



**EASTERN CAPE PROVINCE
DEPARTMENT OF EDUCATION
REQUEST FOR QUOTATION
FOR
PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL**

2EP/EB

EMIS NO: 200500810

DISTRICT: ALFRED NZO WEST

RFQ NO: 2022/07/663

Consisting of:

Single Volume: The Request for Quotation (Returnable) - This document

BIDDER:

CRS NO:

Compiled for:

SUPPLY CHAIN MANAGEMENT
Eastern Cape Department of Education
Steve Tshwete Complex, Zone 6
ZWELITSHA
5608

Website: www.edu.ecprov.gov.za

Compiled by:

INFRASTRUCTURE DELIVERY
Eastern Cape Department of Education
Steve Tshwete Complex, Zone 6
ZWELITSHA
5608

Website: www.edu.ecprov.gov.za

SEPTEMBER 2023

PNO:

REQUEST FOR QUOTATION

Index

REQUEST FOR QUOTATION

Part 1: Bid Procedure

- T1.1 Request for Quotation Notice and Invitation to Bid (SBD1)
- T1.2 Request for Quotation Data

Part 2: Agreement and Contract Data

- C1.1 Form of Offer and Acceptance
- C1.1a Final Summary of Bills of Quantities
- C1.1b Standard Conditions of Tender
- C1.2 Contract Data
- C1.3 Form of Guarantee

Part 3: Returnable Schedules/Documents

1. T2.1 List of Returnable Documents
2. T2.2 Returnable Documents:
 - SBD 4 Declaration of Interest
 - SBD 6.1 Preference Points Claim Form in terms of the Preferential Procurement Regulations 2022
 - SBD 6.2 Local Production and Content
 - T2.2.1 Certificate of Authority for Signatory
 - T2.2.2 Certificate of Authority for Joint Ventures
 - T2.2.5 Record of Addenda to Request for Quotation Documents
 - T2.2.6 Capacity of Bidder
 - T2.2.7 Relevant Project Experience - Completed Projects
 - T2.2.8 Relevant Project Experience - Current Projects
 - T2.2.9 Schedule of Plant & Equipment
 - T2.2.10 Compulsory Enterprise Questionnaire
 - T2.2.11 CIDB Grading Certificate
 - T2.2.12 Other Certificates
 - T2.2.13 Completed Project Reference Forms

THE CONTRACT

Part 4: Scope of Work

- C3.1 Scope of work
- C3.2 Health and Safety Specification
- C3.4 Contractors Reports

Part 5: Pricing data

- C2.1 Pricing instructions
- C2.2 Preliminaries/Bill of Quantities/Final Summary
- C2.3 Generator Specification Guideline

Part 6: Site information

- C4 Site information
- C5 Drawings

Part 1: BID PROCEDURE

**T1.1: Request for Quotation Notice and Invitation to Bid
(SBD1)**



REQUEST FOR QUOTATION NOTICE

DEPARTMENT OF EDUCATION **EASTERN CAPE PROVINCE**

Bidders are hereby invited by **DoE** for the following contract, relating to the Provision of Generators to EcDoE facilities.

PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL

RFQ NO: 2022/07/663

[CIDB Grade: 2EP/EB Category or Higher]

Principal Agent

Mr Q Msiwa

Tel: 040 608 4707

Project Leader (DoE)

Mr Q Msiwa

Tel: 040 608 4707

Request for Quotation documents will be available as from **12h00** on **20 September 2023** at the offices of the **Department of Education, Steve Tshwete Complex, Zone 6, Zwelitsha** or **Website <https://eceducation.gov.za/>**.

Completed Request for Quotation documents in a sealed envelope endorsed with the project name, request for quotation number and description must be deposited in the Tender Box, **Department of Education, Steve Tshwete Complex, Zone 6, Zwelitsha**, not later than **12h00** on **27 September 2023** when request for quotations will not be opened in public. The performance of the Contractor will be evaluated on a monthly basis and the overall performance report will be issued at the end of the project.

Site Briefing Meeting to be confirmed.

Bidders shall take note of the following Bid conditions –

- Single Volume to be submitted.
- Priced BoQ to be submitted.
- Bidders are required to have a CIDB contractor grading designation **2EP/EB** or higher.
- JV Agreements with installers and CIDB graded contractors would be acceptable.
- An approved surety will be required.
- Penalties for late completion will be enforced.
- Late request for quotations will not be accepted.
- Letter of Good Standing from the Compensation Fund or FEMA to be submitted with request for quotation.
- Failure to complete all supplementary information and the RETURNABLE SCHEDULES could result in the request for quotation being eliminated.

- ❑ CIPRO/CIPC Certificate to be submitted with tender.
- ❑ Adjudication criteria are as follows:
 - ❑ **80** Points for Price
 - ❑ **20** Points for Preferential specific Goals

Bids with a threshold value up to R50 000 000,00 shall be evaluated on 80/20 principle. Preference points shall be allocated as per below table:

Preferential goals Historically Disadvantaged individuals	Allocation of Points
Women participation	4
Persons with disabilities	2
Promotion of Youth	6
Specific goals	
Enterprises located in the Eastern Cape Province	6
Promotion of Military Veterans	2

1. CLAIMING OF PREFERENCE POINTS

- 1.1. Preference points allocated Historically Disadvantaged individuals may be claimed by Persons who had no franchise in national elections prior to 1983 and 1993.
- 1.2. Preference points allocated for women may be claimed if there is sufficient evidence that such woman has ownership of 51% or more of the enterprise shareholding.
- 1.3. Preference points allocated for persons with disabilities may only be claimed if there is sufficient evidence that such person has ownership of 51% or more of the enterprise shareholding.
- 1.4. Preference points allocated for promotion of youth may only be claimed if there is sufficient evidence that such youth has ownership of 51% or more of the enterprise shareholding.
- 1.5. Preference points for Locality may be allocated for promotion of enterprises located within the Eastern Cape Province may be claimed by submission of proof that the enterprise is located within the borders of Eastern Cape Province. This includes an enterprise whose head office may be situated in another province but has a fully-

fledged branch within Eastern Cape Province. Enterprises located outside the borders of the Eastern Cape Province and who only appoints agents and or commission warehouses in this municipal area are expressly excluded from claiming points for this goal.

1.6. Preference points may be allocated to other RDP goals as follows:

- (a) Promotion of south African owned enterprises.
- (b) Promotion of export-oriented production to create jobs.
- (c) Creation of new jobs or intensification of labour absorption.
- (d) Promotion of enterprises located in the rural areas.
- (e) Promotion of enterprises located in specific municipal area for work to be done or service to be rendered in that municipal area.

- Tender validity period is 120 (one hundred and twenty) calendar days.
- Tender Forms (Form C1.1: Form of offer and acceptance) that are incomplete or incorrectly completed will result in elimination of that tender.
- An original valid SARS Tax Clearance Certificate/Pin must be submitted with the tender in order to be considered. Failure for submission of Tax Clearance Certificate will result in elimination of tender. In the case of a JV, each partner must present an original SARS Tax Clearance Certificate.
- Form T2.2r (Compulsory Enterprise Questionnaire) must be completed by all or the tender will be eliminated.
- In case of a joint venture a two compulsory enterprise questionnaire must be submitted.

Telegraphic, telexed or faxed tenders will not be considered. The ECDoE does not bind itself to accepting the lowest tenderer. Tender price offered should not pose a commercial risk to the completion of the project.

The BAC may or may not interview the bidder should it deem it necessary.

Procurement Contact Official

Mr P Nxozana

Tel: 040 608 4524

Pakamile.Nxozana@ecdoe.gov.za

Infrastructure Contact Official

Mr Q Msiwa

Tel: 040 608 4707

Qiqile.Msiwa@edu.ecprov.gov.za

PART A INVITATION TO BID

YOU ARE HEREBY INVITED TO BID FOR REQUIREMENTS OF THE (NAME OF DEPARTMENT/ PUBLIC ENTITY)					
BID NUMBER:	2022/07/663	CLOSING DATE:	27 September 2023	CLOSING TIME:	12h00
DESCRIPTION	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL				
BID RESPONSE DOCUMENTS MAY BE DEPOSITED IN THE BID BOX SITUATED AT (STREET ADDRESS)					
RECEPTION AREA OF THE DEPARTMENT OF EDUCATION,					
STEVE VUKILE TSHWETE EDUCATION COMPLEX, ZONE 6,					
ZWELITSHA					
BIDDING PROCEDURE ENQUIRIES MAY BE DIRECTED TO			TECHNICAL ENQUIRIES MAY BE DIRECTED TO:		
CONTACT PERSON	Mr P Nxozana		CONTACT PERSON	Mr Q Msiwa	
TELEPHONE NUMBER	040 608 4524		TELEPHONE NUMBER	040 608 4707	
FACSIMILE NUMBER			FACSIMILE NUMBER		
E-MAIL ADDRESS	Pakamile.Nxozana@ecdoe.gov.za		E-MAIL ADDRESS	qiqile.msiwa@edu.ecprov.gov.za	
SUPPLIER INFORMATION					
NAME OF BIDDER					
POSTAL ADDRESS					
STREET ADDRESS					
TELEPHONE NUMBER	CODE		NUMBER		
CELLPHONE NUMBER					
FACSIMILE NUMBER	CODE		NUMBER		
E-MAIL ADDRESS					
VAT REGISTRATION NUMBER					
SUPPLIER COMPLIANCE STATUS	TAX COMPLIANCE SYSTEM PIN:		OR	CENTRAL SUPPLIER DATABASE No:	MAAA
B-BBEE STATUS LEVEL VERIFICATION CERTIFICATE	TICK APPLICABLE BOX] <input type="checkbox"/> Yes <input type="checkbox"/> NO		B-BBEE STATUS LEVEL SWORN AFFIDAVIT	[TICK APPLICABLE BOX] <input type="checkbox"/> Yes <input type="checkbox"/> No	
[A B-BBEE STATUS LEVEL VERIFICATION CERTIFICATE/ SWORN AFFIDAVIT (FOR EMES & QSEs) MUST BE SUBMITTED IN ORDER TO QUALIFY FOR PREFERENCE POINTS FOR B-BBEE]					
ARE YOU THE ACCREDITED REPRESENTATIVE IN SOUTH AFRICA FOR THE GOODS /SERVICES /WORKS OFFERED?	<input type="checkbox"/> Yes <input type="checkbox"/> No [IF YES ENCLOSE PROOF]		ARE YOU A FOREIGN BASED SUPPLIER FOR THE GOODS /SERVICES /WORKS OFFERED?	<input type="checkbox"/> Yes <input type="checkbox"/> No [IF YES, ANSWER THE QUESTIONNAIRE BELOW]	
QUESTIONNAIRE TO BIDDING FOREIGN SUPPLIERS					

**PART B
TERMS AND CONDITIONS FOR BIDDING**

1. BID SUBMISSION:
<p>1.1. BIDS MUST BE DELIVERED BY THE STIPULATED TIME TO THE CORRECT ADDRESS. LATE BIDS WILL NOT BE ACCEPTED FOR CONSIDERATION.</p> <p>1.2. ALL BIDS MUST BE SUBMITTED ON THE OFFICIAL FORMS PROVIDED–(NOT TO BE RE-TYPED) OR IN THE MANNER PRESCRIBED IN THE BID DOCUMENT.</p> <p>1.3. THIS BID IS SUBJECT TO THE PREFERENTIAL PROCUREMENT POLICY FRAMEWORK ACT, 2000 AND THE PREFERENTIAL PROCUREMENT REGULATIONS, 2022, THE GENERAL CONDITIONS OF CONTRACT (GCC) AND, IF APPLICABLE, ANY OTHER SPECIAL CONDITIONS OF CONTRACT.</p> <p>1.4. THE SUCCESSFUL BIDDER WILL BE REQUIRED TO FILL IN AND SIGN A WRITTEN CONTRACT FORM (SBD7).</p>
2. TAX COMPLIANCE REQUIREMENTS
<p>2.1 BIDDERS MUST ENSURE COMPLIANCE WITH THEIR TAX OBLIGATIONS.</p> <p>2.2 BIDDERS ARE REQUIRED TO SUBMIT THEIR UNIQUE PERSONAL IDENTIFICATION NUMBER (PIN) ISSUED BY SARS TO ENABLE THE ORGAN OF STATE TO VERIFY THE TAXPAYER’S PROFILE AND TAX STATUS.</p> <p>2.3 APPLICATION FOR TAX COMPLIANCE STATUS (TCS) PIN MAY BE MADE VIA E-FILING THROUGH THE SARS WEBSITE WWW.SARS.GOV.ZA.</p> <p>2.4 BIDDERS MAY ALSO SUBMIT A PRINTED TCS CERTIFICATE TOGETHER WITH THE BID.</p> <p>2.5 IN BIDS WHERE CONSORTIA / JOINT VENTURES / SUB-CONTRACTORS ARE INVOLVED; EACH PARTY MUST SUBMIT A SEPARATE TCS CERTIFICATE / PIN / CSD NUMBER.</p> <p>2.6 WHERE NO TCS PIN IS AVAILABLE BUT THE BIDDER IS REGISTERED ON THE CENTRAL SUPPLIER DATABASE (CSD), A CSD NUMBER MUST BE PROVIDED.</p> <p>2.7 NO BIDS WILL BE CONSIDERED FROM PERSONS IN THE SERVICE OF THE STATE, COMPANIES WITH DIRECTORS WHO ARE PERSONS IN THE SERVICE OF THE STATE, OR CLOSE CORPORATIONS WITH MEMBERS PERSONS IN THE SERVICE OF THE STATE.”</p>

NB: FAILURE TO PROVIDE / OR COMPLY WITH ANY OF THE ABOVE PARTICULARS MAY RENDER THE BID INVALID.

SIGNATURE OF BIDDER:

CAPACITY UNDER WHICH THIS BID IS SIGNED:
(Proof of authority must be submitted e.g. company resolution)

DATE:

T1.2 Request for Quotation Data

T1.2: REQUEST FOR QUOTATION DATA

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL		
Request for Quotation No:	2022/07/663		
Advertising date:	20 September 2023	Closing date:	27 September 2023
Closing time:	12h00	Validity period	120 Days

Clause number																															
	<p>The conditions of Request for Quotation applicable to this contract are the Standard Conditions of Tender as contained in Annexure C of the CIDB Standard for Uniformity in Construction Procurement (August 2019) as published in Government Gazette No. 42622, Department of Public Works Notice 423.</p> <p>The Standard Conditions of Bid make several references to the Bid Data for details that apply specifically to this Bid. The Bid Data shall have precedence in the interpretation of any ambiguity or inconsistency between it and the standard conditions of Bid.</p> <p>Each item of data given below is cross-referenced to the clause in the Standard Conditions of Bid to which it mainly applies.</p>																														
C.1.2	The employer is the Eastern Cape Province Department of Education																														
C.1.3.1	<p>The Request for Quotation documents issued by the employer comprise:</p> <p>THE REQUEST FOR QUOTATION (SINGLE VOLUME) Part 1: Bidding Procedure T1.1 Request for Quotation Notice and Invitation to Bid (SBD1) T1.2 Request for Quotation Data</p> <p>Part 2: Agreement and Contract Data C1.1 Form of Offer and Acceptance C1.1a Final Summary of Bills of Quantities (C2.2) C1.1b Standard Conditions of Tender C1.2 Contract Data C1.3 Form of Guarantee</p> <p>Part 3: Returnable Schedules/Documents T2.1 List of Returnable Documents T2.2 Returnable Documents:</p> <table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 15%;">SBD4</td> <td style="width: 60%;">Declaration of interest</td> <td style="width: 25%;">Mandatory Requirement</td> </tr> <tr> <td>SBD6.1</td> <td>Preference points claim form in terms of Preferential Procurement Regulations 2022</td> <td>Mandatory Requirement</td> </tr> <tr> <td>SBD6.2</td> <td>Local production and content</td> <td>Mandatory Requirement</td> </tr> <tr> <td>T2.2.1</td> <td>Certificate of authority for signatory</td> <td>Mandatory Requirement</td> </tr> <tr> <td>T2.2.2</td> <td>Certificate of authority for joint ventures</td> <td>Mandatory Requirement</td> </tr> <tr> <td>T2.2.5</td> <td>Record of addenda to Request for Quotation documents</td> <td>Additional documents</td> </tr> <tr> <td>T2.2.6</td> <td>Capacity of Bidder</td> <td>Additional documents</td> </tr> <tr> <td>T2.2.7</td> <td>Relevant project experience - completed projects</td> <td>Additional documents</td> </tr> <tr> <td>T2.2.8</td> <td>Relevant project experience - current projects</td> <td>Additional documents</td> </tr> <tr> <td>T2.2.9</td> <td>Schedule of plant & equipment</td> <td>Additional documents</td> </tr> </table>	SBD4	Declaration of interest	Mandatory Requirement	SBD6.1	Preference points claim form in terms of Preferential Procurement Regulations 2022	Mandatory Requirement	SBD6.2	Local production and content	Mandatory Requirement	T2.2.1	Certificate of authority for signatory	Mandatory Requirement	T2.2.2	Certificate of authority for joint ventures	Mandatory Requirement	T2.2.5	Record of addenda to Request for Quotation documents	Additional documents	T2.2.6	Capacity of Bidder	Additional documents	T2.2.7	Relevant project experience - completed projects	Additional documents	T2.2.8	Relevant project experience - current projects	Additional documents	T2.2.9	Schedule of plant & equipment	Additional documents
SBD4	Declaration of interest	Mandatory Requirement																													
SBD6.1	Preference points claim form in terms of Preferential Procurement Regulations 2022	Mandatory Requirement																													
SBD6.2	Local production and content	Mandatory Requirement																													
T2.2.1	Certificate of authority for signatory	Mandatory Requirement																													
T2.2.2	Certificate of authority for joint ventures	Mandatory Requirement																													
T2.2.5	Record of addenda to Request for Quotation documents	Additional documents																													
T2.2.6	Capacity of Bidder	Additional documents																													
T2.2.7	Relevant project experience - completed projects	Additional documents																													
T2.2.8	Relevant project experience - current projects	Additional documents																													
T2.2.9	Schedule of plant & equipment	Additional documents																													

	T2.2.10	Compulsory enterprise questionnaire	Mandatory Requirement
	T2.2.11	CIDB grading certificate	Mandatory Requirement
	T2.2.12	Other certificates (certified copies to be inserted by Bidder), etc	Mandatory Requirement
		<ul style="list-style-type: none"> • Certified copy of CIPC company registration certificate • Certified copies of ID's of shareholders, members, partners or sole owner • Letter of Good Standing from Bank where Bidder's primary transaction account is • Letter of Good Standing from Compensation Fund or a licensed insurer as contemplated in the Compensation for Occupational Injuries and Diseases Act 1993 • CSD Registration Summary Report dated not more than thirty (30) days prior to the Request for Quotation closing date. • Original valid SARS tax clearance certificate and pin 	Mandatory Requirement
	T2.2.13	Completed project reference forms	Additional documents
		<ul style="list-style-type: none"> • Priced BoQ 	Mandatory Requirement
	<p>THE CONTRACT</p> <p>Part 4: Scope of Work</p> <p>C3.1 Scope of work</p> <p>C3.2 Health and Safety Specification</p> <p>C3.4 Contractors Reports</p> <p>Part 5: Pricing data</p> <p>C2.1 Pricing instructions</p> <p>C2.2 Preliminaries / Bill of Quantities / Final Summary</p> <p>Part 6: Site information</p> <p>C4 Site information</p> <p>C5 Drawings</p>		
C.1.4	The employer's agent is:		
	Name:	Q Msiwa (Eastern Cape Province Department of Education)	
	Capacity:	Principal Agent	
	Address:	Steve Tshwete Building	
	Tel:	(040) 608 4707	
	Fax:		
	E-mail:	qiqile.msiwa@ecdoe.gov.za	
C.2.1	<p>Only those Bidders who satisfy the following eligibility criteria should submit Request for Quotations:</p> <ol style="list-style-type: none"> 1. Submit an offer only if the Bidder satisfies the criteria stated in the Request for Quotation data and the Bidder, or any of his principals, is not under any restriction to do business with the employer. 2. The Bidder is registered with the CIDB, in a 2EP/EB or higher class of construction work. 3. The Bidder is registered on the National Treasury Central Supplier Data Base (https://secure.csd.gov.za) 4. The Bidder accepts that documents that have correction fluid on them will be deemed non-responsive and the documents must remain intact. 		

C.2.13.5	Request for Quotation offers shall be submitted as originals only.
C.2.13.6	A two-envelope system is not required.
C.2.13.9	Telephonic, telegraphic, telex, facsimile, emailed, electronic copy or late offers will not be accepted.
C.2.15	The closing time for submission of Request for Quotation offers is as per the Request for Quotation Notice (T1.1) and the Invitation to Bid (SBD 1).
C.2.16	The Request for Quotation offer validity period is as per the Request for Quotation Notice (T1.1) and the Invitation to Bid (SBD 1).
C.2.17	Provide clarification of the Request for Quotation offer in response to do so from the employer during the evaluation of Request for Quotation 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 Bidders or substance of the Request for Quotation offer is sought, offered, or permitted.
C.2.22	Not a requirement
C.2.23	Refer to Parts 1, 2 & 3 for certificates and other documents to be submitted with the Request for Quotation.
C.3.4	The time and location for opening of the Request for Quotation offers are as per the Request for Quotation Notice (T1.1).
C.3.11	<p>Financial Offer and Preference will be evaluated as follows:</p> <p>The 80/20 preference point system will be applicable with 80 points allocated to Price and 20 points towards Specific Goals.</p> <p>The score for price is calculated using the following formula:</p> $P_s = 80 \left(1 - \frac{P_t - P_{\min}}{P_{\min}} \right)$ <p>Where:</p> <p>Ps = Points scored for price of bid under consideration;</p> <p>Pt = Price of bid under consideration and</p> <p>Pmin = Price of lowest acceptable bid.</p> <p>1. POINTS AWARDED FOR SPECIFIC GOALS</p> <p>1.1. 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:</p> <p>1.2. 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—</p> <p>(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</p>

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.)

The specific goals allocated points in terms of this tender	Number of points allocated (90/10 system) (To be completed by the organ of state)	Number of points allocated (80/20 system) (To be completed by the organ of state)	Number of points claimed (90/10 system) (To be completed by the tenderer)	Number of points claimed (80/20 system) (To be completed by the tenderer)
Woman Ownership	2	5		
Ownership with Disabilities	1	2		
Youth Ownership	3	5		
Enterprises located in the Eastern Cape Province	3	6		
Ownership by Military Veterans	1	2		

C.3.11

C.3.13

Request for Quotation offers will only be accepted if:

1. The Bidder or any of its directors/shareholders 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;
2. The Bidder has not:
 - a. Abused the Employer's Supply Chain Management System; or
 - b. Failed to perform on any previous contract and has been given a written notice to this effect;
3. The Bidder has completed the compulsory declarations and there are no conflicts of interest, which may impact on the Bidder's ability to perform the contract in the best interests of the employer or potentially compromise the Request for Quotation process;
4. The Bidder has registered on the Centralized Supplier Database (CSD) prior to submitting Request for Quotations (open Request for Quotations). Any prospective Bidder found to have tax matters not in order with SARS during the evaluation process will be eliminated and not be considered further;

	5. The Bidder is registered with the Construction Industry Development Board in an appropriate contractor grading designation; The Bidder is in good standing with the Compensation Fund.
C.3.17	The number of paper copies of the signed contract to be provided by the employer is 1 (one) copy of the signed contract to the successful Bidder.

Part 2: AGREEMENT AND CONTRACT DATA

C1.1 Form of Offer and Acceptance

C1.1: FORM OF OFFER AND ACCEPTANCE

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663

OFFER

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

PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL

The Bidder, identified in the offer signature block, has examined the documents listed in the Request for Quotation data and addenda thereto as listed in the returnable schedules, and by submitting this offer has accepted the conditions of Request for Quotation.

By the representative of the Bidder, deemed to be duly authorized, signing this part of this form of offer and acceptance, the Bidder 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)

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 Bidder before the end of the period of validity stated in the Request for Quotation data, whereupon the Bidder becomes the party named as the contractor in the conditions of contract identified in the contract data.

Signature(s)

Name(s)

Capacity

for the Bidder

.....
(Name and address of organization)

Name and signature of witness Date

ACCEPTANCE

By signing this part of this form of offer and acceptance, the employer identified below accepts the Bidder'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 Bidder's offer shall form an agreement between the employer and the Bidder 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:

Part C1 Agreements and contract data, (which includes this agreement)

Part C2 Pricing data

Part C3 Scope of work.

Part C4 Site information and drawings and documents or parts thereof, which may be incorporated by reference into the above listed Parts.

Deviations from and amendments to the documents listed in the Request for Quotation data and any addenda thereto as listed in the returnable schedules as well as any changes to the terms of the offer agreed by the Bidder and the employer during this process of offer and acceptance, are contained in the schedule of deviations attached to and forming part of this form of offer and acceptance. No amendments to or deviations from said documents are valid unless contained in this schedule.

The Bidder shall within 2 (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 securities, bonds, guarantees, proof of insurance and any other documentation to be provided in terms of the conditions of contract identified in the contract data. 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 Bidder receives one fully completed original copy of this document, including the schedule of deviations (if any). Unless the Bidder (now contractor) within 5 (five) working 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

Schedule of Deviations

Notes:

- 1. The extent of deviations from the Request for Quotation documents issued by the employer before the Request for Quotation closing date is limited to those permitted in terms of the conditions of Request for Quotation.*
- 2. A Bidder'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 Request for Quotation 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 Request for Quotation documents arising from the above agreements and recorded here, shall also be incorporated into the final draft of the Contract.*

1. Subject _____

Details _____

2. Subject _____

Details _____

3. Subject _____

Details _____

4. Subject _____

Details _____

By the duly authorised representatives signing this agreement, the employer and the Bidder agree to and accept the foregoing schedule of deviations as the only deviations from and amendments to the documents listed in the Request for Quotation data and addenda thereto as listed in the Request for Quotation schedules, as well as any confirmation, clarification or changes to the terms of the offer agreed by the Bidder 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 Request for Quotation/ quotation documents and the receipt by the Bidder of a completed signed copy of this Agreement shall have any meaning or effect in the contract between the parties arising from this agreement.

C1.1a

Final Summary of Bills of Quantities

C1.1b Standard Conditions of Tender

CIDB Standard Conditions of Tender (August 2019 Edition)

(As contained in Annexure C of the CIDB Standard for Uniformity in Engineering and Construction Works Contracts in Board Notice 423 of 2019 in Government Gazette No 42622 of 8 August 2019)

C.1 General

C.1.1 Actions

C.1.1.1 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 C.2 and C.3, timeously and with integrity, and behave equitably, honestly and transparently, comply with all legal obligations and not engage in anticompetitive practices.

C.1.1.2 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. Bidders 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.

C.1.1.3 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.

C.1.2 Tender Documents

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

C.1.3 Interpretation

C.1.3.1 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.

C.1.3.2 These conditions of tender, the tender data and tender schedules which are required for tender evaluation purposes, shall form part of any contract arising from the invitation to tender.

C.1.3.3 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 tenderer 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 tenderer who 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;

C.1.4 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.

C.1.5 Cancellation and Re-Invitation of Tenders

C.1.5.1 An employer 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 engineering and construction works specified in the invitation;
- b) funds are no longer available to cover the total envisaged expenditure; or
- c) no acceptable tenders are received.
- d) there is a material irregularity in the tender process.

C.1.5.2 The decision to cancel a tender invitation must be published in the same manner in which the original tender invitation was advertised

C.1.5.3 An employer may only with the prior approval of the relevant treasury cancel a tender invitation for the second time.

C.1.6 Procurement procedures

C.1.6.1 General

Unless otherwise stated in the tender data, a contract will, subject to C.3.13, be concluded with the tenderer who in terms of C.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.

C.1.6.2 Competitive negotiation procedure

C.1.6.2.1 Where the tender data require that the competitive negotiation procedure is to be followed, Bidders shall submit tender offers in response to the proposed contract in the first round of submissions.

Notwithstanding the requirements of C.3.4, the employer shall announce only the names of the Bidders who make a submission. The requirements of C.8 relating to the material deviations or qualifications which affect the competitive position of Bidders shall not apply.

C.1.6.2.2 All responsive Bidders or at least a minimum of not less than three responsive Bidders that are highest ranked in terms of the evaluation criteria stated in the tender data shall be invited to enter into competitive negotiations based on the principle of equal treatment, keeping confidential the proposed solutions and associated information. Notwithstanding the provisions of C.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.

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

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

C.1.6.3 Proposal procedure using the two stage-system

C.1.6.3.1 Option 1

Bidders shall in the first stage submit technical proposals and, if required, cost parameters around which a contract may be negotiated. The employer shall evaluate each responsive submission in terms of the method of evaluation stated in the tender data, and in the second stage negotiate a contract with the tenderer scoring the highest number of evaluation points and award the contract in terms of these

conditions of tender.

C.1.6.3.2 Option 2

C.1.6.3.2.1 Bidders shall submit in the first stage only technical proposals. The employer shall invite all responsive Bidders to submit tender offers in the second stage, following the issuing of procurement documents.

C.1.6.3.2.2 The employer shall evaluate tenders received during the second stage in terms of the method of evaluation stated in the tender data, and award the contract in terms of these conditions of tender.

C.2 Tenderer's obligations

C.2.1 Eligibility

C.2.1.1 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.

C.2.1.2 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.

C.2.2 Cost of tendering

C.2.2.1 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.

C.2.2.2 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.

C.2.3 Check documents

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

C.2.4 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.

C.2.5 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.

C.2.6 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.

C.2.7 Clarification meeting

Attend, where required, a clarification meeting at which Bidders 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.

C.2.8 Seek clarification

Request clarification of the tender documents, if necessary, by notifying the employer at least five (5) working days before the closing time stated in the tender data.

C.2.9 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.

C.2.10 Pricing the tender offer

C.2.10.1 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 fourteen (14) days before the closing time stated in the tender data.

C.2.10.2 Show VAT payable by the employer separately as an addition to the tendered total of the prices.

C.2.10.3 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.

C.2.10.4 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.

C.2.11 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.

C.2.12 Alternative tender offers

C.2.12.1 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.

C.2.12.2 Accept that an alternative tender offer must be based only on the criteria stated in the tender data or criteria otherwise acceptable to the employer.

C.2.12.3 An alternative tender offer must only be considered if the main tender offer is the winning tender.

C.2.13 Submitting a tender offer

C.2.13.1 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 identified in the contract data and described in the scope of works, unless stated otherwise in the tender data.

C.2.13.2 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 ink.

C.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.

C.2.13.4 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 Bidders 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.

- C.2.13.5 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.
- C.2.13.6 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". 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.
- C.2.13.7 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.
- C.2.13.8 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.
- C.2.13.9 Accept that tender offers submitted by facsimile or e-mail will be rejected by the employer, unless stated otherwise in the tender data.

C.2.14 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.

C.2.15 Closing time

- C.2.15.1 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.
- C.2.15.2 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.

C.2.16 Tender offer validity

- C.2.16.1 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.
- C.2.16.2 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.
- C.2.16.3 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. If the validity period stated in C.2.16 lapses before the employer evaluating tender, the contractor reserves the right to review the price based on Consumer Price Index (CPI).
- C.2.16.4 Where a tender submission is to be substituted, a tenderer must submit a substitute tender in accordance with the requirements of C.2.13 with the packages clearly marked as "SUBSTITUTE".

C.2.17 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 Bidders or substance of the tender offer is sought, offered, or permitted.

Note: Sub-clause C.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.

C.2.18 Provide other material

C.2.18.1 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.

C.2.18.2 Dispose of samples of materials provided for evaluation by the employer, where required.

C.2.19 Inspections, tests and analysis

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

C.2.20 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.

C.2.21 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.

C.2.22 Return of other tender documents

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

C.2.23 Certificates

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

C.3 The employer's undertakings

C.3.1 Respond to requests from the tenderer

C.3.1.1 Unless otherwise stated in the tender Data, respond to a request for clarification received up to five (5) working days before the tender closing time stated in the Tender Data and notify all Bidders who collected tender documents.

C.3.1.2 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.

C.3.2 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 (3) working 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 Bidders who collected tender documents.

C.3.3 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.

C.3.4 Opening of tender submissions

C.3.4.1 Unless the two-envelope system is to be followed, open valid tender submissions in the presence of Bidders' 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.

C.3.4.2 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 its BBBEE status level and time for completion for the main tender offer only.

C.3.4.3 Make available the record outlined in C.3.4.2 to all interested persons upon request.

C.3.5 Two-envelope system

C.3.5.1 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 Bidders' 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.

C.3.5.2 Evaluate functionality of the technical proposals offered by Bidders, then advise Bidders 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 Bidders, 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 on BBBEE status level. Return unopened financial proposals to Bidders whose technical proposals failed to achieve the minimum number of points for functionality.

C.3.6 Non-disclosure

Not disclose to Bidders, 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.

C.3.7 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.

C.3.8 Test for responsiveness

C.3.8.1 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.

C.3.8.2 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 Bidders 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.

C.3.9 Arithmetical errors, omissions and discrepancies

- C.3.9.1 Check responsive tenders for discrepancies between amounts in words and amounts in figures. Where there is a discrepancy between the amounts in figures and the amount in words, the amount in words shall govern.
- C.3.9.2 Check the highest ranked tender or tenderer with the highest number of tender evaluation points after the evaluation of tender offers in accordance with C.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.
- C.3.9.3 Notify the tenderer of all errors or omissions that are identified in the tender offer and either confirm the tender offer as tendered or accept the corrected total of prices.
- C.3.9.4 Where the tenderer elects to confirm the tender offer as tendered, correct the errors as follows:
 - a) 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.
 - b) 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.

C.3.10 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.

C.3.11 Evaluation of tender offers

The Standard Conditions of Tender standardize the procurement processes, methods and procedures from the time that tenders are invited to the time that a contract is awarded. They are generic in nature and are made project specific through choices that are made in developing the Tender Data associated with a specific project.

Conditions of tender are by definition the document that establishes a tenderer's obligations in submitting a tender and the employer's undertakings in soliciting and evaluating tender offers. Such conditions establish the rules from the time a tender is advertised to the time that a contract is awarded and require employers to conduct the process of offer and acceptance in terms of a set of standard procedures.

The CIDB Standard Conditions of Tender are based on a procurement system that satisfies the following system requirements:	
Requirement	Qualitative interpretation of goal
Fair	The process of offer and acceptance is conducted impartially without bias, providing simultaneous and timely access to participating parties to the same information.
Equitable	Terms and conditions for performing the work do not unfairly prejudice the interests of the parties.
Transparent	The only grounds for not awarding a contract to a tenderer who satisfies all requirements are restrictions from doing business with the employer, lack of capability or capacity, legal impediments and conflicts of interest.
Competitive	The system provides for appropriate levels of competition to ensure cost effective and best value

	outcomes.
Cost effective	The processes, procedures and methods are standardized with sufficient flexibility to attain best value outcomes in respect of quality, timing and price, and least resources to effectively manage and control procurement processes.

The activities associated with evaluating tender offers are as follows:

- a) Open and record tender offers received
- b) Determine whether or not tender offers are complete
- c) Determine whether or not tender offers are responsive
- d) Evaluate tender offers
- e) Determine if there are any grounds for disqualification
- f) Determine acceptability of preferred tenderer
- g) Prepare a tender evaluation report
- h) Confirm the recommendation contained in the tender evaluation report

C.3.11.1 General

The employer must appoint an evaluation panel of not less than three persons conversant with the proposed scope of works to evaluate each responsive tender offer using the tender evaluation methods and associated evaluation criteria and weightings that are specified in the tender data.

C.3.12 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.

C.3.13 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 No. 2008, bankrupt or being wound up, has his/her affairs administered by a court or a judicial officer, has suspended his/her 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.

C.3.14 Prepare contract documents

C.3.14.1 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.

C.3.14.2 Complete the schedule of deviations attached to the form of offer and acceptance, if any.

C.3.15 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.

C.3.16 Registration of the award

An employer must, within twenty-one (21) working days from the date on which a contractor's offer to perform a construction works contract is accepted in writing by the employer, register and publish the award on the cidb Register of Projects.

C.3.17 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.

C.3.18 Provide written reasons for actions taken

Provide upon request written reasons to Bidders 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 Bidders or might prejudice fair competition between Bidders.

---oo0oo---

C1.2 Contract Data

**C1.2 : CONTRACT DATA : JBCC 2000 PRINCIPAL BUILDING AGREEMENT
(Edition 4.1 of March 2005)**

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663

	<p>The Conditions of Contract are clauses 1 to 42 of the JBCC series 2000 Principal Building Agreement (Edition 4.1 of March 2005) prepared by the Joint Building Contracts Committee.</p> <p>Copies of these conditions of contract may be obtained from the Association of South African Quantity Surveyors, Master Builders Association, South African Association of Consulting Engineers, South African Institute of Architects, Association of Construction Project Managers, Building Industries Federation South Africa, South African Property Owners Association or Specialist Engineering Contractors Committee.</p>
--	---

	<p>CONTRACT VARIABLES</p> <p>THE SCHEDULE</p> <p>The schedule contains all the variables referred to in this document and is divided into part 1: contract data completed by the employer and part 2: contract data completed by the contractor. Part 1 must be completed in full and included in the Bidder documents. Both part 1 and part 2 form part of this agreement.</p> <p>Spaces requiring information must be filled in, shown as “not applicable” or deleted but not left blank. Where choices are offered, the non-applicable items are to be deleted. Where insufficient space is provided the information should be annexed hereto and cross referenced to the applicable clause of the schedule. Key cross reference clauses are italicised in [] brackets.</p>
--	---

42.0	PART 1: CONTRACT DATA PROVIDED BY THE EMPLOYER
-------------	---

42.1	CONTRACTING AND OTHER PARTIES
42.1.1	<p>Employer: Eastern Cape Province Department of Education</p> <p>Postal address: Private Bag X0032 BHISHO 5605</p> <p>Tel: 040 608 4335 Fax: 040 – 602 7272</p> <p>Physical address: Steve Tshwete Building Zone 6 Zwelitsha</p>
[1.2]	

42.1.2 [1.1, 5.1]	Principal Agent: TBC Tel: Fax:
42.1.3 [1.1, 5.2]	Agent (1) - TBC Agent's service: Postal address: Tel: Fax:
42.1.4 [1.1, 5.2]	Agent (2) - TBC Agent's service: Postal address: Tel: Fax:
42.1.5 [1.1, 5.2]	Agent (3) - TBC Agent's service: Postal address: Tel: Fax:
42.1.6 [1.1, 5.2]	Agent (4) - TBC Agent's service: Postal address: Tel: Fax:
42.2	CONTRACT DETAILS
42.2.1 [1.1]	Works description: Refer to document C3.1 – Scope of Work.
42.2.2 [1.1]	Site description: Refer to document C4 – Site Information.
42.2.4 [41.0]	Specific options that are applicable to a State organ only Where so :
[31.1 #] [31.11.2 #] [31.12.2#] [11.2.#]	1) Interest rate legislation: (a) in respect of interest owed by the employer , the interest rate as determined by the Minister of Justice and Constitutional Development from time to time, in terms of section 1(2) of the Prescribed Rate of Interest Act, 1975 (Act No. 55 of 1975), will apply; and (b) in respect of interest owed to the employer , the interest rate as determined by the Minister of Finance, from time to time, in terms of section 80(1)(b) of the Public Finance Management Act, 1999 (Act No. 1 of 1999), will apply

<p>[31.4.2 #]</p> <p>[40.2.2.#]</p> <p>[26.1.2 #]</p>	<p>2) Lateral support insurance to be effected by the contractor:</p> <p>3) Payment will be made for materials and goods on site: Under no circumstance will deposits due by the contractor to any supplier or subcontractor for materials or equipment be paid prior to the delivery to site thereof, after which it will be regarded as materials and goods on site.</p> <p>4) Dispute resolution by adjudication:</p> <p>5) Extended defects liability period is applicable to the following elements:</p> <ul style="list-style-type: none"> - all civil works such as roads, parking areas, stormwater & soil drainage - all work done under electrical subcontracts - all work done under mechanical subcontracts 	<p>Yes <input type="checkbox"/> No <input checked="" type="checkbox"/></p> <p>Yes <input checked="" type="checkbox"/> No <input type="checkbox"/></p> <p>Yes <input checked="" type="checkbox"/> No <input type="checkbox"/></p>
<p>42.2.6 [15.3]</p>	<p>Period for the commencement of the works after the contractor takes possession of the site: Five (5) working days.</p>	
<p>42.2.7 [24.3.1] [30.1]</p>	<p>For the works as a whole: The date for practical completion shall be One (1) Months (including statutory holidays, but excluding the annual builders' shutdown period) from the date that possession of the site is given to the contractor and the penalty per calendar day shall be 27.5 cents per R100 of the contract value.</p>	
<p>42.2.9 [1.2]</p>	<p>The law applicable to this agreement shall be that of the: Republic of South Africa</p>	
<p>42.3</p>	<p>INSURANCES</p>	
<p>42.3.1 [10.1 #, 10.2 #, 12.1 #]</p>	<p>Contract works insurance to be effected by the contractor</p> <p><input checked="" type="checkbox"/> To the minimum value of the contract sum plus 20%</p> <p>With a deductible not exceeding 5% of each and every claim</p>	
<p>42.3.2 [10.1#, 10.2 #, 12.1 #]</p>	<p>Supplementary insurance is required: Yes</p> <p>To the minimum value of the contract sum plus 20 %</p>	
<p>42.3.3 [11.1#, 12.1 #]</p>	<p>Public liability insurance to be effected by the contractor</p> <p><input checked="" type="checkbox"/> For the sum of R 5 million</p> <p>With a deductible not exceeding 5% of each and every claim</p>	
<p>42.3.4 [11.2 #, 12.1 #]</p>	<p>Support insurance to be effected by the contractor:</p> <p>Not Applicable</p>	
<p>42.4</p>	<p>DOCUMENTS</p>	
<p>42.4.2 [3.7]</p>	<p>Three (3) copies of the construction documents will be supplied to the contractor free of charge</p>	
<p>42.4.3</p>	<p>Bills of quantities / Lump sum document schedule of rates drawn up in accordance with: Standard System of Measuring Building Work (seventh edition as amended)</p>	
<p>42.4.4 [15.1.1]</p>	<p>The priced bills of quantities shall be submitted with the Request for Quotation submission : Yes <input checked="" type="checkbox"/> No <input type="checkbox"/></p>	

42.4.5 [3.4]	JBCC Engineering General Conditions are to be included in the contract documents: No
-----------------	--

42.4.6 [31.5.3] [32.13]	<p>The contract value is to be adjusted using CPAP indices: Yes <input type="checkbox"/> No <input checked="" type="checkbox"/></p> <p>Where CPAP is applicable, the contract sum will be adjusted in accordance with the JBCC Contract Price Adjustment Provisions (CPAP) as set out in the CPAP Indices Application Manual as prepared by the JBCC Series 2000, code 2118, dated May 2005 and any amendments thereto:</p> <ol style="list-style-type: none"> 1) Glass etc. measured in specialist section Metalwork, will be adjusted in terms of the index for that work group unless specifically stated otherwise in the bills of quantities 2) All electrical installations in buildings and power distribution systems shall be adjusted in terms of the index for Work Group 160 Electrical Installation. In case of uninterruptible power supplies, elevators, escalators and hoists, generating sets, motor-alternator sets and intercommunication systems shall be in accordance with Work Group 170 3) With reference to Work Group 190 a proportion of the value related preliminaries pro rata to the amount of work excluded from adjustment, shall be excluded from Contract Price Adjustment Provisions, if Option A has been selected for the adjustment of preliminaries 4) Further to clause 3.4.4 of the CPAP Indices Application Manual, the listing of additional items for exclusion by Bidders, will not be permitted 5) Where V results in a negative amount after application of the formula in clause 8.3 of the CPAP Indices Application Manual the factor of 0,55 shall be substituted by 1,45 <p>Alternative Indices: Not Applicable</p>
-----------------------------------	--

42.4.7 [3.10]	<p>Details of changes made to the provisions of JBCC standard documentation</p> <p>Clause 1.1</p> <p>COMMENCEMENT DATE – means the date that the agreement, made in terms of the Offer and Acceptance, comes into effect.</p> <p>CONSTRUCTION GUARANTEE – means a guarantee at call obtained by the contractor from an institution approved by the employer in terms of the employer’s construction guarantee form as selected in the schedule.</p> <p>CONSTRUCTION PERIOD – means the period commencing on the date that possession of the site is given to the contractor and ending on the date of practical completion.</p> <p>CORRUPT PRACTICE – means the offering, giving, receiving or soliciting of anything of value to influence the action of a public official in the procurement process or in contract execution.</p> <p>FRAUDULENT PRACTICE – means a misrepresentation of facts in order to influence a procurement process or the execution of a contract to the detriment of any Bidder, and includes collusive practice among Bidders (prior to and after the Bidder submission) designed to establish Bidder prices at artificial non-competitive levels and to deprive the Bidder of the benefits of free and open competition.</p> <p>INTEREST – the interest rates applicable on this contract, whether specifically indicated in the relevant clauses or not, will be in terms of the legislation of the Republic of South Africa, and in particular:</p> <p>(a) in respect of interest owed by the employer, the interest rate as determined by the Minister of Justice and Constitutional Development from time to time, in terms of section 1(2) of the Prescribed Rate of Interest Act, 1975 (Act No. 55 of 1975), will apply; and</p>
------------------	---

(b) in respect of interest owed to the **employer**, the interest rate as determined by the Minister of Finance, from time to time, in terms of section 80(1)(b) of the Public Finance Management Act, 1999 (Act No. 1 of 1999), will apply

SECURITY – means the form of **security** provided by the **employer** or **contractor**, as stated in the **schedule**, from which the **contractor** or **employer** may recover expenses or loss.

1.6 Any notice given may be delivered by hand, sent by prepaid registered post or telefax. Notice shall be presumed to have been given when:

1.6.4 No clause

3.2.1 A **construction guarantee** in terms of 14.0, where so elected in his Bid.

3.7 Add at the end thereof:

The **contractor** shall supply and keep a copy of the **JBCC** Series 2000 Principal Building Agreement and Preliminaries applicable to this contract on the **site**, to which the **employer**, **principal agent** and **agents** shall have access to at all times.

3.10 Replace the second reference to “**principal agent**” with the word “**employer**”

4.3 No clause

5.1.2 under clause 41- Include reference to 32.6.3; 34.3 and 34.4 in terms of which the employer has retained its authority and has not given a mandate to the **principal agent** and in terms of which the employer shall sign all documents

10.5 Add the following as 10.5

Damage to the works

- a) Without in any way limiting the **contractor's** obligations in terms of the contract, the **contractor** shall bear the full risk of damage to and/or destruction of the **works** by whatever cause during construction of the **works** and hereby indemnifies and holds harmless the **employer** against any such damage. The **contractor** shall take such precautions and **security** measures and other steps for the protection and **security** of the **works** as the **contractor** may deem necessary
- b) The **contractor** shall at all times proceed immediately to remove or dispose of any debris arising from damage to or destruction of the **works** and to rebuild, restore, replace and/or repair the **works**
- c) The **employer** shall carry the risk of damage to or destruction of the **works** and materials paid for by the **employer** that is the result of the excepted risks as set out in 10.6
- d) Where the **employer** bears the risk in terms of this contract, the **contractor** shall, if requested to do so, reinstate any damage or destroyed portions of the **works** and the costs of such reinstatement shall be measured and valued in terms of 32.0 hereof

10.6 Add the following as 10.6

Injury to Persons or loss of or damage to Properties

- a) The **contractor** shall be liable for and hereby indemnifies the **employer** against any liability, loss, claim or proceeding whether arising in common law or by statute, consequent upon personal injuries to or the death of any person whomsoever arising out of or in the course of or caused by the execution of the **works** unless due to any act or neglect of any person for whose actions the **employer** is legally liable
- b) The **contractor** shall be liable for and hereby indemnifies the **employer** against any liability, loss, claim or proceeding consequent upon loss of or damage to any moveable, or immovable or personal property or property contiguous to the **site**, whether belonging

to or under the control of the **employer** or any other body or person, arising out of or in the course of or by reason of the execution of the **works** unless due to any act or neglect of any person for whose actions the **employer** is legally liable

- c) The **contractor** shall upon receiving a contract instruction from the **principal agent** cause the same to be made good in a perfect and workmanlike manner at his own cost and in default thereof the **employer** shall be entitled to cause it to be made good and to recover the cost thereof from the **contractor** or to deduct the same from amounts due to the **contractor**.
- d) The **contractor** shall be responsible for the protection and safety of such portions of the premises placed under his control by the **employer** for the purpose of executing the **works** until the issue of the **certificate of practical completion**.
- e) Where the execution of the **works** involves the risk of removal of or interference with support to adjoining properties including land or structures or any structures to be altered or added to, the **contractor**, shall and will remain adequately insured or insured against the death of or injury to persons or damage to such property consequent on such removal or interference with the support until such portion of the **works** has been completed
- f) The **contractor** shall at all times proceed immediately at his own cost to remove or dispose of any debris and to rebuild, restore, replace and/or repair such property and to execute the **works**

10.7 Add the following as 10.7

HIGH RISK INSURANCE

In the event of the project being executed in a geological area classified as a "High Risk Area", that is an area which is subject to highly unstable subsurface conditions that might result in catastrophic ground movement evident by sinkhole or doline formation the following will apply:

10.7.1 Damage to the works

The **contractor** shall, from the **commencement date** of the **works** until the date of the **certificate of practical completion**, bear the full risk of and hereby indemnifies and holds harmless the **employer** against any damage to and/or destruction of the **works** consequent upon a catastrophic ground movement as mentioned above. The **contractor** shall take such precautions and **security** measures and other steps for the protection of the **works** as he may deem necessary

When so instructed to do so by the **principal agent**, the **contractor** shall proceed immediately to remove and/or dispose of any debris arising from damage to or destruction of the **works** and to rebuild, restore, replace and/or repair the **works**, at the **contractor's** own costs

10.7.2 Injury to persons or loss of or damage to property

The **contractor** shall be liable for and hereby indemnifies and holds harmless the **employer** against any liability, loss, claim or proceeding arising at any time during the period of the contract whether arising in common law or by statute, consequent upon personal injuries to or the death of any person whomsoever resulting from, arising out of or caused by a catastrophic ground movement as mentioned above

The **contractor** shall be liable for and hereby indemnifies the **employer** against any and all liability, loss, claim or proceeding consequent upon loss of or damage to any moveable, or immovable or personal property or property contiguous to the site, whether belonging to or under the control of the **employer** or any other body or person whomsoever arising out of or caused by a catastrophic ground movement, as mentioned above, which occurred during the period of the contract

- 10.7.3 It is the responsibility of the **contractor** to ensure that he has adequate insurance to cover his risk and liability as mentioned in 10.7.1 and 10.7.2. Without limiting the **contractor's** obligations in terms of the contract, the **contractor** shall, within twenty one (21) calendar days of the **commencement date** but before commencement of the **works**, submit to the **employer** proof of such insurance policy, if requested to do so
- 10.7.4 The **employer** shall be entitled to recover any and all losses and/or damages of whatever nature suffered or incurred consequent upon the **contractor's** default of his obligations as set out in 10.7.1; 10.7.2 and 10.7.3. Such losses or damages may be recovered from the **contractor** or by deducting the same from any amounts still due under this contract or under any other contract presently or hereafter existing between the **employer** and the **contractor** and for this purpose all these contracts shall be considered one indivisible whole
- 14.0 Replace the entire clause 14.0 with the following:
- 14.0 **SECURITY**
- 14.1 In respect of contracts with a **contract sum** up to R1 million, the **security** to be submitted by the **contractor** to the **employer** will be as a payment reduction of five percent (5%) of the value certified in the **payment certificate** (excluding VAT)
- 14.1.1 The payment reduction of the value certified in a **payment certificate** shall be mutatis mutandi in terms of 31.8(A)
- 14.1.2 The **employer** shall be entitled to recover expense and loss from the payment reduction in terms of 33.0 provided that the **employer** complies with the provisions of 33.4 in which event the **employer's** entitlement shall take precedence over his obligations to refund the payment reduction **security** or portions thereof to the **contractor**
- 14.2 In respect of contracts with a **contract sum** above R1 million, the **contractor** shall have the right to select the **security** to be provided in terms of 14.3, 14.4, 14.5, 14.6, or 14.7 as stated in the schedule. Such **security** shall be provided to the **employer** within fourteen (14) calendar days from **commencement date**. Should the **contractor** fail to select the **security** to be provided or should the **contractor** fail to provide the **employer** with the selected **security** within fourteen (14) calendar days from **commencement date**, the **security** in terms of 14.7 shall be deemed to have been selected.
- 14.3 Where the **security** as a cash deposit of ten percent (10%) of the **contract sum** (excluding VAT) has been selected:
- 14.3.1 The **contractor** shall furnish the **employer** with a cash deposit equal in value to ten percent (10%) of the **contract sum** (excluding VAT) within fourteen (14) calendar days from **commencement date**
- 14.3.2 Within fourteen (14) calendar days of the date of **practical completion** of the **works** the **employer** shall reduce the cash deposit to an amount equal to three percent (3%) of the contract value (excluding VAT), and refund the balance to the **contractor**
- 14.3.3 Within fourteen (14) calendar days of the date of **final completion** of the **works** the **employer** shall reduce the cash deposit to an amount equal to one percent (1%) of the contract value (excluding VAT) and refund the balance to the **contractor**
- 14.3.4 On the date of payment of the amount in the final **payment certificate**, the **employer** shall refund the remainder of the cash deposit to the **contractor**
- 14.3.5 The **employer** shall be entitled to recover expense and loss from the cash deposit in terms of 33.0 provided that the **employer** complies with the provisions of 33.4 in which event the **employer's** entitlement shall take precedence over his obligations to refund the cash deposit **security** or portions thereof to the **contractor**

- 14.3.6 The parties expressly agree that neither the **employer** nor the **contractor** shall be entitled to cede the rights to the deposit to any third party
- 14.4 Where **security** as a variable **construction guarantee** of ten percent (10%) of the **contract sum** (excluding VAT) has been selected: **NOT APPLICABLE**
- 14.4.1 The **contractor** shall furnish the **employer** with an acceptable variable **construction guarantee** equal in value to ten percent (10%) of the **contract sum** (excluding VAT) within fourteen (14) calendar days from **commencement date**
- 14.4.2 The variable **construction guarantee** shall reduce and expire in terms of the Variable **Construction guarantee** form included in the invitation to Bidder
- 14.4.3 The **employer** shall return the variable **construction guarantee** to the **contractor** within fourteen (14) calendar days of it expiring
- 14.4.4 Where the **employer** has a right of recovery against the **contractor** in terms of 33.0, the **employer** shall issue a written demand in terms of the variable **construction guarantee**
- 14.5 Where **security** as a fixed **construction guarantee** of five percent (5%) of the **contract sum** (excluding VAT) and a five percent (5%) payment reduction of the value certified in the **payment certificate** (excluding VAT) has been selected:
- 14.5.1 The **contractor** shall furnish a fixed **construction guarantee** to the **employer** equal in value to five percent (5%) of the **contract sum** (excluding VAT) within fourteen (14) calendar days from **commencement date**
- 14.5.2 The fixed **construction guarantee** shall come into force on the date of issue and shall expire on the date of the last **certificate of practical completion**
- 14.5.3 The **employer** shall return the fixed **construction guarantee** to the **contractor** within fourteen (14) calendar days of it expiring
- 14.5.4 The payment reduction of the value certified in a **payment certificate** shall be in terms of 31.8(A) and 34.8
- 14.5.5 Where the **employer** has a right of recovery against the **contractor** in terms of 33.0, the **employer** shall be entitled to issue a written demand in terms of the fixed **construction guarantee** or may recover from the payment reduction or may do both
- 14.6 Where **security** as a cash deposit of five percent (5%) of the **contract sum** (excluding VAT) and a payment reduction of five percent (5%) of the value certified in the **payment certificate** (excluding VAT) has been selected:
- 14.6.1 The **contractor** shall furnish the **employer** with a cash deposit equal in value to five percent (5%) of the **contract sum** (excluding VAT) within fourteen (14) calendar days from **commencement date**
- 14.6.2 Within twenty-one (21) calendar days of the date of **practical completion** of the **works** the **employer** shall refund the cash deposit in total to the **contractor**
- 14.6.3 The payment reduction of the value certified in a **payment certificate** shall be mutatis mutandi in terms of 31.8(A)
- 14.6.4 Where the **employer** has a right of recovery against the **contractor** in terms of 33.0, the **employer** may issue a written notice in terms of 33.4 or may recover from the payment reduction or may do both
- 14.7 Where **security** as a payment reduction of ten percent (10%) of the value certified in the **payment certificate** (excluding VAT) has been selected:
- 14.7.1 The payment reduction of the value certified in a **payment certificate** shall be mutatis

mutandi in terms of 31.8(B)

- 14.7.2 The **employer** shall be entitled to recover expense and loss from the payment reduction in terms of 33.0 provided that the **employer** complies with the provisions of 33.4 in which event the **employer's** entitlement shall take precedence over his obligations to refund the payment reduction or portions thereof to the **contractor**
- 14.8 Payments made by the guarantor to the **employer** in terms of the fixed or variable **construction guarantee** shall not prejudice the rights of the **employer** or **contractor** in terms of this agreement
- 14.9 Should the **contractor** fail to furnish the **security** in terms of 14.2 the **employer**, in his sole discretion, and without notification to the **contractor**, is entitled to change the **contractor's** selected form of **security** to that of a ten percent (10%) payment reduction of the value certified in the **payment certificate** (excluding VAT), whereafter 14.7 shall be applicable
- 15.1.1 No clause
- 15.1.4 Add 15.1.4 as follows:

An acceptable health and safety plan, required in terms of the Occupational Health and Safety Act, 1993 (Act 85 of 1993), within fourteen (14) calendar days of **commencement date**.

The abovementioned plan shall also address all additional requirements with regard to the
the
Coronavirus pandemic in terms of all Covid-19 legislation, regulations and guidelines as an additional safe work procedure on site.
- 15.2.1 Under 41: Amend to read as follows:

"Give the **contractor** possession of the site within five (5) working days of the **contractor** complying with the terms of 15.1.2 and 15.1.4
- 17.1.11 Delete the words "and the appointment of **nominated** and **selected subcontractors**"
- 20.1.3 No clause
- 21.0 No clause
- 29.2.5 No clause
- 31.5.2 Security adjustments in terms of 14.0 and 31.8
- 31.1.4 Add 15.1.4 as follows:
- 31.6 The value of materials and goods in terms of 31.4.2 shall be included in the value certified
only where, to the satisfaction of the principal agent, the materials and goods are:
- 31.6.5 Add 31.6.5 as follows:
Covered by an advance payment guarantee or such other security as may be accepted by the employer where stored off the site. Standard JBCC Guarantee wording would be applicable.
- 31.8 Amend as follows:
- 31.8(A) Where a **security** is selected in terms of 14.1; 14.5 or 14.6, the value of the **works** in terms of 31.4.1 and of the **materials and goods** in terms of 31.4.2 shall be certified in full. The value certified shall be subject to the following percentage adjustments:

31.8(A).1	Ninety-five percent (95%) of such value in interim payment certificates issued up to the date of practical completion
31.8.(A).2	Ninety-seven percent (97%) of such value in interim payment certificates issued on the date of practical completion and up to but excluding the date of final completion
31.8(A).3	Ninety-nine percent (99%) of such value in interim payment certificates issued on the date of final completion and up to but excluding the final payment certificate in terms of 34.6
31.8(A).4	One hundred percent (100%) of such value in the final payment certificate in terms of 34.6 except where the amount certified is in favour of the employer . In such an event the payment reduction shall remain at the adjustment level applicable to the final payment certificate .
31.8(B)	Where security is a payment reduction in term of 14.7 has been selected the value of the works in terms of 31.4.1 and materials and goods in terms of 31.4.2 shall be certified in full. The value certified shall be subject to the following percentage adjustments:
31.8(B).1	Ninety percent (90%) of such value in interim payment certificates issued up to the date of practical completion
31.8(B).2	Ninety-seven percent (97%) of such value in interim payment certificates issued on the date of practical completion and up to but excluding the date of final completion
31.8(B).3	Ninety-nine percent (99%) of such value in interim payment certificates issued on the date of final completion and up to but excluding the final payment certificate in terms of 34.6
31.8(B).4	One hundred percent (100%) of such value in the final payment certificate in terms of 34.6 except were the amount certified is in favour of the employer . In such an event the payment reduction shall remain at the adjustment level applicable to the final payment certificate
31.9	Replace “twenty-one (21) calendar days” with “thirty (30) calendar days”. Should the Contractor’s tax clearance certificate expire during the contract period, the Employer shall be entitled to withhold payment without incurring any liability for interest, until a valid tax clearance certificate is submitted to the Employer, at which point, upon that date, the thirty (30) day period for due date of payment of the invoice shall commence.
31.12	Delete the following: “Payment shall be subject to the employer giving the contractor a tax invoice for the amount due.”
32.5.1 32.5.4 and 32.5.7	Add the following to the end of each of these clauses: “...due to no fault of the contractor ”
32.12	Replace “ contractor ” with “ employer ”
33.2	Add the following clauses 33.2.9 to 33.2.13:
33.2.9	the contractor’s failure or neglect to commence with the works on the dates prescribed in the contract
33.2.10	the contractor’s failure or neglect to proceed with the works in terms of the contract
33.2.11	the contractor’s failure or neglect for any reason to complete the works in accordance with the contract

	<p>33.2.12 the contractor's refusal or neglect to comply strictly with any of the conditions of contract or any contract instructions and/or orders in writing given in terms of the contract</p> <p>33.2.13 the contractor's estate being sequestrated, liquidated or surrendered in terms of the insolvency laws in force within the Republic of South Africa</p> <p>34.13 Replace "seven (7) calendar days" with "thirty (30) calendar days" and delete the words: "subject to the employer giving the contractor a tax invoice for the amount due" as per PPPFA</p> <p>36.3 Remove reference to "No clause", and replace "principal agent" with "employer"</p> <p>36.7 Add the following: "Notwithstanding any clause to the contrary, on cancellation of this 37.5 this agreement either by the employer or the contractor; or for any reason whatsoever and whatsoever, the contractor shall on written instruction, discontinue with the works on a 38.7 date stated and withdraw himself from the site. The contractor shall not be entitled to refuse to withdraw from the works on the grounds of any lien or right of retention or on the grounds of any other right whatsoever"</p> <p>37.3.5 Replace "ninety (90)" with "one hundred and twenty (120) and 38.5.4</p> <p>39.3.5 Add the following words at the end thereof: "within one hundred and twenty (120) working days of completion of such report"</p> <p>40.2.2 under clause 41 – Replace "one (1) year" with "three (3) years"</p> <p>40.6 under clause 41 – Remove reference to no clause</p> <p>40.7.1 Change "(10)" to "(15)"</p> <p>Add the following to the end thereof:</p> <p>Whether or not mediation resolves the dispute, the parties shall bear their own costs concerning the mediation and equally share the costs of the mediator and related costs.</p>
42.0	PART 2: CONTRACT DATA PROVIDED BY THE CONTRACTOR
42.0.1	The successful contractor must have a built environment professional on his staff or he must employ one for the duration of the contract.
42.0.2	All bids shall remain valid for a period of one hundred and twenty (120) calendar days after the Request for Quotation closing date.
42.0.3	The successful bidder will be required to submit an Approved Health and Safety File within fourteen (14) calendar days upon receipt of the letter of award.
42.0.4	The successful bidder will be required to submit a letter of good standing from the compensation commission or FEMA within fourteen (14) calendar days upon receipt of the letter of award.
42.0.5	The successful Bidder will be required to submit a construction program and contractor's cash flow within twenty one (21) calendar days upon receipt of the letter of award.
42.0.6	At least thirty percent (30%) of the total labour force employed during the execution of the works , shall be from the local community.
	POST-BID INFORMATION
42.5	CONTRACT DETAILS
42.5.1	Contractor:

	<p>.....</p> <p>Postal address:</p> <p>.....</p> <p>.....</p> <p>.....</p> <p>Tel: Fax: E-mail:</p> <p>TAX / VAT Registration No:</p> <p>Physical address:</p> <p>.....</p> <p>.....</p> <p>.....</p>								
42.5.2	<p>The accepted contract sum inclusive of tax is</p> <p>R.....</p> <p>Amount in words:</p> <p>.....</p>								
42.5.3 [31.3]	<p>The latest day of the month for the issue of an interim payment certificate:</p> <p>.....</p>								
42.5.4 [32.12]	<p>The preliminaries amounts shall be paid in terms of: Alternative A <input checked="" type="checkbox"/> Alternative B <input type="checkbox"/></p>								
42.5.5 [32.12]	<p>The preliminaries amounts shall be adjusted in terms of: Alternative A <input checked="" type="checkbox"/> Alternative B <input type="checkbox"/></p>								
42.5.7 [14]	<p>The security to be provided by the contractor:</p> <p>(a) in respect of contracts up to R1 million, the contractor will provide security in terms of 14.1</p> <p>(b) in respect of contracts above R1 million, the contractor will provide, as security, one of the following:</p> <table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 75%;">(1) cash deposit of 10% of the contract sum (excluding VAT)</td> <td style="width: 25%;">Yes <input type="checkbox"/> No <input type="checkbox"/></td> </tr> <tr> <td>(2) payment reduction of 10% of the value certified in the payment certificate (excluding VAT)</td> <td>Yes <input type="checkbox"/> No <input type="checkbox"/></td> </tr> <tr> <td>(3) cash deposit of 5% of the contract sum (excluding VAT) and a payment reduction of 5% of the value certified in the payment certificate (excluding VAT)</td> <td>Yes <input type="checkbox"/> No <input type="checkbox"/></td> </tr> <tr> <td>(4) fixed construction guarantee of 5% of the contract sum (excluding VAT) and a payment reduction of 5% of the value certified in the payment certificate (excluding VAT)</td> <td>Yes <input type="checkbox"/> No <input type="checkbox"/></td> </tr> </table>	(1) cash deposit of 10% of the contract sum (excluding VAT)	Yes <input type="checkbox"/> No <input type="checkbox"/>	(2) payment reduction of 10% of the value certified in the payment certificate (excluding VAT)	Yes <input type="checkbox"/> No <input type="checkbox"/>	(3) cash deposit of 5% of the contract sum (excluding VAT) and a payment reduction of 5% of the value certified in the payment certificate (excluding VAT)	Yes <input type="checkbox"/> No <input type="checkbox"/>	(4) fixed construction guarantee of 5% of the contract sum (excluding VAT) and a payment reduction of 5% of the value certified in the payment certificate (excluding VAT)	Yes <input type="checkbox"/> No <input type="checkbox"/>
(1) cash deposit of 10% of the contract sum (excluding VAT)	Yes <input type="checkbox"/> No <input type="checkbox"/>								
(2) payment reduction of 10% of the value certified in the payment certificate (excluding VAT)	Yes <input type="checkbox"/> No <input type="checkbox"/>								
(3) cash deposit of 5% of the contract sum (excluding VAT) and a payment reduction of 5% of the value certified in the payment certificate (excluding VAT)	Yes <input type="checkbox"/> No <input type="checkbox"/>								
(4) fixed construction guarantee of 5% of the contract sum (excluding VAT) and a payment reduction of 5% of the value certified in the payment certificate (excluding VAT)	Yes <input type="checkbox"/> No <input type="checkbox"/>								

NB: Guarantees submitted must be issued by either an insurance company duly registered in terms of the Short-Term Insurance Act, 1998 (Act 35 of 1998) or by a bank duly registered in terms of the Banks Act, 1990 (Act 94 of 1990) on the pro-forma referred to above. No alterations or amendments of the wording of the pro-forma will be accepted.

42.5.8 [29.7.2] The annual building holiday period after the commencement of the construction period: from to

42.6 DOCUMENTS

42.6.1 Contract documents marked and annexed hereto:

Priced bills of quantities:	Yes <input type="checkbox"/> No <input type="checkbox"/>	Document marked as
Lump sum document:	Yes <input type="checkbox"/> No <input type="checkbox"/>	Document marked as
Guarantees:	Yes <input type="checkbox"/> No <input type="checkbox"/>	Document marked as
Contract drawings:	Yes <input type="checkbox"/> No <input type="checkbox"/>	Document marked as
Other documents	Yes <input type="checkbox"/> No <input type="checkbox"/>	(attach additional pages if more space is required)

.....
 ...

 ...

 ...

 ...

 ...

 ...

 ...

 ...

42.8 SIGNATURES OF THE CONTRACTING PARTIES

Thus done and signed at _____ on _____

Name of signatory

Capacity of signatory

for and behalf of the **Employer** who by signature hereof warrants authorization hereto

as Witness

	Thus done and signed at _____ on _____
_____ Name of signatory	_____ for and behalf of the Contractor who by signature hereof warrants authorization
hereto	
_____ Capacity of signatory	_____ as Witness

C1.3 Form of Guarantee

C 1.3.1: FIXED CONSTRUCTION GUARANTEE - JBCC 2000 PRINCIPAL BUILDING AGREEMENT (Edition 4.1 of March 2005)

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663

1. With reference to the contract between _____
_____ (hereinafter referred to as the
“**contractor**”) and the **Eastern Cape Department of Education** (hereinafter referred to as the “**employer**”).
Request for Quotation No: **2022/07/663** for the **PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL**
(hereinafter referred to as the “contract”)
- in the amount of R _____, (_____
_____) (amount in words),
(hereinafter referred to as the **contract sum** excluding VAT.)
- I/We, _____
in my/our capacity as _____ and hereby
representing _____ (hereinafter
referred to as the **guarantor**”) advise that the **guarantor** hold at the **employer’s** disposal the sum of
R _____ (_____)
(amount in words) being 5% of the **contract sum** (excluding VAT), for the due fulfilment of the contract.
2. The **guarantor** hereby renounces the benefits of the exceptions non numeratae pecunia, non causa debiti;
excussionis et divisionis; and all other exceptions which could be pleaded against the enforcement of this
guarantee, with the meaning and effect whereof i/we declare myself/ourselves to be conversant, and
undertake to pay the **employer** the amount guaranteed, during the period when the claim is received by the
guarantor, on receipt of a written demand from the **employer** to do so, and which demand the **employer**
may make if the **employer** has a right of recovery against the **contractor** in terms of 33.0 of the contract.
3. Subject to the above, but without in any way detracting from the **employer’s** rights to adopt any of the
procedures provided for in the contract, the said demand can be made by the **employer**, at any stage prior
to the expiry of this guarantee.
4. The amount paid by the **guarantor** in terms of this guarantee may be retained by the **employer** on condition
that upon the issue of the last final **payment certificate**, the **employer** shall account to the **guarantor**
showing how this amount has been expended and refund any balance due to the **guarantor**.
5. The **employer** shall have the absolute right to arrange his affairs with the **contractor** in any manner which
the **employer** deems fit and the **guarantor** shall not have the right to claim his release on account of any
conduct alleged to be prejudicial to the **guarantor**. Without derogating from the foregoing, any
compromise, extension of the **construction period**, indulgence, release or variation of the **contractor’s**
obligation shall not affect the validity of this guarantee.
6. This undertaking is neither negotiable nor transferable, and
- a) must be surrendered to the **guarantor** at the time when the **employer** accounts to the **guarantor** in
terms of clause 4 above, or
 - b) shall lapse on the date of the last **certificate of practical completion**; and
 - c) shall not be interpreted as extending the **guarantor’s** liability to anything more than payment of the
amount guaranteed.

SIGNED AT _____ ON THIS _____ DAY OF _____ 20____

AS WITNESS

1. _____

2. _____

By and on behalf of _____

(insert the name and physical address of the guarantor)

NAME: _____

CAPACITY: _____
(duly authorized thereto by resolution attached marked Annexure A)

DATE: _____

- A. No alterations and/or additions of the wording of this form will be accepted.
- B. The physical address of the guarantor must be clearly indicated and will be regarded as the guarantor's *domicilium citandi et executandi*, for all purposes arising from this guarantee.
- C. This GUARANTEE must be returned to:

Part 3: Returnable Schedules/Documents

T2.1 List of Returnable Documents

2.1: LIST OF RETURNABLE DOCUMENTS

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL		
Principal Agent:	Eastern Cape Province Department of Education	Request for Quotation No:	2022/07/663

1. RETURNABLE DOCUMENTS REQUIRED FOR TENDEER EVALUATION PURPOSES

(Insert a tick in the "Returnable document" column to indicate which documents must be returned with the Bid)

Bid Document Name	Number of pages issued	Returnable Document
Declaration of Interest (SBD4)	3 Pages	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Preference points claim form in terms of Preferential Procurement Regulations 2022 (SBD 6.1)	6 Pages	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Local Production and Content (SBD 6.2)	7 Pages	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Certificate of Authority for Signatory (T2.2.1)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Certificate of Authority for Joint Ventures (T2.2.2)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Schedule of Proposed Subcontractors (T2.2.3)	1 Page	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Final Summary Page of Bills of Quantities (C1.1a)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Completed Project Reference Forms (T2.2.13)	6 Pages	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No

2. OTHER DOCUMENTS REQUIRED FOR REQUEST FOR QUOTATION EVALUATION PURPOSES

Bid Document Name	Number of pages issued	Returnable Document
Site Inspection Certificate (T2.2.4)	1 Page	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Capacity of the Bidder (T2.2.6)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Relevant Project Experience - Completed Projects (T2.2.7)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Relevant Project Experience - Current Projects (T2.2.8)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
CIDB Grading Certificate (T2.2.11)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
CIPC Company Registration Certificate (T2.2.12)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
ID's of shareholders, members, partners or sole proprietor (T2.2.12)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Letter of Good Standing from Bank (T2.2.12)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Letter of Good Standing from Compensation Fund (T2.2.12)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
CSD Registration Summary Report (T2.2.12)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
SARS Tax Clearance Certificate and Pin (T2.2.12)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Proof of Locality of Head Office (T2.2.12)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No

3. RETURNABLE DOCUMENTS THAT WILL BE INCORPORATED INTO THE CONTRACT

Bid Document Name	Number of pages issued	Returnable Document
Record of Addenda to Request for Quotation Documents (T2.2.5)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Schedule of Plant and Equipment (T2.2.9)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Compulsory Enterprise Questionnaire (T2.2.10)	1 Page	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No

4. OTHER DOCUMENTS THAT WILL BE INCORPORATED INTO THE CONTRACT

Bid Document Name	Number of pages issued	Returnable Document
Form of Offer and Acceptance (C1.1)	3 Pages	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Contract Data (C1.2)	14 Pages	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Applicable form of Guarantee (C1.3)	4 Pages	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Priced Bills of Quantities including Preliminaries (C2.2)	4 Pages	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No

T2.2 Returnable schedules

SBD 4 : BIDDER'S DISCLOSURE

BIDDER'S DISCLOSURE

1. PURPOSE OF THE FORM

Any person (natural or juristic) may make an offer or offers in terms of this invitation to bid. In line with the principles of transparency, accountability, impartiality, and ethics as enshrined in the Constitution of the Republic of South Africa and further expressed in various pieces of legislation, it is required for the bidder to make this declaration in respect of the details required hereunder.

Where a person/s are listed in the Register for Tender Defaulters and / or the List of Restricted Suppliers, that person will automatically be disqualified from the bid process.

2. Bidder's declaration

2.1 Is the bidder, or any of its directors / trustees / shareholders / members / partners or any person having a controlling interest¹ in the enterprise, employed by the state? **YES/NO**

2.1.1 If so, furnish particulars of the names, individual identity numbers, and, if applicable, state employee numbers of sole proprietor/ directors / trustees / shareholders / members/ partners or any person having a controlling interest in the enterprise, in table below.

Full Name	Identity Number	Name of State institution

2.2 Do you, or any person connected with the bidder, have a relationship with any person who is employed by the procuring institution? **YES/NO**

2.2.1 If so, furnish particulars:

2.3 Does the bidder or any of its directors / trustees / shareholders / members / partners or any person having a controlling interest in the enterprise have any interest in any other related enterprise whether or not they are bidding for this contract?
YES/NO

2.3.1 If so, furnish particulars:

¹ the power, by one person or a group of persons holding the majority of the equity of an enterprise, alternatively, the person/s having the deciding vote or power to influence or to direct the course and decisions of the enterprise.

3 DECLARATION

I, the undersigned, (name)..... in submitting the accompanying bid, do hereby make the following statements that I certify to be true and complete in every respect:

- 3.1 I have read and I understand the contents of this disclosure;
- 3.2 I understand that the accompanying bid will be disqualified if this disclosure is found not to be true and complete in every respect;
- 3.3 The bidder has arrived at the accompanying bid independently from, and without consultation, communication, agreement or arrangement with any competitor. However, communication between partners in a joint venture or consortium² will not be construed as collusive bidding.
- 3.4 In addition, there have been no consultations, communications, agreements or arrangements with any competitor regarding the quality, quantity, specifications, prices, including methods, factors or formulas used to calculate prices, market allocation, the intention or decision to submit or not to submit the bid, bidding with the intention not to win the bid and conditions or delivery particulars of the products or services to which this bid invitation relates.
- 3.4 The terms of the accompanying bid 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 bid opening or of the awarding of the contract.
- 3.5 There have been no consultations, communications, agreements or arrangements made by the bidder with any official of the procuring institution in relation to this procurement process prior to and during the bidding process except to provide clarification on the bid submitted where so required by the institution; and the bidder was not involved in the drafting of the specifications or terms of reference for this bid.
- 3.6 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.

I CERTIFY THAT THE INFORMATION FURNISHED IN PARAGRAPHS 1, 2 and 3 ABOVE IS CORRECT.
I ACCEPT THAT THE STATE MAY REJECT THE BID OR ACT AGAINST ME IN TERMS OF PARAGRAPH 6 OF PFMA SCM INSTRUCTION 03 OF 2021/22 ON PREVENTING AND COMBATING ABUSE IN THE SUPPLY CHAIN MANAGEMENT SYSTEM SHOULD THIS DECLARATION PROVE TO BE FALSE.

.....
Signature

.....
Date

.....
Position

.....
Name of bidder

² 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.

SBD 6.1 : Preference Points Claim Form

SBD 6.1

PREFERENCE POINTS CLAIM FORM

In order to claim preference points, Bidders are to note the following:

- The SBD 6.1 form must be completed and duly signed.

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 of 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

1.3. 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:

$$Ps = 80 \left(1 - \frac{Pt - Pmin}{Pmin} \right) \quad \text{or} \quad Ps = 90 \left(1 - \frac{Pt - Pmin}{Pmin} \right)$$

Where

Ps = Points scored for price of tender under consideration

Pt = Price of tender under consideration

Pmin = Price of lowest acceptable tender

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

3.4.1. POINTS AWARDED FOR PRICE

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

$$P_s = 80 \left(1 + \frac{P_t - P_{max}}{P_{max}} \right) \text{ or } P_s = 90 \left(1 + \frac{P_t - P_{max}}{P_{max}} \right)$$

Where

- P_s = Points scored for price of tender under consideration
 P_t = Price of tender under consideration
 P_{max} = Price of highest acceptable tender

4. POINTS AWARDED FOR SPECIFIC GOALS

1.1. 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:

1.2. 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—

(c) 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

(d) 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.)

The specific goals allocated points in terms of this tender	Number of points allocated (90/10 system) (To be completed by the organ of state)	Number of points allocated (80/20 system) (To be completed by the organ of state)	Number of points claimed (90/10 system) (To be completed by the tenderer)	Number of points claimed (80/20 system) (To be completed by the tenderer)
Woman Ownership	2	5		
Ownership with Disabilities	1	2		
Youth Ownership	3	5		
Enterprises located in the Eastern Cape Province	3	6		
Ownership by Military Veterans	1	2		

DECLARATION WITH REGARD TO COMPANY/FIRM

1.3. Name of company/firm.....

1.4. Company registration number:

1.5. 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]

1.6. 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:

SBD 6.2: Local Production and Content

SBD 6.2

DECLARATION CERTIFICATE FOR LOCAL PRODUCTION AND CONTENT FOR DESIGNATED SECTORS

This Standard Bidding Document (SBD) must form part of all bids invited. It contains general information and serves as a declaration form for local content (local production and local content are used interchangeably).

Before completing this declaration, bidders must study the General Conditions, Definitions, Directives applicable in respect of Local Content as prescribed in the Preferential Procurement Regulations, 2022, the South African Bureau of Standards (SABS) approved technical specification number SATS 1286:2011 (Edition 1) and the Guidance on the Calculation of Local Content together with the Local Content Declaration Templates [Annex C (Local Content Declaration: Summary Schedule), D (Imported Content Declaration: Supporting Schedule to Annex C) and E (Local Content Declaration: Supporting Schedule to Annex C)].

1. General Conditions

- 1.1. Preferential Procurement Regulations, 2022 (Regulation 8) make provision for the promotion of local production and content.
- 1.2. Regulation 8.(2) prescribes that in the case of designated sectors, organs of state must advertise such tenders with the specific bidding condition that only locally produced or manufactured goods, with a stipulated minimum threshold for local production and content will be considered.
- 1.3. Where necessary, for tenders referred to in paragraph 1.2 above, a two stage bidding process may be followed, where the first stage involves a minimum threshold for local production and content and the second stage price.
- 1.4. A person awarded a contract in relation to a designated sector, may not sub-contract in such a manner that the local production and content of the overall value of the contract is reduced to below the stipulated minimum threshold.
- 1.5. The local content (LC) expressed as a percentage of the bid price must be calculated in accordance with the SABS approved technical specification number SATS 1286: 2011 as follows:

$$LC = [1 - x / y] * 100$$

Where

x is the imported content in Rand

y is the bid price in Rand excluding value added tax (VAT)

Prices referred to in the determination of x must be converted to Rand (ZAR) by using the exchange rate published by South African Reserve Bank (SARB) on the date of advertisement of the bid as indicated in paragraph 3.1 below.

The SABS approved technical specification number SATS 1286:2011 is accessible on [http://www.thedti.gov.za/industrial development/ip.jsp](http://www.thedti.gov.za/industrial%20development/ip.jsp) at no cost.

- 1.6. A bid may be disqualified if this Declaration Certificate and the Annex C (Local Content Declaration: Summary Schedule) are not submitted as part of the bid documentation;

2. The stipulated minimum threshold(s) for local production and content (refer to Annex A of SATS 1286:2011) for this bid is/are as follows:

<u>Description of services, works or goods</u>	<u>Stipulated minimum threshold</u>
Reinforcement	100%
Roof coverings	100%
Steel windows, doors and frames	100%
Sundry metalwork and structural steelwork	100%
Gutters and down pipes	100%

uPVC and HDPE pipes	100%
Electrical cables	100%
Fencing	100%

3. Does any portion of the goods or services offered have any imported content?

(Tick applicable box)

YES	<input type="checkbox"/>	NO	<input type="checkbox"/>
-----	--------------------------	----	--------------------------

3.1 If yes, the rate(s) of exchange to be used in this bid to calculate the local content as prescribed in paragraph 1.5 of the general conditions must be the rate(s) published by SARB for the specific currency on the date of advertisement of the bid.

The relevant rates of exchange information is accessible on www.resbank.co.za

Indicate the rate(s) of exchange against the appropriate currency in the table below (refer to Annex A of SATS 1286:2011):

Currency	Rates of exchange
US Dollar	
Pound Sterling	
Euro	
Yen	
Other	

NB: Bidders must submit proof of the SARB rate (s) of exchange used.

4. Where, after the award of a bid, challenges are experienced in meeting the stipulated minimum threshold for local content the dti must be informed accordingly in order for the dti to verify and in consultation with the AO/AA provide directives in this regard.

LOCAL CONTENT DECLARATION
(REFER TO ANNEX B OF SATS 1286:2011)

LOCAL CONTENT DECLARATION BY CHIEF FINANCIAL OFFICER OR OTHER LEGALLY RESPONSIBLE PERSON NOMINATED IN WRITING BY THE CHIEF EXECUTIVE OR SENIOR MEMBER/PERSON WITH MANAGEMENT RESPONSIBILITY (CLOSE CORPORATION, PARTNERSHIP OR INDIVIDUAL)

IN RESPECT OF BID NO. 2022/07/663

ISSUED BY: (Procurement Authority / Name of Institution):

.....
 NB

- 1 The obligation to complete, duly sign and submit this declaration cannot be transferred to an external authorized representative, auditor or any other third party acting on behalf of the bidder.
- 2 Guidance on the Calculation of Local Content together with Local Content Declaration Templates (Annex C, D and E) is accessible on http://www.thedti.gov.za/industrial_development/ip.jsp. Bidders should first complete Declaration D. After completing Declaration D, bidders should complete Declaration E and then consolidate the information on Declaration C. **Declaration C should be submitted with the bid documentation at the closing date and time of the bid in order to substantiate the declaration made in paragraph (c) below.** Declarations D and E should be kept by the bidders for verification purposes for a period of at least 5 years. The successful bidder is required to continuously update Declarations C, D and E with the actual values for the duration of the contract.

I, the undersigned, (full names),
 do hereby declare, in my capacity as
 of(name of bidder entity), the
 following:

- (a) The facts contained herein are within my own personal knowledge.
- (b) I have satisfied myself that:
 - (i) the goods/services/works to be delivered in terms of the above-specified bid comply with the minimum local content requirements as specified in the bid, and as measured in terms of SATS 1286:2011; and
- (c) The local content percentage (%) indicated below has been calculated using the formula given in clause 3 of SATS 1286:2011, the rates of exchange indicated in paragraph 3.1 above and the information contained in Declaration D and E which has been consolidated in Declaration C:

Bid price, excluding VAT (y)	R
Imported content (x), as calculated in terms of SATS 1286:2011	R
Stipulated minimum threshold for local content (paragraph 3 above)	
Local content %, as calculated in terms of SATS 1286:2011	

If the bid is for more than one product, the local content percentages for each product contained in Declaration C shall be used instead of the table above. The local content percentages for each product has been calculated using the formula given in clause 3 of SATS 1286:2011, the rates of exchange indicated in paragraph 3.1 above and the information contained in Declaration D and E.

- (d) I accept that the Procurement Authority / Institution has the right to request that the local content be verified in terms of the requirements of SATS 1286:2011.
- (e) I understand that the awarding of the bid is dependent on the accuracy of the information furnished in this application. I also understand that the submission of incorrect data, or data that are not verifiable as described in SATS 1286:2011, may result in the Procurement Authority / Institution imposing any or all of the remedies as provided for in Regulation 14 of the Preferential Procurement Regulations, 2022 promulgated under the Preferential Policy Framework Act (PPFA), 2000 (Act No. 5 of 2000).

SIGNATURE: _____

WITNESS No. 1 _____

DATE: _____

WITNESS No. 2 _____

DATE: _____

Annexure C

Local Content Declaration – Summary Schedule

(C1)	Tender No.						
(C2)	Tender Description:						
(C3)	Designated product(s)						
(C4)	Tender Authority:						
(C5)	Tender Entity Name:						
(C6)	Tender Exchange Rate:	Pula:		EU:		GBP:	
(C7)	Specified local content %						

Note: VAT to be excluded from all calculations

Calculation of Local Content							
Tender item no's	List of items	Tender price – each (excl. VAT)	Exempted imported value	Tender value net of exempted imported content	Imported value	Local value	Local content % (per item)
(C8)	(C9)	(C10)	(C11)	(C12)	(C13)	(C14)	(C15)

Tender Summary			
Tender Qty	Total tender value	Total exempted imported content	Total imported content
(C16)	(C17)	(C18)	(C19)

(C20) Total tender value	
(C21) Total Exempt imported content	
(C22) Total tender value net of exempt imported content	
(C23) Total Imported content	
(C24) Total local content	
(C25) Average local content % of tender	

Signature of Bidder from Annex B

Date: _____

Annexure D

Imported Content Declaration – Supporting Schedule to Annex C

(D1)	Tender No.						
(D2)	Tender Description:						
(D3)	Designated product(s)						
(D4)	Tender Authority:						
(D5)	Tender Entity Name:						
(D6)	Tender Exchange Rate:	Pula:		EU:		GBP:	

Note: VAT to be excluded from all calculations

A. Exempted imported content

Calculation of imported content

Tender Item no's	Description of imported content	Local supplier	Overseas supplier	Foreign currency value as per commercial invoice	Tender Rate of Exchange	Local value of imports	Freight costs to port of entry	All locally incurred landing costs & duties	Total landed cost excl. VAT
(D7)	(D8)	(D9)	(D10)	(D11)	(D12)	(D13)	(D14)	(D15)	(D16)

Summary

Tender QTY	Exempted imported value
(D17)	(D18)

(D19) Total exempt imported value

This total must correspond with Annex C - C21

B. Imported directly by Tenderer

Calculation of imported content

Tender Item no's	Description of imported content	Unit of measure	Overseas supplier	Foreign currency value as per commercial invoice	Tender Rate of Exchange	Local value of imports	Freight costs to port of entry	All locally incurred landing costs & duties	Total landed cost excl. VAT
(D20)	(D21)	(D22)	(D23)	(D24)	(D25)	(D26)	(D27)	(D28)	(D29)

Summary

Tender QTY	Total imported value
(D30)	(D31)

(D32) Total imported value by tenderer

C. Imported by a 3rd party and supplied to the Tenderer

Calculation of imported content

Description of imported content	Unit of Measure	Local Supplier	Overseas supplier	Foreign currency value as per commercial invoice	Tender Rate of Exchange	Local value of imports	Freight costs to port of entry	All locally incurred landing costs & duties	Total landed cost excl. VAT
(D33)	(D34)	(D35)	(D36)	(D37)	(D38)	(D39)	(D40)	(D42)	(D42)

Summary

Tender QTY	Total imported value
(D43)	(D44)

(D45) Total imported value by 3rd party

D. Other foreign currency payments

Calculation of foreign currency

Type of payment	Local Supplier making the payment	Overseas beneficiary	Foreign currency value paid	Tender Rate of Exchange
(D46)	(D47)	(D48)	(D49)	(D50)

Summary of Payments

Local value of payments
(D51)

Signature of tenderer from Annex B

(D52) Total of foreign currency payments by tenderer/or 3rd party

Date: _____

(D53) Total of imported content & foreign currency payments (D32), (D45) & (D52) above

This total must correspond with Annex C – C23

Annexure E

Local Content Declaration – Supporting Schedule to Annex C

(E1)	Tender No.	
(E2)	Tender Description:	
(E3)	Designated product(s)	
(E4)	Tender Authority:	
(E5)	Tender Entity Name:	

Note: VAT to be excluded from all calculations
--

Local Products (Goods, Services and Works)	Description of items purchased	Local Suppliers	Value
	<i>(E6)</i>	<i>(E7)</i>	<i>(E8)</i>
<i>(E9)</i> Total local products (Goods, Service and Works)			

(E10)	Manpower costs	(Tenderer's manpower cost)	
(E11)	Factory overheads	(Rental, depreciation & amortisation, utility costs, consumables etc.)	
(E12)	Administration overheads and mark-up	(Marketing, insurance, financing, interest etc.)	

<i>(E13)</i> Total local content

This total must correspond with annex C – C24

Signature of tenderer from Annex B

Date: _____

T2.2.1 Certificate of Authority for Signatory

T2.2.1: CERTIFICATE OF AUTHORITY FOR SIGNATORY

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663

NOTE: This returnable document must be on a company letterhead

Signatory for companies shall confirm their authority hereto by attaching a duly signed and dated copy of the relevant resolution of the board of directors to this form on the company's letterhead.

An example is given below:

"By resolution of the board of directors passed at a meeting held on _____

Mr/Ms _____, whose signature appears below, has been duly authorised to sign all documents in connection with the bidder for Contract No. _____

and any Contract which may arise there from on behalf of (Block Capitals) _____

SIGNED ON BEHALF OF THE COMPANY: _____

IN HIS/HER CAPACITY AS: _____

DATE: _____

SIGNATURE OF SIGNATORY: _____

WITNESSES:

1. _____ SIGNATURE: _____

2. _____ SIGNATURE: _____

T2.2.2 Certificate of Authority for Joint Ventures

T2.2.2: CERTIFICATE OF AUTHORITY FOR JOINT VENTURES

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663

This returnable schedule is to be completed by joint ventures.

We, the undersigned, are submitting this Request for Quotation in Joint Venture and hereby authorise Mr/Ms _____, of the company _____, acting in the capacity of lead partner, to sign all documents in connection with the Request for Quotation and any contract resulting from it on our behalf.

Name of Firm	Address	Duly Authorised Signatory
Lead Partner _____		Signature: _____ Name: _____ Designation: _____
 _____		Signature: _____ Name: _____ Designation: _____
 _____		Signature: _____ Name: _____ Designation: _____
 _____		Signature: _____ Name: _____ Designation: _____

T2.2.4 Site Inspection Certificate

T2.2.4: SITE INSPECTION CERTIFICATE

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Tender No:	2022/07/663

I/We have visited the site for the above-mentioned works at the date specified below.

I/We have thoroughly studied the site, plans and contract documents and I/We have brought myself/ourselves fully conversant with all aspects which could possibly influence the construction of the works.

I/We further certify that I/We am/are satisfied with the description of the works and the explanation given to me/us by the Representative/Agent at the inspection and I/We fully understand the extent of the work to be done as specified and implied for the execution of this contract.

Date of Inspection:

Time of Inspection:

Name of Tenderer

Signature of Tender

Signature of Representative/Agent

Date

T2.2.5 Record of Addenda to Request for Quotation Documents

T2.2.5: RECORD OF ADDENDA TO BID DOCUMENTS

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663

We confirm that the following communications received from the Employer before the submission of this Request for Quotation offer, amending the Request for Quotation documents, have been taken into account in this Request for Quotation offer:

	Date	Title or Details
1.		
2.		
3.		
4.		
5.		
6.		
7.		
8.		
9.		
10.		

Attach additional pages if more space is required.

Signed

Date

Name

Position

Bidder

T2.2.6 Capacity of Bidder

T2.2.6: CAPACITY OF THE BIDDER

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663
<p>WORK CAPACITY: (The Bidder is requested to furnish the following capacity particulars and to attach additional pages if more space is required. Details of project team including CV, qualifications and proof of registration completed for each individual to be provided by Bidder. Failure to furnish the particulars may result in the Bid being disregarded.)</p> <p><i>Artisans and Employees: (Artisans and Employees to be, or are, employed for this project)</i></p>	

Quantity / No. of Resources	Categories of Employee - Key Personnel (part of Business Enterprise)	Professional Registration No.	Date of Employment
	Site Agent		
	Project Manager		
	Foreman		
	Quality Control & Safety Officer-Construction Supervisor		
	Artisans		
	Unskilled employees		
	Others		

The undersigned, who warrants that she/ he is duly authorised to do so on behalf of the enterprise, confirms that the content of this schedule that presented by the Bidder are within my personal knowledge and are to the best of my knowledge both true and correct.

Signed:	Date:
Name:	Position:

Bidder:

T2.2.7 Relevant Project Experience - Completed Projects

T2.2.7: RELEVANT PROJECT EXPERIENCE – COMPLETED PROJECTS

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663

Bidders must submit a max one-page description of at least three projects successfully completed.

Attach a Completion Certificate for each of the project provided.

The description of each project must include the following information:

1. Essential introductory information:
 - 1.1. Name of project.
 - 1.2. Name of client.
 - 1.3. Contact details of client.
 - 1.4. Contact details (including telephone numbers and email addresses) of currently contactable references.
 - 1.5. The period during which the project was performed, and also, if this is different, the period during which the Bidder's team members were contracted.
 - 1.6. Cost of works and/or contract value (making it clear in broad terms what this cost/value purchased, and to what extent (if any) this cost/value was part of a larger project budget or programme budget).

NO.	NAME OF PROJECT	NAME OF CLIENT	CONTACT DETAILS OF CLIENT	PROJECT VALUE	DATE COMPLETED
1					
2					
3					

Attach a separate page to address this issue (the above table is just for reference purposes).

The undersigned, who warrants that she/ he is duly authorised to do so on behalf of the enterprise, confirms that the content of this schedule that presented by the Bidder are within my personal knowledge and are to the best of my knowledge both true and correct.

Signed _____ Date _____

Name _____ Position _____

Bidder _____

T2.2.8 Relevant Project Experience - Current Projects

T2.2.8: RELEVANT PROJECT EXPERIENCE – CURRENT PROJECTS

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663

Bidders must submit a max one-page description of at least three projects under construction/ on hold/ just handed over/ towards completion (if they exist).

Attach an Appointment letter for each of the project provided.

The description of each project must include the following information:

2. Essential introductory information:
 - 2.1. Name of project.
 - 2.2. Name of client.
 - 2.3. Contact details of client.
 - 2.4. Contact details (including telephone numbers and email addresses) of currently contactable references.
 - 2.5. The period during which the project was performed, and also, if this is different, the period during which the Bidder's team members were contracted.
 - 2.6. Cost of works and/or contract value (making it clear in broad terms what this cost/value purchased, and to what extent (if any) this cost/value was part of a larger project budget or programme budget).

NO.	NAME OF PROJECT	NAME OF CLIENT	CONTACT DETAILS OF CLIENT	CONTACT DETAILS OF REFERENCES	PROJECT VALUE	STAGE OF PROJECT
1						
2						
3						

Attach a separate page to address this issue (the above table is just for reference purposes).

The undersigned, who warrants that she/ he is duly authorised to do so on behalf of the enterprise, confirms that the content of this schedule that presented by the Bidder are within my personal knowledge and are to the best of my knowledge both true and correct.

Signed _____ Date _____

Name _____ Position _____

Bidder _____

T2.2.9 Schedule of Plant & Equipment

T2.2.9: SCHEDULE OF PLANT AND EQUIPMENT

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663

The following are lists of major items of relevant equipment that I/we presently own or lease and will have available for this contract or will acquire or hire for this contract if my/our Bid is accepted.

(a) Details of major equipment that is owned by and immediately available for this contract.

Quantity	Description, size, capacity, etc.

Attach additional pages if more space is required.

(b) Details of major equipment that will be hired, or acquired for this contract if my/our Bid is acceptable.

Quantity	Description, size, capacity, etc.

Attach additional pages if more space is required.

Signed Date

Name Position

Bidder

T2.2.10 Compulsory Enterprise Questionnaire

T2.2.10: COMPULSORY ENTERPRISE QUESTIONNAIRE

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL		
Request for Quotation No:	2022/07/663		
The following particulars must be furnished. In the case of a joint venture, separate enterprise questionnaires in respect of each partner must be completed and submitted.			
Section 1: Name of enterprise:			
Section 2: VAT registration number, if any:			
Section 3: CIDB registration number, if any:			
Section 4: CSD number:			
Section 5: Particulars of sole proprietors and partners in partnerships:			
Name*	Identity number*	Personal income tax number*	
<i>*Complete only if sole proprietor or partnership and attach separate page if more than 3 partners</i>			
Section 6: Particulars of companies and close corporations			
Company registration number:			
Close corporation number:			
Tax reference number:			
Section 7: SBD4 issued by National Treasury must be completed for each Bidder and be attached as a Request for Quotation requirement.			
Section 8: SBD6 issued by National Treasury must be completed for each Bidder and be attached as a Request for Quotation requirement.			
The undersigned, who warrants that he / she is duly authorised to do so on behalf of the enterprise:			
<ul style="list-style-type: none"> i) authorizes the employer to verify the Bidders tax clearance status from the South African Revenue Services that it is in order; ii) confirms that the neither the name of the enterprise or the name of any partner, manager, director or other person, who wholly or partly exercises or may exercise, control over the enterprise appears on the Register of Tender Defaulters established in terms of the Prevention and Combating of Corrupt Activities Act of 2004; iii) confirms that no partner, member, director or other person, who wholly or partly exercises, or may exercise control over the enterprise appears, has within the last five years been convicted of fraud or corruption; iv) confirms that I / we are not associated, linked or involved with any other bidding entities submitting Request for Quotation offers and have no other relationship with any of the Bidders or those responsible for compiling the scope of work that could cause or be interpreted as a conflict of interest; and v) confirms that the contents of this questionnaire are within my personal knowledge and are to the best of my belief both true and correct. 			
Signed		Date	
Name		Position	
<i>Enterprise name</i>			

T2.2.11 CIDB Grading Certificate / Proof of Registration

T2.2.11: CIDB GRADING CERTIFICATE/PROOF OF REGISTRATION

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663

Bidders are required to submit with their Request for Quotation:

A Certificate of Contractor Registration issued by the Construction Industry Development Board.

**NOTE: PROOF OF CIDB GRADING TO BE ATTACHED TO THIS PAGE BY BIDDER
IN THE CASE OF A JOINT VENTURE, SEPARATE CERTIFICATES IN RESPECT OF EACH PARTNER MUST BE SUBMITTED**

T2.2.12 Other certificates, etc.

T2.2.12: OTHER CERTIFICATES, ETC TO BE PROVIDED BY BIDDER

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663

Bidders are required to submit with their Request for Quotation:

- Certified copy of CIPC company registration certificate
- Certified copies of ID's of shareholders, members, partners or sole proprietor
- Letter of Good Standing from Bank where Bidder's primary transaction account is
- Letter of Good Standing from Compensation Fund or a licensed insurer as contemplated in the Compensation for Occupational Injuries and Diseases Act 1993
- CSD Registration Summary Report dated not more than thirty (30) calendar days prior to the Request for Quotation closing date
- Original valid SARS tax clearance certificate and pin
- Proof of locality of head office by way of certified copy of municipal account or lease agreement

NOTE: CERTIFICATES, ETC TO BE ATTACHED TO THE RELEVANT PAGE HEREAFTER

Insert certified copy of CIPC certificate

Insert certified copies of ID's

Insert Letter of Good Standing from Bank

**Insert Letter of Good Standing from Compensation
Fund**

Insert CSD Registration Summary Report

**Insert Original Valid SARS Tax Clearance Certificate
and Pin**

**Insert Certified Copy of
Municipal Account or Lease Agreement**

T2.2.13 Insert Completed Project Reference Forms

PROJECT REFERENCE RETURNABLE 1 OF 3

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663

NOTE: This returnable document must be completed by the person who was the principal agent on a construction project of similar value and complexity that was completed successfully by the Bidder.

I, _____ (name and surname) of
 _____ (company name) declare

that I was the principal agent on the following building construction project successfully
 executed by _____ (name of Bidder):

Project name: _____

Project location: _____

Construction period: _____ Completion date: _____

Contract value: _____

A. Please evaluate the performance of the Bidder on the abovementioned project, on which you were the principal agent, by inserting "Yes" in the relevant box below:

	Very Poor 1	Poor 2	Fair 3	Good 4	Excellent 5
1. Project performance / time management / programming					
2. Quality of workmanship					
3. Resources: Personnel					
4. Resources: Plant					
5. Financial management / payment of subcontractors / cash flow, etc					

B. Would you consider / recommend this Bidder again:

YES	NO

C. Any other comments:

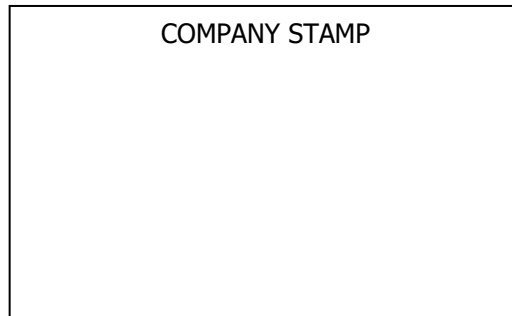
D. My contact details are:

Telephone: _____ Cellphone: _____ Fax: _____

E-mail: _____

Thus signed at _____ on this _____ day of _____ 2023

Signature of principal agent



NOTE:

If reference cannot be verified due to the inability to contact the referee or failure on his/her part to respond to a written request to do so, that reference will not score any points.

Name of Bidder

Signature of Bidder

Date

PROJECT REFERENCE RETURNABLE 2 OF 3

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663

NOTE: This returnable document must be completed by the person who was the principal agent on a construction project of similar value and complexity that was completed successfully by the Bidder.

I, _____ (name and surname) of
 _____ (company name) declare

that I was the principal agent on the following building construction project successfully
 executed by _____ (name of Bidder):

Project name: _____

Project location: _____

Construction period: _____ Completion date: _____

Contract value: _____

A. Please evaluate the performance of the Bidder on the abovementioned project, on which you were the principal agent, by inserting "Yes" in the relevant box below:

	Very Poor 1	Poor 2	Fair 3	Good 4	Excellent 5
1. Project performance / time management / programming					
2. Quality of workmanship					
3. Resources: Personnel					
4. Resources: Plant					
5. Financial management / payment of subcontractors / cash flow, etc					

B. Would you consider / recommend this Bidder again:

YES	NO

C. Any other comments:

D. My contact details are:

Telephone: _____ Cellphone: _____ Fax: _____

E-mail: _____

Thus signed at _____ on this _____ day of _____ 2023

Signature of principal agent

COMPANY STAMP

NOTE:

If reference cannot be verified due to the inability to contact the referee or failure on his/her part to respond to a written request to do so, that reference will not score any points.

Name of Bidder

Signature of Bidder

Date

PROJECT REFERENCE RETURNABLE 3 OF 3

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Request for Quotation No:	2022/07/663

NOTE: This returnable document must be completed by the person who was the principal agent on an construction project of similar value and complexity that was completed successfully by the Bidder.

I, _____ (name and surname) of
 _____ (company name) declare

that I was the principal agent on the following building construction project successfully
 executed by _____ (name of Bidder):

Project name: _____

Project location: _____

Construction period: _____ Completion date: _____

Contract value: _____

A. Please evaluate the performance of the Bidder on the abovementioned project, on which you were the principal agent, by inserting "Yes" in the relevant box below:

	Very Poor 1	Poor 2	Fair 3	Good 4	Excellent 5
1. Project performance / time management / programming					
2. Quality of workmanship					
3. Resources: Personnel					
4. Resources: Plant					
5. Financial management / payment of subcontractors / cash flow, etc					

B. Would you consider / recommend this Bidder again:

YES	NO

C. Any other comments:

D. My contact details are:

Telephone: _____ Cellphone: _____ Fax: _____

E-mail: _____

Thus signed at _____ on this _____ day of _____ 2023

Signature of principal agent

COMPANY STAMP

NOTE:

If reference cannot be verified due to the inability to contact the referee or failure on his/her part to respond to a written request to do so, that reference will not score any points.

Name of Bidder

Signature of Bidder

Date

THE CONTRACT

Part 4: Scope of Work

C3.1 Scope of work

C3.1: SCOPE OF WORKS – JBCC 2000 PRINCIPAL BUILDING AGREEMENT (Edition 4.1 of March 2005)

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Bid No:	2022/07/663

C3. Scope of Works

1. GENERAL

a) EXTENT OF THE WORKS

The work comprises of:

- Erection of a plinth, palisade fence and the provision and installation of a generator including all relevant switch gear and a 12-month maintenance programme.

b) ORDER OF THE WORKS

Commencement of the works after handover, daily progress and completion of the works is critical to the success of the programme and will thus be closely and strictly monitored. Decisive action will be taken against any potential risks that could lead to time over run on the contract period. The bidder is to take specific notice of this, most especially to the penalty clause.

c) BUILDING OCCUPIED

Yes

d) ACCESS – Gravel Road

C3.2 Health and Safety Specification

C3.4 Contractors Reports

CONTRACTOR MONTHLY REPORT

PART 1

Project No: Project Name:

Contract No:

Contractor Name:

Claim No: For Period Ending:

Date of Report:

The Contractors monthly report comprises an integral part of the Contractors payment claim and processing of the payment claim is not permitted without this report also being submitted i.e.

“NO REPORT – NO PAYMENT”.

Attachments:

Part 2 : Overall Project Worker Schedule: Schedule of all local labourers employed since the start of the project

Part 3 : Weekly Task Wage Register

Part 4 : Local Labour Schedule

Part 5 : Beneficiary List (certified copy of ID's)

Additional Requirements:

1. When contractor recruit local labourers, they must produce a 13 digit identity document and a certified copy of the ID must be forwarded to the DRPW Regional EPWP representative
2. That at least one disabled person be recruited and employed on the project and reported as such
3. A daily attendance register should be kept on site
4. Each beneficiary must **sign** the payment sheet, as proof that they have been paid.
5. At the bottom of the contractors report, the site agent or CLO or contractor must sign the document as proof that the people indicated have worked the number of days
6. Employment of local labourers should constitute the following:
 - a. 55% women
 - b. 55% young people
 - c. the minimum wage rate to be paid is R180.00 per day per person or higher

OVERALL PROJECT WORKER SCHEDULE (local labourers only)

Contract No: PART 2

Project No.

Project Name:

Month of Report:

Sheet: of

Names of all **Local Workers** employed **at any time on the project** are to be entered in the table below irrespective of how long they worked on the project.

No.	Name of Local Labourer	Identity Number	Month Worker Started	Age	Tick if Yes									Place a tick in the box which corresponds to the Gender and Age of the Worker					
					Female Head of Household with Dependants	Disabled	Labourer	Semi-Skilled	Skilled	Supervisor	Clerical	Managerial	Professional	Women		Men			
														Over 35 yrs 2A	35 yrs & under 2B	Over 35 yrs 2C	35 yrs & under 2D		
Totals for this sheet																			Total No. of workers Employed on the Project
Totals from previous sheet																			
Totals carried forward																			

(A) (B) (C) (D) (E) (F) (G) (H) (I) (J) (K) (L) (M) (N) = (J+K+L)

NOTE: LOCAL LABOUR TARGETS TO BE ACHIEVED WITH REGARD TO EPWP RELATED WORKS: Women = 55%; Youth = 55%; Disabled = 2%

Completed by: Name: Signature:..... Capacity Date:.....

Project No. Project Name: Week Ending: Sheet:.... of

Entries in this portion to be completed by Foreman								Entries in this portion to be Completed by Contractor						
No.	Name of local worker	Day Tasks Worked							Payment					
		Mon	Tue	Wed	Thu	Fri	Sat	Sun	Total DAY TASKS worked this week	Rate per DAY TASK	Total Payment due to Worker	Workers signature on receipt of Payment	Date Payment Received by Worker	
Totals This Sheet														
Totals Brought Forward From previous Sheet														
Totals Carried Forward														
								(A)		(B)				

Completed by: Name: Signature: Capacity: Date:

LOCAL LABOUR AND MATERIAL SCHEDULE

PART 4

Contract No: Date of Report:
 Project No: Project Name:
 Claim No: For Period Ending:
 Contractor Name:

1. Summary of Day Tasks worked and Amount Spent on Local Labour this month

Week No.	Week Ending	Total Day Tasks / Person Days Worked	Total Amount Paid
		(Total of (A) from Form 4 for each week)	(Total of (B) from Form 4 for each week)
1			R
2			R
3			R
4			R
5			R
6			R
7			R
8			R
9			R
Total			R

Transfer to 2 in table below

2. Summary of Amount Spent on Local Labour to date

1. Previous Amount Spent on Local Labour (From previous claim)	R
2. Amount Spent on Local Labour this month (From Total above)	R
3. Total Amount Spent on Local Labour to date (3)=(1+2)	R

3. Local Labour Schedule

Summary of Local Labour Employed	No. of local workers who worked on the project to date (From Part 2)	% of Total
Columns refer to Columns in Part 2		
1. Total No. of individual local workers who have worked on the Project (Column N)		100%
10. How many of the Total No. are local youth (35 yrs and under) (Column B & D)		
11. How many of the Total No. are local women (Column A + B)		

4. Summary of Amount Spent on Material to Date (Cumulative)

Item	This Month	Total to date

1. Material from Local Municipality		
2. Material from Local District Municipality		
3. Material from Outside the Eastern Cape		
4. Material from other areas within the Eastern Cape		
Total Material		
Total material as percentage of contractor expenditure		
Total as percentage of contractor budget		

Training of Local Workers

Category of training	Name of course	No. trained	Days trained	Comments on progress
(a) Technical training for implementation	Bricklaying			
	Carpentry			
	Plumbing			
	Fencing			
	Plastering			
	Painting			
	House Building			
	Handyman			
	Electrical			
(b) Institutional training for local management beyond construction				
(c) Technical training for OMM				
(d) Institutional training for implementation				
(e) HIV/ Aids etc.				
Other – Please specify				
Total				

NOTE: LOCAL LABOUR TARGETS TO BE ACHIEVED WITH REGARD TO EPWP RELATED WORKS: Women = 55%; Youth = 55%; Disabled = 2%

Completed by:
Name Signature Capacity Date

Part 5: Pricing Data

C2.1 Pricing Instructions

C2.1: PRICING INSTRUCTIONS JBCC 2000 PRINCIPAL BUILDING AGREEMENT (Edition 4.1 of March 2005)

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Bid No:	2022/07/663

1. BILLS OF QUANTITIES

The **bills of quantities** forms part of and must be read and priced in conjunction with all the other documents forming part of the **contract documents**, the Standard Conditions of Bid, Conditions of Contract, Specifications, Drawings and all other relevant documentation.

2. VALUE ADDED TAX

The bid price must include for Value Added Tax (VAT). All rates, provisional sums, etc. in the **bills of quantities** must however be net (exclusive of VAT) with VAT calculated and added to the Total Value thereof in the Final Summary.

3. PREVIOUS WORK

The bidder is to acquaint themselves with the site thoroughly before pricing. Adjustment of prices will not be entertained after the award of the contract.

C2.2 Preliminaries / Bill of Quantities / Final Summary

Part 6: Site Information

C4 Site Information

**C4: SITE INFORMATION - JBCC 2000 PRINCIPAL BUILDING
AGREEMENT (Edition 4.1 of March 2005)**

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Bid No:	2022/07/663

C4 Site Information – Existing operational education facilities

1. GROUND CONDITIONS

Geotech information not available. This is an existing site.

2. UNDERGROUND SERVICES

There are unidentifiable underground services traversing the area of works, care would need to be taken during excavations.

3. ADJACENT BUILDINGS

No adjacent buildings could be affected by the construction. No particular precautions have been identified by the Engineer for the protection of this structure.

4. ENVIRONMENTAL ISSUES

None

C5 Drawings

C5.1: DRAWINGS

Project title:	PROVISION OF A GENERATOR AT MVENYANE HIGH SCHOOL
Bid No:	2022/07/663

Drawing title	Drawing number	Print date	Rev No.
Typical Generator Plinth Detail	001E-2018		
Typical Kiosk Plinth	002E-2018		
Typical Palisade Fence Detail	003E-2018		

OCCUPATIONAL HEALTH AND SAFETY SPECIFICATION

FOR

**CONSTRUCTION OR REFURBISHMENT OF EC
SCHOOLS (SMALL PROJECTS)**

**EASTERN CAPE DEPARTMENT OF
EDUCATION**

(THE “CLIENT”)

Prepared By:	Dr. Claire Deacon CHSA010/2013
Last revision 02/12/2022 By:	Ntokozo Ngwenya

Table of Contents

Site Details:	28
REFERENCES.....	28
1. LIST OF ABBREVIATIONS.....	28
2. Purpose of the Site Specific Health and Safety Specification (SSHSS).....	29
2.1 Project description/detailed scope of work as it applies to the project (Details as per the scope of work) 30	
2.2 Programme Description	30
3. Implementation of the Site Specific Occupational Health and Safety Specifications (SSHSS)	30
4. GENERAL REQUIREMENTS	31
4.1 Summary of Risks identified during Design	31
4.2 Specified Hazardous Chemical Substances.....	32
5. OCCUPATIONAL HEALTH & SAFETY MANAGEMENT	32
5.1 Structure and Organization of H&S Responsibilities	32
5.1.1 Notification of Commencement of Construction Work	32
6. HEALTH AND SAFETY PLAN FRAMEWORK.....	33
6.1 Appointment of Competent Site Personnel	33
6.1.2 Construction Health and Safety Officer	34
7. GENERAL RISK MANAGEMENT.....	35
8. Training	36
8.1 Site Induction and other training	36
8.2 Noise Risks.....	36
9. Emergency Procedures	36
9.1 Fire, First Aiders and First Aid Equipment	37
9.2 Incident Management and Compensation Claims	37
10. Personal Protective Equipment (PPE) and Clothing	37
11. Occupational Health and Safety Signage.....	37
12. Induction of Employees and Visitors, General H&S Training	38
13. Management of Plant and Equipment	38
14. Excavations (if applicable)	38
15. Working at heights (if applicable)	38
16. Cranes and lifting equipment (if applicable)	39
17. Temporary Works (Scaffolding, support work, formwork) (if applicable).....	39
18. Auditing	39
19. Communication and Meetings on Site	40
20. Care of Workers on Site (Welfare)	40
21. HEALTH AND SAFETY FILE.....	40
22. NON-CONFORMANCES.....	41
23. Failure to Comply with Provisions.....	41
24. Public safety	41
ANNEXURE A.....	Error! Bookmark not defined.
CLOSE OUT REQUIREMENTS.....	43



Project Details	
Date of compilation:	Revision number: 00
Value of project:	Commencement date:
	Contract period:
Occupational Health and Safety Agent:	

<i>Professional responsibilities</i>	<i>Company</i>	<i>Contact person</i>	<i>Telephone</i>	<i>Fax</i>	<i>email</i>
Architects					
Civil Engineers					
Structural Engineers					
Electrical Engineers					
HVAC Engineers & Fire Consultants					
Quantity Surveyors					

Site Details:

Locality of the works:

REFERENCES,

- Occupational Health and Safety Act (OHSA) No. 85 of 1993 and Regulations (as amended);
- Compensation for Injury and Occupational Diseases Act (COIDA) No. 100 of 1993 (as amended);
- South African Council for the Project and Construction Management Professions (SACPCMP) 2013: Scope of services for the OHS Consultant, Manager and Officer;
- Any other internal standards and specifications developed by the Client as they affect the operations, and
- The amended Baseline Risk assessment
- South African Roads Traffic Safety Manual (SARTSM) Chapter 2, Volume 13 of 1999
- Road Traffic Safety Act No. 93 of 1996 (as amended)
- Construction Specifications & Standards 6.0 for Southern Africa. Hans Wegelin 6th Edition 2010
- SANS Code 10400
- SABS 1200

1. LIST OF ABBREVIATIONS

AIA	Approved Inspection Authority
BoQ	Bill of Quantities
CC	Compensation Commissioner
CR	Construction Regulations
CHSO	Construction Health and Safety Officer
DMR	Driven Machinery Regulations
DEL	Department of Employment and Labour
FEMA	Federated Employers Mutual Association
GAR	General Administration Regulations
GSR	General Safety Regulations

HCSR	Hazardous Chemical Substances Regulations
HIRA	Hazard Identification Risk Assessment
H&S	Health and Safety
ER	Engineer's Representative
LI	Labour Intensive
DMA	Disaster Management Act
OH	Occupational Health
OHSA	Occupational Health and Safety Act No. 85 of 1993 (as amended)
SSHSS	Site Specific Health and Safety Specification
PC	Principal Contractor
PPE	Personal Protective Equipment
SANS	South African National Standards (Authority)
SACPCMP	South African Council for Project and Construction Management Professions
SDS	Safety Data Sheet
SMME	Small, Micro, Medium Enterprise
SWP	Safe Work Procedure

Each year fatalities, serious injuries and poor attitudes of Contractors mar the reputation of the Construction Industry. The CLIENT has a responsibility to limit its risk by ensuring a zero tolerance and better practice approach to Contractors and those affiliated to a particular project. Thus, a high premium is placed on the health and safety (H&S) of the Client and stakeholders, which include its employees, professional service providers, public and its physical assets.

The responsibilities that the Client and relevant stakeholders have toward its employees are captured in, but not limited to this document. The responsibilities stem from both moral, civil and a variety of legal obligations. The Principal Contractor is to take due cognisance of the above statement.

Where there is an appointed OHS Consultant its behalf, shall provide a site specific Health & Safety Specification (SSHSS) for the project and provide the Principal Contractor/s (PC) making a bid or appointed to perform construction work for the project, or parts thereof.

By drawing up this SSHSS, the Client has endeavoured to address the most critical aspects relating to H&S issues in order to assist the contractor in adequately providing for the health and safety of employees on site.

Should the Client not have addressed all H&S aspects pertaining to the work that is tendered for, the contractor needs to include it in the SSHSP and inform the Client of such issues when submitting the tender, or as soon as identified.

Notwithstanding the above, cognisance needs to be taken of the current Disaster Management Plan, and all the requirements of the current levels of lockdown, standards, guidelines and information published from time to time.

2. Purpose of the Site Specific Health and Safety Specification (SSHSS)

The SSHSS is a performance specification to ensure that the Client and any bodies that enter into formal agreements with the Client, Agents, Professional Designers (Engineers, Quantity Surveyors and Architects), Principal Contractors and Contractors achieve an acceptable level of OHS performance.

No advice, approval of any document required by the SSHSS, such as hazard identification and risk assessments, or any other form of communication from the Client shall be construed as acceptance by the Client of any obligation that absolves the Principal Contractor from achieving the required level of performance and compliance with legal requirements. Furthermore, there is no acceptance of liability by the Client, which may result from the Principal Contractor failing to comply with the SSHSS, i.e. the Principal Contractor remains responsible for achieving the required performance levels.

A Mandatary Agreement in terms of Section 37.2 of the OHSA will be signed between parties prior to any works commencing. If the NEC contract is used a copy of the signed contract shall form part of the H&S file submission.

The SSHSS highlights the aspects to be implemented over and above the minimum requirements of current legislation. Requirements may be changed should new risks or issues are identified that could not have been foreseen during the design phase of the project, or during the construction phase. Any new legislation or standards (legislated or determined by the Client) that are promulgated or accepted during the contract will automatically be applied.

Environmental management shall receive due attention as per the requirements of the Environmental Control Officer (ECO), but will be managed by the ECO directly if applicable to the project.

2.1 Project description/detailed scope of work as it applies to the project (Details as per the scope of work)

The Scope of work as identified by the Stakeholders is as follows:

- Preliminary and General
- Breaking
- Painting
- Carpentry
- Brickwork
- Roof Work
- Asbestos Work

The works shall be done in accordance with the applicable SANS 1200 specifications, Municipal By-laws and Regulations, variations and additions to the standardized specifications applicable to this contract and the technical specifications of the Client for work that falls outside of the standardized specifications.

2.2 Programme Description

Clarification Meeting	<i>TBA</i>
Time allowed for preparation of H&S plan/file after tender award	
Approval date of SSHSP	<i>Within 1 week after submission but subject to content as per this requirement, for more than one review.</i>
Induction dates	<i>To be advised after Approvals of H&S Plan/file</i>
Estimated Commencement date of work on site	<i>Subject to approval of H&S Plan.</i>
Estimated Project completion date or project duration	<i>Dependant on site establishment and site hand over</i>
Project term	

3. Implementation of the Site Specific Occupational Health and Safety Specifications (SSHSS)

The site specific H&S specification (SSHSS) forms an integral part of the Contract, and PCs are required to make it an integral part of their Contracts with Contractors and Suppliers. A SSHSS will be available for each level of Contract and Contractor and must be complied with.

This specification must be read in conjunction with the OHSA, Regulations (as amended) and any other standards relating to work being done and ensure compliance thereto. The information relative to the scope of the project, the works etc. are detailed in the tender, are to be considered when developing the SSHSP and associated documentation. The summary of risks is included in Section 2 of the SSHSS.

The OHSA S.37.2 Mandatory Agreement must be fully completed by the PC, supplied by the Client. These documents shall be deemed to form part of the returnable Contract Documents.

No work may commence without written approval of the SSHSP by the H&S Agent, or the responsible person of the Client.

Should there be design changes, or change in the scope of works, an amended SSHSS may be issued. Where amended SSHSSs are issued, the PC will be required to ensure a resubmission of an amended SSHSP for approval. Further to this, the PC must ensure that similar information must be provided as it applies to the works to all their Contractors, within 5 working days following notification thereof. Such design changes.

The OHS Consultant will visit the project at least bi-monthly to ensure compliance and limit risk. All activities on the site and all appropriate documentation will be monitored and reported on to the Client and the Designer.

Non-conformances will be issued, and penalties or work stoppage will be issued where appropriate. Communication between the OHS Consultant and the PC will be through the Designer (or Client's responsible person) as determined at the commencement of the project.

3.1 Requirements at Start Up

A site specific H&S Plan (SSHSP) in response to this SSHSS will be subject to approval by the OHS Consultant within the stipulated time period as noted in the tender. This must include all supporting documentation as required to verify the H&S system:

- A declaration to the effect that the PC has the competence and necessary resources to carry out the work safely in compliance with the Occupational Health and Safety Act and its Regulations;
- A valid Letter of Good Standing;
- Detailed technical method statements along with, and aligned with the project programme for review by the Principal Agent, Designer and appropriate risk assessments and safe work procedures for approval by the OHS Consultant or Client:
- Site establishment including:
 - A procedure must be drafted relative to protection/ prevention of injury to persons other than PC employees, during undertaking of such construction activity.
 - Exposure of services, power, telecommunication etc.;
 - Arrangements for hoarding, traffic accommodation if applicable;
 - Excavating for services;
 - An emergency plan indicating how and where emergencies will be handled, and
 - Working at heights (if applicable).

Further method statements are to be submitted prior to, and during the project where changes or new work is required, and the approval of the Principal Agent/Client is required before work on that aspect or activity can commence. The construction CHSO (CHSO) is to be included in production planning sessions/meetings to ensure that the appropriate risk assessments, safe work procedures and communication required are available and completed timeously.

Penalties will be applied should this not be adhered to and deemed a serious offence.

4. GENERAL REQUIREMENTS

4.1 Summary of Risks identified during Design

The intention of the summary of findings from the design risk assessment is to highlight the residual risks identified during the design phase. The full design risk assessment can be found in the tender document.

The summary of risks provided is to point the contractor towards some risks he may not be aware of during tendering stage and while developing his formal risk assessments for the project.

The design risks and the management thereof should be included in the PC risk assessments. Where there are other Contractors appointed to do work, the PC is to ensure that Contractors include such information in their risk assessments.

The summary is to be developed following the completion of the Design risk assessment, and to include the residual risks as they apply to the project.

PHASES OF THE PROJECT	RESIDUAL RISKS IDENTIFIED TO BE MANAGED (as applicable)
Site Establishment	Bringing in containers, fitting with electricity, phone and fax, toilet hire. Hoarding, security and access to be managed and in place.
Site Clearance	Traffic accommodation, movement of heavy construction vehicles, use hand tools, chainsaws, use of local labour and contractors.
Earthworks	Open excavations, use of plant and machinery, use of lifting equipment for laying storm water concrete pipes, electrical hand tools plant and equipment during paving. Noise monitoring.
Ancillary Roadworks	Use of chemicals, excavation and use of hand tools.

Housekeeping, stacking and storage	The area is adequate to ensure housekeeping and stacking and storage principles are followed. However, the children need to be kept well away from all work areas including the site camp, and notices to be clear in warning of dangerous construction activities. Care and increased attention to ensure all materials and vehicles are carefully managed and designated routes are used.
General	Use of local labour, and contractors, CLO to do regular information sessions. High winds and inclement weather require monitoring for all working at heights
Painting	Hand mixing may occur, 50kg paint drums are an ergonomic risk from handling. Potential eye, skin and respiratory irritant from paint fumes exposure, chromates.

4.2 Specified Hazardous Chemical Substances

The following lists of products or substances are those which have been identified as likely to be used on the project. This list is not inclusive and other products may be considered. Where the PC is likely to supply the product as the product has not been specified, safety data sheets (SDSs) need to be considered prior to all selections.

PRODUCTS/SUBSTANCES/RISKS	POTENTIAL HEALTH OR OTHER RISKS
Cement	Hand mixing may occur, 50kg bags are an ergonomic risk from handling. Potential eye, skin and respiratory irritant from dust exposure, chromates.
Cement/Silica dust	Caused by cutting, grinding, sanding of any concrete/granite/tiled surface/masonry.
Wood dusts	Caused by cutting, sanding, drilling wooden products treated Viz fencing poles.
Mineral turpentine	Applying paint and cleaning of paint brushes. Potential eye, nose, skin and respiratory irritant.
Paint	Splashes into eyes, onto skin causing irritation.
Cleaning materials	Use of disinfectants and sanitizers

5. OCCUPATIONAL HEALTH & SAFETY MANAGEMENT

5.1 Structure and Organization of H&S Responsibilities

An organogram will be available to identify key appointments and responsibilities on site and be kept up to date throughout the project.

5.1.1 Notification of Commencement of Construction Work

The PC shall notify the Provincial Director of the Department of Employment and Labour (DEL) in writing, in the form of the Annexure in the CRs. This shall occur within 7 days of the award of the contract. Proof of submission and/or receipt must be provided and kept in the H&S file.

Where changes to the conditions given in the submission are required (i.e. Contractors, completion dates, increase in workers), a revised Annexure A must be submitted to the DEL. The completion date is to include the defect and liability period. A copy of the notification form and any further submissions/correspondence must be kept in the H&S file.

6. HEALTH AND SAFETY PLAN FRAMEWORK

The H&S aspects related to the project outlined in the previous sections are to be taken into account when drawing up the H&S Plan. The PC is required to demonstrate competence by providing an H&S system that will address the requirements of the project.

The current legislative requirements, SABS codes, SANS 10400 and any other standards that may guide practice are to be taken into consideration. The following aspects must be addressed in the SSHSP, as they have been identified in section 2, as playing a role in reducing the overall risk of a particular activity, or section of the project. The OHS Agent may from time to time request additions or systems as they relate to the works or legislative requirements at the time.

The PC is to prepare a site layout drawing to indicate at least the following to submit with the H&S plan:

- The positions of site offices of all Contractors, toilets, drinking water and worker rest areas;
- Indicate the positions of emergency planning and equipment and first aiders;
- Protection of plant and public, indicate parking, designated vehicular routes and access to site;
- Storage areas (materials and equipment, waste etc.), and
- Storage of materials and waste;

Such layouts are to be updated regularly throughout the project.

Cognisance is to be given to those permanent employees who are over 60 years of age, and younger workers who have underlying chronic health issues such as high blood pressure, diabetes, TB, HIV and AIDS etc. Specialised workers who are indispensable will need to be declared fit for work by an occupational health service provider.

Key appointments and succession planning is to be available to ensure those who are playing key roles are able to cover the project at all times.

The project Organogram is to be updated accordingly and signed and dated at each update.

6.1 Appointment of Competent Site Personnel

The CEO (OHSA S16.1 or 16.2) of the PC will take overall responsibility for the appointment of competent site staff for the duration of the project. Should the CEO not be personally involved in the project, the H&S responsibilities are to be delegated to the Site Agent (OHSA 16.2). Knowledge and training in H&S are required and certificates indicating H&S training as well as experience to be included in CVs.

All other legal appointments are to be made with relevance to the type of work required and kept current with the project programme. The construction team is to ensure the appointed CHSO is kept up to date with all planned activities, to ensure all H&S requirements are met.

All construction/technical method statements are to be generated by senior site personnel, and the appropriate risk assessments developed therefrom in conjunction with the CHSO.

The SSHSP shall include the following, but is not limited to the following key appointments:

6.1.1 Construction Supervision

Competent supervisors will be appointed to manage part or all of the works and have training and/or experience in the area of responsibility, regarding CR 8.1, 8.2 and 8.7. All site supervisors must show evidence of appropriate training in H&S, and an understanding or training in areas of responsibility (i.e. risk assessments, method statements etc.).

Curriculum Vitae (CVs) are to be submitted for approval by the Principal Agent, and/or Client. The Supervisor will be held responsible for the safety of working teams and subordinates, housekeeping and stacking and storage of materials.

6.1.2 Construction Health and Safety Officer

The PC shall employ at least one competent, CHSO for the duration of the contract. The CHSO's CV is to be submitted for approval by the OHS Agent or the Client, at time of tender

The PC is to ensure adequate resources are provided in order to undertake all responsibilities (i.e. mobile phone, computer and internet access, etc.).

Qualifications shall include at least Grade 12, SAMTRAC/NEBOSH/Diploma in H&S qualifications or similar, with exposure to civil engineering and similar road construction, with at least 5 years' experience, given the level of project complexity preferably in an OHS capacity. He should also have undergone training in the Act and Regulations. In the case of a contract where contractors are employed, the CHSO must have a competence to evaluate the Contractors Health and Safety plans and be registered with the SACPCMP as a CHSO.

This person may not hold any other position on the site staff. The site supervisor may not act as the CHSO. The CHSO appointed for the project will be held responsible for all H&S on the project.

- Senior site staff and supervision, Contractors are to follow systems, instructions etc. given by the CHSO at all times;
- No new workers or Contractors may commence work without approval or following the SSHSP as submitted;
- No inductions of any Contractors' staff until the H&S documentation is approved by the CHSO, and
- The CHSO may not be removed or replaced without the approval of the H&S Agent, nor may the site be left unattended for more than 1 day without adequate, competent cover.

A monthly report of all H&S activities and incidents is required by the end of the first week of each month, or at a date agreed to by the OHS Consultant /Client and the CHSO. An example of the monthly report is attached as an Annexure D.

The CHSO will be responsible for collating the H&S documentation at the close out of the project in electronic format, properly labeled and filed. A list of the typical aspects that should be provided is available as Annexure B to this document. The PC is to ensure that all Contractors documentation follows the same requirements and closed out. H&S documentation must be completed and be available with the close out of the main contract, or as determined at the time.

Failure to do so will be considered a serious offence and penalties applied. Failure could also result in retentions or project certification not being issued to the PC.

6.1.3 Traffic Safety

The CHSO will be responsible for ensuring that daily traffic management is adequately managed.

No worker may be transported in, or on the rear of construction vehicles (bakkies included), or with plant and materials to, on, or from site. The number of passengers in any vehicle is limited to what is stated on the license disc. Vehicles used to transport workers to, from, or on site, shall have secure seats and be covered. No canopies may be used.

While this is difficult to control by the PC, induction training needs to include such information so workers can protect themselves. An on-site transportation policy needs to be available for how such transportation will be made safe and limit any opportunity for cross infection. Disinfection of vehicles needs to be determined where possible, and sanitizers provided prior to boarding and recommended during transit.

Each worker is to be encouraged to wear a cloth mask while travelling, and this needs to be enforced if using company transport.

Penalties will be issued for non-compliances noted.

6.1.4 Health and Safety Representatives and H&S meetings (if applicable)

H&S Representatives representing workers and Contractors are to be appointed following the start up of the project, irrespective of the number of workers on site. The appointed H&S Representatives are to be actively involved with H&S and will assist the CHSO and site management in meeting legislative duties.

All internal and external OHS Agent audits are to be discussed, as well as all H&S related issues at all internal production or progress meetings.

Failure to do so will be deemed to be a moderate offence.

6.1.5 Appointment of Competent Contractors and Suppliers, short term works (if applicable)

The PC is to ensure compliance with the Clients minimum standards and all legislative requirements. The same H&S standards required of the PC are to be applied to all Contractors. An index of all Contractors and Suppliers is to be on file and kept updated at all times. The PC is to ensure there is sufficient funding for H&S compliance by each Contractor.

The following minimum aspects are applicable to any Contractor appointed:

- The CHSO is to ensure a Contractors appointment and approval of H&S documentation at least seven (7) working days prior to commencing work;
- No Contractor may work under the PCs Compensation registration number. If required, the PC may assist SMMEs with their registration with the Compensation Commissioner (CC). However, such Contractors will not be able to commence work until proof of registration or Letter of Good Standing has been received, and
- No work may commence without Mandatary agreements between parties in place.

Suppliers or short-term works (surveying, repairs, servicing, deliveries etc.) also require H&S Management. Cognisance is to be taken of the level of risk involved and the CHSO is to ensure the level of H&S documentation is appropriate and appropriately managed.

Failure to provide written approval of H&S documentation will be considered a serious offense, and could result in aspects of, or all the activities being stopped, and penalties implemented.

7. GENERAL RISK MANAGEMENT

7.1 Health Risks and Medical Surveillance

The appropriate SDSs are to be obtained for all products and used to develop the H&S documentation as they relate to the works. Many of the processes are labour intensive and ergonomic risks are to be noted. All workers (including Contractors) are to be included in the medical surveillance programme.

Workers will be exposed to noise, dust, and physical risks from extended periods of work of a repetitive nature, materials specified and the general nature of the works.

All permanent workers (including those of Contractors) are required to be in possession of a medical certificate of fitness prior to arrival on site that must be less than 12 months old. An exit medical will be required where the project exceeds 6 months in duration. Arrangements for keeping medical records for the required time are to be noted. A procedure for managing the medical records which require safekeeping for prescribed periods are to be addressed, specifically for the asbestos exposed workers.

Given the potential health risks the following aspects are to be included in each medical surveillance intervention:

- Full medical, surgical and occupational history;
- Full physical examination of all systems, and
- Referral if required for the management of identified health issues that may affect the worker.

Specific testing for existing conditions and limitations relative to exposure could include, but are not limited to:

- Audiometry (hearing tests);
- Spirometry (lung function tests) are not to be done until deemed safe to do so, and
- Any other tests identified as relevant from chemical or specifically identified risks of exposure

Failure to do so will be considered a serious offence.

8. Training

Training of site personnel in H&S in the revised areas of work is required, mainly through induction between the Client and specific groups of employees. The CHSO is to determine training requirements and to report on needs or completed training in their reports and audits.

Records of all training, and acknowledgement of such training by attendees must be kept. Comprehensive records of all employees under the PCs control attending induction or any other training throughout the project shall be included. Amendments to statutes, the SSHSS, PSHSP, policies, procedures, method statements etc. shall require that all those affected shall undergo the relevant re-training.

8.1 Site Induction and other training

The PCs shall ensure that all employees, and contractors have undergone the induction programme for visitors or contractors, or any other that is deemed necessary.

Appropriate time must be set-aside for training (induction and other) for all employees. No person will be able to commence work or visit the site where the induction has not been done.

All employees and visitors on site from either the Client or the PC shall carry the proof of induction training in form of an induction card. Client Induction is valid for a year from the date it was conducted and thereafter refresher induction shall be re-scheduled at least one month before the induction period expires.

Both parties shall keep a database of all records pertaining to induction and will inform Contractors of pending expiry though the overall responsibility of maintaining current induction cards still lies with the principal contractor. All induction cards issued must be returned on completion of the project to the Issuer.

Toolbox talks to be conducted outdoors when possible in order for persons to maintain social distancing. Where inclement weather does not allow for this, toolbox talks to be conducted with smaller groupings of workers in a sheltered area large enough to maintain social distancing.

8.2 Noise Risks

All plant from plant hire companies (suppliers) or that of the PC is to come to site with the appropriate testing completed and be compliant with the Noise Induced Hearing Loss Regulations. Plant identified that has not been tested and marked for noise emissions will result in having to be tested or removed from site. Failure to do so within a reasonable time period will result in such plant being removed from site.

Suitable SANS approved hearing protective equipment shall be issued and worn where noise levels are identified as equal to or greater than 85 dB.

8.3 Asbestos Work

Only a registered asbestos contractor may do work which entails asbestos material. An Approved Inspection Authority must be consulted and Asbestos regulations complied to.

Failure to do so will be considered a serious offence.

9. Emergency Procedures

A simple emergency plan and procedure that is appropriate to the risks is required prior to commencement on site. It is advised that the system should be simple and easy for any worker to follow. The plan may be adapted should new information or risks are identified.

The procedure shall detail the response plan in relation to the works, and include at least (but are not limited to) the following key elements:

Appointment of a competent emergency response co-ordinator

- Fire, public injury, asbestos;
- Falls from heights;

- Serious injury to workers (medical or work-related), and
- Any other major risks identified during risk assessments

The emergency plan is to ensure the inclusion of local service providers. Such arrangements should be made with these persons prior to the commencement of the project. The general principals of emergency management are to be applied as it applies to the hierarchy of control and management.

9.1 Fire, First Aiders and First Aid Equipment

At least 1 first aider will be trained to level 1. First aiders shall be available and accessible on site at all times and be able to work as a team when responding to any emergency on the project. The number of First aiders will be determined by the complexity and exposed risks of the project, not numbers of workers.

Contractors are expected to ensure compliance and provide/manage their own first aiders and equipment. Appropriately stocked first aid kits are to be available at all times and to assure continual availability and access on site.

Fire extinguishers will be appropriate for the risk and in sufficient numbers to deal with the type of fires that could occur. All mobile plant is to have fire extinguishers. Hot work permits are required for any such activities.

Failure to comply with emergency provisions will be considered a serious offence, and the operation or project may be stopped if deemed inadequate for the work at the time of assessment or site inspection.

9.2 Incident Management and Compensation Claims

All incidents and accidents are to be investigated. All serious incidents involving any form of disabling injury or fatality are to be reported to the Principal Agent/Client /OHS Agent immediately. This shall be confirmed in writing following the incident. Full details are to be included in each site meeting or when the Client visits site. A summary of incidents is to be included in the monthly report.

Failure to comply with emergency provisions will be considered a serious offence, and the operation or project may be stopped if deemed inadequate for the work at the time of assessment or site inspection.

10. Personal Protective Equipment (PPE) and Clothing

The PC is to provide a procedure as an addendum to indicate how PPE is managed within the Company. The wearing of the identified SANS approved PPE at all times is non-negotiable and is to be linked to the risk assessments. The PC shall ensure that all workers (Including Contractors) are issued with and shall wear:

- Hard hats;
- Protective footwear;
- Eye protection;
- Hearing protection;
- Reflective jackets (no bibs);
- At least 3 cloth masks (for general wear);
- Respiratory protection (minimum of FFP2) or as deemed required by the AIA, and
- Any other necessary PPE identified from SDSs and/or risk assessments.

Adequate quantities of PPE shall be available. This shall include necessary PPE for visitors. The procedures for managing PPE are to be in a formal procedure submitted with the SSHSP for approval.

Any person (including Client, Agents, etc.) found on site without the necessary PPE will be removed from site until the PPE is supplied and worn.

Failure to comply will result in penalties being applied.

11. Occupational Health and Safety Signage

On-site H&S signage is required as well as standard H&S information. Signage shall be posted up at fixed or temporary working areas, or other potential risk areas/operations. These signs shall be in accordance with the requirements of the General Safety Regulations or SANS requirements as amended. Signage is to be noted on the site drawings indicating where fixed/temporary signage is required and appropriate to the risks identified in risk assessments.

Signs shall be posted at areas of work on site indicating that a construction site is being entered and that persons should take note of H&S requirements.

Failure to comply will result in penalties being applied.

12. Induction of Employees and Visitors, General H&S Training

A simple, formal induction programme is to be submitted as an addendum for approval with the H&S plan. Inductions must be carried out for all workers and visitors (including Client, Designers) to the site.

Daily, pre-task training is required to ensure workers are familiar with the risks and H&S measures of the work or tasks to be done. Records to be kept in the H&S file.

Any person found on site without proof of induction will be removed from site until the proof is supplied and, and a **penalty issued per non-compliance.**

13. Management of Plant and Equipment

The CHSO will ensure control of all plant and equipment, including daily monitoring, prior to commencing work. Full lists of hired and own plant are to be available at the OHS Consultant /Client audit. All daily inspection records are to be kept in the H&S file, or Contractors where plant and equipment is brought onto site. Registers are not to be more than 1 week behind.

Only competent, fit plant operators are to be used. Medical certificates of fitness are required for all operators.

Any plant or slings used to lift plant or material require annual load testing by an AIA, and all certificates must have the testers LMI/E number. Operators are to be adequately trained and certified to operate mobile cranes or crane trucks. Certificates and registers are to be placed in the H&S file.

Failure to do so will be considered a serious offence.

14. Excavations (if applicable)

A procedure for managing excavations is to be provided as an addendum to the SSHSP describing how excavations are to be managed.

A competent person is to be appointed for managing all excavations. A permit system is to be available and used for all excavations. All equipment and ground conditions to be checked daily, and prior to work commencing.

Excavations should preferably not be open beyond what can be closed daily. Where excavations need to remain open, all excavations are to be properly protected. Adequate stakes with 1m high demarcation and berms/spoil are required to be a safe distance from the edge of the angle of repose. Candy tape may not be used to demarcate excavations. Cognisance is required of the surrounding area and increased levels of protection are required where work is in communities, near schools and clinics or churches.

Work will be stopped, and penalties applied to any work in excavations that is not compliant.

15. Working at heights (if applicable)

A fall protection plan is to be available and supplied as an addendum to the H&S plan. The fall protection plan must be appropriate for the project. Proof of competency must be on file for the Fall Protection Plan Developer and the appointment of a Fall Protection Supervisor with competency to be on file. Method statements, appropriate risk assessments, safe work procedures and training (all employees are to be in possession of a valid working at heights certification) are to be available prior to work commencing.

The focus for working at height shall include fall restraint systems where possible except during assembling or dismantling top components or where it is not deemed safe. The relevant SANS codes are to be applied as they apply to the works and the project, such as:

- SANS 10085
- SANS 10333 (parts 1-3)

Should part of the works be contracted out, competent Contractors are to be appointed and submit documentation according to the project requirements. The PC is to note if such work is to be contracted to specialists in the H&S Plan. The plan is to be developed and work managed by a competent person for the duration of the project. The following aspects must be included:

- The public or users of buildings are to be protected at all times by way of hoarding, barricading or fencing
- Notices to be posted
- Restrictions or stoppage when weather conditions are deemed hazardous
- Permit system for working at heights
- Prevention of falling tools or equipment
- Link to emergency plan regarding rescue

All workers are to be in possession of valid certificates of fitness that extend for the duration of the works. Note the requirements in the section relating to medical surveillance.

Registers and all relevant documentation are to be placed in the H&S file.

Work will be stopped, and penalties applied to any work at heights that is not compliant.

16. Cranes and lifting equipment (if applicable)

Lifting devices such as mobile cranes might be used during the project for deliveries, and moving of supplies or equipment,

Appropriate documentation must be made available for the cranes and operators. Method statements, risk assessments, safe work procedures and training are to be available prior to work commencing. A procedure for managing loads and lifting must be made available as an addendum to the H&S Plan.

Chains, slings and webbing to have valid safe working load certification on file, should the documentation not be on site, the operation may be stopped, and fines imposed until such documentation may be delivered.

17. Temporary Works (Scaffolding, support work, formwork) (if applicable)

Temporary works must be properly designed and signed off by the PCs competent person for all temporary scaffolds, support work or formwork. In these instances, a competent person is defined as one who has sufficient experience in the design of the type of temporary work in question to be able to assess the design. The appropriate competent persons are to be appointed to manage and monitor such works to the satisfaction of the Engineer and OHS Agent. Records and registers are to be properly completed and kept in the H&S file. If temporary works are to be erected by a Contractor, this must be notified to the Principal Agent/OHS Agent.

Failure to do so will be considered a serious offence.

18. Auditing

Frequency of external auditing by the OHS Agent or Client will be bi-monthly to conform to the requirements of the Construction Regulations. The site will be inspected, and the documentation audited relative to the activities and H&S plan. The CHSO of the PC must accompany the Client, or the H&S Agent, on all audits and inspections.

The PC will ensure that all their Contractors are audited on a monthly basis, dependent upon the time to be spent on the site. Audit frequency may be increased if Contractors are not performing adequately. Audit results will be acted upon and non-conformances and penalties issued where deemed appropriate. The Client, Designer or OHS Agent may act or require further outcomes if non-compliances are noted or unsafe acts are noted on site.

Internal audits are to include site conditions as well as ensuring H&S files are appropriate, and compliant. Comprehensive audit reports are to be made available the format of the audit reports will be reviewed by the H&S Agent.

The PC will be audited using a template as supplied in the tender document. The audit template will be adjusted from time to time relative to the activities on site. A similar process is to be used by the PC when auditing their Contractors on site. Compliance with legislative requirements and the systems provided by the PC to manage the H&S on site will be measured. Full compliance is required. Time limits for corrective actions will be set and must be adhered to.

Failure to address findings or non-conformances will be considered a serious offence.

19. Communication and Meetings on Site

All H&S communication during the project between the OHS Consultant and the PC will be done through the Principal Agent and be in writing, including the issue and responses to non-conformances and H&S audit results.

Failure to address issues timeously will be considered a serious offence.

20. Care of Workers on Site (Welfare)

Adequate toilets, clean, safe drinking water and weather protected shelter will be afforded workers at all times. Toilets will be within reasonable distance of workers, or placed with each working team in safe, with reasonable privacy.

Hand washing facilities, disinfectants and sanitizers will be provided across the site at common areas and entrances to work areas.

Failure to ensure compliance will be considered a serious offence, work will be stopped if con-conformances noted until corrected.

21. HEALTH AND SAFETY FILE

The documentation submitted and approved following the awarding of the contract will be used to form the H&S file. The H&S file is required to be laid out in a logical manner, and documentation filed within the file is to be easily accessible.

The following completed information shall be included (but not be limited to) as part of the index:

- The SSHSS;
- The SSHSP and the approval by Client;
- Appointment by Client;
- Mandatory agreement with Client;
- Notification of construction work;
- A record of all working drawings, calculations and design where applicable;
- Detailed list of Contractors with contact details, appointments, Mandatories etc., H&S specifications issued;
- Record of Competencies (CVs) and appointments;
- Training Records;
- Permits;
- Method statements;
- Risk assessments;
- Safe work procedures;
- Emergency and injury management;
- Safety data sheets
- Medical surveillance records;
- Registers;
- Records of audits, minutes etc.;
- Plant lists;
- Temporary electrical installations, and
- Employee records (who is on site).

22. NON-CONFORMANCES

Should, at any time, the works, or part of the works, be stopped due to unsafe acts or non-compliance with the Clients or PCs H&S Plan; neither the PC nor any other Contractor shall have a claim for extension of time or any other compensation.

The following constitute examples of the types of non-conformances that will attract penalties:

Minor: Penalty: R50/count	Medium: Penalty: R500/count and a non-conformance	Severe Penalty: R5000/count, a non-conformance and/or activity stoppage
Non-use of PPE supplied	Toilets not supplied or regularly serviced; lack of drinking water	Contractors working without Health and Safety Plan approval
Non-completion of registers for plant and equipment on site	Contractors not audited	Workers transported in contravention of the OHS plan or legal requirements
Lack of H&S signage at work areas	Working without training or the appropriate, approved H&S method statements	Invalid Letters of Good Standing
Tools and equipment identified in poor condition during inspections	Legal non-conformances identified during the previous audit and not addressed within the agreed time frame	Non-compliance with traffic accommodation requirements: layout or physical conditions
	No monthly OHS report at site meeting to report on	Any serious breach of legal requirements
	No certificates of fitness for workers as required	
	Working without approved method statements	

23. Failure to Comply with Provisions

Failure or refusal on the part of the PC or their Contractors to take the necessary steps to ensure the safety of workers and the general public in accordance with these specifications or as required by statutory authorities or ordered by the engineer, shall be sufficient cause for the engineer to apply penalties as follows:

- (i) A penalty as shown in the Table above shall be deducted for each and every occurrence of non-compliance with any of the requirements of the SSHSS,
- (ii) In addition, a time-related penalty of R500,00 per hour over and above the fixed penalty may be deducted for non-compliance to rectify any non-conformance within the allowable time after a site instruction to this effect has been given by the Designer. The site instruction shall state the agreed time, which shall be the time in hours for reinstatement of the defects. Should the Contractor fail to adhere to this instruction, the time-related penalty shall be applied from the time the instruction was given.

24. Public safety

The Principal Contractor shall ensure at all times that staff, and general public are aware of the dangers and risks involved whilst construction is taking place.

- Safety signage / posters shall be posted at all areas where construction work is taking place;
- Edges, excavations, stockpile areas, material storage areas, will be demarcated and no entry signage appended;
- Safety talks with employees shall be done, all employees shall be involved in keeping the site safe;
- CLO shall be given talks to do with the community members who are directly involved;
- A record of all training shall be kept, and indemnity documents shall be signed by those attending the safety talks.
- Community unrest shall be handled by the local SAPS. CLO shall assist the Contractor should the need arise.

- No visitors to site are allowed unless proper arrangements are made.

ANNEXURE A CLOSE OUT REQUIREMENTS

The H&S files for the Principal Contractors and all Contractors require closure and handover to the Client at the completion of the project. The following list is an example of what should be included but is not exhaustive. The OHS Consultant or the Client may require further information at the time of completion and the Principal Contractor is to ensure that all instructions are met. Documentation would include all records from the start of the project. Daily or monthly plant inspection records are not required unless they are related to an accident. All records to be in electronic format and submitted to the OHS agent for approval in adequately formatted lists and folders. Layout should be logical and in the same order as in the site files.

Health and Safety close out file requirements include:

- a) Client H&S Specification
- b) Principal Contractor's OHS Plan(s)
- c) Organograms
- d) Legal Appointments
- e) List of all employees employed on a permanent or contractual basis over the duration of the contract
- f) Notification to Department of Labour of commencement of work
- g) Letters of Good Standing for the Project
- h) Full files for all Contractors as well as their close out reports
 - List of Contractors
 - All employees employed on a permanent or contractual basis over the duration of the contract
 - Letters of Approval of Contractors
 - Mandatary Agreements
 - Letters of Good Standing
 - Appointments
- i) Incident Records
- j) Non- Conformance records
- k) Agent's Audits
- l) Method Statements
- m) Risk assessments
- n) Safe work procedures
- o) Medical surveillance certificates of fitness. Medical records are to be kept according to the OH&S Act as amended
- p) All drawings for temporary structures (suspended beams/scaffolds etc.)
- q) All operating manuals for any systems that require ongoing maintenance
- r) Copies of test results, policies and procedures for environmental monitoring (silica, noise, dusts etc.)

Defect and Liability Period

The H&S files are to be kept 'live' for the defect and liability period by the Principal Contractor, including those of their Contractors. Any work required during the defect and liability period will require an assessment of the H&S file by the OHS Consultant to any work commencing.

A copy drawing records for the as-builts are to be placed on file by the Designers once complete



CLIENT: ECDoE
 PROJECT: DoE Small Projects
 COMPILED BY: Ntokozo Ngwenya
 REVISION: 00

	HAZARD	RISK	MINIMUM CONTROL MEASURES
1.	Electrical commission	Electrical shock	<ul style="list-style-type: none"> - Personnel to comply with permits to work issued by client. - Personal protective equipment to be worn by employees to prevent electrical shock. - First aid treatment to be readily available. - Only competent and trained persons may decommission or commission electrical equipment.
2.	Excavations (working in and around)	Toxic fumes Collapse of trench walls/trapping Falling into excavation Collapse of adjacent structures	<ul style="list-style-type: none"> - Deep excavation/ Monitor air for toxic fumes. - Prevent collapse by battering back sides to safe angle or install temporary support. - Protect vehicles from falling into excavations, provide barriers, signage, etc. as necessary. - Beware of undermining of other structures (e.g. building , scaffolds). - Record excavations inspections by competent person on daily basis. - Provide suitable means of access/egress in case of emergency. - Excavations formed by explosives must be accompanied by method statement approved by client.
3.	Explosive actuated fastening devices	Noise Being stuck by cartridge or fixing	<ul style="list-style-type: none"> - Operators to be trained, competent and wear appropriate protective equipment, e.g. goggles, gloves, ear plugs and head protection. - Cartridge gun to be in good condition, inspected for damages and faults regularly and results entered register. - Used and unused cartridges gun should be kept in a secure place when not in use, maintain register for return and issue.
4.	Explosive use	Injuries to personnel and by-passers Property damage	<ul style="list-style-type: none"> - Blaster must have all relevant permits, permission and licenses in place before blasting.



CLIENT: ECDoE
PROJECT: DoE Small Projects
COMPILED BY: Ntokozo Ngwenya
REVISION: 00

			<ul style="list-style-type: none">- Method statement must be approved.- Maintain exclusion zone around perimeter of blasting, warn persons away, erect warning signage and barriers.- Obtain permission from local authority and police.- Blaster must be competent in blasting.- Ensure blasting does not affect stability of adjacent structures/building.
5.	Fire	Injuries to workers, pedestrians, residents, road users, damage to property through fire.	<ul style="list-style-type: none">- No littering on site which could become a fire hazard, maintain site in clean condition.- No fires to be lit on site, have a working fire extinguisher at hand all times.- No smoking or naked flames near flammable substances or in unauthorised areas.- Ensure proper storage/use of petrol/diesel/flammable substances, post warning notices
6.	Flammable liquids	Fire Explosion	<ul style="list-style-type: none">- No littering on site which could become a fire hazard, maintain site in clean condition- Have a working fire extinguisher at all times.
7.	Asbestos Cement pipes	Release of asbestos fibres	<ul style="list-style-type: none">- Ensure safe access and egress is provided.- Erect physical barriers to prevent entry by unauthorised persons, as applicable.- Damp down exposed area to contain fibre release.- Personnel involved to wear asbestos respiratory protection.- Only Department of Labour registered asbestos contractors may work with asbestos, and strictly in accordance with the requirements of the Asbestos Regulations.



CLIENT: ECDoE
PROJECT: DoE Small Projects
COMPILED BY: Ntokozo Ngwenya
REVISION: 00

8.	Asbestos Cement removal	Person falling from height Debris falling from height Falling of equipment or tools Release of asbestos fibres	<ul style="list-style-type: none">- Notice to be erected informing personnel of fragile roofs, as applicable.- Ensure of safe access and egress in provided.- Erect physical barriers to prevent entry by unauthorised persons and falls from heights, as applicable.- Roof sheets to be sprayed with water to prevent fibre release, where feasible.- Take extreme care to remove sheets whole. Where breakage occurs damp down exposed area to contain fibre release.- Personnel involved to wear respiratory protection.- Exclusive zone may be required under area of sheet removal to prevent injury from falls of material from heights.- Only Department of Labour registered asbestos contractors may work with asbestos, and strictly in accordance with the requirements of the Asbestos Regulations.
9.	Asphalting	Fire Burns to skin Skin disease	<ul style="list-style-type: none">- Suitable fire extinguisher to be place prior to commence of works- Ensure competent personnel using material and competent and trained machinery/equipment operators.- Ensure there is a safe workplace at all time.- Ensure all personnel wear sufficient personal protective equipment (PPE) including safety boots, reflective vests and gloves.- Health and safety data sheet required.
10.	Bricklaying	Caustic contamination with mortar Contact with sharp blade tools	<ul style="list-style-type: none">- Use only trained personnel.- Safe means of access to be provided.



CLIENT: ECDoE
 PROJECT: DoE Small Projects
 COMPILED BY: Ntokozo Ngwenya
 REVISION: 00

			<ul style="list-style-type: none"> - Safe/suitable working platform required where working at height. - PPE for mortar to include gloves where practical and goggles/ masks where there is a risk of contamination
11.	Brush cutting	<p>Injury from contact with blade/nylon Fire (where petrol used) Electrocutation (where electrical tools are used)</p>	<ul style="list-style-type: none"> - Person using brush cutter must be trained and competent. - Use PPE such as goggles, safety boots, ear protection, gloves, hard hat. - Brush cutter must be in good condition and maintained. - Adequate supervision on site at all times. - No smoking when refuelling, fire extinguisher to be on hand (where petrol is used)
12.	Chainsaw use	<p>Falling tree or branches causing injury to persons Incorrect use of chainsaw causing injury</p>	<ul style="list-style-type: none"> - Person using chainsaw must be trained and competent - Use PPE such as goggles, safety boots, ear protection, gloves, hard hat, chainsaw trousers and jackets. - Chainsaw must be in good condition including guards. - Clear area below area of chainsaw use and where tree felling.' - When using chainsaw at height practise safety procedures
13.	Plumbing	<p>Falling material Fall from height Fire Burns Exposure to lead flames</p>	<ul style="list-style-type: none"> - Ensure standard safety procedures are followed at all times - Only used trained and competent personnel - Ensure there is a safe working area at all times. - Ensure material are stored neatly - Ensure there is a safe access and egress at all times. - Ensure all personnel wear suitable and sufficient PPE. - Consider a hot works permit system prior to commencing of any hot works. - Make sure emergency procedures are in place and ensure all



CLIENT: ECDoE
 PROJECT: DoE Small Projects
 COMPILED BY: Ntokozo Ngwenya
 REVISION: 00

			personnel are aware of where to go in case of fire.
14.	Plastering	Falling material Fall from height Contact with materials	<ul style="list-style-type: none"> - Ensure standard safety procedures are followed. - Ensure there is a safe working area. - Ensure safe access and egress. - Ensure competent personnel are used.
15.	Plant or vehicles and equipment operation	Workers injured by passing traffic Road users and pedestrians at risk from plant operation Noise	<ul style="list-style-type: none"> - Implement traffic protection measures. - Trained and competent operators must be used. - Check plant and vehicles on daily basis before use and record inspections. Maintain vehicles in safe condition. - Medical certificates of fitness required for construction plant. - Crossing of road by construction vehicles or machines must be limited to the practical minimum. - Plant and vehicles must be fitted with amber rotating beacons and reverse alarms. - Wear appropriate PPE
16.	Pilling	Falls Struck by machine Exposure to noise	<ul style="list-style-type: none"> - Personnel to be trained and competent, pilling rig to be in safe condition and inspected on a daily basis on a register by competent personnel. - Empty pilling holes not to be left unguarded. - Only approach pilling plant on signal from operator. - Personnel to wear PPE such as ear plugs.
17	Paving (laying)	Impact injuries from tile/ mallet Caustic burns Sore knees Cuts from cutter	<ul style="list-style-type: none"> - Impervious gloves to be worn/ barrier cream to be used - Kneelers or similar to be available. - Personal protective equipment to be worn.
18	Painting	Contact with paint	<ul style="list-style-type: none"> - Refer to safety data sheet for usage instructions, hazards and precautions required.



CLIENT: ECDoE
 PROJECT: DoE Small Projects
 COMPILED BY: Ntokozo Ngwenya
 REVISION: 00

			<ul style="list-style-type: none"> - When working at height, refer to risk assessment addressing this hazard.
19	Overhead services (Working near)	Contact with live services causing injury to personnel Damage caused to services	<ul style="list-style-type: none"> - Maintain safe clearance levels. - Establish presence of any services via proper walk through survey of site and/ or means service drawings. - Wear personal protective clothing. - Ensure height of plant/ vehicles does not compromise or exceed clearance levels from service provider.
20	Noise and Dust	Breathing in dust can cause long term health problems, noise can damage hearing	<ul style="list-style-type: none"> - Wear respiratory and hearing protection. - Dampen down and minimise dust where possible.
21	Night work	Security Lighting	<ul style="list-style-type: none"> - The contractor shall not undertake any night work without prior arrangement and written permit from the client. - The contractor shall ensure that adequate lighting is provided for all night work and failure to do so shall result in work being stopped
22	Compacting and filling	Contact with tipping materials Contact with moving plant Vehicles/personnel falling into excavations Contact with underground services	<ul style="list-style-type: none"> - Trained banks man to control vehicle movement - Only trained personnel to use plant - Personnel to stand clear as materials are being tipped - Use stop blocks and signs to warn vehicles of excavations, where applicable - Stand clear of plant whilst material is being compacted - Establish position of underground services and protect services from damage.
23	Concrete pumping	Sprains and strains Hit by pump Concrete burns Collapse/bursting of structure	<ul style="list-style-type: none"> - Personnel to be in clear vision of pump operator - Trained pump operator - Personnel working with the concrete to wear the appropriate equipment to protect against cement burns



CLIENT: ECDoE
 PROJECT: DoE Small Projects
 COMPILED BY: Ntokozo Ngwenya
 REVISION: 00

			<ul style="list-style-type: none"> - Design of structure being loaded to be approved by competent designer and inspect before, during and after loading. - Pump to be well maintained
24	Compactor operations	Crush of feet	<ul style="list-style-type: none"> - Only trained and competent personnel to use the machine - Ensure operators wear steel toe caps shoes or boots at all times
25	Confined spaces	Suffocating Fumes	<ul style="list-style-type: none"> - Ensure that confined spaces is sufficiently ventilated - Wear personal protective equipment such as proper masks if air supply insufficient or not of sufficient quality. - Test oxygen levels in confined space to ensure that is safe for entry - Ensure that emergency procedures are in place
26	Cutting Kerbs	Saw slipping, blade disintegrating	<ul style="list-style-type: none"> - Only trained operators to use saw and change blades. - PPE must be worn, gloves, goggles, dust mask and hearing protection. - People to be kept away from the work area. - Work to cease if people have to pass - Sparks etc. To be directed away from people and any flammable material.
27	Cutting Off Disc	Noise Cuts from machine Fire (particularly at refuelling) Flying debris Blade shattering Contamination by fume created or exhaust fume	<ul style="list-style-type: none"> - Use competent personnel - Hot works control, fire extinguisher, fire watch man. (permit may be required). - PPE to include gloves, eye protection, hearing protection. - Solid working position - Clear working area - Correct grade of blade must be used - Good ventilation to be provided (Forced if necessary) - Changing of wheels to be by competent persons only



CLIENT: ECDoE
 PROJECT: DoE Small Projects
 COMPILED BY: Ntokozo Ngwenya
 REVISION: 00

			<ul style="list-style-type: none"> - Cutting discs must not be used for grinding (grinding disc thicker). - Bystanders to wear hearing protection, as applicable.
28	Demolition	Falling materials premature collapse of structure	<ul style="list-style-type: none"> - Ensure there is current method statement in place - Ensure all emergency procedures are in place and all details are displayed. - Ensure that structural demolition has been approved by designer and site management
29	Kerb Laying	Nips at joints Crushing by kerbs Caustic burns	<ul style="list-style-type: none"> - Impervious gloves and barrier cream to be used to protect hands. - Personnel should be aware of safe manual handling techniques when handling kerbs.
30	Lead – working with removal of tiles	Toxic effects from exposure to lead and its compounds Risk of inhalation, ingestion and absorption Personnel falling from height Debris falling from height	<ul style="list-style-type: none"> - Demarcation of the workplace - Restriction of entry by unauthorised persons - Restriction of substances that can release airborne lead to certain areas - Limit number of workers exposed to lead - Regular cleaning of workplaces and equipment - All employees who are exposed to lead must be provided with suitable and adequate PPE - Lead is to be packed in impermeable containers that are tightly sealed and clearly marked for removal. - The need for medical surveillance and the nature thereof is to be based on both risk assessment and air monitoring results and safety legislations.
31	Lifting Operations	Falling material Crushing by material Hand injuries to the slinger Toppling crane	<ul style="list-style-type: none"> - Check test certificate - Check examination certificate - Check inspection have been carried out



CLIENT: ECDoE
 PROJECT: DoE Small Projects
 COMPILED BY: Ntokozo Ngwenya
 REVISION: 00

			<ul style="list-style-type: none"> - Check certificates for lifting equipment (chains, slings, shackles, etc.)
32	Fragile Materials	Person or items falling through fragile materials	<ul style="list-style-type: none"> - All fragile materials to be identified and protected prior to work commencing. - Protection to include either covering the fragile materials or excluding activity. - Any coverings to be secured in place - The location of the fragile materials to be indicated by signage
33	Hand tools	<p>Injuries caused by use of hand tool</p> <p>Impact with the tool</p> <p>Falls due to access problems</p> <p>Contamination with substance being worked</p>	<ul style="list-style-type: none"> - Ensure: - Tool is correct for the job - Tool is in good order and suitably sharp - Personnel must be competent/instructed in tool usage and tool safety - Lighting is sufficient - Access is safe, working platform is secure, leading edge is guarded - Operative is wearing all necessary PPE
34	Hazardous Substances	Injuries to workers through use of hazardous substances, e.g. injuries to eyes, skin, etc..	<ul style="list-style-type: none"> - Use substances in accordance with the safety data sheet particularly reference protective clothing required. (example: gloves, goggles, etc.) - Know what first aid measures are. - Have welfare facilities available for washing of hands, etc..
35	Hot Works	Burns to eyes or other parts of the body	<ul style="list-style-type: none"> - PPE to include eye protection, kin and ear protection. - Respirator maybe be required where cutting galvanized steel or anywhere else toxic fumes and gases arise. - Dust can also be a problem and forced ventilation may be required
36	Mobile Crane Erection & Dismantling and Use	<p>Collapse of structure</p> <p>Overturning structure</p> <p>Falling Materials</p>	<ul style="list-style-type: none"> - Ensure emergency procedures are in place and all operative are aware of the details



CLIENT: ECDoE
 PROJECT: DoE Small Projects
 COMPILED BY: Ntokozo Ngwenya
 REVISION: 00

			<ul style="list-style-type: none"> - Only used trained and competent operators for the erection and dismantling and use of cranes - Ensure crane driver is trained and hold certification as proof. Must have a valid medical fitness certificate - Ensure crane is 360 degrees vision if not ensure a fully trained banks man is available at all times. - Banksman to wear reflector vest to identify him/herself to the crane driver - Ensure all personnel wear suitable and sufficient PPE - Consider creating an exclusion area
37	Members of the public – Protection Of	Injury to the member of the public and road users from site works	<ul style="list-style-type: none"> - Barriers and signage to be in place - Workers must warn away members of the public from the works - Footpaths and bridges which are open to the public must be closed off if in the area of works otherwise made safe so that no injury to a member of the public occurs - Traffic turning into site – traffic management and signage is required - Signage to be on the road at site entrance warning motorists that construction traffic turning into/out of site access. Keep roads free of mud where possible - Refer to plant risk assessment for details on plant safety precautions - NOTE: SIGNAGE TO BE POSTED ON SITE TO WARN OF CONSTRUCTION MOVEMENTS. SAFE MEANS OF ACCESS FOR BOTH CONSTRUCTION TRAFFIC TO SITE AND PROVATE HOMEOWNERS MUST BE AGREED
38	Manhole Rings & Pipe Storage	Rolling of rings Collapse of pipes Crushing of persons Stockpile collapse	<ul style="list-style-type: none"> - Manhole rings must be stored flat to prevent them being rolled - Banks of stock pipes are not to be broken until they are ready to be used



CLIENT: ECDoE
 PROJECT: DoE Small Projects
 COMPILED BY: Ntokozo Ngwenya
 REVISION: 00

			<ul style="list-style-type: none"> - Personnel must stand to the side when breaking bands so as not to be hit by falling pipes - Pipes must be wedged to prevent rolling
39	Temporary Works – Shoring, Scaffolding, falsework, formwork	Collapse of works	<ul style="list-style-type: none"> - Wear PPE such as gloves and goggles - Formwork must be built by trained person and also be inspected by competent person and results entered into register on site/
40	Tower (Mobile Aluminium Tower) Scaffold	Overturing Falls	<ul style="list-style-type: none"> - Tower to be on firm level ground with wheels or feet properly supported - Erection by competent person - Inspection before first use - Weekly record of inspection required - Guard rails and toe boards as per normal scaffold - Beware when moving of overhead obstructions, such as power lines - Never move in strong winds
41	Underground Services	Striking of buried services	<ul style="list-style-type: none"> - Make all necessary enquiries to establish what services are in the area - Assume all services to be live (unless confirmation is received to confirm that services are isolated or otherwise made safe. - Comply with requirements of the safe system of work for underground services - Where available locate services with a locator - Hand dig around services
42	Working at height	Personnel falling from height Falling debris Those beneath being injured	<ul style="list-style-type: none"> - All access equipment is properly constructed (inspection record must be maintained) - Only trained personnel construct, dismantle or control access equipment - All equipment must have full toe boards and guard rails, Comply



CLIENT: ECDoE
 PROJECT: DoE Small Projects
 COMPILED BY: Ntokozo Ngwenya
 REVISION: 00

			<p>with SANS10085 on erection, use and dismantling scaffolding</p> <ul style="list-style-type: none"> - No access equipment to be loaded above its safe working load - No access equipment to be loaded above the level of the guardrail - Where working involves leaning out an open leading edge, then all personnel are to be fitted with a full body harness. The harness must be connected at all times - All fall arrest equipment to be correctly maintained - Ensure if ladders used for access, they are either footed or tied.
43	Precast slab/ Unit laying and fixing	Falls Falling material Manual handling	<ul style="list-style-type: none"> - Emergency procedures are in place and personnel explained details - Use competent personnel - Ensure suitable and sufficient access and egress is provided - Safe place of work must be provided - Ensure all personnel wear correct PPE - Exclusion zone may be required for protection against risk of falling objects
44	Road Construction	Risk of being struck by vehicles	<ul style="list-style-type: none"> - Ensure traffic management measures in place - No construction activities to commence until adequate provision made to accommodate traffic in accordance with the South African road signs manual - Wear reflective waist coats when working on or near the road and road shoulder as well as any either required PPE clothing - Crossing of road by personnel must be limited to the practical minimum - Use of fencing or other barriers as appropriate.
45	Road Marking	Contact with moving vehicles	<ul style="list-style-type: none"> - Ensure suitable and sufficient road signs are erected, as applicable



CLIENT: ECDoE
PROJECT: DoE Small Projects
COMPILED BY: Ntokozo Ngwenya
REVISION: 00

		Fire	<ul style="list-style-type: none">- Possible road or lane closure may be required, traffic management may be required- Fire extinguisher to be situated in a suitable area, use dry powder or foam
46	Rope Access	Personnel falling from Height Falling debris Those beneath being injured	<ul style="list-style-type: none">- Ensure:- Competent person is appointed in writing to supervise all rope access on the site- Compliance with Construction regulations particularly section 10 & 18- All rope access work is carried out under supervision of a competent person- All rope access operators are competent and licensed to carry out their work- The design, selection and use of the equipment and anchors comply with safety standards incorporated for this purpose into these regulations under section 44 of the act.- Site specific fall protection plan must be developed by a competent person applicable to the specific work and environment prior to the commencement of the work including all records of maintenance and inspections of all equipment used for the work operations
47	Steel fixing	Back injuries caused by manual handling Eye injuries from tie wire Trips/Falls Falling from height	<ul style="list-style-type: none">- PPE must include safety boots and goggles- Manual handling training may be required- Care to be taken when near overhead lines- Use only trained personnel- Provide safe means of access- Maintain and regularly inspect all lifting appliances and equipment



CLIENT: ECDoE
 PROJECT: DoE Small Projects
 COMPILED BY: Ntokozo Ngwenya
 REVISION: 00

			<ul style="list-style-type: none"> - Cap starter bars to prevent injuries where feasible - Construct scaffold walkway to cross reinforcing mesh, as required
48	Steel erection	<p>Falls from height Falling components Contact injuries from falling lifting equipment</p>	<ul style="list-style-type: none"> - Adhere to all general precautions for working at height - Barrier off/ exclude area below work - All lifting appliances to be examined and inspected - Inspection register in place and up to date - All personnel to be trained and competent wear clipped on safety harnessed when working on height - Ensure that lifting equipment (slings, chains and shackles) test certificates are current and on site - Competent persons only to connect loads and direct plant
49	Work over or next to water	Drowning	<ul style="list-style-type: none"> - Evaluate the depth of water, height above water that work takes place, whether workers can swim or not and then determine safety precautions required: these may include such measures such as barriers, signage, life belts, safety harness etc. - When working on river/harbour/dam edge, erect life saving devices and barriers to protect workers and vehicles (Stop blocks may also be required). Only trained and competent personnel may be used
50	Scaffold Erection/Dismantling	<p>Personnel falling from height Items of scaffold falling onto personnel Scaffold collapsing onto those below</p>	<ul style="list-style-type: none"> - Ensure: - Scaffold is designed to take the imposed load - Scaffold is not overloaded - Scaffolders are fully trained - Scaffolding is regularly checked by competent person and record of inspection retained. Written inspections to be recorded on weekly basis.

AGREEMENT WITH MANDATARY

**WRITTEN AGREEMENT ENTERED INTO
AND BETWEEN**

(Hereinafter referred to as the Employer)

and

(Hereinafter referred to as The Employee)

Compensation Fund
Number:

Whereas the Company called under contract no. _____ for the executing of the following

At _____ (“Premises”)

and whereas the contractor _____

Undertook to carry out the work and whereas the client contractor have agreed to regulate as between them and as provided for in terms of section 37(2) of the Occupational Health and Safety Act, No 85 of 1993, now therefore the undersigned agree to:

1. The Contractor warrants that all his and his contractors’ employees are covered in terms of the provisions of the Compensation for Occupational Injuries and Diseases Act 1993 (the Act) which cover shall remain in force whilst any such employees are on the premises.
2. The Contractor warrants that he is in possession of the following insurance cover which shall remain in force whilst he and/or his Contractor and/or his employees are present on the premises or which shall remain in force for the duration of his contractual relationship with the client whichever period is the longest:
 - Public liability insurance covers.
 - Any other insurance cover that will adequately make provision for any possible losses and/or claims arising from his and/or his contractors and/or his Employees’ acts and/or omissions on the premises.
3. The Contractor undertakes to ensure that he and/or his contractors and/or their respective employees will at all times comply with all the requirements of the Act and without derogating from this general undertaking, also comply with the following conditions:
 - All work performed on the premises must be performed under the close supervision of the contractor’s employees who are trained to understand the hazards associated with any work that the contractor performs on the stated premises.
 - The Contractor shall assume the responsibility in terms of Section 16(1) of the Act. If the Contractor delegates any duty in terms of Section 16(2), a copy of such written delegation shall immediately be forwarded to the Client.
 - The Contractor shall ensure that he familiarize himself with the requirements of the Act, and that he, his employees and any Contractor comply with them.
 - The Contractor shall conduct a hazard analysis and ensure that his and any contractor employees are made aware of the hazards identified. This analysis needs to be reviewed prior to a new tasks are commenced.

The Contractor must provide the Client with written proof that his employees and those of the sub contractor have been made aware of the hazards identified. The Contractor must provide the Client with up dated copies of the analysis.

- Discipline regarding Occupational Health and Safety shall be strictly enforced.
- Personal Protective Equipment as defined in the Act and regulations shall be issued free of charge by the Contractor and worn as prescribed.
- Safe work practices shall be enforced and all employees shall be made conversant with the contents of these practices.
- No unsafe equipment/machinery and/or articles will be allows and/or used on the premises.
- All incidents referred to in Section 24 of the Act shall be reported by the Contractor to the Department of Labour as well as to the client. The Client shall further be provided with copies of all documentation relating to any incident.
- The Client hereby obtains an interest in the issue of any formal inquiry conducted in terms of Section 32 of the Act into any incident involving a Contractor and/or his employees and/or his Contractor.
- No use shall be made of any machinery/article/substance/personal protective equipment that belongs to the Client without prior written approval.
- Work for which the issuing of a permit is required shall not be performed prior to the obtaining of a duly completed and approved permit.

- No alcohol or other intoxicating substance shall be allowed on the premises. Anyone found to be or suspected of being under the influence of alcohol or any other intoxicating substance shall be removed from the premises.
 - Full participation shall be given if and when Client employees inquire into Occupational Health and Safety issues.
 - The Contractor expressly agrees to comply with the procedures and arrangements as required by the Act in the execution of the work.
4. The Contractor confirms; that he has been informed that he must report to Client management ;(in writing) anything that he deems to be unhealthy and/or unsafe and that he has versed his employees and/or contractors in this regard.
5. The Contractor warrants that he shall not endanger the health and safety of any of the Client's employees in any way whilst performing any work on the premises.

_____ Date _____
1. Signed by Client Rep

_____ Date _____
2. Signed by Contractor or his Authorized Represent

MVENYANE HIGH SCHOOL ELECTRICAL BOQ

ITEM NO.	DESCRIPTION	UNIT	QTY	RATE	AMOUNT
1	<u>PRELIMINARIES AND GENERAL</u>				
1.1	Preliminaries and general required to comply with the conditions of contract and all regulations governing this contract including insurances et cetera	Item	1		
1.2	<u>OCCUPATIONAL HEALTH & SAFETY</u> Allowance for Compliance with Construction Regulations, as detailed in the Occupational Health & Safety Act (OHS), Act 85 of 1993. Submission of an (OHS) plan and all applicable documentation to the Clients satisfaction.	Item	1		
TOTAL CARRIED FORWARD TO SUMMARY PAGE					
2	<u>BUILDING WORK</u>				
2.1	<u>CONCRETE PLINTH</u>				
2.1.1	Provide materials & cast a concrete plinth according to the specifications & drawings for Generator CAR20E/2018/001E	Item	1		
2.1.2	Provide materials & cast a concrete plinth according to the specifications & drawings for Changeover Kiosk CAR20E/2018/002E	Item	1		
2.1.3	Supply and Intall Clearview Fence with gate as per specification CAR20E/2018/003E Typical Clearview Fence Detail	Item	1		
2.2	Supply and install the following Kabelflex (HDPE) sleeves.				
2.2.1	Supply and install 110mmØ sleeves c/w bends etc for main supply cables	m	30		
	Supply	m	30		
	Install				
2.2.2	Cable sleeve seal				
	Supply	ea.	1		
	Install	ea.	1		
2.2.3	Galvanised steel draw wire				
	Supply	m	40		
	Install	m	40		
2.3	<u>TRENCHING</u>				
2.3.1	Cutting of concrete pavement or tar 300mm wide and breaking up of concrete or tar	m	30		
2.3.2	Allow for removal of rubble from site and reinstating once cable is installed.	m ³	3		
	Excavations for cables in trenches (450mm wide x 600mm deep)				
2.3.3	Excavate in normal earth	m	30		
2.3.4	Allow for Earth in above trench	m ³	10		
2.3.5	Allow for Soft Rock in above trench	m ³	3		
2.3.6	Allow for Hard rock in above trench	m ³	3		
TOTAL CARRIED FORWARD TO SUMMARY PAGE					

ITEM NO.	DESCRIPTION	UNIT	QTY	RATE	AMOUNT
3	<u>MECHANICAL INSTALLATION</u>				
3.1	<u>EMERGENCY STANDBY GENERATOR</u>				
3.1.1	Allow a provisional sum of R550 000.00 (Five Hundred and Fifty Thousand Rand only), for the supply and delivery of a complete 250 kVA outdoor emergency inside an IP65 canopy/container set on a concrete plinth as specified in generator specification, to be used in part or whole, per Engineers discretion.	Prov. Sum	1	R 550 000.00	R 550 000.00
	Allow for Profit and attendance on item 3.1.1 above Installation and commissioning on item 3.1.1 above	% No.	0.1		
3.1.2	New Kiosk incl. c/o, controller & modem as per drawing provided Supply Install	No. No.	1 1		
3.1.3	Label equipment as prescribed in the wiring code	Item	1		
3.1.4	Compilation of Maintenance, Operational and Technical Manuals to the	No.	1		
3.2	<u>GENERATOR EARTHING</u>				
3.2.1	Supply and install earthing system as per specification and as required by Regulations.	Item	1		
	TOTAL CARRIED FORWARD TO SUMMARY PAGE				
4	<u>ELECTRICAL INSTALLATION</u>				
	<u>EXISTING SUPPLY</u>				
4.1	Disconnect the existing supply cable and re-connect (where necessary).	Sum	1		
	<u>LOW VOLTAGE SUPPLY CABLES</u>				
	Supply and install the following 600/1000V PVC/SWA/PVC cables with copper conductors to Sabs 1507 laid vertically or horizontally in conduiting or ducting or direct in accordance with the specification and drawings including fixing, termination measured elsewhere				
4.2	70mm ² x 4 core PVC/PVCSWAPVC cable Supply Install Terminations	m m each	1 1 1		Rate Only Rate Only Rate Only
4.3	50mm ² x 4 core PVC/PVCSWAPVC cable Supply Install Terminations	m m each	40 40 2		
4.4	35mm ² bare copper earth wire Supply Install	m m	40 40		
4.5	100mm wide cable tray Supply Install	m m	20 20		
	TOTAL CARRIED FORWARD TO SUMMARY PAGE				

ITEM NO.	DESCRIPTION	UNIT	QTY	RATE	AMOUNT
5	<u>DISTRIBUTION BOARDS AND SWITCHGEAR</u> <u>EXISTING MAIN DISTRIBUTION BOARD</u>				
5.1	Trace incoming cable outgoing circuits including cable sizes	Item	1		
5.2	Supply and install earthing system as per specification and as required by Regulations.	Item	1		
5.3	Label distribution boards as prescribed in the wiring code	Item	1		
	Allow for the supply and installation of the following switchgear as per specification, and to the satisfaction of the engineer.				
5.4	200 - 400 amp TP MCCB - 15kA	each	3		
	Supply	each	3		
	Install				
5.5	Housekeeping, sundry items, consumable stocks such as circuit beads engraving, labels, painting etc.	Sum	1		
5.6	Testing of complete installation in terms of the regulations	Each	1		
5.7	Provide Certificates of Compliance	Sum	1		
	TOTAL CARRIED FORWARD TO SUMMARY PAGE				
6	<u>MISCELLANEOUS</u>				
6.1	Supply and install A82 padlocks	Item	1		
6.2	Supply set of Warning Notices as per SANS and OHS specifications.	Item	1		
6.3	<u>TEST AND COMMISSION</u> Testing and Commissioning of a fully operational generating set to the Client and Engineers satisfaction including all the necessary test reports, test equipment, fuel etc.				
6.3.1	At the suppliers premises, prior to delivery to site	Item	1		
6.3.2	On site after completion of the installation	Item	1		
6.4	Decommissioning and relocation of existing generator to a DOE facility within 100km from site per the Clients or Engineers instruction.	Prov. Sum	1		
6.5	THE FOLLOWING PRICE RANGES				
6.5.1	Up to R100,000	%			
6.5.2	From R100,001 up to R250,000	%			
6.5.3	From R250,001 Up to R400,000	%			
6.5.4	From R400,001 and above	%			
	TOTAL CARRIED FORWARD TO SUMMARY PAGE				

MVENYANE HIGH SCHOOL ELECTRICAL

PRICE SUMMARY ESTIMATE

<u>ITEM</u>	<u>DESCRIPTION</u>	<u>TOTAL AMOUNT</u>
Bill No. 1	PRELIMINARIES AND GENERAL	_____
Bill No. 2	BUILDING WORK	_____
Bill No. 3	MECHANICAL INSTALLATION	_____
Bill No. 4	ELECTRICAL INSTALLATION	_____
Bill No. 5	DISTRIBUTION BOARDS AND SWITCHGEAR	_____
Bill No. 6	MISCELLANEOUS	_____
Subtotal		_____
Contingencies (5%)		_____
Subtotal		_____
VAT (15%)		_____
	ELECTRICAL PRICE SUMMARY	_____
	TOTAL AMOUNT	=====

NAME OF FIRM:

TENDERER'S SIGNATURE

NAME IN PRINT

ADDRESS

.....

DATE

TEL. NO.

FAX NO.



DEPARTMENT OF EDUCATION MVENYANE HIGH SCHOOL

TENDER DOCUMENTS

SPECIFICATION FOR ELECTRICAL WORKS

TENDERER		
TELEPHONE/ FACSIMILE		

JUNE 2023

PREPARED BY:

Carifro Consulting Engineers
4 Belgrave Road
Southernwood
East London
5213

Contact Person: Thokozani Sibiya
Tel: 043 743 8266

Table of Contents

1. SECTION 1 – GENERAL.....	2
1.1. Intent of Specification	2
1.2. Standards and Codes	2
1.3. Compliance with Regulations	2
1.4. Scope of Work	2
1.5. Co-ordinating	3
1.6. Tests Certificates and Inspections.....	3
1.7. Operating and Maintenance Manuals.....	3
1.8. Guarantee	3
1.9. Materials and Workmanship	4
1.10. Brochures	4
1.11. Fence Specification	5
2. SECTION 2 – EQUIPMENT REQUIREMENTS	8
2.1. Engine.....	8
2.1.1. General	8
2.1.2. Rating.....	8
2.1.3. De-Rating.....	8
2.1.4. Starting and Stopping	8
2.1.5. Starter Battery.....	8
2.1.6. Cooling.....	9
2.1.7. Lubrication	9
2.1.8. Fuel Pump.....	9
2.1.9. Fuel Tank	9
2.1.10. Governor	10
2.1.11. Flywheel.....	10
2.1.12. Exhaust Silencer.....	10
2.1.13. Accessories.....	10
2.1.14. Exhaust emissions.....	10
2.2. Alternator	11
2.2.1. General	11
2.2.2. Regulation.....	11
2.2.3. Performance	11
2.2.4. Coupling.....	11
2.3. Switchboard	11
2.3.1. General	11
2.3.2. Construction.....	11
2.3.3. Protection and Alarm Devices	12
2.3.4. Modular Generator Set controller	13
2.3.5. Manual Starting.....	16
2.3.6. Battery Charging Equipment.....	16
2.3.7. Switchboard Instruments	17
2.3.8. Marking	17
2.3.9. Earthing.....	17
2.3.10. Operation Selector Switch	17
2.3.11. Automatic Change-over System	17
2.3.12. By-pass Switch and Main Isolator.....	18
2.3.13. Start Delay	18
2.3.14. Stop Delay	18
2.4. Installation.....	18
2.5. Warning Notices	18
2.6. Construction.....	19
2.7. Operation	19
3. SECTION 3 – TECHNICAL SPECIFICATION.....	21
3.1. General	21
3.2. Site Information and Conditions	21

3.2.1.	Location	21
3.2.2.	Site Conditions.....	21
3.3.	Output and Voltage.....	22
3.4.	Switchboard/Control Panel Unit.....	22
3.5.	Cables.....	22
3.6.	Engine.....	22
3.7.	Alternator	22
3.8.	Load Acceptance	22
3.9.	Enclosure	22
3.10.	Alarms.....	24
3.11.	Remote Control Generator Switch.....	24
3.12.	Fuel Drip Tray.....	24
3.13.	Completion Time.....	25
3.14.	Inform 25	
3.15.	Fuel Supply Tank.....	25
4.	SECTION 4 – SCHEDULES OF TECHNICAL INFORMATION	27
4.1.	Engine.....	27
4.2.	Alternator	29
4.3.	Switchboard	30
4.4.	Battery	31
4.5.	Dimensions	31
4.6.	Deviation from the Specification as an Alternative (State Briefly)	31
4.7.	Spare Parts and Maintenance Facilities	31
5.	SECTION 5 – PRICE SCHEDULES	33
5.1.	General	33
5.2.	Schedule.....	33
5.3.	Summary of Schedules of Quantities	33

SECTION 1 – GENERAL

TABLE OF CONTENTS

1.1.	Intent of Specification	2
1.2.	Standards and Codes	2
1.3.	Compliance with Regulations	2
1.4.	Scope of Work	2
1.5.	Co-ordinating	3
1.6.	Tests Certificates and Inspections.....	3
1.7.	Operating and Maintenance Manuals.....	3
1.8.	Guarantee	3
1.9.	Materials and Workmanship	4
1.10.	Brochures	4

1. SECTION 1 – GENERAL

1.1. Intent of Specification

The specification is intended to cover the complete installation and commissioning of the generator plant. The minimum equipment requirements are outlined, but do not cover all the details of design and construction. Such details are recognised as being the exclusive responsibility of the contractor.

For the purposes of this document the following applies:

- Generator Contractor shall be referred to as the Generator Contractor or simply Contractor;
- The masculine includes the feminine;
- The singular includes the plural.

1.2. Standards and Codes

All standards referenced shall be the latest editions.

SANS 10142-1	the wiring of premises: Low Voltage Installations
SANS 8528	Reciprocating internal combustion engine driven alternating current generating sets.
SANS 60034	Rotating electrical Machines
SANS IEC 60947	Low Voltage Switchgear
OHSACT	Occupational Health and Safety Act.
Department of Public Works	Quality Specification Parts A, B and C.
Local municipality by-laws	for generator installations. (To be obtained from local municipality)

1.3. Compliance with Regulations

The installation shall be erected and tested in accordance with the following Acts and regulations:

- a) The Occupational Health and Safety Act, 1993 (Act 85 of 1993) as amended,
- b) The Local Government Ordinance 1939 (Ordinance 17 of 1939) as amended and the municipal by-laws and any special requirements of the local supply authority,
- c) The Fire Brigade services Act 1987 (Act 99 of 1987) as amended,
- d) The National Building Regulations and Building Standards Act 1977 (Act 103 of 1977) as amended,
- e) The Electricity Act 1984 (Act 41 of 1984) as amended.
- f) The environmental Act and regulations

1.4. Scope of Work

Included in this Outdoor Generator Specification

Supply, delivery, installation and commissioning of the complete outdoor emergency generator inside an IP65 canopy/container set on a concrete plinth as specified in this document.

The successful tenderer shall supply, deliver and install a complete single enclosed diesel driven standby generator set in a position that will be determined on site. The machine shall be totally enclosed in a 3CR12 stainless steel housing powder coated or within 50km from the coast with grade 316 steel housing powder coated. The exhaust shall be manufactured from stainless steel.

The housing is to be provided on galvanized 3CR12 stainless steel skids so that the generator set can be transported to site and placed in position on a concrete plinth, casted by the successful tenderer. The skids must be of sufficient height to allow for the passage of storm water under the set.

1.5. Co-ordinating

The Contractor shall familiarise himself with the requirements of the other professional disciplines and shall examine the plans and specifications covering each of these sections.

The generator space, noise and vibration requirements shall be carefully checked with other professional disciplines to ensure that the equipment can be installed in the proper sequence in the space allotted.

1.6. Tests Certificates and Inspections

The following tests are to be carried out:

- a) At the supplier's premises, before the generating set will be delivered to site Representatives of the Department must be present during the test to satisfy themselves that the generating set complies with the specification and delivers the specified output. The test must be carried out in accordance with SANS 8528. The Representative/Agent must be timeously advised of the date for the test.
- b) After completion of the works and before practical completion is taken, a full test will be carried out on the installation for a period of sufficient duration to determine the satisfactory working thereof. During this period the installation will be inspected and the contractor shall make good, to the satisfaction of the Representative/Agent, any defects which may arise.
- c) The Contractor shall provide all instruments and equipment required for testing and any water, power and fuel required for the commissioning and testing of the installation at completion.
- d) Test reports of both tests as specified under (a) and (b) are to be submitted to the Representative/Agent.

The total costs for these test shall be included in the tendered amount.

In the event of the plant, equipment or installation not passing the test, the Representative/Agent shall be at liberty to deduct from the Contract amount all reasonable expenses incurred by the Employer and/or the Representative/Agent attending the test.

1.7. Operating and Maintenance Manuals

The Contractor shall be responsible for the compilation of a complete set of Operating and Maintenance manuals.

This shall be done in accordance with Section 4 – Operating and Maintenance manuals.

All information shall be recorded and reproduced in electronic format as well as supplying the Representative/Agent with three sets of hard copies.

Approval of the final Operating and Maintenance Manuals shall be a prerequisite for issuing of a Certificate of Practical Completion of the installation.

1.8. Guarantee

After works completion of the installation have been achieved, there will follow a 12-month free maintenance period.

During this period the generator contractor shall maintain the generator installation as per the requirements of the Occupational Health and Safety Act. This maintenance shall include systematic examinations, adjustments and lubrication of all generator equipment. Electrical and mechanical parts shall be repaired or replaced whenever it is required to maintain optimum performance without additional cost to the Department, unless the condition was caused by misuse or vandalism of the generator equipment or natural hazards/force majeure.

The work under this section shall be performed by competent, qualified accredited personnel under the supervision and in the direct employment of the Generator Contractor and shall not be transferred to any non-affiliated agent. Contract maintenance and repair work shall be done during normal working hours and shall further provide emergency call-back service twenty-four (24) hours a day, seven (7) days a week.

During the guarantee/maintenance period the Department will invite tenders for the comprehensive maintenance of the generator, which will commence after the final completion has taken place, i.e. after the twelfth month guarantee period is over and all defects are corrected.

1.9. Materials and Workmanship

- a) The work throughout shall be executed to the highest standards and to the entire satisfaction of the Representative/Agent who shall interpret the meaning of the Contract Document and shall have the authority to reject any work and materials, which, in his judgement, are not in full accordance therewith. All condemned material and workmanship shall be replaced or rectified as directed and approved by the Representative/Agent.
- b) All work shall be executed in a first-class manner by qualified accredited tradesman.
- c) The Contractor shall be fully responsible for his work and shall replace any of the work which may be damaged, lost or stolen. The Contractor shall protect the building and its contents against damage by him, his employees or sub-contractors and shall make good any damage thereto.
- d) The Contractor shall indemnify the Employer of all liability for damages arising from injuries or disabilities to persons or damage to property occasioned by any act or omission of the Contractor or any of his sub-contractors, including any and all expenses, legal or otherwise, which may be incurred by the Employer or Representative/Agent in the defence of any claim, action or suit.
- e) The Contractor shall warrant that the materials and workmanship shall be of the highest grade, that the equipment shall be installed in a practical and first-class manner in accordance with the best practices and ready and complete for full operation. It is specifically intended that all material or labour which is usually provided as part of such equipment as is called for and which is necessary for its proper completion and operation shall be provided without additional cost whether or not shown or described in the Contract Document.
- f) The Contractor shall thoroughly acquaint himself with the work involved and shall verify on site all measurements necessary for proper installation and commissioning work. The Contractor shall also be prepared to promptly furnish any information relating to his own work as may be necessary for the proper installation work and shall co-operate with and co-ordinate the work of others as may be applicable.
- g) The Contractor shall inspect and verify that the existing power feeder system is compatible with the equipment offered and any changes or upgrading of the electrical supply shall be brought to the attention of the Representative/Agent.
- h) Material and equipment damaged in transit shall be replaced with undamaged material without additional cost to the Department.
- i) All components and their respective adjustment, which do not form part of the equipment installation work, but influence the optimum and safe operation of the equipment shall be considered to form part of, and shall be included in the Contractor's scope of works.
- j) All control equipment and serviceable items shall be installed and positioned such that they will be accessible and maintainable.
- k) The Contractor shall make sure that all safety regulations and measures and environmental regulations are applied and enforced during the installation and guarantee period to ensure the safety of the public and the User Client.

1.10. Brochures

Detailed brochures of all equipment offered shall be presented together with the tender documents.

1.11. Fence Specification

All fences specified must be specified with either

- i. a coloured protective coating and not be a natural metal finish or
- ii. galvanized mild steel
- iii. Hot-dip galvanizing and Fusion-bond epoxy powder coating (or similar)

All gates should be manufactured by the same company as the fence to ensure an inclusive guarantee/warranty.

Class A Fencing shall be utilised, and adhere to the following but not limited to:

CLASS A	HIGH RISK AREAS
	SPECIFICATIONS
NOTE	<ul style="list-style-type: none"> • All steel material to be good commercial quality galvanised steel. • All posts shall be hot dip galvanised, continuous lengths with no joints in accordance with ISO 1461, minimum coating thickness shall be 70micron. Furnish moisture proof, corrosion resistant, end caps to posts. • Concrete works to be in accordance with the model preambles for graded 2008.
GENERAL	Performance equal to “ClearVu” mesh panel, “ClearVu” mesh panel underdig, “Cochrane Taper locking post” system. Manufacturer is Cochrane International.
HEIGHT	2400mm above finished ground level
POSTS	Mild steel hot dip galvanised and coated with e.g. “Marine Fusion Bond”. Post sealed with UV stabilised polymer cap at 3382mm centers maximum. Post shall include “locking recess mechanism) to secure panel edge.
FOUNDATIONS	To manufacturer’s specification
LATERAL SUPPORT	To manufacturer’s specification
MESH PANELS	2400mm high “ClearVu” mesh panel. Panel aperture size (center to center) 76.2mm x 12.7mm. 3.00mm diameter galvanised wire core diameter. Internal fixtures to be anti- vandal allowing for flush post and panel finish. All fixtures shall be to the inside of the fence line. Panels shall have a flush panel post finish with no climbing aid. Panel and fixtures to be galvanised and coated.
UNDERDIG	400mm deep ClearVu mesh panel. Mesh below ground is bitumen dipped.
ANTI CLIMB OVER PREVENTION	100mm high 2mm thick toughed steel “Castle” spike. Spike shall be hot dip galvanised and coated with e.g “Marine Fusion Bond coated”

	CORROSION PROTECTION	Galvanised and coated, with e.g. "Marine Fusion Bond coated"
	SWING GATES	All connections and joints to be welded to form rigid frames or assembled with corner fittings. Hinges shall not twist or turn under the action of the gate and shall be so arranged that the closed gate cannot be lifted off the hinges to obtain entry. The quality of the gate assembly must comply with that of the fence.
	SLIDING GATES	Gate frame fabrication and miscellaneous items shall be similar to swing gates. All fittings, brackets and rear wheel tracks shall be of standard manufactured products for the intended application. The quality of the gate assembly must comply with that of the fence.
	REQUIRED DOCUMENTS	10-year anti- corrosion guarantee. 12-month anti vandalism guarantee. Certificate of compliance for materials and coatings. Shop drawings for gates.
	COST	

SECTION 2 – EQUIPMENT REQUIREMENTS

TABLE OF CONTENTS

2.1.	Engine.....	8
2.1.1.	General.....	8
2.1.2.	Rating.....	8
2.1.3.	De-Rating.....	8
2.1.4.	Starting and Stopping.....	8
2.1.5.	Starter Battery.....	8
2.1.6.	Cooling.....	9
2.1.7.	Lubrication.....	9
2.1.8.	Fuel Pump.....	9
2.1.9.	Fuel Tank.....	9
2.1.10.	Governor.....	10
2.1.11.	Flywheel.....	10
2.1.12.	Exhaust Silencer.....	10
2.1.13.	Accessories.....	10
2.1.14.	Exhaust emissions.....	10
2.2.	Alternator.....	11
2.2.1.	General.....	11
2.2.2.	Regulation.....	11
2.2.3.	Performance.....	11
2.2.4.	Coupling.....	11
2.3.	Switchboard.....	11
2.3.1.	General.....	11
2.3.2.	Construction.....	11
2.3.3.	Protection and Alarm Devices.....	12
2.3.4.	Modular Generator Set controller.....	13
2.3.5.	Manual Starting.....	16
2.3.6.	Battery Charging Equipment.....	16
2.3.7.	Switchboard Instruments.....	17
2.3.8.	Marking.....	17
2.3.9.	Earthing.....	17
2.3.10.	Operation Selector Switch.....	17
2.3.11.	Automatic Change-over System.....	17
2.3.12.	By-pass Switch and Main Isolator.....	18
2.3.13.	Start Delay.....	18
2.3.14.	Stop Delay.....	18
2.4.	Installation.....	18
2.5.	Warning Notices.....	18
2.6.	Construction.....	19
2.7.	Operation.....	19

2. SECTION 2 – EQUIPMENT REQUIREMENTS

2.1. Engine

2.1.1. General

The engine must comply with the requirements laid down in SANS 8528 and must be of the atomized injection, compression ignition type, running at a speed not exceeding 1500 r.p.m. The engine must be amply rated for the required electrical output of the set, when running under the site conditions. The starting period for either manual or automatic switching-on until the taking over by the generating set, in one step, of a load equal to the specified site electrical output, shall not exceed 15 seconds. This must be guaranteed by the Tenderer.

Turbo-charged engines will only be accepted if the Tenderer submits a written guarantee that the engine can deliver full load within the specified starting period.

Curves furnished by the engine makers, showing the output of the engine offered against the speed, for both intermittent and continuous operation as well as fuel consumption curves when the engine is used for electric generation, must be submitted with the Tender.

2.1.2. Rating

The set shall be capable of delivering the specified output continuously under the site Conditions, without overheating. The engine shall be capable of delivering an output of 110% of the specified output for one hour in any period of 12 hours consecutive running in accordance with SANS 8528.

2.1.3. De-Rating

The engine must be de-rated for the site conditions as set out in the Technical Specification, Section 3 of this document.

The de-rating of the engine for site conditions shall be strictly in accordance with SANS 8528 as amended to date. Any other methods of de-rating must have the approval of the Department and must be motivated in detail. Such de-rating must be guaranteed in writing and proved by the successful Tenderer at the site test.

2.1.4. Starting and Stopping

The engine shall be fitted with an electric starter motor and be easily started from cold, without the use of any special ignition devices under summer as well as winter conditions.

Tenderers must state what arrangements are provided to ensure easy starting in cold weather. Full details of this equipment must be submitted. In the case of water cooled engines, any electrical heaters shall be thermostatically controlled. The electrical circuit for such heaters shall be taken from the control panel, and must be protected by a suitable circuit breaker.

2.1.5. Starter Battery

The set must be supplied a fully charged lead-acid type or maintenance free type battery, complete with necessary electrolyte. The battery must have sufficient capacity to provide the starting torque stipulated by the engine manufacturer. The battery capacity shall not be less than 120 Ah and shall be capable of providing three consecutive start attempts from cold and thereafter a fourth attempt under manual control of not less than 20 seconds duration each. The battery must be of the heavy duty "low maintenance" type, housed in a suitable battery box.

2.1.6. Cooling

The engine may be either of the air or water cooled type. In the case of water-cooling, a built-on heavy duty, tropical type pressurised radiator must be fitted. Only stand-by sets that are water cooled shall have electric heaters.

For either method of cooling, protection must be provided against running at excessive temperatures. The operation of this protective device must give a visual and audible indication on the switchboard. Water-cooled engines shall in addition be fitted with a low water cut-out switch, installed in the radiator, to switch the set off in the event of a loss of coolant. The protection shall operate in the same way as the other cut-outs (e.g. low oil pressure). All air ducts for the cooling of the engine are to be allowed for. The air shall be supplied from the cooling fan cowling/radiator face to air outlet louvers in the enclosure.

2.1.7. Lubrication

Lubrication of the main bearings and other important moving parts shall be by forced feed system. An automatic low oil pressure cut-out must be fitted, operating the stop solenoid on the engine and giving a visible and audible indication on the switchboard.

2.1.8. Fuel Pump

The fuel injection equipment is suitable for operation with the commercial brands of diesel fuel normally available in South Africa.

2.1.9. Fuel Tank

The fuel tank shall be an integral part of the base frame of the generator set. The tank shall have sufficient capacity for standby sets to run the engine on full load for a period of 6 hours.

The diesel fuel storage system / tank which will be provided with the standby generator installation must be fitted with a fuel filtration and water separation system (filter & separator) which is entirely separate from the fuel supply line and line filter to the engine. This filtration and water separation system must be dedicated to purifying the content of the storage system / tank by way of the cleaning processes which are applied while circulating the fuel through the filter & separator unit.

The filtration system must be able to handle diesel fuel of "high" and of "low" sulphur content for an indefinite period. The suction line of the system must be connected to the lowest part of the storage system / tank. The return line must be connected in the top section of the storage system / tank in such a position and in such a way that the flow of fuel within the storage system / tank between the fuel return point and the fuel suction point will induce scouring of the bottom of the system / tank to effectively capture sediment and water in the to be filtered fuel.

The filtration unit must filter the diesel fuel, removing suspended particles of effective diameters down to 5 micron. In addition, it must separate all water from the fuel and the fuel storage system and automatically dispose of / dump such water into an open, removable receptacle for disposal at the installation or in a suitable position outside the building. Separation of the fuel and water must be sufficiently effective that the discharged water will meet the standard required for it to be disposed of into a municipal drain and sewer system.

The filter and water separator unit must draw its power from the DC batteries used to power the relevant generator set. The circulating pump shall be provided with a controller programmed to switch the pump through not more than three complete on and off cycles of equal time (i.e. 50% on; 50% off) , per hour, with a deviation of not more than 10 % ±. The pump must be capable of a duty cycle of not less than 60% running time. The flow rate through the circulating pump must be between 1 L/min and 1.25 L/min.

The filter cartridge of the filter and water separator unit must be replaceable, and, in normal operational conditions, not require replacement within periods shorter than three months. The replacement units must be readily available.

The filtration & separator system may be mounted against the wall of the plant room or on the inside of a container, which may house the installation as may be specified elsewhere in this document.

The tank shall be fitted with a suitable filter, a full height gauge glass, "low fuel level" alarm, giving an audible and visible signal on the switchboard as well as a low-low fuel level cut-out.

An electrically operated pump with sufficient length of oil resistant hose to reach 2m beyond the door of the canopy/container, shall be supplied, for each set for filling the fuel tank/s from 200 litre drums.

The interconnection fuel piping shall consist of copper tubes and the connection to vibrating components shall be in flexible tubing with armoured covering.

The contractor shall allow for the supply and installation of a fuel shut off fusible link in the container. The fusible link shall shut off the fuel at a temperature of 130 degrees in an event of a fire in the self-contain enclosure. The fusible link shall be mounted above the engine and coupled to the shut off valve by means of a 2mm stainless steel cable. The cable shall be installed to the shut off valve without any possibility of kinking the cable which may cause malfunctioning of the protection device.

2.1.10. Governor

The speed of the engine shall be controlled by a governor in accordance with ECM of SANS 8528 if not otherwise specified in the Detailed Specification.

The permanent speed variation between no load and full load shall not exceed 4.5% of the nominal engine speed and the temporary speed variation shall not exceed 10%. External facilities must be provided on the engine, to adjust the nominal speed setting by $\pm 5\%$ at all loads between zero and rated load.

2.1.11. Flywheel

A suitable flywheel must be fitted, so that lights fed from the set will be free from any visible flicker.

The cyclic irregularity of the set must be within the limit laid down in SANS 8528.

2.1.12. Exhaust Silencer

It is essential to keep the noise level as low as possible. An effective exhaust silencing system of the residential type must be provided and shall be capable of providing 20 to 30 decibels of suppression.

The exhaust system shall consist of 3CR12 steel for inland areas (greater than 50km from the coast) or Grade 304 stainless steel in coastal areas.

The exhaust pipe shall be installed in such a way that the expelled exhaust fumes will not cause discomfort to the public. The exhaust pipe must be flexibly connected to the engine to take up vibrations transmitted from the engine, which may cause breakage. The exhaust piping and silencer shall be lagged and then cladded in stainless steel sheet to reduce the heat and noise transmission in the generator enclosure and shall be protected against the ingress of driving rain at 45° to the horizontal. The exhaust pipe must extend 0,5m above the canopy.

2.1.13. Accessories

The engine must be supplied complete with all accessories, air and oil filters, 3 instruction manuals, spare parts lists, the first fill of all lubricating oils, fuel, etc.

2.1.14. Exhaust emissions

The exhaust emissions shall comply with US Tier III/EU stage III standards.

2.2. Alternator

2.2.1. General

The alternator shall be of the self-excited brushless type, with enclosed ventilated drip-proof housing and must be capable of supplying the specified output continuously with a temperature rise not exceeding the limits laid down in SANS 60034-1 for rotor and stator windings.

The alternator shall be capable of delivering an output of 110% of the specified output, for one hour in any period of 12 hours consecutive running.

Both windings must be fully impregnated for tropical climate and must have an oil resisting finishing varnish.

2.2.2. Regulation

The alternator must preferably be self-regulated without the utilisation of solid state elements. The inherent voltage regulation must not exceed plus or minus 5% of the nominal voltage specified, at all loads with the power factor between unity and 0,9 lagging and within the driving speed variations of 4,5% between no-load and full load.

2.2.3. Performance

The excitation system shall be designed to promote rapid voltage recovery following the sudden application of the load. The voltage shall recover to within 5% of the steady state within 300 milliseconds following the application of full load and the transient voltage dip shall not exceed 18%.

2.2.4. Coupling

The engine and alternator must be directly coupled by means of a high quality flexible coupling, ISO 9001:2000 approved and must be designed and manufactured to this quality system.

2.3. Switchboard

2.3.1. General

A switchboard must be supplied and installed to incorporate the equipment for the control and protection of the generating set and battery charging.

The switchboard must conform the specification as set out in the following paragraphs.

2.3.2. Construction

The switchboard shall be enclosed in the steel enclosure.

All equipment, connections and terminals shall be easily accessible from the front. The front panels may be either hinged or removable and fixed with studs and chromium-plated cap nuts. Self-tapping screws shall not be used in the construction of the board.

All pushbuttons, pilot lights, control switches, instrument and control fuses, shall be mounted on hinged panels with the control wires in flexible looms.

The steelwork of the boards must be thoroughly de-rusted, primed with zinc chromate and finished with two coats of signal red quality enamel, or a baked powder epoxy coating.

Suitably rated terminals must be provided for all main circuits and the control and protection circuits. Where cable lugs are used, these shall be crimped onto the cable strands. Screw terminals shall be of the type to prevent spreading of cable strands. All terminals shall be clearly marked.

For the control wiring, each wire shall be fitted with a cable or wire marker of approved type, and numbering of these markers must be shown on the wiring diagram on the switchboard. Control wiring shall be run in PVC trunking. The trunking shall be properly fixed to the switchboard steelwork. Adhesives shall not be acceptable for the fixing of trunking or looms.

The modular generator set controller and protection equipment shall be mounted on a separate easily replaceable panel.

All equipment on the switchboard, such as contactors, isolators, busbars, etc., shall have ample current carrying capacity to handle at least 110% of the alternator full load current.

Access to the cubicle will be such that all components can be conveniently reached for testing and maintenance purposes.

The necessary bushes and a screen over the terminals will be provided where the power feeds enter and leave the cubicle.

The cubicle will be so constructed that the ac and dc components are screened from one another.

2.3.3. Protection and Alarm Devices

All switchboards shall be equipped with protection and alarm devices as described below.

A circuit breaker and an adjustable current limiting protection relay must be installed for protection of the alternator. The protection relay shall be of the type with inverse time characteristics. The relay shall cause contactor to isolate the alternator and stop the engine.

Protection must be provided for overload, high engine temperature, low lubricating oil pressure, over speed, start-failure, and low water level.

Reset push buttons are required on the modular generator set controller and a visible signal are required and the engine must stop when any of the protective devices operate. In the case of manual operation of standby sets, it shall not be possible to restart the engine.

The indication on the modular generator set controller must be in ENGLISH.

"OVERLOAD"
"TEMPERATURE HIGH"
"OIL PRESSURE LOW"
"OVERSPEED"
"START FAILURE"
"LOW WATER LEVEL"

In addition an audible and visible flashing signal shall be provided, when:

- a) The fuel level in the service tank is low. The indication on the modular generator set controller shall be "FUEL LOW".
- b) The battery charger failed. The indication on the modular generator set controller shall be "CHARGER FAIL"

A low-low level sensor must be provided. At this level the engine must stop to prevent air entering the fuel system.

This is also applicable to the engine driven generator/alternator.

All alarm conditions must operate an alarm hooter. A pushbutton must be installed in the hooter circuit to stop the audible signal, but the fault indicating light on the control panel must remain lit until the fault has been rectified.

An on/off switch is not acceptable. After the hooter has been stopped, it must be re-set automatically, ready for a further alarm.

The hooter must be of the continuous duty and low consumption type. Both hooter and protection circuits must operate from the battery.

Potential free contacts from the alarm relay must be brought down to terminals for remote indication of alarm conditions.

A test pushbutton must be provided to test all indicators lamps.

2.3.4. Modular Generator Set controller

The modular generator set controller shall be an electronic unit to match those of the other modular generator set controllers and of a high quality i.e. Levato, Deep Sea Electronics, Circom. It must be provided with IO and communication facilities.

The modular generator set controller will be supplied with all its functions and shall be mounted on a separate easily replaceable panel with plug in termination blocks for easy installation and replacement.

The modular generator set controller interface will be implemented with relays, contactors etc.

The modular generator set controller will have a mimic display of the alternator/mains/ change over contactors configuration with LED's showing the status of the mains, alternator and change over contactors.

Configuration software shall be supplied with the system. The software will be capable of the following:

- Fault management (event log)
- Configuration management (software upgrades and function changes)
- Account management (energy management)
- Performance management (generator set point changes)
- Security management (passwords)

The modular generator set controller will have a standard RS 232/485 or Ethernet interface suitable for TCP I/P transport medium. All communication including configuration management will be done through this port. Equipment connected at each end of the RS 232 or Ethernet cable shall be adequately protected against transient over-voltages, lightning effects (particularly if the set and remote alarms are in separate buildings), switching surges, power system surges or mains and alternator borne noise/interference.

The controller will incorporate the following functions:

- Mains sensing
- Alternator output-voltage sensing
- Alternator over- frequency sensing
- Control of processor unit (self-diagnostics)
- Alarm/ Status indications
- Control selector and operation
- Phase rotation monitor

A 4- position control selector on the controller will be provided to facilitate the following modes of operation:

- OFF: Diesel/ alternator generator set switched off
- MANUAL: Mains bypassed: Diesel/ alternator will not take load

- AUTO: Diesel /alternator takes load on mains failure
- TEST: Diesel /alternator takes load on mains failure
- A standby failure alarm (SF) will be given on the controller and to the output alarms when “Not in Auto” is selected.

The modular generator set controller must monitor the following

When the voltage of the incoming mains varies by more than a pre-program value (default +- 10%) from the normal voltage on any phase, the controller will signal that the incoming mains will be disconnected and the engine-starting sequence initiated.

When the frequency of the incoming mains varies by more than pre- program value (default +-5%) from the normal frequency, the controller will signal that the incoming mains will be disconnected and the engine-starting sequence initiated.

Upon restoration of the incoming mains to the pre-program value (default +-10%) of the normal voltage on all phases, the monitor will signal that the load will be disconnected from the alternator and reconnected to the incoming mains.

If the alternator has been disconnected from the load and the incoming mains within the voltage limits of +- 10% on all phases, the controller will signal that the load will be reconnected to the incoming mains.

Should the incoming mains fail or not in the specified limits while the engine is running under control of the cooling-off timer, the control for the cooling –off timer in the controller will be cancelled and the load connected to the alternator.

When the output voltage of the alternator varies by more than the pre-program value (default value +- 10 %) on ANY phase, the controller will signal that the load will be disconnected from the alternator and the engine stopped.

A software over and under-frequency monitor will be provided in the controller if the frequency exceeds or drop below pre-programmed values. It will meet the requirements of class G2 governing. The monitor will not be influenced by harmonics.

Note: Software monitors will include adjustable overshoot and undershoot timers to be fully compatible with Class G2 governing.

All timers will be implemented in software.

Incoming supply failure timer

It is essential that incoming supply failures, occurring at short intervals, do not cause a series of starts and stops.

A timer adjustable from 1 s to 10 s required

The timer default value will be generator set to 3 s

The signal generated by the mains voltage monitor will start the timer. If the duration of the signal is less than the generator setting on the timer, the signal is suppressed so that the switching and starting sequence is initiated. However, if the duration of the signal is more than the generator setting on the timer, the signal will be transmitted to initiate the switching and starting sequence.

Incoming supply restoration timer

It is essential that incoming supply failures, occurring at short intervals, do not cause a series of starts and stops.

A timer adjustable from 1 s to 10 s required.

The timer default value will be generator set to 3 s.

The signal generated by the mains voltage monitor will start the timer. If the duration of the signal is less than 150 sec, the signal is suppressed and the timer is regenerated. However, if the duration of the signal is more than 150 sec, the signal will be transmitted to initiate the switching sequence.

Alternator supply/ incoming supply change-over timer

It is essential that the supply be disconnected from the load before the incoming supply is reconnected to the load. This will be software generator settable in the controller with a minimum of 5 seconds and maximum of 20 seconds.

On receipt of the switching signal, the alternator supply will be disconnected from the load and timer started. After 5 sec, the incoming supply will be reconnected to the load.

Engine cooling-off timer

After the load has been transferred to the incoming supply the engine will run without load for a period to cool off and then stop.

A timer, software adjustable in the controller from 5 to 10 min is required.

Repeat- start control

A repeat- start control is required in the controller software adjustable so that in the event of the engine failing to start on the first start attempt, the starter motor will be released and repeat the start attempt.

The repeat-start attempt will be repeated 3 times.

The duration of each start attempt will be 6 sec with a period of 15 sec between successive start attempts.

Should the engine fail to start after the third start attempt, the controller will transmit a signal for alarm purposes.

In addition to the requirement for the switchboard instruments listed elsewhere in this document metering will also form part of the modular generator set controller and must be accessible on the software.

The modular generator set controller shall display the following alarm/status indications:

- High engine temperature.
- Low Oil pressure
- High/low alternator output voltage
- Over and under speed (frequency)
- Low water level
- Emergency stop activated
- Mains fail
- Battery charger fail
- Dummy load in operation (When provided)
- Unit not in Auto
- Engine running
- Low fuel alarm
- Engine start failure

Conditions one to six above will stop the engine.

The Contractor shall provide a remote alarm mimic panel and the associated control wiring for the set. The panel shall be installed in the duty/security room at the entrance to the building approximately 70m from the generator set position.

The mimic panels must fit into furniture and blend with the design. Before manufacture, the Contractor shall submit and obtain the approval, from the Engineer, for the mimic panel.

The remote alarm must have potential free relay contacts which shall indicate the following on each set:

- 1) Mains on/off
- 2) Alternator running
- 3) Common fault alarm
- 4) Buzzer which can only be reset at the generator panel
- 5) Fuel low

The cable between the remote alarms is to be a signal cable with a screen and this option must be able to operate from a 12 / 24 V dc supply so that it can be powered from the generator set batteries.

A facility to originate a fault message should a warning or shutdown fault occur.

A facility to allow the mode of the control system to be changed to any of the four modes to allow the set to be run from a remote location.

A facility to originate a call to the control cellular and to transfer a fault message should a warning or shutdown fault occur. The alarm conditions above from the controller will be extended to four relays with a make and break contact and terminal strip to allow for remote monitoring of the following alarms:

- Mains fail
- Standby run
- Standby fail
- Low Fuel

A remote start facility must be supplied, software controllable in the controller.

All events relating to the status of the generator set shall be logged with date and time in a non-volatile memory (which can retain information for a period of 6 months in the absence of power to the controller) and the user shall be able to contain a hard copy on site.

The modular generator set controller system must be able to operate with a minimum DC supply voltage of 4 volts (without making use of either an internal or an external auxiliary battery) to allow cranking and starting under conditions of low battery capacity. Control cables between the set and the control panel shall be fitted with sockets for ease of undoing in the event the modular generator set controller has to be removed.

2.3.5. Manual Starting

Each switchboard shall be equipped with two pushbuttons marked "START" and "STOP" for manual starting and stopping of the set.

2.3.6. Battery Charging Equipment

Each switchboard shall be equipped with battery charging equipment.

The charger shall operate automatically in accordance with the state of the battery and shall generally consist of an air-cooled transformer, a full wave solid state rectifier, and the necessary automatic control equipment of the constant voltage system.

The charger must be fed from the mains. An engine driven alternator must be provided for charging the battery while the set is operational. Failure of this alternator must also activate the battery charger failure circuit.

The starter battery voltage will be software monitored by the modular generator set controller. The voltage will be digitally displayed.

2.3.7. Switchboard Instruments

Each generating set shall have a switchboard equipped as follows:

- a) One flush square dial voltmeter, reading the alternator voltage, scaled as follows:
 - (i) 0-300V for single phase generators.
 - (ii) 0-500V for three phase generator. In this case a six position and off selector switch must be installed for reading all phase and phase to neutral voltages.
- b) A flush square dial combination maximum demand and instantaneous ampere meter for each phase, with resettable pointer suitably scaled 20% higher than the alternator rating. A red arc stripe above scale markings from 0-20A and a red radial line through the scale at full-load current, shall be provided. This instruments shall be supplied complete with the necessary current transformer.
- c) One flush square dial vibrating type frequency meter, indicating the alternator frequency.
- d) A six digit running hour meter with digital counter, reading the number of hours the plant has been operating. The smallest figure on this meter must read 1/10 hour.
- e) Fuses or m.c.b.'s for the potential voltage circuits of the meters.
- f) One flush square dial ampere meter suitably scaled for the battery charging current.
- g) One flush square dial voltmeter with a spring loaded pushbutton or switch for the battery voltage.

2.3.8. Marking

All labels, markings or instructions on the switchgear shall be in English.

2.3.9. Earthing

An earth bar must be fitted in the switchboard, to which all non-current carrying metal parts shall be bonded.

The neutral point of the alternator must be solidly connected this bar by means of a removable link labelled "EARTH". Suitable terminals must be provided on the earth bar for connection of up to three earth conductors, which will be supplied and installed by others.

2.3.10. Operation Selector Switch

A four position selector switch must be provided on the switchboard marked "AUTO", "MANUAL", "and TEST" and "OFF".

With the selector on "AUTO", the set shall automatically start and stop, according to the mains supply being available or not.

With the selector on "TEST", it shall only be possible to start and stop the set with the pushbuttons, but the running set shall not be switched to the load.

With the selector on "MANUAL", the set must take the load when started with the pushbutton, but it must not be possible to switch the set on to the mains, or the mains onto the running set.

With the selector on "OFF", the set shall be completely disconnected from the automatic controls, for cleaning and maintenance of the engine.

2.3.11. Automatic Change-over System

A fully automatic change-over system must be provided to isolate the mains supply and connect the standby set to the outgoing feeder in case of a mains failure and reverse this procedure on return of the mains.

The contactors for this system must be electrically and mechanically interlocked.

2.3.12. By-pass Switch and Main Isolator

The switchboard shall be equipped with an on-load isolator to isolate the mains and a manually operated on-load 4 pole 4 position by-pass switch, which shall switch the connected loads as follows:

NORMAL: will allow for the normal connection i.e. connects the incoming mains to the Automatic control gear or directly to the outgoing feeder.

In the GEN BY-PASS position the switch will disconnect the automatic changeover control gear, and will connect the municipal mains directly to the essential supply busbar which will allow for the maintenance of either or both the generator and the automatic changeover equipment.

MAINS BY-PASS switching position would allow the generator to be connected directly to the essential supply busbar. This is when there is a problem with the automatic changeover equipment and there is no municipal power available.

The final position is an OFF position which will remove all power downstream of this switch.

It is required that this by-pass switch and mains isolator be mounted away from the automatic control gear, in a separate compartment, either on the side or in the lower portion of the switchboard cubicle, and that the switches are operated from the front of the compartment.

Contractor to note: The by-pass and mains isolator switch shall also break the main neutral.

2.3.13. Start Delay

Starting shall be automatic in event of a mains failure. A 0-15 second adjustable start delay timer shall be provided to prevent start-up on power trips or very short interruptions.

2.3.14. Stop Delay

A stop delay with timer is required for the set, to keep the set on load for an adjustable period of one to sixty seconds after the return of the mains supply, before changing back to the supply. An additional timer shall keep the set running for a further adjustable cooling period of 5 to 10 minutes at no-load before stopping.

2.4. Installation

Except for the supply of the incoming mains cable and outgoing feeder cables, the tenderer must include for the complete installation and wiring of the plant in running order, including the connection of the incoming cable and outgoing feeder cables.

The connecting of the cable and control cabling to the generator and the control terminals in the LV board remains the responsibility of the tenderer.

2.5. Warning Notices

Notices, in English, must be installed on the outside of the steel enclosure.

The successful tenderer must consult the Occupational Health and Safety Act 83 of 1993 and get approval of the wording from the Department's representative, prior to ordering the notices.

The notice shall be made of a non-corrodible and non-deteriorating material, preferable plastic, and must read as follows:

DANGER: This engine will start without notice. Turn selector switch on control board to "OFF" before working on the plant.

An engraved label shall be installed next to the fuel cap that indicates the following:

- Base Tank Capacity
- Bulk Tank Capacity (if provided)
- Full load litres per hour consumption

2.6. Construction

The engine and alternator of the set shall be built together on a common frame, which must be mounted on a skid base on anti-vibration mountings. The set must be placed inside an IP65 canopy/container. A drip tray must be fitted under the engine. The tray must be large enough to catch a drip from any part of the engine.

The frame must be of the 'DUPLEX' type.

2.7. Operation

The set is required to supply the lighting and power requirements in the case of a mains power failure.

The set shall be fully automatic i.e. it shall start when any one phase of the main supply fails or get switched and shall shut down when the normal supply is re-established. In addition it shall be possible to manually start and stop the set by means of pushbuttons on the switchboard.

The automatic control shall make provision for three consecutive starting attempts. Thereafter the set must be switched off, and the start failure relay on the switchboard must give a visible and audible indication of the fault.

To prevent the alternator being electrically connected to the mains supply when the mains supply is on and vice versa, a safe and fail proof system of suitably interlocked contactors shall be supplied and fitted to the changeover switchboard.

SECTION 3 – TECHNICAL SPECIFICATION

TABLE OF CONTENTS

3.1.	General	21
3.2.	Site Information and Conditions	21
3.2.1.	Location	21
3.2.2.	Site Conditions.....	21
3.3.	Output and Voltage.....	22
3.4.	Switchboard/Control Panel Unit.....	22
3.5.	Cables.....	22
3.6.	Engine.....	22
3.7.	Alternator	22
3.8.	Load Acceptance	22
3.9.	Enclosure.....	22
3.10.	Alarms.....	24
3.11.	Remote Control Generator Switch.....	24
3.12.	Fuel Drip Tray	24
3.13.	Completion Time.....	25
3.14.	Inform	25
3.15.	Fuel Supply Tank.....	25

3. SECTION 3 – TECHNICAL SPECIFICATION

3.1. General

Supply, deliver, install, commission, test and maintain an emergency generating set at Mvenyane High School, Mvenyane A/A, Msukeni Location, Rural Cedarville, 4720

This installation must comply fully with all the sections and drawings of this document. This technical specification is supplementary to the Equipment Requirements, Section 2, and must be read together where they are at variance the Technical Specification shall apply.

Supply, delivery, installation and commissioning of the complete outdoor emergency generator set inside an IP65 canopy/container on a concrete plinth as specified in this document and indicated on the drawings.

Concrete plinth to be provided as per drawing

- CAR20E/2018/001E Generator Set Typical Plinth
- CAR20E/2018/002E Changeover Kiosk Typical Plinth

The surface of the concrete plinth shall be 50mm higher than the existing ground level. The thickness and strength of the plinth shall be designed by the consulting engineer and are detailed on the drawings.

A tap to be provided to drain all the water that accumulates inside the bund wall. Final position of the tap will be determined on site. It is the engineer's responsibility to ensure plinth design complies with generator dimensions and weights. The bund wall shall contain 110% of the fuel, oil and water capacity of the generator. The bund wall shall not constrain the canopy doors from opening completely.

The contractor shall install an earthing system in the concrete plinth. The contractor shall install two (2) earth studs 1.8 meters long on opposite corners of the concrete plinth into the ground. The earth studs shall be connected by means of a 70mm² bare copper earth wire to the main earth bar in the control panel. The earth conductor shall be connected to the earth bar, canopy, bass, skid and earth bar by means of suitably crimping lugs and brass bolts.

Note: *The generator set scope may be reduced or omitted partially or in its entirety from the scope of works, per the Engineers discretion.*

3.2. Site Information and Conditions

3.2.1. Location

The site is at -30.54504, 29.02111

3.2.2. Site Conditions

The following site conditions will be applicable and equipment shall be suitably rated to develop their assigned rating and duty at these conditions.

- | | |
|---|--------------|
| a) Height above sea level | : 1121 Meter |
| b) Maximum ambient temperature | : 21.84°C |
| c) Maximum ambient humidity at lowest temperature | : 69.9 % |

3.3. Output and Voltage

After the de-rating factors for the engine and generator due to site conditions have been taken into account, the set must have a site output and voltage as follows: -

No load voltage	:	400/230 Volt
Rating	:	250kVA
Power at 0.9 power factor	:	225kW
Frequency	:	50Hz
Fault Level	:	Existing

The generating set is required to feed 100% of the existing electrical load:

3.4. Switchboard/Control Panel Unit

All switch- and control gear shall be rated for the existing fault current level.

The switchboard/control panel unit shall be enclosed in the IP65 canopy/container.

3.5. Cables

The contractor will be responsible for all electrical cable connections associated with the complete generating set installation.

The following cables will be supplied, installed and terminated at the Switchboard by others. Adequate provision shall be made for the termination of these cables at the Switchboard:

DB fed	PVC PVC SWA PVC Cable	50mm ²
--------	-----------------------	-------------------

3.6. Engine

A sump drainpipe must be fitted with a shut-off valve placed in a convenient position outside the base frame to facilitate drainage.

Recommended oil types must be indicated on the engine, or base frames, by means of suitable labels.

All engine instruments shall have clear markings on the faceplates, indicating the normal operating zone(s), maximum and minimum allowable values/limits and danger zone(s).

The flywheel shall be covered by approved hoods.

3.7. Alternator

The Alternator shall be of the low harmonic type.

3.8. Load Acceptance

The generator set shall be capable of accepting 75% of the specified site electrical output 10 seconds after the starter motor is energised and the remaining 25%, 5 seconds thereafter, i.e. 100% load acceptance shall not exceed 15 seconds.

3.9. Enclosure

The standby set is a free standing unit and shall be mounted in an enclosure as detailed below:-

3.9.1 General

The enclosure, shall be completely vermin-proof, powder coated and shall be constructed of 3CR12 stainless steel or within 50km from the coast with grade 316 steel housing of a minimum thickness of ± 1.5 mm.

The enclosure shall allow easy access to the engine, alternator, radiator filler cap and control cubicle for maintenance purposes.

The door shall be flush with the rest of the canopy and of the side opening type. A minimum of four doors are required i.e. two on either side.

The door hinges and locking bars shall be of a heavy duty type and be manufactured of 3CR12 stainless steel or within 50km from the coast with grade 316 steel and shall be fitted with a grease nipple.

The doors and panels shall be suitably braced and stiffened to ensure rigidity and to prevent bending and warping.

Suitable door restraints shall be fitted to all the doors, enclosure including the control panel to prevent wind damage. The restraint shall consist of a steel rod in a steel groove or slide with a spring loaded catch, which is to be manually reset to close the door.

No flexible restraints will be accepted.

The diesel fuel level indicator and alternator rating plate shall be clearly visible with the doors open.

Unless specified the silencers shall be mounted within the enclosure.

Perforated sheeting shall be fitted over all the insulating material inside the canopy of all soundproof sets.

Rubber seals on doors shall be equal to or similar to rubber pinch weld, wind lace.

9.2 Design

The enclosure shall be designed to be weather-proof and sound-proofing as specified. Rivets or self-tapping screws will under no circumstances be allowed for fixing the various sections of the enclosure. Only cadmium coated nuts and bolts are acceptable.

9.3 Roof

The roof of the enclosure shall be constructed for proper drainage of water as per the drawing.

9.4 Lamp fitting

A lamp fitting and it's associated on/off door switch shall be provided inside the enclosure for illumination of the control panel. The power for the lamp shall be obtained from the starter battery.

9.5 Sound-proofing

The sound-proofing on canopy engine sets shall be such that the maximum noise level generated by the set under any load condition shall not exceed 65 dB measured in any direction at a distance of 5m from the centre of the set with the doors closed.

The supply and discharge air paths will require separate attenuators on soundproof sets.

9.6 Padlock and keys

The contractor shall supply padlocks and keys for all the doors of the enclosure. The padlock shall be off the "Viro A82 keyed alike with stainless steel shackles" type.

Suitable brass metal plates shall be installed behind each lock for the protection of the enclosure against scratching or damaging, where the locks are hanging.

3.10. Alarms

The successful tenderer must pay particular attention to the requirements of the alarms as described in the Equipment Requirements, Section 2.

One alarm hooter and red light shall be supplied and installed on the outside of the generator container in a position as indicated by the Department's Representative.

The hooter shall consist of an electronic unit similar and equal to a "Klaxon" - type SY2/725 hooter with a continuously rated output and 110 dB at a distance of 2 metres, and shall be IP55 weatherproof rated.

The warning light shall consist of a 40W flashing red light, which shall be mounted on a galvanised steel frame together with the hooter.

The hooter and light shall be switched on or off simultaneously after initiation or cancellation of an alarm condition. The supply and installation of the wiring between the control board and the alarm unit forms part of this contract.

The successful tenderer must ensure that the hooter control circuit resets automatically after cancellation due to a low fuel condition or battery charger failure, but the visible fault indication must remain, i.e. should the operator continue to run the set, the hooter must sound, should any other condition develop.

A remote alarm panel shall be supplied and installed by the contractor in the control room. This shall be of surface mounting, enamelled sheet metal (colour to approval), minimum depth construction, and shall incorporate a flashing red pilot alarm light, adjustable electronic sounder, and a silence push button. The silence button shall not switch off the pilot light - this shall only be switched off when the alarm is reset at the Generator Panel.

A 2,5mm² x 4-core PVC SWA PVC cable will be supplied, installed and terminated by others between the Generator Panel and the Main Office. The Contractor shall connect this cable at both ends and shall supply and install all switch gear relays, etc. to ensure satisfactory operation of the Remote Alarm Panel.

3.11. Remote Control Generator Switch

A Remote Control Generator "ON/OFF/AUTO" switch will be supplied and installed by others in the control room, and a 2,5mm² x 4-core PVC SWA PVC cable will be supplied and installed by others between the control room and the Generator Panel.

The contractor shall connect this cable at both ends, and shall supply and install all switch gear, relays, etc. to ensure satisfactory operation of the remote control switch.

3.12. Fuel Drip Tray

A drip tray approximately 100mm deep shall be mounted below the generator and must be large enough to collect any fuel that drips from the generator fuel accessories. The drip tray shall be manufactured from black mild steel. The thickness of the drip tray sheet steel shall not be less than 2mm.

3.13. Completion Time

The Generator Set is required to be commissioned within 6 months.

3.14. Inform

The successful tenderer shall inform the Engineer when the set is ready for installation.

3.15. Fuel Supply Tank

The fuel tank shall be an integral part of the base frame of the generator set. The tank shall have sufficient capacity to run the engine on full load for a period of 6 hours. The base tank shall be an open channel self-bund walled type that shall be of sufficient capacity to contain a spillage equivalent to 110% in volume of the base tank. The containment tank shall be manufactured from black mild steel with a thickness of not less than 2mm.

A float level alarm connected to the generator controller shall be incorporated into the bund area located such that the alarm will be activated when 50% of the volume of the bund area has been reached in the event of any diesel fuel leakage.

SECTION 4 – SCHEDULES OF TECHNICAL INFORMATION

TABLE OF CONTENTS

4.1. Engine..... 27
4.2. Alternator 29
4.3. Switchboard 30
4.4. Battery 31
4.5. Dimensions 31
4.6. Deviation from the Specification as an Alternative (State Briefly) 31
4.7. Spare Parts and Maintenance Facilities 31

4. SECTION 4 – SCHEDULES OF TECHNICAL INFORMATION

4.1. Engine

NO	ITEM	REMARKS
1.	Manufacturer's Name	
2.	Country of Origin	
3.	Manufacturer's model No. and year of manufacture	
4.	Continuous sea level rating after allowing for ancillary equipment : a) In b.h.p. b) In kW	
5.	Percentage de-rating for site conditions, in accordance with SANS 8528 a) For altitude b) For temperature c) For humidity d) Total de-rating	
6.	Net output on site in kW	
7.	Nominal speed in r.p.m.	
8.	Number of cylinders	
9.	Strokes per working cycle	
10.	Stroke in mm	
11.	Cylinder bore in mm	
12.	Swept volume in cm ³	
13.	Mean piston speed in m/min	
14.	Compression ratio	
15.	Cyclic irregularity	
16.	Fuel consumption of the complete generating set on site in l/h of alternator output at : a) Full load b) $\frac{3}{4}$ load c) $\frac{1}{2}$ load NOTE : A tolerance of 5% shall be allowed above the stated value of fuel consumption.	
17.	Make of fuel injection system.	
18.	Capacity of fuel tank in litres	
19.	Is gauge glass fitted to tank?	
20.	Is electric pump for filling the fuel tank included?	

NO	ITEM	REMARKS
21.	Method of starting	
22.	Voltage of starting system	
23.	Method of cooling	
24.	Type of radiator if water-cooled	
25.	Type of heater for warming cylinder heads	
26.	Capacity of heater in kW	
27.	Method of protection against high temperature	
28.	Method of protection against low oil pressure	
29.	Type of governor	
30.	Speed variation in % a. Temporary b. Permanent	
31.	Minimum time required for as assumption of full load in seconds	
32.	Recommended interval in running hours for : a. Lubricating oil change b. Oil filter element change c. Decarbonising	
33.	Type of base	
34.	Can plant be placed on solid concrete floor?	
35.	Are all accessories and ducts included?	
36.	Is engine naturally aspirated?	
37.	Are performance curves attached?	
38.	Diameter of exhaust pipe	
39.	Noise level in plant room in dBA	N/A
40.	Noise level at tail of exhaust pipe in dBA	
41.	BMEP (4 stroke) at continuous rating (kPa)	
42.	% Load acceptance to SANS 8528, with 10% transient speed drop	

4.2. Alternator

NO	ITEM	REMARKS
1.	Maker's name and model no.	
2.	Country of Origin and year of manufacture	
3.	Type of enclosure	
4.	Nominal speed in r.p.m.	
5.	Number of bearings	
6.	Terminal voltage	
7.	Sea level rating kVA at 0,9 power factor	
8.	De-rating for site conditions	
9.	Input required in kW	
10.	Method of excitation	
11.	Efficiency at 0,9 power factor and : a) Full load b) $\frac{3}{4}$ load c) $\frac{1}{2}$ load	
12.	Maximum permanent voltage variation in %	
13.	Transient voltage dip on full load	
14.	Voltage recovery on full load application in milli-seconds	
15.	Is alternator brushless?	
16.	Class of insulation of windings	
17.	Is alternator tropicalised?	
18.	Symmetrical short circuit current at terminals n Ampere	
19.	Type of Coupling	

4.3. Switchboard

NO	ITEM	REMARKS
1.	Maker's Name	
2.	Country of Origin	
3.	Is board floor mounted?	
4.	Finish of board	
5.	Make of volt, amp, and frequency meters	
6.	Dial size of meters in mm	
7.	Scale range of voltmeter	
8.	Scale range of ammeters	
9.	Ration of current transformers	
10.	Make of hour meter	
11.	Range of cyclometer counter	
12.	Smallest unit shown on counter (Item 11)	
13.	Make of circuit breaker	
14.	Type of circuit breaker	
15.	Rating of circuit breaker in Amp and fault level in kA	
16.	Setting range of overload trips	
17.	Setting range of instantaneous trips	
18.	Make of change-over equipment	
19.	Make of voltage relay	
20.	Is control and protection equipment mounted on a small removable panel?	
21.	Type of control equipment	
22.	Make of mains isolator	
23.	Type of indicators for protective devices	
24.	Make of rectifier	
25.	Type of rectifier	
26.	Is battery charging	
27.	Are volt- and ammeters provided for charging circuit?	
28.	Is the alarm hooter of the continuous duty type?	
29.	Rating in Amps of : a. Change-over equipment b. Mains on load isolator c. By-pass switch d. Circuit breaker to outgoing feed	
30.	Is manufacture of switchboard/control panel to be sub-let?	

NO	ITEM	REMARKS
31.	If yes, state name and address of specialist manufacturer	

4.4. Battery

NO	ITEM	REMARKS
1.	Maker's Name	
2.	Country of Origin	
3.	Type of battery	
4.	Voltage of battery	
5.	Number of cells	
6.	Capacity in cold crank amp	

4.5. Dimensions

NO	ITEM	REMARKS
1.	Overall dimensions of set in mm	
2.	Overall mass	
3.	Is the canopy/container adequate for the installation of the set, switch board and fuel tank	

4.6. Deviation from the Specification as an Alternative (State Briefly)

NO	DESCRIPTION

4.7. Spare Parts and Maintenance Facilities

NO	ITEM	REMARKS
1	Approximate value of spares carried in stock for this particular diesel engine and alternator	
2	Where are these spares held in stock	
3	What facilities exist for the servicing of the equipment offered	
4	Where are these facilities available	

SECTION 5 – PRICE SCHEDULES

TABLE OF CONTENTS

5.1.	General	33
5.2.	Schedule	33
5.3.	Summary of Schedules of Quantities	33

5. SECTION 5 – PRICE SCHEDULES

5.1. General

- 1) The descriptions in this Price Schedule shall be read in conjunction with the specification.
- 2) The unit rate for each item in the Price Schedules shall include for all materials, labour, profit, transport, etc., everything necessary for the execution and complete installation of the work in accordance with the description.
- 3) The Price Schedules shall not be used for ordering purposes. The Contractor shall check the lengths of cables and overhead conductors on site before ordering any of the cables. Any allowance for off-cuts shall be made in the unit rates.
- 4) The rates shall exclude Value Added Tax and the total carried over to the final price summary.
- 5) All material covered by this Specification shall, wherever possible, be of South African manufacture.

5.2. Schedule

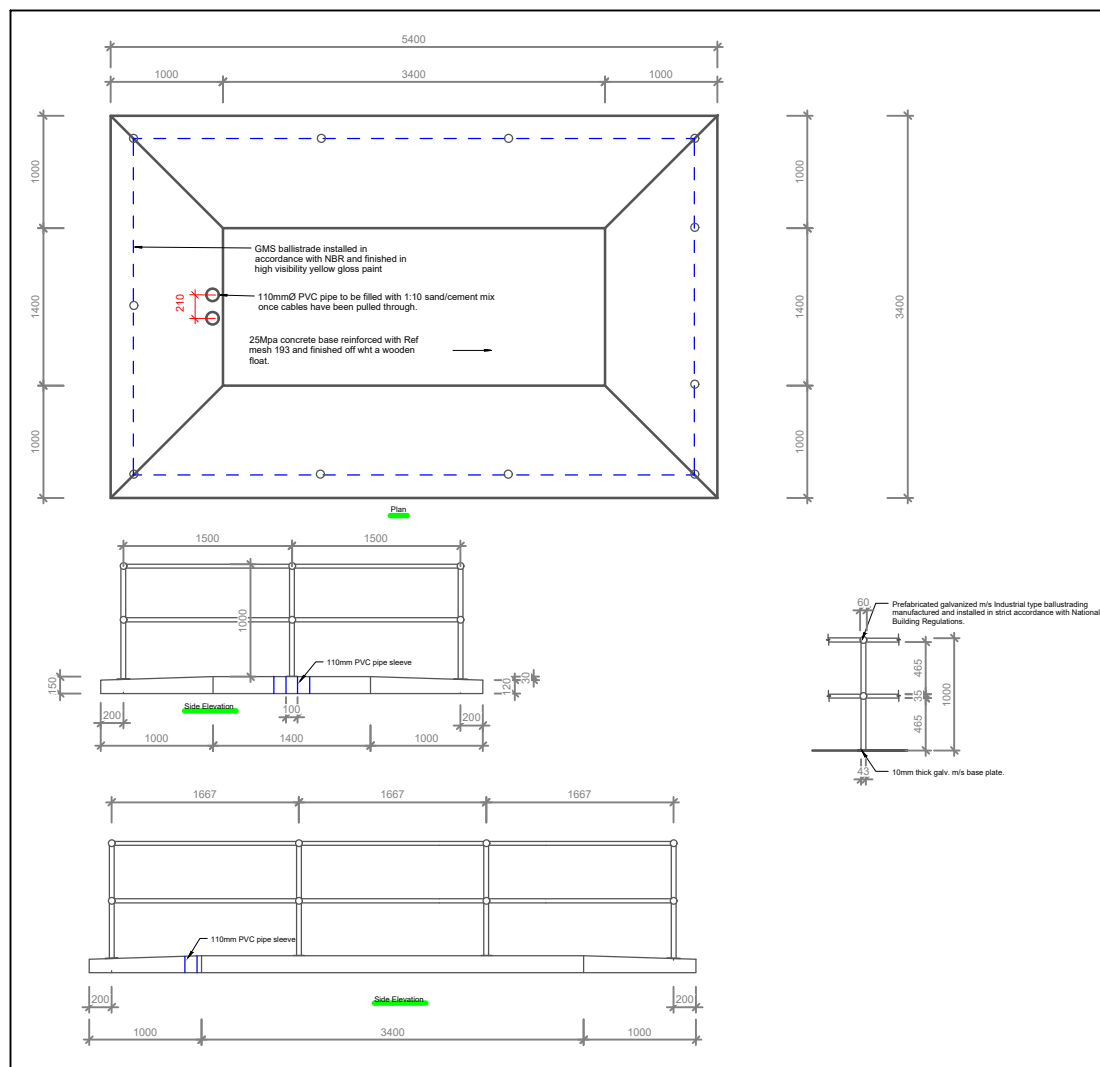
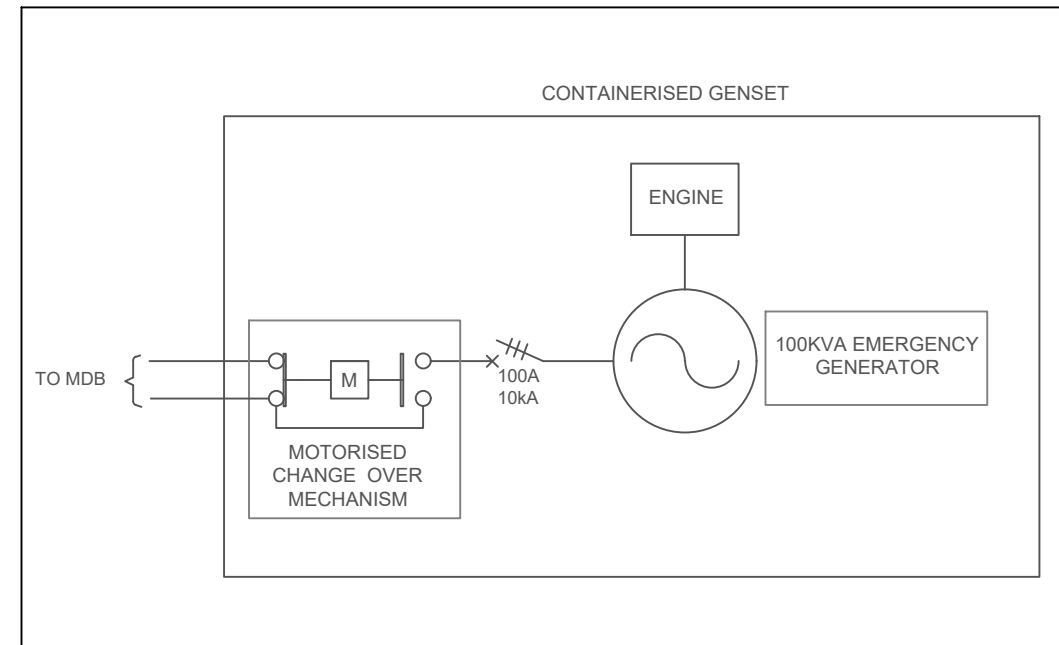
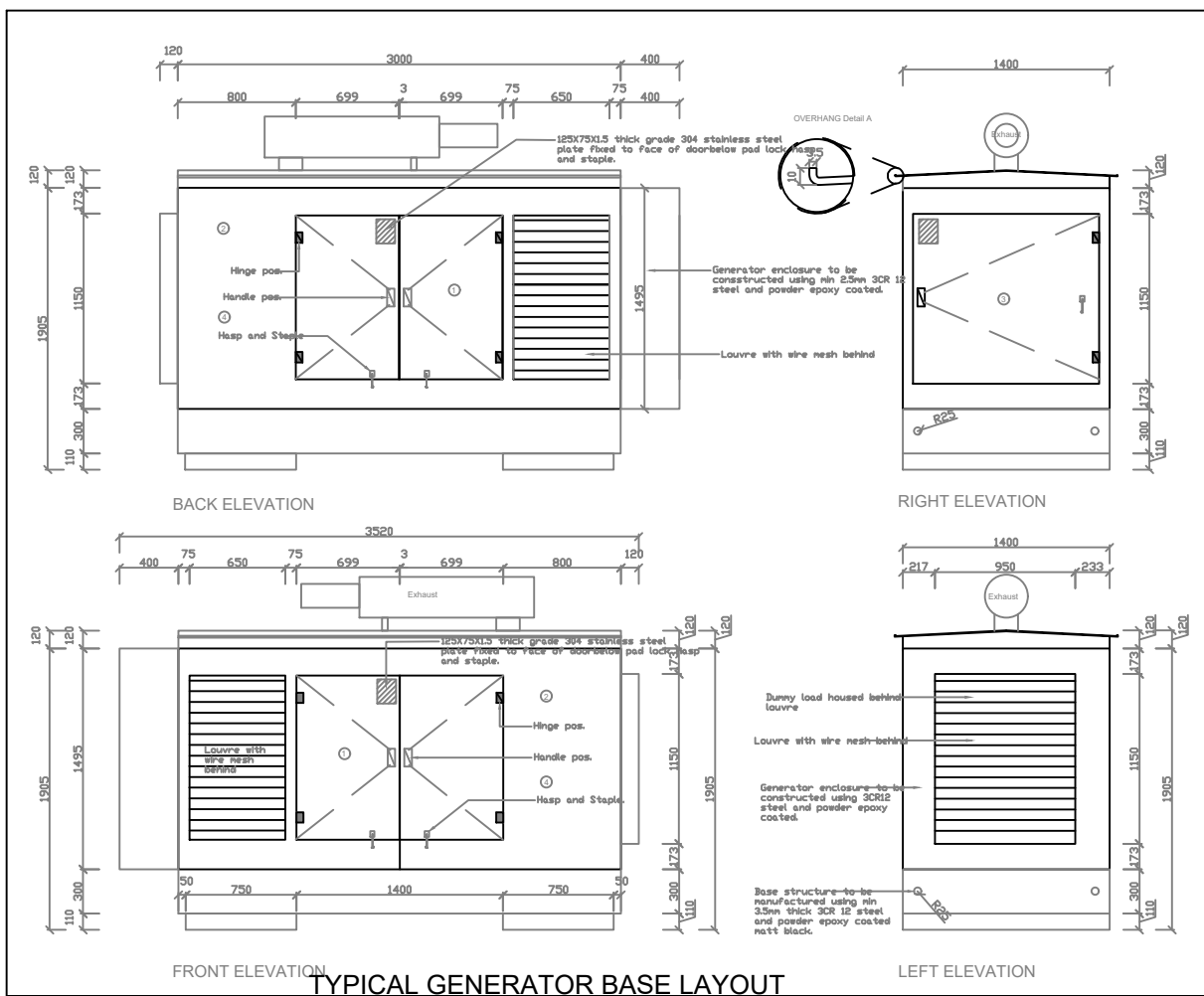
See attached Bill of Quantity

5.3. Summary of Schedules of Quantities

See attached Price Summary Page

Total Tender Price for the Supply and Installation of an Emergency Generator Set (incl VAT)

R _____



- ① Danger sign- Automated engine start without ollice.
- ② Electric shock treatment sign.
- ③ Multilingual Danger sign
- ④ Electrical Hazard Sign



ELECTRIC SHOCK TREATMENT

BEFORE ATTEMPTING ANY RESCUE OR ASSISTANCE, ALWAYS ENSURE YOUR OWN SAFETY

- DO NOT TOUCH CASUALTY WITH YOUR BARE HANDS WHILST HE IS IN CONTACT WITH THE LIVE WIRE.
- SWITCH OFF CURRENT IF POSSIBLE
- INSULATE YOURSELF BY STANDING ON A PIECE OF DRY WOOD OR THICK FOLDED BLANKET OR COAT
- USING A DRY ROPE, BELT OR STICK MOVE THE WIRE FROM CASUALTY OR DRAG HIM AWAY FROM WIRE.

SEND FOR MEDICAL ASSISTANCE

- DO NOT GIVE STIMULANTS UNLESS ORDERED BY A DOCTOR
- APPLY STERILIZED DRESSING TO BURNS DO NOT REMOVE BURNED CLOTHING AND DO NOT BREAK BLISTERS.
- IF PATIENT IS BREATHING KEEP HIM WARM, COVER WITH BLANKETS OR COATS.
- IF PATIENT IS NOT BREATHING LOOK FOR ANY OBSTRUCTION WHICH MAY BE IN HIS MOUTH

TREATMENT

PERFORM MOUTH TO MOUTH ARTIFICIAL RESPIRATION

A THIN HANDKERCHIEF MAY BE PLACED OVER TIME CASUALTY'S MOUTH OR NOSE IF DESIRED.

- PLACE THE CASUALTY ON HIS BACK AND SIT OR KNEEL ON THE SIDE OF HIS HEAD. HOLD THE HEAD IN HANDS, ONE PRESSING IT BACKWARDS THE OTHER PUSHING THE LOWER JAW UPWARDS AND FORWARD. THIS IS IMPORTANT TO ENSURE AN UNRESTRICTED PASSAGE TO THE CASUALTY'S LUNGS.
- PINCH THE CASUALTY'S NOSE CLOSED WITH ONE HAND.
- TAKE A DEEP BREATH, OPEN YOUR MOUTH WIDE AND SEAL YOUR LIPS AROUND THE CASUALTY'S MOUTH. BLOW AIR STEADILY ON TO THE CASUALTY'S LUNGS UNTIL HIS CHEST RISES.
- REMOVE YOUR MOUTH AND TURN YOUR FACE TO ONE SIDE TO TAKE ANOTHER BREATH. THE CASUALTY WILL AUTOMATICALLY BREATHE OUT THROUGH HIS MOUTH.
- SIX BREATHS SHOULD BE GIVEN AS QUICKLY AS POSSIBLE THEN REPEAT THE CYCLE AT 4 SECOND INTERVALS KEEP PATIENT'S HEAD PASSED BACK AT ALL TIMES.

TYPICAL GENERATOR SAFETY SIGNAGE

REVISIONS:

No.	Date	By	Description
00	JAN 2023	TS	First Issue For Tender

CLIENT:



ELECTRICAL ENGINEERS



PROJECT TITLE:

DOE GENERATOR INSTALLATIONS

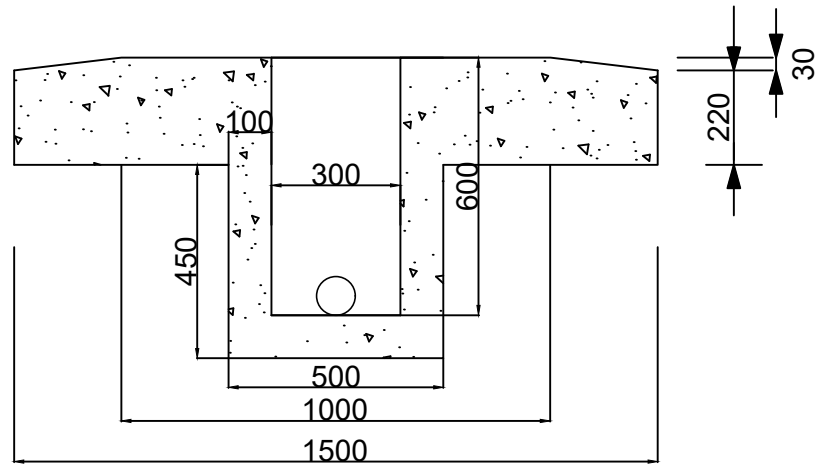
DRAWING TITLE:

TYPICAL GENERATOR SET PLINTH LAYOUT

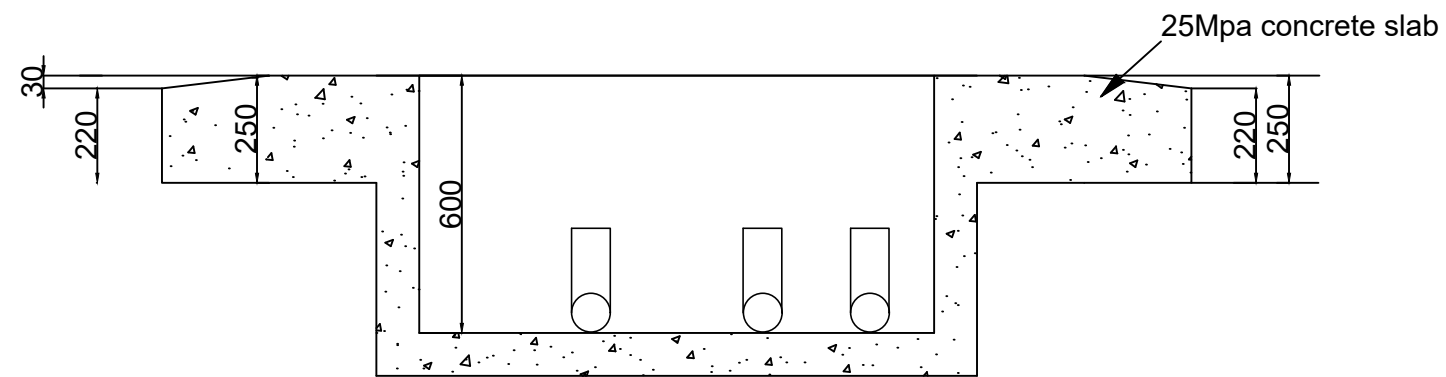
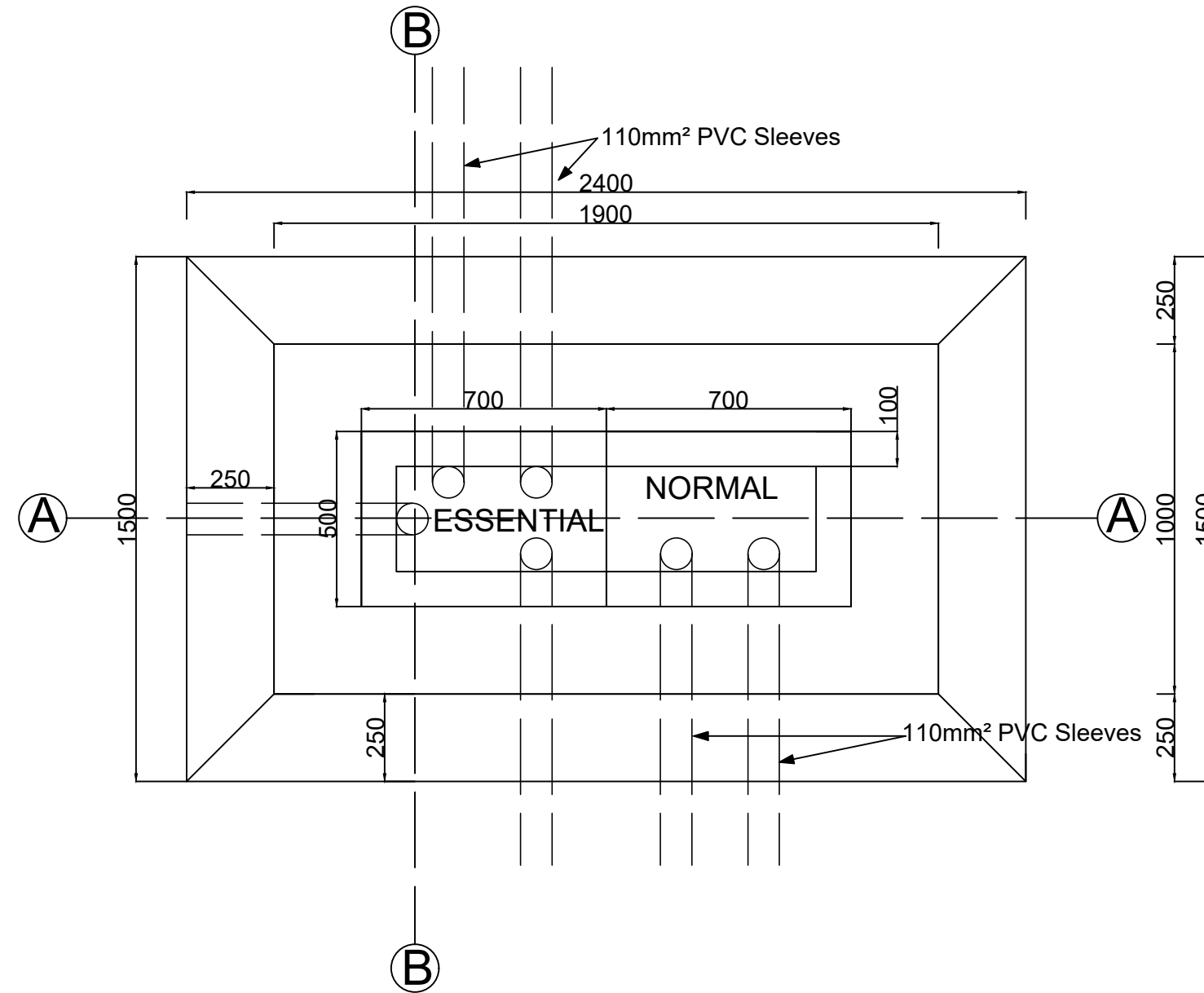
DRAWN BY: T.S.	CHECKED BY: G.M.	APPROVED BY: L.N.
SCALE: N.T.S.	COPYRIGHT RESERVED	DATE: JAN 2023
DRAWING FILE NAME: PLINTH LAYOUT		REV: 0
SHEET NO: CAR20E/2018/001E		SIZE: A1

PROJECT STATUS:
TENDER

KIOSK PLINTH



SECTION B-B



SECTION A-A

REVISIONS

No	Date	By	Description



CLIENT
DEPARTMENT OF BASIC EDUCATION

DISCIPLINE
ELECTRICAL ENGINEERING

PROJECT
DOE GENERATOR INSTALLATIONS

TITLE
TYPICAL KIOSK PLINTH

DRAWN
T.S

CHECKED
G.M

APPROVED
L.L.N

SCALE
NTS

PROJECT STATUS
TENDER

DATE
31-01-2023

DRAWING No.
CAR20E/2018/002E

REV
0