of materials.

C5.3.4.20. COMMUNITY LIAISON OFFICER (CLO)

The CLO official shall be identified by the Employer to act as a liaison person between the Contractor and the persons to be employed. The liaison officer must be appointed by the process of appointment, and the job description is available from the Employer or the employer's Agent, which must be communicated to him/her after the appointment. The remuneration of the CLO must be in line with the rates of the area and is fixed at a minimum of **R10,000.00 per month.**

C5.3.4.21. LABOUR INTENSIVE ACTIVITIES

The normal rules and regulations in terms of the Labour Act must be adhered to. Minimum wages for the region must be paid to the labourers, and formal Labour-contract documentation must be in place during the construction period. The minimum labour wage of R38.50 per hour will be applicable for this contract. The appointment of Local Labour shall adhere as far as possible to the requirements stipulated by the WSIG Project Requirements for the full duration of the works. The contractor shall be responsible for submitting, together with his monthly performance claims, a complete detailed record of all labour on-site to the Engineer for the processing of monthly payment certificates, and failure to do so will result in a breach of contractual compliance and nor the Employer nor his agent will be held liable for late payments to the Contractor.

The following activities must be executed with local labour:

- General labour

- Pipe handling and laying.
- Bedding and blanket material
- Backfilling of trenches
- Building of manholes
- Repair / Installation of fencing
- Final site clearance
- Hand excavation close to existing services
- Planting of grass

C5.3.4.22. CLASSES OF EXCAVATION

Estimated quantities of expected soft and hard rock excavations are provided in the Schedule of Quantities, and materials shall only be classified as soft or hard rock material for the purpose of this contract and shall be classified as such by the Engineer on site.

All material encountered in any excavations for any purpose, including restricted excavation, will be classified as follows:

I. Hard rock excavation

Hard rock excavation shall be excavation in material (including boulders exceeding 0.15 cubic metres in individual volume) that cannot be efficiently removed without blasting, wedging, splitting or a mechanical hammer. Construction takes place close to structures, and it is highly likely that mechanical hammers will be required.

II. Soft excavation

Soft excavation shall be all material not falling into the category of hard rock or intermediate excavation.

C5.3.4.23. QUALITY CONTROL BY THE ENGINEER

Except for the quality control measures that must be implied by the Contractor, the Engineer can arrange and execute his own quality control inspections. Invoices will be forwarded to the Contractor for payment and to claim with a 10 % markup. However, in the case where the Contractor fails to comply with the required quality control measures during the execution of the works, the Contractor shall be liable for all costs resulting from quality control tests and/or inspections carried out by the Engineer.

C5.4. PART B: AMENDMENTS TO THE STANDARD SPECIFICATIONS

In certain clauses the *Standard Specifications* allow a choice to be specified in the Project Specifications between alternative materials or methods of construction and for additional requirements to be specified to suit a particular contract. Details of such alternative or additional requirements applicable to this Contract are contained in this part of the Project Specification. It also contains additional specifications required for this particular contract.

C5.4.1. PROJECT SPECIFICATION

C5.4.2. PV SOLAR OFF-GRID INSTALLATION

1.1. SCOPE OF WORK

The scope of work of this contract includes the design, supply, delivery, installation, testing, commissioning and handing over in good working order of a Solar PV Off-Grid installation, with associated peripherals, for the Completion of the Outstanding Works for the Microgrid Project in Pofadder, Northern Cape.

This specification forms an integral part of the contract documentation and shall be read in conjunction with conditions of contract, The Bills of Quantities, Tenderers Schedules and The Drawings. Any contradictions shall be referred to the engineer for a final ruling.

1.2. EXTENT OF WORK

The extent of the work includes the design, supply and installation of all equipment, peripherals, software and sundries necessary for the completion of the installation, although not specifically mentioned or specified, encompassing:

a) The construction of a single facebrick cladding skin to the exposed sides of the concrete foundation footings. The brick skin is to be set out true to line and level, thereby providing alignment and an aesthetically acceptable finish to the PV array support bases. A PC sum is allowed for this item in the bill of quantities.
b) The supply, manufacture, delivery and installation of a steel PV array structure as shown on the drawings. A PC sum is allowed for this item in the bill of quantities.
c) The design, supply and installation of an earthing and lightning protection system including all excavations, earth rods, cabling, finials, nuts, bolts, etc. as specified and indicated on the drawings, and all the equipment required by the Contractor to provide a complete and neat workable installation. The design shall allow a modular system to cater for future expansion.
d) The design, supply and installation of 565W, MBB, Mono-crystalline Solar PV Modules mounted on the fixed-axis array structure as specified and indicated on the drawings.
e) The design, supply and installation of all PV cabling- and wiring, PV connectors, P2000 trunking, unistrut brackets, conduiting, etc., and all the equipment required by the Contractor to provide a complete and neat workable installation.
f) The design, manufacture and erection of a containerized Inverter/BESS system with the required mechanical air-conditioning, small power and lighting, fire detection and suppression installation, and Wi-Fi connection. A PC sum is allowed for this item in the bill of quantities.
g) The design, supply and installation of PV Off-Grid Inverters with scalable Lithium Iron Phosphate Battery units and their floor mounting brackets including the associated Interface Gateway to seamless control the inverters and batteries as specified and indicated on the drawings, connected to the relevant PV Module strings, DC Combiner boxes, etcetera. A built-in maximum power point tracking (MPPT) system which optimise the performance from the relevant PV module string including a remote monitoring software system shall form part of both the PV Inverters. The hybrid inverter must include a datalogger for overall system monitoring, by collecting all system- and operation data for information to the relevant inverter server via the internet product features. The design shall allow a modular

and scalable system to cater for future expansion. A PC sum is allowed for this item in the bill of quantities.

h) The design, supply and installation of a High Voltage Lithium Iron Phosphate scalable battery bank and remote monitoring system as specified and indicated on the drawings including all terminations, welding cables, nuts, bolts, etc. The design shall allow a modular system to cater for future expansion. A PC sum is allowed for this item in the bill of quantities.
i) The design, supply and installation of a new main low voltage (AC) distribution board, wall mounted with brackets, nuts, bolts, etc. in the PV equipment container as specified and indicated on the drawings, and all the equipment required by the Contractor to provide a complete and neat workable installation. The design shall allow spare space for future expansion of the PV solar system. A PC sum is allowed for this item in the bill of quantities.
j) The design, supply and installation of all IP integrated software for the specified remote monitoring of the complete system, and all the equipment required by the Contractor to provide a complete and neat workable installation. The design shall allow spare space for future expansion of the PV solar system. A PC sum is allowed for this item in the bill of quantities.
k) The design, supply and installation of all material and equipment that is not specifically stated in this specification, but which is nonetheless necessary to execute the contract in accordance with the requirements of this specification, regulations, statutes and codes of practice which are applicable to the installation.
l) The issuing of a complete certificate of compliance and relevant test report.
m) The complete training of the Client's technical staff with respect to the operation and maintenance of the system.
n) The testing, commissioning and handing over of all the systems that form part of this subcontract.
o) The complete installation is subject to a one-year defects liability period.
p) The Contractor must issue Guarantees for all products
q) 12-Month Monitoring of the PV Solar off-grid system including a monthly report based on data.
r) Compliance with Health and Safety based on latest construction health and safety requirements.

1.3. WORKING DRAWINGS AND TECHNICAL INFORMATION

1.3.1 GENERAL

Only the main equipment and devices have been shown on the drawings and specific wiring or cabling between equipment has not been shown.

It shall be the responsibility of the Contractor to ensure that the method of installing wiring or cabling, and the wiring used, between the equipment shall optimise the use of such equipment and that the optimum parameters specified can be obtained.

1.3.2 SUBMITTALS DURING TENDER PERIOD

All Tenderers shall submit the following information with their tenders:

a) Any information that may have a direct effect on the architectural or structural features of the PV plant container layout, which features may upon the proposal of the Contractor be subject to modification.
b) Brochures and specifications of all equipment offered for the execution of the contract.
c) Brochures and specifications of all software offered for the execution of the contract.
d) Full details regarding the proposed training to be given on the hardware, software and the operation and maintenance of the system.

e) A letter of compliance also indicating which of the items offered does not comply with this specification and what the differences are and the implications thereof.

1.3.3 SUBMITTALS DURING CONTRACT PERIOD

The Contractor shall submit complete documentation showing the type, size, rate, style, catalogue number, manufacturer's names, photos, and/or catalogue data sheets for all items offered enabling the Engineer to ensure compliance of the equipment with this specification.

This information shall be submitted to the Engineer within fourteen (14) calendar days after award of this contract and shall be subject to his approval.

Equipment must not be ordered without this approval.

Furthermore, the Contractor shall submit for approval the complete design layout of the entire system including calculations, showing wiring and all equipment.

All equipment proposed as equal to that specified herein, shall conform to the standards herein.

For equipment other than specified, the Contractor shall supply proof that such substitute equipment does in fact equal or exceed the features, functions, performance and quality of the specified equipment. However, the Engineer shall have the final decision of acceptance and his decision shall be final.

1.3.4 APPROVAL OF DRAWINGS

The approval of drawings shall not relieve the Contractor of his responsibility to supply the installation according to the requirements of this specification or to obtain the highest quality of craftsmanship possible.

1.3.5 MAINTENANCE OF AS-BUILT DRAWING

During execution of the contract, the Contractor shall update the drawings daily with all the relevant information.

At the end of the contract and prior to hand-over being accepted, the Contractor shall prepare as-built drawings of the installation. These drawings shall be a set of the latest drawings issued by the Engineer on which the Contractor shall highlight all changes.

The Contractor shall also issue three (3) sets of any other drawings, wiring diagrams, service and instruction manuals for equipment supplied by him and these will have to be acceptable to the Engineer prior to hand-over being approved.

1.4. ENVIRONMENTAL CONDITIONS

The installation shall operate satisfactorily in the following environmental conditions:

Average monthly maximum temperature (Summer condition) : 45°C

Average monthly minimum temperature (Winter condition) : -5°C

Altitude above sea level : 992 m

(The aforementioned figures are the prevailing outside weather conditions)

1.5. SUPPLY VOLTAGE

The off-grid PV solar inverter system will supply power at 400 Volt (Nominal), three phase, 4 wire, 50 Hz AC.

All the equipment associated with the system shall be able to operate from the low voltage power distribution system for twenty-four hours per day without overheating or degradation.

1.6. QUALITY CONTROL OF MATERIAL

All materials shall be the best of their respective kinds described in the specification and shall in every way be suitable for the purpose for which they are intended to be used.

All materials and equipment supplied shall fully comply with the requirements laid down in this specification and the latest editions of the relevant SANS, BS, IEC, IEEE, CCITT, EIA, ISO and DIN specifications or as otherwise specified.

Any item not complying with the following shall be substituted with an approved new component at no cost to the Employer, the acceptance or rejection of such work being determined by the Engineer.

The Contractor shall maintain adequate and effective quality control standards while manufacturing or installing the specified equipment.
The Engineer shall have the prerogative of inspecting the equipment in the Contractor's factory or on site, or to call for manufacturer's test certificates of such equipment at any reasonable time.

The Engineer shall check accuracy of dimensions, completeness, configuration, quality of workmanship, correct identification, proper use of and type of materials, equipment used and finishes to equipment.

Samples of all equipment must be submitted for approval before installation is commenced.

Such approval shall not relieve the Contractor of his responsibility for design, detail and dimension and shall in no way exonerate him from his liability to carry out the work in accordance with the terms of the contract and specification.

All such samples may be retained until completion of the contract. All such samples must have labels securely attached thereto designating the contract by name and number, the name of the Contractor and any further relevant information.

1.7. WORKMANSHIP

The Contractor shall only employ competent Project Managers, Technicians and Artisans to erect the installation on site.

The contract shall be executed with the best workmanship in a workmanlike manner to the satisfaction of the Engineer.

The Contractor must maintain a high quality of workmanship and the Engineer shall be in full control to determine whether the installation or individual portions thereof are acceptable or not.

The Contractor shall be informed in writing should the equipment or workmanship not be to the satisfaction of the Engineer and thus not acceptable. In such a case the Contractor shall replace the equipment and/or perform the remedial work immediately at the cost of the Contractor. All rejected material shall be removed from site.

The Engineer may upon request of the Contractor visit existing installations or prototype assemblies in the factory to determine that the workmanship is of the required standard.

If required, the Contractor shall provide the Engineer with equipment or facilities to examine all equipment and if necessary, test this equipment to preclude malfunctioning of the equipment.

The Contractor shall be held liable for all damage to other services and if such damage is not repaired to the satisfaction of the Engineer within a reasonable period the Engineer shall be entitled to appoint another Contractor to repair such damage and debit the account of the Contractor.

1.8. COMPETENCY OF WORKMEN

The Engineer reserves the right to call upon the Contractor to remove any workman or representative whom, in his opinion, is incompetent or whose presence would have a deleterious effect on the progress of the Works.

1.9. TRAINING OF OPERATORS

A suitable qualified person, preferably one who has been involved with a similar installation or the installation on site and who is conversant with the English language shall train and instruct operators employed by the Employer in operating the installation.

Such a person shall be available to instruct and train the persons involved by means of lectures and practical instructions on site for a period of one day minimum, commencing two days before the commissioning and handing over of the installation.

The Contractor shall supply full details of the proposed training to be given on all hardware and software as specified in this specification detailed as follows:

a) Cost per person
b) Duration of the course
c) Course outline

The training cost shall cover training for two persons on the premises of the Employer and shall be included in the Bills of Quantities.

The Contractor shall supply additional software support on any problems and questions asked by the trained personnel during the one-year guarantee period.

1.10. TRAINING OF TECHNICAL PERSONNEL

A suitable qualified person, preferably one who has been involved with a similar installation or the installation on site and who is conversant with the English language shall train and instruct

technical personnel employed by the Employer in maintaining the functionality of the installation at the end of the guarantee period.

Such a person shall be available to instruct and train the persons involved by means of lectures and practical instructions on site with regards to operation, routine maintenance and inspection of the installation for a period of one day minimum, commencing two days before the commissioning and handing over of the installation.

Irrespective of the above, the Contractor shall perform revision training of the technical personnel six months after acceptance of the installation and the first training session. The Contractor shall determine whether the personnel is familiar with and adequately trained to utilise the installation fully and submit a report after this revision training to the Administration's representative.

The Contractor shall supply full details of the proposed technical training to be given on all hardware and software as specified in this specification detailed as follows:

a) Cost per person
b) Duration of the course
c) Course outline

The training cost shall cover training of two persons on the premises of the Employer and shall be included in the Bills of Quantities.

The technical and operational manuals to be supplied by the Contractor must be explained fully to the personnel.

The Contractor shall supply any additional technical support training during the one-year guarantee period the cost of which shall be allowed for in the tender price.

1.11. REQUIREMENTS OF THE SOLAR PV OFF-GRID SYSTEM

1.11.1 GENERAL INFORMATION

This part of the specification is for the design, supply, delivery, installation, testing and commissioning of a Solar PV Off-Grid System and must be read in conjunction with the Tender Schedules and Drawings. Where it deviates from any of the specifications listed or accepted as general practice those deviations must be brought to the Engineer’s attention at tender stage.

1.11.2 EQUIPMENT MANUFACTURERS

All references to manufacturers, suppliers, model numbers and other pertinent information herein is intended to establish minimum standards of performance, function and quality.

Equivalent equipment from other manufacturers or suppliers may be submitted for that specified providing the submittals are of the same or higher quality, standards and performance and conforms to this specification.

1.12. EQUIPMENT AND MATERIAL REQUIREMENTS

All equipment and material shall be new and unused.

All equipment and material shall be designed for continuous duty without undue heating or degradation of function or performance.

All equipment, materials, accessories, and other facilities covered by this specification or noted on the contract drawings shall be the best suited for their intended use and shall be provided by a single manufacturer or, if provided by different manufacturers, recognised as compatible by both manufacturers (written proof/statement shall be provided by the manufacturers).

1.13. SYSTEM REQUIREMENTS

The following are the basic system requirements, which requirements are the minimum and not exhaustive. The design shall allow a modular system to cater for future expansion considering that this installation will cater for 20 x Households.

a) The PV array structure shall be of the fixed-axis type with a slope angle of 30° facing North. The main frame structure shall be galvanised steel with Aluminium trusses for mounting of 60 x PV solar modules. Refer the detail structural drawing.
b) The Solar PV Modules shall be designed with the best irradiance performance considering their location, mounting angle and azimuth.
c) The Solar PV inverter system will consist of off-grid hybrid inverters that shall combine sophisticated digital control technology with efficient power conversion architecture to achieve superior solar power harvesting and best-in-class reliability. The solar inverter shall always work at its optimal input voltage, regardless of the number of modules in a string or environmental conditions.
d) A proprietary data monitoring receiver shall be integrated into the hybrid inverter to aggregates the performance data from each PV module. This data shall be transmitted to the web and accessed via the Hybrid Inverter Monitoring Platform for performance analysis, fault detection and troubleshooting of PV systems.
e) The DC battery bank shall be of the high voltage lithium iron phosphate type suitable for the environmental temperatures of the applicable site and location. Each inverter shall be connected to a set of battery units which are scalable for future expansion.
f) The inverter system shall include a interface gateway to seamless control the number of inverters with their battery banks for optimum efficiency of the system.
g) The inverter and BESS system must be housed in a one direction 20feet cargo container being reduced to a 3m length with the container walls adjusted for efficient insulation. The container will house the mechanical air conditioning system, the fire detection/suppression system, the AC DB and the DC DB including the Wi-Fi system with data network to all inverter devices.
h) The main low voltage AC distribution board must be floor standing and have ample space for future expansions.
i) Equipment shall have been installed in the RSA in a similar installation as the one specified and shall have operated reliably and satisfactory for at least one year.
j) All components for the system offered and installed shall be available for a period of at least 10 years from the date of the contract. A certificate of **replacement guarantee** to this effect shall be submitted by the supplier of such components.

1.14. SOLAR PV MODULE MOUNTING STRUCTURES

Photovoltaic arrays must be mounted on a stable, durable galvanised structure that can support the array and withstand wind, rain, and other adverse conditions. The array structure will be as per the structural design as indicated on the drawings, with fixed-angle arrangement.

The array structure shall cover the container for convenient shading to the container to reduce direct heating.

Aluminium truss structures mounted on the galvanised frame shall be protected against rusting either by coating or anodization.

The structure shall be designed to withstand operating environmental conditions for a period of minimum 25 years and shall be free from corrosion while installation. Screw fasteners shall use existing mounting holes provided by module manufacturer. No additional holes shall be drilled on module frames.

The PV Panel area shall be accessible for cleaning and for any repair work. The Structural Drawing of the Module Mounting Structure is attached to this specification.

1.15. SOLAR PV MODULES (120 CELL, 600W)

Type JAM72S30 LR Solar MBB PV Solar Modules with a mono-crystalline 144 half-cell arrangement of [6 x 24], anodised aluminium alloy body and front cover of 3.2mm tempered glass with anti-reflective coating shall be used. The panels must have a high system energy yield at a low irradiance and low NOCT (nominal operating cell temperature). The enhanced 30mm frames shall ensure that the panels can handle at least 5400Pa snow load and 2400Pa wind load. The junction box shall have 3 x bypass diodes and an ingress rating of IP68.

The PV module shall comply to IEC 61215 and IEC 61730. The PV module shall have a low irradiance performance of 96, 5% at 1000W/m² to 200W/m². The PV Module shall have a minimum linear power output warranty of 25 years and a minimum product warranty on materials and workmanship of 12 years.

1.16. CONTAINER

The Container shall be as manufactured by Herholdts Group or equal and approved.

a) The inverter and BESS system must be containerized and a pre-assembled installation. The Contractor shall arrange for the required delivery and insurances.
b) The one direction 20 feet cargo container reduced to 3m length shall be converted to include insulated walls and roof by installing 50mm Isotherm with the required thermal properties. The interior wall shall be the 16mm PVC Foam Giroboard. The giroboard shall have neat round access holes at the correct height and position pertaining to cable access to all equipment.
c) There shall be no ventilation or openings. The container shall have an IP68 rating. The double doors shall be removed and sealed with new steel wall and a new side entry fire door shall be installed.
d) The mechanical air conditioning system shall consist of a 36000 BTU type Alliance cassette split-inverter type unit including the drainpipe and pump. The refrigerant gas shall be 410A, eco-friendly. The temperature control unit shall be wired and fitted adjacent the Gateway Interface.
e) The inverter controller units with scalable battery units shall be located and positioned for convenient access and maintenance.
f) The AC DB shall be wall mounted and located adjacent the gateway interface.
g) The DC DB (combiner box) shall be located for convenient entrance of the DC cable strings. A weather- and dust proof entrance shall be provided for the DC cable strings to enter the container.
h) The timber plywood floor must be covered with 2mm aluminium checker plates.
i) The adjusted floor and walls must be neat, plumb and square.
j) The fire protection system must consist of a fire suppression system using Stat-X aerosol agent canister, including a double knock smoke detection system linked to a gas controller with yellow break glass and blue hold break glass. The gas controller must be located on the outside in a weatherproof enclosure with IP65. The gas controller must be connected to two strobe-sire and 6-inch bell systems, one set inside and one set outside the container.

k) The internet connection shall consist of a Hauwei router with simcard, and cat6 UTP cable network linked to the gateway, inverter controllers and gas suppression controller. The router shall have space for future CCTV and access control expansion.
l) Light duty wire mesh cable trays shall be used for containment cable routes between the gateway and inverter controllers. The DC and AC cables shall be insulated / separated from the data cabling.
m) The container shall include damp proof LED lighting with switch socket outlets.
n) Refer the Equipment Container Layout drawing.
o) A shop drawing of the container must be submitted for approval by the Engineer prior to construction.

1.17. SOLAR PV OFF-GRID INVERTER AND BESS SYSTEM

The type Sigenergy inverter/BESS compatible coupling system shall be used for DC/AC conversion. The inverter shall include appropriate self-protective and self-diagnostic feature to protect itself and the PV array from damage in the event of inverter component failure or from parameters beyond the inverter's safe operating range due to internal or external causes. Further the unit shall include phase sequence connection self-adaptation.

The operation must be completely automatic including wakeup, synchronization (phase locking) and shut down. The inverter shall contain an oscillator capable of operating and maintaining the inverter output frequency as specified. The inverter oscillator shall be capable of frequency synchronisation and phase locking to the mains (or standby generator) power source frequency.

The inverter system shall consist of multiple inverters, each with multiple battery units attached to the inverter in tower type modular format, and seamlessly controlled by an interface gateway. The inverter/BESS system must be scalable for future expansion and convenient maintenance. The BESS shall consist of scalable LiFePO4 battery units.

The MPP (maximum power point) algorithm or Dynamic Peak Manager shall ensure that the solar inverter is always working at its optimal input voltage, regardless of the number of modules in a string or environmental conditions, even during partial shading. MPP range must be suitable to individual array voltages.

The PV Inverter shall include a built-in proprietary data monitoring receiver which aggregates the performance data from each PV module string. The PV data will be transmitted to the web and accessed via a Monitoring Platform for performance analysis, fault detection and troubleshooting of the PV system. The communication to internet shall be via ethernet LAN, Simcard or Wi-Fi.

The PV Inverter shall include a "Grid Limiter", thus ensuring that no energy is distributed into the Grid. The warranty shall be a minimum of 10 years replacement, extendable to 25 years, and have an AI-integrated O&M platform that offers continuous 24/7 service response.

1.18. SOLAR PV CABLES (COPPER, 6MM²) AND CONNECTORS (MC4)

The type PV Solar Helu Cable, with a cross sectional diameter of 6mm² copper conductor shall be used.

PV connectors shall allow strings of panels to be easily constructed by pushing the connectors from adjacent panels together by hand but require a tool to disconnect them to avoid accidental disconnection when cables are pulled. Type PV Solar MC4 male and female inline connecters shall be used for connection of PV panel strings.

The contractor shall ensure that the copper cable strands are cut not longer than the prescribed termination lug length (8mm) before applying the crimp tool in order to prevent a "hot connection" inside the MC4 lug.

1.19. SOLAR PV DC COMBINER BOX

The String Combiner boxes shall be installed between the PV modules for the inverter, providing protection and performance monitoring. The Dc combiner box shall be installed inside the container.

The combiner box shall include the following switchgear per DC string:

a) 1000Vdc 20A type Suntree PV Fuses and fuse-holders. One for positive and one for negative.
b) With drawable 3-Pole (positive, earth, negative) PRD-DC Surge arrestors to protect the PV modules and inverter from over-voltages due to lightning strikes.
c) 32A DC rotating out-lockable on-load isolator.
d) All bridging modules and termination blocks

1.20. EARTHING

The Solar PV Plant should have a dedicated earthing system. The Earthing for array and LV power shall be made as per the provisions of SANS 10142-1-2: 2012: The wiring of premises; Part 1-2

a) All PV module frames shall be earthed to the array steel structures by means of the mid- and end PV clamps which includes an earth stud to penetrate the module frame coating to provide continue contact with the aluminium module frame.
b) All steel column structures on the South side of the array structure shall each be connected to a 1,5m copper plated earth rod via earth clamps and 16mm² insulated copper conductor with the top of the earth rod buried at 600mm below the soil surface.
c) All DC strings must be bridged via a 6mm² insulated earth Cu conductor to one 6mm² insulated Cu earth conductor that will run to the combiner box surge arrestor where it will bridge to all surge arrestors.
d) The AC DB main earth bar must be connected to a crows-feet earth terminal via a 35mm² insulated Cu earth conductor.

1.21. MAINTENANCE

Tenderers must note full particulars of the year free maintenance.

Each Tenderer shall give full particulars of the maintenance, spare parts and service facilities which are available either locally or in the RSA.

The Tenderer shall list the centres where maintenance facilities can be readily provided and shall state if repairs under guarantee or maintenance agreement can be undertaken at these centres. Local Companies or subsidiaries thereof, other than the main supplier, who only offer replacement of malfunctioning printed circuit boards, etc., cannot be considered to be maintenance centres under this clause.

1.22. LITERATURE REQUIRED

The installation shall not be handed over if any of the following are outstanding:

a) Certificate of Compliance and Test Report
b) Operating, maintenance and fault-finding instructions in triplicate.
c) Schematics and wiring diagrams in triplicate.
d) "As Built" drawings.

C5.4.3. OVERHEAD ELECTRIFICATION

1.1 SCOPE OF WORK

The project/contract entails the provision of a Microgrid to service 20 x low-income households. It includes LV overhead reticulation as well as overhead service connections. The majority of the ABC backbone installation has been completed; however, the pole-top boxes with split meters and the overhead house connections remain outstanding and must still be finalized.

EXTENT OF WORK

The overhead electrification works entail the following:

a) The systems voltages are 11kV, 400V and 230V.
b) No MV network installations will be required.
c) Erection of new overhead service connections with split pre-payment PLC meters, type Conlog which must comply with the vendor group code of the Khâi-Ma Local Municipality, including earth rod installations at each house.
d) Testing and commissioning of the complete installation including issuing of COC's, "as built" drawings and O & M manuals.
e) Compliance with Health and Safety based on latest construction health and safety requirements.

1.2 LV DISTRIBUTION

The low voltage ABC lines have been designed for a particular supply area. The supply areas shall be strictly adhered to and no deviations from the design shall be allowed unless the Project Manager issues a design change in writing.

a) For detail drawings showing the various Eskom standards refer to the Eskom Electrification Standard.

- LV ABC Suspension Assembly (0° - 30°) D-DT-1100
- LV ABC Terminal Assembly D-DT-1120
- LV ABC Strain Assembly (30° - 90°) D-DT-1122
- LV ABC T-Off Assembly from Intermediate D-DT-1140
- LV ABC Cross Intermediate Assembly D-DT-1141
- LV ABC T-Off Assembly from Strain D-DT-1142
- LV ABC Cross Intermediate Strain Assembly D-DT-1143

b) Ensure that LV struts and LV stay rods are planted according to the correct depth and not bended.

c) Ensure stays, poles and struts are compacted

d) Discrepancies between any of the Construction Drawings, Employer's DDT Drawings,

Spanning sheets, Bill of Materials and Specifications will be brought immediately to the attention of the Project Engineer via the Project Manager. All surveys (MV & LV) will be done by the contractor. The contractor to survey according to the approved SG plan AND NOT ACCORDING TO THE YARD FENCES ON SITE. The MV ASCII file to be completed by Employer Survey and the contractor to arrange for this to be done via the COW once pegged. PM to ensure that Employer survey is involved and aware of the project prior to the construction of the project. The contractor to ensure that the networks surveyed adhere to the following requirements:

- Clearances between conductors and ground, houses/dwellings, vegetation, Telkom etc. are according to the Employer minimum requirements
- Ensure that lines do not cross graveyards, soccer fields etc.
- Applications were done for rail and road crossings in conjunction with the Employer survey department prior to construction.

e) The Contractor may not change routes that will influence voltage drops, have an influence on the costs or the practical operation and maintenance of the electrical network. If areas of uncertainty exist, the Engineer will be contacted immediately.

f) No trees will be trimmed or totally cut without the permission from the Landowner and in rural areas from the Local Leader. Trees that are legally protected may only be cut with a permit. The Contractor to ensure that these permits are in place before any trees is cut.

g) The following are general construction related aspects and will take preference to any other drawing and / or specification:

- The onus is therefore placed on the Contractor to ensure that the minimum ground clearances of the telecommunication conductors is obtained, as required in TABLE 1 of the Code of Practice for the joint use of a pole route for Power lines using aerial bundled conductors and telecommunication lines, viz:
  - Across streets in a township : 6000
  - Along streets in a township : 4200
  - Mid-block sections : 4200
  - To Telkom lines: 800
- All poles shall be wood. Poles of the following lengths, shall be supplied by the Contractor:
  - Mid-blocks : 9m, top diameter minimum 160mm
  - Street front and street crossings : 9m, top diameter minimum 160mm
  - The planting depth shall be 1,500mm for 9m poles.
- All open excavations will be considered as dangerous. It will be clearly marked with danger tape that is at least 1 m from the edge of the excavation and at least 1m in height.
- All incorrectly drilled holes in wood poles must be painted with creosote and plugged with dells that fit the hole firmly.
- Poles, Stays & Struts planted in type 3 and 4 soils to be installed according to Technical Instruction 06TI-019, as well as Technical Bulletin 06TB-035, dated 15 January 2007.
- The electrical contractor shall plan and measure the LV ABC spans as such that no mid-span connections of LV ABC spans will be required.

- All leftovers on drums shall be measured, and such drums shall be marked with length of unused conductors. This information shall then be used in the planning of ensuing work.
- Conductors shall be run out and tensioned in such a manner as to reduce contact with the ground or other obstruction to an absolute minimum. In particular, under no circumstances shall a conductor be allowed to touch or be dragged across stony ground, fences or other objects liable to damage the conductor insulation. This is especially important for aerial bundled conductor where deterioration of the insulation is unacceptable. The conductor shall not be allowed to rub on any part of the structure, but shall be placed in suitable aluminium jockey pulleys, which shall be designed to impose the smallest possible restraint on the free movement of the conductor.
- An approved pulling sock and swivel shall be used during the erection process of ABC for pulling the cable bundle through the pulleys and appropriate come-alongs and lever hoists shall be used.
- Suitable temporary arrangements for the staying of structures wherever necessary shall be made and such arrangements shall not impose overload conditions on any portion of such structures.
- When running out conductor, the drums shall be supported on approved drum jacks. Suitable means shall be used to prevent drum over-run. Under no circumstances shall conductor be run out from drums laid on a drum cheek, the conductor being pulled over the free cheek.
- Tensioning and sagging of conductors shall be made by means of suitable dynamometers. Dynamometers, which shall be recalibrated if so directed, shall be used for the final regulation of the conductors to the correct sag.
- The necessary stringing/sag charts for aerial bundled conductors shall be applied.

h) It is the Contractors responsibility to ensure that wooden poles delivered on site is stacked according to the required standard, DISPVABY3.

i) The contractor to tender for normal soil or as specified by the Design Engineer in the Price List. The Contractor to provide a rate for all the soil types in Part 2: Type 4 (very soft soil), Type 3 (soft to firm), Type 2 (very soft rock), Type 1 (soft rock) and Hard rock. The contractor will only be remunerated for the actual soil types on site. To claim for other soil types as tendered for the COW will have to confirm the soil types on site before closing the holes. No payments will be made if the before mentioned are not verified and confirmed by the appointed COW.

j) New 4 core, 35mm² (55mm² bare neutral) aluminium alloy XLPE covered conductors will be supplied by the Contractor

k) The three-phase, four wire distribution shall be the TN-C-S system with the neutral/earth conductor earthed at the low voltage earth mat at the source, and at the terminal points, t-off points and intervals exceeding 150m.

l) All stays on LV ABC structures shall be provided with stay insulators.

m) All LV struts shall be provided with anti-climbing devices as shown on the drawings and the cost thereof shall be included in the tender prices for the installation of strut poles.

n) Strain and suspension hardware shall be secured to the structures in accordance with arrangements shown on the drawings. If stay hand-made wraps are used, then these shall be painted with a coat of epoxy coal tar to effectively prevent corrosion.

o) All split pins, security clips, locknuts or other locking devices shall be applied in their intended manner of use, so as to prevent uncoupling of the items in service due to vibration or any untoward reason.

p) Drilled holes shall be centrally disposed on the main diameter of the pole and drilled truly perpendicular to the longitudinal directions of the line. All holes drilled in the poles

on site shall be treated with creosote.

q) Conductor joints shall be affected using appropriate jointing ferrules or connectors and heat shrink material. Where more than one core is to be jointed through, the joints shall be staggered.

r) Heat shrink endcaps shall be placed on all exposed ends of the ABC if jointing is not to continue immediately or if the ABC is a fixed termination.

s) All neutral connections shall have two termination clamps.

t) LV pole structures shall be positioned in road reserves at 500mm from stand boundaries and/or to line up with the existing structures.

1.3 LOW VOLTAGE DISTRIBUTION PROTECTION

a) The contractor will be responsible for the supply and installation of a 35mm² x 4c Cu PVC/PVC/SWA/PVC 1000/600V cable from the AC DB in the container to the first LV overhead pole structure where the copper cable and Aluminium ABC are connected/terminated via bi-metal ferrule clamps with colour coded UPVC heat shrink. The copper cable tails must also be covered with the colour coded UPVC heat shrink.

b) The 35mm² x 4c Cu PVC/PVC/SWA/PVC 1000/600V supply cable shall connect to the supply circuit breaker at the AC DB. The protection circuit breaker shall include a shunt trip coil with a CBI 305-earth leakage unit. Refer the Single Line Diagram drawing.

1.4 EARTHING

1.4.1 General

The earthing of the electrical installation as described herein shall conform to the requirements set out in Section 2 of the Electrification Standard, Volume 1.

It is however a specific requirement that the following minimum sizes of earth conductor shall be used:

- Container Earth: : 70 mm² BCEW Crows feet
- LV Structures : 35 mm² BCEW with 1,5m copper plated Single Peg
- At Houses : 35 mm² BCEW with 1,5m copper plated Single Peg

1.4.2 Earthing of LV ABC Distributors

- The neutral of the LV ABC distributor shall be earthed at the following points:
  a) At the Container by means of crow's feet.
  b) At any other convenient points along the distributor
  c) At every distributor T-off.
  d) At every 150 m interval along the distributor.
- The ideal is that the earth resistance of each LV ABC distributor shall not exceed 10 ohm, before connection to any other LV earth system, however if this is not achieved by the prescribed earth installation, then the combined earth resistance of all the circuits supplied by that specific transformer shall be measured. If this combined reading is more than 10 Ohm then the Project Manager shall decide on the action to be taken.
- Separate earthing points at the houses are required under this contract.

- Tenderers shall allow in their tender prices for the complete earthing of LV ABC pole structures as specified and should include all materials and labour required for the earthing system, including:
    - Earth wires at all MV pole structures and LV ABC distributors, as required by the Electrification Standard and this specification.
    - An earth protection pipe at the above locations, consisting of a 20 mm diameter galvanised conduit of overall length 4000 mm of which 3000 mm has to protrude above natural ground level, strapped with Bandit strapping against the poles at 1000 mm intervals, i.e. 4 straps.
    - The interconnection between the earth electrodes and the transformer earth stud shall be with 70mm² green PVC covered stranded copper conductors.
    - Jointing of earth conductors, where required, shall be an approved welding process similar or equal to the Cadweld process.

1.5 SERVICE CONNECTIONS

1.5.1 Auxiliary Equipment

a) Install Links according to D-DT 1847

1.5.2 Pole-top boxes

a) Only type Allbro pole-top boxes will be allowed.

b) The boxes will include:

- 30A SP curve 1 orange toggle hydraulic magnetic CBI circuit breakers
- The pole top box must have space to upgrde the the 30A SP to a 60A SP MCB.
- Conlog BEC44 PL Split (Wired) Prepaid Single-Phase Meters
- The pole-top box must be UV resistant and have 16mm2 ultra violet protected PVC insulated copper conductor tails with sufficient length for convenient connection between the pole-top box and aerial bundle conductor.
- The 16mm2 Cu core tails shall be neatly strapped with heavy duty PVC cable ties.
- The meters vendor group code must comply with the vendor group code of the Khâi-Ma Local Municipality.

1.5.3 Ready Boards

a) All the ready boards are already installed.
b) The Contractor must ensure that the Airdac cable entrance at each house are as close as practical possible to the installed ready board.
c) The Contractor shall allow and price for the complete installation of the split keypad inside the house including all accessories required to make it a neat and functional installation.

1.5.4 Others

a) Testing, commissioning and handing over of networks to Employer as per Handing-Over Procedure, SCSASABZ1.

b) Produce As-Built drawings of constructed networks and hand over to the Employer as per Standard, ESKPVAEG8.

1.6 EXISTING SERVICES

Since the new installation will be done in a developed area, extreme care must be taken to avoid damage to the following services:

e) Water network

f) Telephone network
g) Roads
h) Storm water drainage network
i) Sewerage network
j) Existing electrical network

Where possible, plans of the existing services will be provided to the contractor upon take-over of the site. It is however his responsibility to ensure at all times that the location of existing services in the area where work is in progress is known beforehand.

In the case of damage to existing services, which could reasonably have been prevented, repairs will be done at the cost of the contractor, to the satisfaction of the Project Manager.

1.7 SUPERVISION AND QUALITY CONTROL

a) The Contractor shall tender and allow in his tender prices for adequate and trained personnel, conversant with the nature of the Works described herein, to carry out the day-to-day construction activities.

b) The Contractor shall appoint, in writing, a responsible person in terms of the Occupational Health and Safety Act, who will assume responsibility for all safety aspects on the site and for the Works. A copy of this letter of appointment shall be forwarded to the Project Manager.

c) The responsible person, so appointed, shall take responsibility for the construction of the Works and the certification of all tests and test results as specified.

d) The Contractor shall tender for and ensure that adequate quality control of the contract works is provided and maintained for the duration of the Contract.

e) It is an implicit requirement that the Contractor submit with his tender the number as well as the functional responsibilities of persons involved in this project.

f) This staff complement shall be maintained for the total duration of the Contract.

g) Failure to comply with the above requirements may seriously jeopardise the Contractor's tender bid, as the Project Manager will have insufficient information to adjudicate tenders.

1.8 FINAL INSPECTION, TAKING OVER OF THE WORKS AND CLEARING OF SITE

a) "As Built" drawings to be supplied at the final inspection according to the as built process ESKPVAEG8 (latest).

b) During final inspection, the *Project Manager* or his *representative* will ensure that the quality control check sheets are completed and signed by all the interested and affected parties. Only after signing of this document, will the site be handed over for Commercial Operation. (See standard, SCSASABZ1 rev 1)

c) Removal of site office and stores and discontinuation of services provided for the site office.

d) Clearing of all rubble, waste and rubbish, resulting from the construction activities, removal from site and re-instatement of terrain.

e) Removal of all excess material (Copper, etc.) from site and returning of such material to the nearest *Employer* stores.

f) All the parties concerned at the completion of the *works*, prior to the taking over of the

works, will hold a final inspection.

g) In the event of the *Contractor* not pricing the items of the Final Inspection and Taking Over of the Works Activities in sufficient detail, the *Employer* reserves the right to exercise it's own discretion in the apportionment to individual items of the total Final Inspection and Taking Over of the Works prices within the contract documents.

1.9 OTHER ACCESS

a) In situations where private roads must be used for construction purposes, the condition of the said roads must be recorded (e.g. Photographed) prior to the use thereof and be agreed upon by the *Employer*, the *Landowner* and the *Contractor.*

b) All private roads used as access to the site of work by the *Contractor*, shall be maintained by him at all times at his expense, and upon completion of the work, be left in at least the condition prior to the commencement of the construction activities.

c) Where possible access along the power line must be established by vehicles passes over the same track on natural ground.

d) Temporary access roads shall only be constructed and maintained where necessary at watercourses, steep slopes or where boulders and rocks prohibit vehicular traffic.

e) No access roads shall be constructed in and/or outside the power line servitude without the written instructions from the *Clerk of Works*.

f) Upon completion of the project, all construction access roads shall be closed unless otherwise specified by the *Employer* and/or *Landowner.*

g) All temporary access roads shall be constructed in strict accordance with specification ***TRMSCAAC1 Section 4.4***, and to the satisfaction of the relevant *Landowner*.

h) Loose boulders which obstruct the construction access as well as for running out the conductors shall be removed from the servitude.

1.10 BUSH CLEARING

a) All work to be in strict accordance with ***TRMSCAAC1, The Environmental Conservation Act No. 73 of 1989***, the ***Conservation of Agricultural Resources Act No. 43 of 1983,*** the Standards and Specifications for the control and cutting of trees and bush within overhead line servitude's ***SCSASAAZ9*** and the Environmental Management Plan for the **specific project and spanning sheets.**

b) Trees and bush to be cut and/or trimmed on a careful and selective basis to ensure the required electrical clearances from all conductive equipment and to ensure the safety of the power line structures.

c) All stumps from trees, bush and shrubs shall be chemically treated immediately after cutting, to prevent any further growth thereof. The chemical treatment must be approved by the *Employer's Environmental Practitioner* prior to the purchasing and application thereof.

d) Between structures, where no traffic is required, there shall be no removal of vegetation except as required for stringing of the power line. Access for the stringing of the power line shall be limited to one single track for all pulls. No cutting of bush and shrubs will be permitted across bush filled ravines or gullies where the bush will not interfere with the strung conductor. Alternative means shall be used to string the power line conductors.

e) All chopped trees and bush will remain the property of the relevant *Landowners*, unless otherwise negotiated with the *Employer's Clerk of Works*.

1.10.1 Special Bush Clearing Requirements

a) One week written notice must be given to the *Employer's Environmental Practitioner* before commencement with construction activities

b) The *Contractor* shall use only approved and/or accredited weed killer applicators.

c) The *Contractor* will not be allowed to cut and/or trim any **endangered** trees or shrubs in the servitude, unless written prove of the required permits, obtained by the *Contractor,* is given to the *Employer's Clerk of Works.*

d) The use of existing gates and private roads in or outside the power line servitude for bush clearing purposes must be discussed with and accepted by the relevant *Landowner*, prior to the use thereof.

e) All vehicles used for bush clearing shall pass through gates when crossing fences and the *Contractor* shall not be allowed to drop fences temporarily for the purpose of driving over it.

1.11 CONSTRAINTS ON HOW THE CONTRACTOR PROVIDES THE WORKS

a) **The *contractor* must list the name of the experienced construction supervisor for the duration of the contract below. This is compulsory and if not adhere to might result in the tender to be null and void.**

Name	I.D. number	Years' experience	Other

b) Written notice will be given by the *contractor* to *Employer*, thirty days prior to any switching that may be required by the *contractor*. The outage must be cancelled at least 5 working days prior to the actual date should anything happens and the outage cannot take place. All stake holders to be informed by the COW in writing.

c) The risk of all lies with the *contractor* until that section of line is energized.

d) Inform each landowner before entering their property and treat property with respect.

e) Sign off all form/letter with each hand over to ensure that the customer is happy with the work completed on his property.

f) The *Contractor* is to provide the *works* strictly according to all the requirements of **Section 31 of the Occupational Health and Safety Act of 1993**.

g) The *Employer* Standards and specifications as per Annexe A are the requirements of the *Contract*. The *Contractor* shall comply in full with Contract Quality Requirements, "Matrices A and C" of NWS 1814/C1.

h) The *Contractor* shall be responsible for the relevant Quality Assurance Requirements to be imposed on his sub-*contractor*s and suppliers of materials in terms of the above standards.

i) No weather data are included in this specification and the *Contractor* is referred to the Weather Bureau, Department of Transport, Private Bag X097, Pretoria 0001 The

Contract places the responsibility on the *Contractor* to foresee inclement weather. The *Contractor* shall take into account large variations in the weather patterns. No extensions of time will be granted for delays arising out of normal weather conditions. Where abnormal, unfavourable weather conditions are experienced, an extension of the *Contract* period may be considered by the *Employer*, by no claim for additional Preliminary and General or escalation of the *Contract Price* for the extended period will be granted.

j) All work on site to be done in accordance with The Environmental Management Plan for this project.

1.12 WORK AND THINGS SUPPLIED BY THE CONTRACTOR FOR THE WORKS

1.12.1 Plant provided by the Employer

Employer will not supply any plant

1.12.2 Materials supplied by the Employer

Employer will not supply any material

The *contractor* must ensure that the BOM correlate with the span plan.

1.12.3 Materials to be supplied by the Contractor.

All materials supplied by the *Contractor* to be approved by the **Project Engineer** before commencing with the project.

Once the plant and/or materials have been delivered to the Contractor's yard on site, the loading, transporting to site, off-loading and safekeeping thereof becomes the responsibility of the Contractor. He must make the necessary arrangements for safe storage on site, offering adequate protection against theft, damage, wind and weather. The responsibility for insurance of materials against any form of damage or theft after issue thereof rests with the Contractor.

It is essential that a good record-keeping system exist whereby control over quantities on site can be kept. All new deliveries to the site-store and all materials and plant issued for construction must be recorded. At any time, it must be possible for the Project Manager to establish from these records exactly what material and/or plant is kept in store or has been erected. These figures will regularly be compared to the actual quantities measured on site and the formal Employer issuing invoices.

At all times it will be assumed that the Contractor has been ensured upon issue of material and/or plant that no visible damage has occurred to it. In the case of damaged material and/or plant, acceptance must be refused. If a dispute arises, the Project Manager must be called in for a decision. Damaged material and/or plant found on site will be replaced at the cost of the Contractor and no extension of contract time will be granted for the extra delivery time.

Liability for inherent defects in material and/or plant issued does not lie with the Contractor. If defects in material, plant or in the Works, due to the use of patently defective material and/or plant are discovered, new material and/or plant will be ordered at the contractor's cost and the contractor should resolve the issue with the supplier.

The decision concerning the caused and responsibility of defects, as well as the extent of compensation (if any), rests with the Project Manager.

The Contractor must make the necessary arrangements for safe storage on site, offering adequate protection against theft, damage, wind and weather. The responsibility for insurance of materials against any form of damage or theft after issue thereof rests with the Contractor.

It is essential that a good record-keeping system exist whereby control over quantities on site can be kept. All new deliveries to the site-store and all materials and plant issued for construction must be recorded. At any time, it must be possible for the Client to establish from these records exactly what material and/or plant is kept in store or has been erected. These figures will regularly be compared to the actual quantities measured on site and the formal Employer's issuing invoices.

1.13 EQUIPMENT

The *Contractor* shall supply all the equipment required to complete the works

1.14 HOLDING POINTS OF THE WORKS

No construction activities will commence until the site is officially handed over by the Project Manager or his representative to the Contractor.

No construction activities will commence prior to the submission of a detailed construction program and special tool calibration certificates, etc. by the contractor.

The Employer's Clerk of Works will have the prerogative to execute a proper inspection on the condition of all construction tools, equipment and vehicles prior to the commencement of any construction activities.

The holding points shall be agreed between the *Contractor* and the *Employer Representative* and shall enforced as per the requirements of document 34-212, 'Inspection and Maintenance of High Voltage Cables"

The *Contractor* will be held responsible for any construction errors, defects, claims, etc. for continuing with the construction activities at the "hold point" stages without the written instructions from the *employer*s' Clerk of Works.

1.15 OTHER LIMITATIONS

The Contractor shall use the private roads with the necessary respect and maintain it throughout the construction period.

The Contractor shall control his activities and processes in such a way as to ensure compliance with the specifications. He shall carry out as a minimum requirement all the tests laid down in the specifications and shall submit all the test results to the Employer.

The Employer Standards, as indicated in Specifications of this document, are requirements of the Contract.

C5.5. MANAGEMENT

C5.5.1. MANAGEMENT OF THE WORKS

C5.5.1.1. CONSTRUCTION PROGRAMME

The Contractor shall submit within the period stated in the Contract Data a suitable and realistic programme for the consideration of the Engineer.

The programme shall be in the form of a Gantt Chart and shall include the following details:

- A work breakdown structure, identifying the major activity groups.
- For each activity group further details shall be provided with regard to the scheduled start and end dates of individual activities.
- The linkages between activities shall be clearly indicated and the logical network upon which the programme is based shall be separately submitted to the Engineer if requested. Any constraints shall be classified as being time-related or resource-related.
- The critical path(s) shall be clearly indicated and floats on non-critical activities shall be shown.
- The Contractor shall indicate the working hours per day, night, week and month allowed for in the programme.
- Where relevant the Contractor shall indicate the production rates for key activities, e.g. earthworks, etc.

Together with the programme as detailed above the Contractor shall submit to the Engineer a **cash flow projection**, indicating projected monthly intervals to reflect actual payments to date and anticipated future payments.

The programme will be **reviewed** at the monthly site meetings at which the Contractor shall provide sufficient detail that will allow the comparison of completed work per activity has fallen behind. The updated programme shall be submitted to the Engineer at **least two days prior** to the monthly meetings.

If the programme has to be revised by reason of the Contractor falling behind his programme, he shall produce a **revised programme** showing how he intends to regain lost time in order to ensure completion of the Works within the time for completion as defined in ***Clause 5.12*** of the ***General Conditions of Contract*** or any granted extension of time. Any proposal to increase the tempo of work must be accompanied by positive steps to increase production by providing more labour and plant on site, or by using the available labour and plant on site, or by using the available labour and plant in a more efficient manner.

Failure on the part of the Contractor to submit the programme or to work according to the programme or revised programmes shall be sufficient reason for the Engineer to take steps as provided in ***Clause 9.2*** of the ***General Conditions of Contract*.**

The approval by the Engineer of any programme shall have no contractual significance other than that the Engineer will be satisfied that the work is carried out according to such programme and that the Contractor undertakes to carry out the work in accordance with the programme. It shall not limit the right of the Engineer to instruct the Contractor to vary the programme if required by circumstances. The Contractor is also referred to ***Clause 5.6*** of the ***General Conditions of Contract*** when drawing up his programme.

C5.5.1.2. DRAWINGS, OPERATION AND MAINTENANCE MANUALS

All information in the possession of the Contractor that is required by the Engineer's Representative in order to complete the As Built drawings and to prepare a completion report for the Employer must be submitted to the Engineer's Representative before a Certificate of Practical Completion will be issued for the Works. Similarly, the Contractor will be required to submit full details of all pipes, valves meters and specials in a suitable loose bound format, including any special operational and maintenance manual for the scheme prior to the issue of a Certificate of Completion of the Works.

Only figured dimensions on the drawings may be used in the interpretation thereof, and the drawings shall not be scaled unless the Contractor is so instructed by the Engineer in writing. The Engineer will upon written request provide any dimensions that may have been omitted from the drawings.

C5.5.1.3. SITE ADMINISTRATION

An index to the Engineer's standard site administration forms as well as examples of some of the administration forms are appended as STANDARD FORMS AND FORMATS *(page 208).*

Acceptance control, recordkeeping and payment certificates shall be done in accordance with the Engineer's standard system except if the Engineer approves that the Contract's standard system may be used.

C5.5.1.4. DAILY SITE DIARY

The daily site diary in accordance with the pro forma appended in STANDARD FORMS AND FORMATS *(208)* shall be kept up to date by the Contractor's Site Agent and will be signed on a daily basis by the Engineer's Representative.

C5.5.1.5. INFORMATION IN RESPECT OF PLANT

Information relating to plant on Site shall be delivered to the Engineer, on a monthly basis, in the form of a detailed summary of construction plant kept on the Site, with full particulars given for each day of the month. Distinction shall be made between plant in **working order** and plant **out of order**. Such inventory shall be submitted by the first day of the following month to be reported.

C5.5.1.6. INFORMATION IN RESPECT OF EMPLOYEES

Information relating to labour and management on Site shall be recorded in the daily site diary. In addition, the Contractor shall deliver to the Engineer, on a monthly basis, a detailed summary of supervisory staff, labour employed (own and local labour) by category, and Contractor (both local and imported) for each day of the month. Such return shall be submitted by the first day of the month following the month to be reported.

C5.5.1.7. RAINFALL RECORDS

Rainfall records for the period of construction shall be taken on Site and recorded in the daily site diary. The Contractor shall provide and install all the necessary equipment for accurately measuring the rainfall. The Contractor shall also provide, erect, and maintain a security fence plus gate, padlock and keys at each measuring station, all at his own cost. The Engineer or his Representative shall take and record the daily rainfall readings. The Contractor shall be permitted to attend these readings, in the company of the Engineer's Representative. Access to the measuring gauge(s) shall at all times be under the Engineer's control.

C5.5.1.8. SITE INSTRUCTIONS

Site instructions by the Engineer, addressed to the Contractor at his office on the Site, will be numbered consecutively and will be deemed to have been received by the Contractor's Representative unless a break in the sequence of number is brought to the notice of the Engineer in writing immediately.

C5.5.1.9. SITE MEETINGS

The Contractor and his authorised representative shall attend all meetings held on the Site with the Employer and the professional team at dates and times to be determined by the Engineer. Such meetings will be held to evaluate the progress of the Contract, and to discuss matters pertaining to the Contract which any of the parties represented may wish to raise. It is not the intention to discuss day-to-day technical matters at such meetings.

C5.5.1.10. PAYMENT CERTIFICATES

Monthly Progress Payment Certificates shall be submitted to the Engineer's Representative on Site not later than the 20th of each month (or on the last working day prior to this date) in order to allow for checking and reconciliation of all quantities, rates, extensions and additions in the certificate. Each progress payment certificate shall include work executed or reasonably expected to be executed up to the 30th day of the specific month. The Engineer's Representative shall have a period of five (5) calendar days to review the draft certificate in collaboration with the Contractor. All quantity calculations and certificates submitted by the Contractor for checking shall be in accordance with the standard formats that are included in STANDARD FORMS AND FORMATS *(page 208).*

Upon agreement by the Engineer's Representative the certificate shall be submitted by the Contractor in neat, typed form in accordance with the prescribed format and with the correct spelling, to the Engineer not later than the 25th of each month (or on the first working day thereafter) together with four (4) additional copies for certification.

Where day works have been instructed by the Engineer, the Contractor shall submit the returns to the Engineer for signature and approval within twenty-four (24) hours of the end of the working day on which the work was executed. Day work returns shall be submitted on forms following the standard format included in STANDARD FORMS AND FORMATS *(page 208)* for this purpose. Failure to comply with the terms of this clause will result in non-payment for such day works.

The tax invoice submitted with the certificate shall be dated the 1st of the month following the period certified. All costs for the preparation and submission of progress certificates shall be borne by the Contractor.

C5.6. PROCUREMENT

C5.6.1. SUB-CONTRACTOR

1.1. The Contractor shall appoint such authorities and/or specialist sub-contractor and suppliers as may be designated or nominated by the Employer or the Engineer for those portions of the Works that are described in **C5** Specifications *(page 246)*

1.2. As required by ***C4.1.7.*** Sub-Contracting (Clause 4.4) *(page 237)*, the Contractor shall be responsible for all work carried out by sub-contractor (whether nominated by the Employer or selected by the Contractor) on his behalf. The Engineer will not liaise directly with any such Contractor, nor will he become involved in any problems and/or disputes related to payments, programming, workmanship, etc., unless provided for in ***C4*** CONDITIONS OF CONTRACT Such problems and/or disputes shall remain the sole concern of the Contractor and his sub-contractor.

C5.6.2.LOCAL LABOUR

The Contractor shall employ labour from the local communities through the appointed Community Liaison Officer (CLO). Accordingly, the workforce that is employed on the site shall consist of residents, except for approved **key staff** in the permanent employ of the Contractor.

The labour desks shall assist in identifying available local labour and, where available **semi-skilled labour** as well as **local sub-contractor**. The Labour Desks shall also assist and advice regarding conditions of employment, minimum wages, disputes and disciplinary procedures. The function of the Community Liaison Officer shall, however, in no way diminish the responsibilities of the Contractor in terms of *Clause 4.10* of *GCC 2015* and *paragraph C4.1.13. (page 239)* of this document.

Although the Contractor shall adhere to the statutory minimum wage rates, the Contractor is, however, at liberty to negotiate additional incentive payments based on performance.

A contract of employment or sub-contract should be signed between the Contractor and each of his employees or sub-contractor. Likewise, contracts of employment must be entered into between each sub-contractor, and each of the specific sub-contractor's employees. Employment and Contractor agreements shall make clear reference to at least the following conditions:

- The minimum agreed wage rate per hour in respect of labourers.
- The agreed pay rate per unit of production where applicable;
- UIF and WCA payments;
- Minimum working hours per day;
- Start and end times of a daily shift;
- Lunch break times;
- Company Policy regarding:
    - Rain time;
    - Sickness and absenteeism;
    - Disciplinary matters;
    - Grievances;
    - Method and frequency of payment;
    - Work clothes and safety equipment.

C6. SITE INFORMATION

C6.1. GENERAL DESCRIPTION OF THE WORKS

See C5, Specifications, page 169.

C6.2. DESCRIPTION OF SITE AND ACCESS

See C5, Specifications, page 169.

C6.3. THE WORKS

See C5, Specifications, page 169.

C6.4. SITE OFFICES

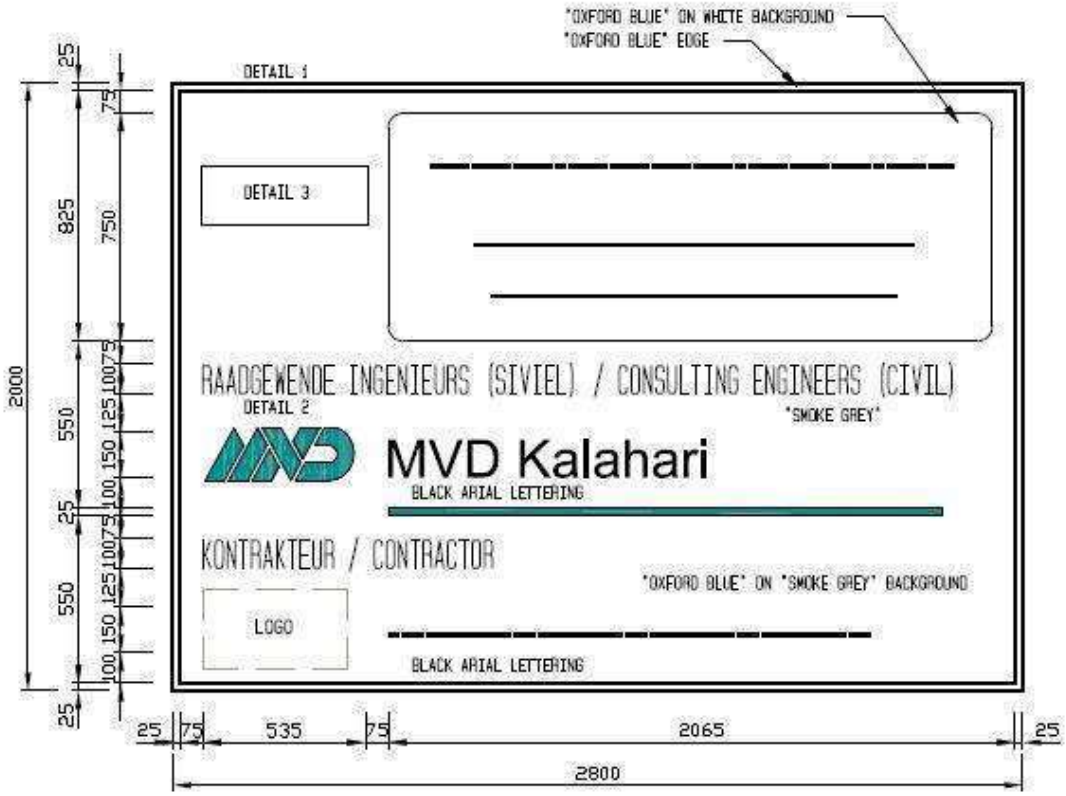
To be finalised on appointment.

SECTION 4

FIGURES AND DRAWINGS

Drawing A1: Name Board

ANNEXURE H



NOTES:

DETAIL 1: SHOULD MORE INFORMATION BE REQUIRED, THE BOARD MUST BE ENLARGED IN MULTIPLES OF 550mm

DETAIL 2: MVD LOGO CAN BE BOUGHT FROM MVD KALAHARI

DETAIL 3: SAVRI LOGO CAN BE BOUGHT FROM MVD KALAHARI

DETAIL 3



COLOUR SPECIFICATIONS:

- C:87 M:69 Y:0 K:0 PANTONE 2726 C
- C:56 M:21 Y:4 K:0 PANTONE 659 C
- C:0 M:0 Y:0 K:100 PANTONE PROCESS BLACK C
- C:0 M:0 Y:0 K:50 PANTONE COOL GRAY 9 C
- C:0 M:0 Y:0 K:30 PANTONE 2726 C

PROJECT NAME BOARD

NAME BOARD : A800 (CONTRACTOR 1 OR 2 OR 3)

SCALE 1 : 20

STANDARD FORMS AND FORMATS

REF NUMBER	DESCRIPTION
SS-01	Daily Site Diary
SS-02	Inspection Request
SS-03	Monthly Progress Report - General
SS-04	Monthly Progress Report - Roads
SS-07	Monthly Progress Report – Storm Water
SS-09	Monthly Report – Plant on Site
SS-10	Monthly Report – Labour on Site
SS-11	Control on Pavement Layer Works Contract Supervision
SS-12	Evaluation of Road Levels
SS-13	Inspection Form - Roads
SS-15	Excavation Checklist
SS-17	Requisition for Checking prior to pouring of Concrete
SS-18	Pre-Concrete Inspection Checklist
SS-19	Post Concrete Inspection Report for Civil Works
SS-20	Partial Handover Inspection
SS-21	Telkom & Electrical Certificate
SS-23.1	Interim Inspection Form – Sewer and Stormwater
SS-26	Final Inspection Form - Stormwater
CONS-10	Community Liaison Officer – Monthly Report
CONS-17	Outstanding Items for Completion
CONS-18.3	Certificate of Completion and Snag List
CONS-19.3	Certificate of Practical Completion
CONS-20.3	Final Approval Certificate
THE ABOVEMENTIONED FORMS WILL BE MADE AVAILABLE AFTER TENDER IS AWARDED	

SCHEDULE OF KEY PERSONNEL

ANNEXURE: A : SCHEDULE OF KEY PERSONNEL

Category A1: 3 - PHASE INSTALLATION ELECTRICIAN:
NAME & SURNAME: _____

ID NUMBER	QUALIFICATION

Category A2: ELECTRICAL CONSTRUCTION MANAGER/SUPERVISOR:
NAME & SURNAME:_____

ID NUMBER	QUALIFICATION

Category A3: PV SOLAR INSTALLATION SPECIALIST:
NAME & SURNAME:_____

ID NUMBER	QUALIFICATION

Category A4: SITE SHEQ OFFICER:
NAME & SURNAME:_____

ID NUMBER	QUALIFICATION

ANNEXURE: B : SCHEDULE OF PROJECT EXPERIENCE OF KEY PERSONNEL

Category A1: 3 - PHASE INSTALLATION ELETRICIAN:
NAME & SURNAME: _____

PROJECT NAME	DESCRIPTION	YEAR COMMENCE	YEAR COMPLETED	PROJECT VALUE INCL VAT	REFERENCE/ CONTACT DETAILS

Category A2: ELECTRICAL CONSTRUCTION MANAGER/SUPERVISOR:
NAME & SURNAME:_____

PROJECT NAME	DESCRIPTION	YEAR COMMENCE	YEAR COMPLETED	PROJECT VALUE INCL VAT	REFERENCE/ CONTACT DETAILS

Category A3: PV SOLAR INSTALLATION SPECIALIST:

NAME & SURNAME: _____

PROJECT NAME	DESCRIPTION	YEAR COMMENCE	YEAR COMPLETED	PROJECT VALUE INCL VAT	REFERENCE/ CONTACT DETAILS

Category A4: SITE SHEQ OFFICER:

NAME & SURNAME: _____

PROJECT NAME	DESCRIPTION	YEAR COMMENCE	YEAR COMPLETED	PROJECT VALUE INCL VAT	REFERENCE/ CONTACT DETAILS

ANNEXURE: C : SCHEDULE OF EXPERIENCE OF BIDDER (COMPANY)

B1-EXPERIENCE OF THE BIDDER: OVERHEAD ELECTRIFICATION					
PROJECT NAME	**DESCRIPTION**	**YEAR COM-MENCE**	**YEAR COM-PLETED**	**PROJECT VALUE INCL VAT**	**REFERENCE/ CONTACT DE-TAILS**

B2-EXPERIENCE OF THE BIDDER: PV SOLAR OFF-GRID INSTALLATIONS					
PROJECT NAME	**DESCRIPTION**	**YEAR COM-MENCE**	**YEAR COM-PLETED**	**PROJECT VALUE INCL VAT**	**REFERENCE/ CONTACT DE-TAILS**