



PART: A: INVITATION TO BID:

MBD1

YOU ARE HEREBY INVITED TO BID FOR REQUIREMENTS OF THE (POLOKWANE MUNICIPALITY)					
BID NUMBER:	PM63/2021	CLOSING DATE:	18 NOVEMBER 2022	CLOSING TIME:	10:00
BID DESCRIPTION	CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI YEAR)				
THE SUCCESSFUL BIDDER WILL BE REQUIRED TO FILL IN AND SIGN A WRITTEN CONTRACT FORM (MBD7) or SERVICE LEVEL AGREEMENT OF POLOKWANE MUNICIPALITY.					

BID RESPONSE DOCUMENTS MAY BE DEPOSITED IN THE BID BOX SITUATED AT (Polokwane Municipality, Civic Centre, corner, Bondenstein and Land - dros Mare Street) not later than **10H00** on 18th of November **2022**.

An official and compulsory site inspection will NOT be held.					
The Bid box is generally open 24 hours, 7 days a week.					
Completed Bid document, fully priced and signed must be sealed in an envelope marked: "PM63/2021: CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI YEAR)"					
Bidders should ensure that bids are delivered timeously to the correct address. If the bid is late, it will not be accepted for consideration.					
Bids documents containing the Conditions of Bid and other requirements in terms of the Supply Chain Management Policy will be downloaded from e-tender Publication Portal at www.etenders.gov.za and www.polokwane.gov.za at no fee.					

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					
TAX COMPLIANCE STATUS	TCS PIN:		OR	CSD No:	
B-BBEE STATUS LEVEL NUMBER	-----		TOTAL BID PRICE	R	
B-BBEE STATUS LEVEL VERIFICATION CERTIFICATE [TICK APPLICABLE BOX]	☐ Yes ☐ No		B-BBEE STATUS LEVEL SWORN AFFIDAVIT	☐ Yes ☐ 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?	☐ Yes ☐ No [IF YES ENCLOSE PROOF]	ARE YOU A FOREIGN BASED SUPPLIER FOR THE GOODS /SERVICES /WORKS OFFERED?	☐ Yes ☐ No [IF YES,ANSWER PART B:3]
MINIMUM WORK OPPORTUNITIES TO BE CREATED	36	CIDB GRADING	6 CE OR HIGHER
SIGNATURE OF BIDDER	ë ë ë ë ë ë ë ë ë ë ë	DATE	
CAPACITY UNDER WHICH THIS BID IS SIGNED			
BIDDING PROCEDURE ENQUIRIES MAY BE DIRECTED TO:		TECHNICAL INFORMATION MAY BE DIRECTED TO:	
MUNICIPALITY	POLOKWANE	POLOKWANE MUNICIPLAITY	MAPULA MAMABOLO
CONTACT PERSON	MR. K. MASHIANE	TELEPHONE NUMBER	(015) 023 5335
TELEPHONE NUMBER	(015) 023 5148	FACSIMILE NUMBER	N/A
FACSIMILE NUMBER	N/A	E-MAIL ADDRESS:	mapula@polokwane.gov.za
E-MAIL ADDRESS	kwenama@polokwane.gov.za	PRINCIPAL AGENT: MONT CONSULTING ENGINEERS CONTACT: MR T E MUVHANGO TELEPHONE: (015) 291 4173 EMAIL ADDRESS: admin@montce.co.za	
 EXPANDED PUBLIC WORKS PROGRAMME Creating opportunities towards human fulfilment		IUDG	

PART B

TERMS AND CONDITIONS FOR BIDDING

1. BID SUBMISSION:

1.1 BIDS MUST BE DELIVERED BY THE STIPULATED TIME TO THE CORRECT ADDRESS. LATE BIDS WILL NOT BE ACCEPTED FOR CONSIDERATION.

1.2 ALL BIDS MUST BE SUBMITTED ON THE OFFICIAL FORMS PROVIDED–(NOT TO BE RE-TYPED) OR ONLINE

1.3 THIS BID IS SUBJECT TO THE PREFERENTIAL PROCUREMENT POLICY FRAMEWORK ACT AND THE PREFERENTIAL PROCUREMENT REGULATIONS, 2017, THE GENERAL CONDITIONS OF CONTRACT (GCC) AND, IF APPLICABLE, ANY OTHER SPECIAL CONDITIONS OF CONTRACT.

2. TAX COMPLIANCE REQUIREMENTS

2.1 BIDDERS MUST ENSURE COMPLIANCE WITH THEIR TAX OBLIGATIONS.

2.2 BIDDERS ARE REQUIRED TO SUBMIT THEIR UNIQUE PERSONAL IDENTIFICATION NUMBER (PIN) ISSUED BY SARS TO ENABLE THE ORGAN OF STATE TO VIEW THE TAXPAYER'S PROFILE AND TAX STATUS.

2.3 APPLICATION FOR THE TAX COMPLIANCE STATUS (TCS) CERTIFICATE OR PIN MAY ALSO BE MADE VIA E-FILING. IN ORDER TO USE THIS PROVISION, TAXPAYERS WILL NEED TO REGISTER WITH SARS AS E-FILERS THROUGH THE WEBSITE WWW.SARS.GOV.ZA.

2.4 FOREIGN SUPPLIERS MUST COMPLETE THE PRE-AWARD QUESTIONNAIRE IN PART B:3.

2.5 BIDDERS MAY ALSO SUBMIT A PRINTED TCS CERTIFICATE TOGETHER WITH THE BID.

2.6 IN BIDS WHERE CONSORTIA / JOINT VENTURES / SUB-CONTRACTORS ARE INVOLVED, EACH PARTY MUST SUBMIT A SEPARATE TCS CERTIFICATE / PIN / CSD NUMBER.

2.7 WHERE NO TCS IS AVAILABLE BUT THE BIDDER IS REGISTERED ON THE CENTRAL SUPPLIER DATABASE (CSD), A CSD NUMBER MUST BE PROVIDED.

3. QUESTIONNAIRE TO BIDDING FOREIGN SUPPLIERS

3.1 IS THE ENTITY A RESIDENT OF THE REPUBLIC OF SOUTH AFRICA (RSA)?
☐ YES ☐ NO

3.2 DOES THE ENTITY HAVE A BRANCH IN THE RSA?
☐ YES ☐ NO

3.3 DOES THE ENTITY HAVE A PERMANENT ESTABLISHMENT IN THE RSA?
☐ YES ☐ NO

3.4 DOES THE ENTITY HAVE ANY SOURCE OF INCOME IN THE RSA?
☐ YES ☐ NO

3.5 IS THE ENTITY LIABLE IN THE RSA FOR ANY FORM OF TAXATION?
☐ YES ☐ NO

IF THE ANSWER IS "NO" TO ALL OF THE ABOVE, THEN IT IS NOT A REQUIREMENT TO REGISTER FOR A TAX COMPLIANCE STATUS SYSTEM PIN CODE FROM THE SOUTH AFRICAN REVENUE SERVICE (SARS) AND IF NOT REGISTER AS PER 2.3 ABOVE.

**NB: FAILURE TO PROVIDE ANY OF THE ABOVE PARTICULARS MAY RENDER THE
BID INVALID.**

NO BIDS WILL BE CONSIDERED FROM PERSONS IN THE SERVICE OF THE STATE.

SIGNATURE OF BIDDER: ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

CAPACITY UNDER WHICH THIS BID IS SIGNED: ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

DATE: ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ..

POLOKWANE MUNICIPALITY

CONTENTS OF TENDER DOCUMENTATION

Volume 1: Tender requirements, Contract and Pricing Data		
Number	Heading	Colour
Part T1: Tendering procedures		
T1.1	Tender Notice and Invitation to Tender	White
T1.2	Tender Data	Pink
T1.3	Standard and Particular Conditions of Tender	Pink
Part T2: Returnable Documents		
T2.1	List of Returnable Documents	Yellow
T2.2	Returnable Schedules	Yellow
Part C1: Agreements and Contract Data		
C1.1	Form of Offer and Acceptance	White
C1.2	Contract Data	White
C1.3	Demand Guarantee and Retention Money Guarantee	White
C1.4	Occupational Health and Safety Agreement	White
C1.5	Agreement with adjudicators	White
Part C2: Pricing data		
C2.1	Pricing Instructions	Yellow
C2.2	Bill of Quantities	Yellow
Part C3: Scope of Work		
C3.1	Description of the Works	Blue
C3.2	List of Drawings	Blue
C3.3	Procurement	Blue
C3.4	Construction	Blue
C3.5	International, National and Polokwane Municipality Standards	Blue
C3.6	Health and Safety Specifications	Blue
C3.7	Environmental Management During Construction	Blue
C3.8	Management of Works	Blue
Part C4: Site information		
C4	Site Information	Green
	Drawings	White



BID NUMBER: PM63/2021: CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)

DIRECTORATE: WATER AND SANITATION

BUSINESS UNIT: INFRASTRUCTURE DEVELOPMENT

Bids are hereby invited for CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)

The Council also reserves the right to negotiate further conditions and requirements with the successful bidder.

THIS BID IS SUBJECT TO THE, PREFERENTIAL PROCUREMENT POLICY FRAMEWORK ACT AND THE PREFERENTIAL PROCUREMENT REGULATION, 2017, AND THE GENERAL CONDITIONS OF CONTRACT FOR CONSTRUCTION WORKS (THIRD EDITION) (2015) AND, IF APPLICABLE, ANY OTHER SPECIAL CONDITIONS OF CONTRACT.

The Municipality shall adjudicate and award bids in accordance with B-BBEE status level of contribution on 80/20-point system, 80 points for the price and 20 points for contribution. Prospective bidders must accept that the bid will be adjudicated, according to the said legislation. Bids will remain valid for 90 (ninety) days.

**MS THUSO NEMUGUMONI
MUNICIPAL MANAGER
CIVIC CENTRE
LANDDROS MARE STREET,
POLOKWANE**

RESPONSIVENESS AND EVALUATION CRITERIA

1. RESPONSIVENESS CRITERIA

The Polokwane Municipality will consider no Bid unless it meets the following responsiveness criteria:

- The bid must be properly received in a sealed envelope clearly indicating the description of the service and the bid number for which the bid is submitted.
- The bid must be deposited in the relevant bid box as indicated on the notice of the bid on or before the closing date and time of the bid.
- A valid CSD number must be submitted with the bid on or before the closing time and date of the bid.
- Copy of the company registration certificate must be submitted with the bid on or before the closing time and date of the bid.
- Submission of a Joint Venture Agreement, where applicable, which has been properly signed by all parties.
- Proof of payment of Municipal Rates and Taxes or letter for Tribal Authority or lease agreement must be attached.
- Complies with the requirements of the bid and technical specifications.
- Registered in the relevant contractor category in the Construction Industry Development Board Register of Contractors (CIDB).
- Adheres to Pricing Instructions.
- Financial ability to execute the contract.
- Comply in full and observe the requirements of the Notice to Bidders.
- Experience with similar work ñ demonstrate a track record of a similar scope and size

2. EVALUATION OF BIDS

- a. All bids received shall be evaluated in terms of the Supply Chain Management Regulations, Polokwane Municipality Supply Chain Management Policy (on request from Municipality), the preferential procurement regulation 2011, and other applicable legislations.
- b. The Council reserves the right to accept all, some, or none of the bids submitted ñ either wholly or in part ñ and it is not obliged to accept the lowest bid.

By submitting this bid, bidder authorizes the Council or its delegate(s) to carry out any investigation deemed necessary to verify the correctness of the statements and documents submitted and that such documents reasonably reflect the ability of the Bidder to provide the goods and services required by the Council.

PLEASE NOTE

- 1. The Municipal Manager may cancel a contract awarded to a person if:**
 - a) The person committed a corrupt or fraudulent act during the procurement process or in the execution of the contract, or
 - b) An official or other role player committed any corrupt or fraudulent act during the procurement process or in the execution of the contract that benefited that person.
- 2. The Municipal Manager may reject the bid or quote of any person if that person or any of its directors has:**
 - a) Failed to pay municipal rates and taxes or municipal service charges and such rates, taxes and charges are in arrears for more than three months;
 - b) Failed, during the last five years, to perform satisfactorily on a previous contract with the Polokwane Municipality or any other organ of State after written notice was given to that bidder that performance was unsatisfactory;
 - c) Abused the supply chain management system of the Municipality or have committed any improper conduct in relation to this system;
 - d) Been convicted of fraud or corruption during the past five years;
 - e) Wilfully neglected, reneged on or failed to comply with any government, municipal or other public sector contract during the past five years; or
 - f) Been listed in the Register for Tender Defaulters in terms of section 29 of the Prevention and Combating of Corrupt Activities Act (No. 12 of 2004) or has been listed on National Treasury's database as a person prohibited from doing business with public sector.

POLOKWANE MUNICIPALITY

T1.2 TENDER DATA

1. CONDITIONS OF TENDER

The conditions of tender are the Standard Conditions of Tender as contained in Annex F of the CIDB Standard for Uniformity in Construction Procurement (SFU) of May 2010, as published in Government Gazette No 33239, Board Notice 86 of 2010 of 28 May 2010. Those Standard Conditions of Tender remained the same as those published in the previous edition of the SFU as published in Government Gazette No 31823, Board Notice 12 of 2009 of 30 January 2009 - See www.cidb.org.za.

Each Tenderer shall obtain its own copy of the Standard Conditions of Tender.

The Standard Conditions of Tender make several references to the Tender Data for details that apply specifically to this tender. In the interpretation of any ambiguity or inconsistency between the Tender Data and the Standard Conditions of Tender, the Tender Data shall have precedence.

Each item of data given below is cross-referenced to the clause in the Standard Conditions of Tender to which it mainly applies.

Clause number	Tender Data
1. <u>EMPLOYER</u> Cl. F.1.1	The Employer is Polokwane Municipality The Employer's domicilium citandi et executandi (permanent physical business address) is: Polokwane Municipality, Civic Centre, Landdros Mare Street, Polokwane The Employer's address for communication relating to this project is: PO Box 111, Polokwane, 0700
2. <u>TENDER DOCUMENTS</u> Cl. F.1.2	The following documents form part of this tender: VOLUME 1 Part T1 Tendering procedures T1.1 Tender notice and invitation to tender T1.2 Tender data T1.3 Standard and Particular conditions to tender Part T2 Returnable Documents T2.1 List of Returnable Documents T2.2 Returnable Schedules that will be incorporated into the Contract Part C1 Agreements and Contract Data C1.1 Form of offer and acceptance C1.2 Contract data C1.3 Form for Adjudicators Appointment C1.4 Agreement in terms of Occupational Health and Safety Part C2 Pricing Data C2.1 Pricing Instructions C2.2 Bill of Quantities Part C3 Scope of Work C3.1 Description of the Works C3.2 List of Drawings C3.3 Procurement C3.4 Construction C3.5 International, National and Eskom Standards C3.6 Health and Safety Specifications C3.7 Environmental Management during Construction C3.8 Management of the Works Part C4 Site information

Clause number	Tender Data
3. <u>EMPLOYER'S AGENT</u> Cl. F.1.4	The Employer's Agent are: a) Principal Agent Mont Consulting Engineers <u>Physical Address:</u> 29 Bendor Drive Pro Park, Pro Arch Building Bendor, Polokwane 0700 <u>Postal Address:</u> P.O. Box 1249 Fauna Park Polokwane 0787 Tel.: (015) 291 4173 E-mail: admin@montce.co.za Fax.: (015) 291 4218
4. <u>TENDERER'S OBLIGATIONS</u>	
5.1. <u>Eligibility</u> Cl. F.2.1	A tender offer may only be submitted if the Tenderer satisfies the criteria stated in the Tender Data and if the Tenderer, or any of his principals, is not under any restriction to do business with the Employer.
5.2. <u>Site Visit and Clarification Meeting</u> Cl. F.2.7	The arrangements for a compulsory pre-tender meeting are: Location: NOT APPLICABLE Date:
5.3. <u>Insurance</u> Cl. F.2.9	No insurance cover will be provided by the Employer.
5.4. <u>Alternative Tender Offers</u> Cl. F. 2.12	Unless anything to the contrary has been determined in the Contract Data, a Tenderer may, together with his tender for the original designs contained in the contract documents, submit alternative designs and tender offers for consideration. All designs, calculations, drawings and Operation and Maintenance manuals shall be fully endorsed by a third party registered engineer, accomplished in such specific field of practice and the cost thereof shall be borne solely by the Contractor. Such alternative designs and offers shall be subject to the following conditions and requirements: 5.4.1. <u>Tenders</u> An alternative offer or design will be considered only if the tender for the original items has been fully priced and completed. The alternative tender offer is to be submitted in the same envelope as the main tender offer, together with a schedule that compares the requirements of the tender documents with the alternative requirements the Tenderer proposes. No alternative tender will be considered unless a tender free from qualifications is also submitted. Unless the alternative offer stipulates to the contrary, it shall be assumed that the period for completion of the Works shall be the same as for the original design. Designs, calculations, drawings and a modified schedule of quantities (as determined hereafter) in respect of each alternative offer or design shall accompany the alternative tender offer and shall be endorsed fully by a third party registered engineer, accomplished in such specific field of practice. 5.4.2. <u>Preliminary calculations</u> Preliminary calculations for an alternative design shall be submitted with the tender. Such calculations shall give adequate details so as to enable an assessment to be made of the general efficacy of the design and of its principal elements, also of the degree to which the design prescriptions and codes of the Employer are being complied with. The calculations shall be clear and in a logical sequence and shall clearly reflect all the design assumptions.

Clause number	Tender Data
	5.4.3. <u>Preliminary drawings</u> Preliminary drawings of the alternative designs shall also be submitted with the tender. These drawings shall comprise adequate layout plans, elevations and sections and shall clearly illustrate the general efficacy of the design and its principal elements. 5.4.4. <u>Quantities</u> Each alternative offer shall be accompanied by a modified priced schedule of quantities compiled in accordance with the specifications, in so far as it is applicable, which clearly shows the manner in which the price for the alternative offer has been determined and the items in the original schedule of quantities which fall away or are being changed. In addition to the schedule of quantities, a set of calculations shall be supplied to show how the quantities have been determined. All assumptions in regard to factors which will determine quantities shall be clearly and conspicuously marked by underlining or coloring, and shall indicate whether or not the assumptions have been based on information furnished in the Contract Data (with the necessary references). 5.4.5. <u>Further details</u> Should the Employer's Agent find that the calculations and drawings submitted for alternative designs are not complete enough for proper adjudication of the alternative designs, the Employer reserves to itself the right to call on the Tenderer to submit such further calculations and drawings as may be required. If such further details are not submitted within ten days of having been requested, the alternative designs will not be given further consideration. 5.4.6. <u>Preliminary adjudication of alternative designs</u> The Employer's Agent will undertake a preliminary scrutiny of any alternative designs for compliance with the specified requirements of the Employer. Should he find any mistakes or unsatisfactory aspects, he may afford the Bidder the opportunity to rectify them within a period to be determined by the Employer's Agent. However, it is emphasized that the preliminary scrutiny of the design and tender by the Employer's Agent, by its very nature, cannot be comprehensive, and no guarantee can be given in this regard that all the mistakes made by the Bidder will in fact be detected. Any correction of such mistakes shall be made with the tender price of the bidder being retained, and, wherever necessary, the priced schedule of quantities for the alternative design shall be adjusted accordingly. 5.4.7. <u>Acceptance of alternative design</u> The Bidder shall note that the acceptance of a tender which includes alternative designs shall mean that the alternative designs have been approved in principle only. If the final calculations, drawings and details do not comply with the specified requirements, such alternative designs may be rejected, unless they are suitably amended by the Bidder so as to be acceptable to the Employer. 5.4.8. <u>Final drawings and calculations and the priced schedule of quantities</u> Where a tender with an alternative design has been accepted, the Contractor shall, not less than two months before he intends starting with the construction of such design, submit to the Employer's Agent a complete set of working drawings, detailed calculations and a complete schedule of quantities, for approval. The schedule of quantities shall be based on the preliminary schedule of quantities, but with the necessary adjustments in quantities and prices and with the tendered price for the alternative design being retained.

Clause number	Tender Data
	Within three weeks of having received the above, the Employer's Agent will indicate which drawings, calculations, quantities, prices and other particulars are acceptable to him and which not, with reasons furnished. The Contractor shall then submit to the Employer's Agent in good time any modified drawings and other particulars for approval, for which he will require two weeks. Any delay arising from the fact that the amended particulars do not meet the requirements shall be the responsibility of the Contractor. No work which will be affected by an alternative design may be commenced, unless the drawings, schedule of quantities and prices for such alternative design have been approved. Should the Contractor fail to modify any drawings, calculations, quantities, prices or any other particulars to the satisfaction of the Employer's Agent, the alternative design will be rejected and the original design shall be constructed for the same amount as has been tendered for the alternative design. 5.4.9. <u>Responsibility for alternative design</u> The approval of a design by the Employer's Agent shall not in any way relieve the Bidder of his responsibility to produce a design which conforms in all respects to all the specified requirements and which will be suitable for the purpose envisaged. Should it appear later during construction or during the maintenance period that the design does not conform to the specified requirements, the Contractor only, shall be liable for any damage arising there from and he shall, at his own expense, do all the necessary work to ensure that the Works conforms to all the specified requirements. 5.4.10. <u>Indemnity</u> Once the alternative design has been approved, the Contractor shall indemnify and hold harmless the Employer, its agents and assigns, against all claims howsoever arising out of the said design whether in contract or delict.
5.1. Submitting a Tender Offer Cl. F2.13	5.5.1. <u>Whole of the Works</u> (Cl. F.2.13.1) Tenderers shall offer to provide for the whole of the Works identified. 5.5.2. <u>Original tender documents</u> (Cl. F2.13.3) The original tender document, issued to the Bidder, shall be submitted in its entirety. No copies are required. 5.5.3. <u>Marking of Tender Submissions</u> (Cl. F2.13.5) The complete tender documents shall be enclosed and sealed in a single envelope, marked: "BID NO. PM63/2021: CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)" The Employer's address for delivery of tender offers to be shown on each tender submission package is the Tender Box located at: Polokwane Municipality Civic Centre Landdros Mare Street Polokwane 5.5.4. <u>Two envelope system</u> (Cl. F.2.13.6) A two-envelope procedure will not be followed.

Clause number	Tender Data
	5.5.5. <u>Closing time</u> (Cl. F.2.15) The closing time for submission of tender offers is: 10H00 Telegraphic, telephonic, telex, facsimile, e-mail, electronic and late tender offers will not be accepted. 5.5.6. <u>Tender offer validity</u> (Cl. F.2.16) The tender offer validity period is 90 days after tender closing date. 5.5.7. <u>Clarification of tender offer after submission</u> (Cl. F.2.17) Delete the last part of the second sentence, commencing with the word “and” Furthermore, delete the last two sentences of Cl. F2.17. Add the following sentence: “The rates stated by the Bidder shall be binding” 5.5.8. <u>Provide other Material</u> (Cl. F.2.18.1) Upon request by the Employer, the Bidder shall promptly supply any other material that has a bearing on the tender offer, the bidder’s commercial position (including, where applicable, notarized joint venture agreements), preferencing arrangements, or samples of materials, considered necessary by the Employer for the purpose of a full and fair assessment. Should the Bidder not provide the information or material called for, by the time for submission stated in the Employer’s request, the Employer will regard the tender offer as being non-responsive. 5.5.9. <u>Certificates</u> (Cl. F.2.23) The following certificates are to be provided with this tender: - A valid CSD number to be provided. - Compensation Fund registration certificate - Certificate of Contractor Registration issued by the Construction Industry Development Board or a copy of the application Form for registration in terms of the Construction Industry Development Board Act (Form F006). (A minimum grading of 6CE is required). Important Note: Failure to provide the required particulars as per the above-listed certificates implies a non-responsive tender and warrants rejection of the tender on account of non-compliance with the requirements of the Tender Data
6. <u>EMPLOYER’S UNDERTAKING</u>	
6.1. <u>Opening of Tender Submissions</u> Cl. F3.4	The time and location for opening of the tender offers are: 10:00 on 18 November 2022 Location: Tender Box, Polokwane Municipality, Civic Centre, Landdros Mare Street, Polokwane
6.2. <u>Arithmetical Errors</u> Cl. F.3.9.1	Delete paragraphs (b) and (c) of Cl. F.3.9.1 and replace with: If a bill of quantities (or schedule of quantities or schedule of rates) applies and there is an error in the line item resulting from the product of the unit rate and the quantity, the rate shall be binding and the error of extension as entered in the tender offer will be corrected by the Employer in determining the Contract Price.

Clause number	Tender Data
	c) Where there is an error in addition, either as a result of other corrections required by this checking process or in the Bidder's addition of prices, such error will be corrected by the Employer in determining the Contract Price. d) The Contract Price for the completed Contract shall be computed from the actual quantities of authorized work done and compliant with the Contract Data, valued at rates contracted against the respective items in the bill of quantities, schedule of Quantities or schedule of rates and shall include such authorized Provisional Sums and items of extra work as have become payable in terms of the Contract Data.
7. ACCEPTANCE OF TENDER OFFER CI. F3.13	Tender offers will only be accepted if: a) A valid CSD number to be provided; b) The bidder is registered with the Construction Industry Development Board in an appropriate contractor grading designation. (A minimum grading of 6CE is required for the main contractor); a) The bidder has demonstrated previous experience with the type of work required under this contract having successfully completed a project of similar scope and size. d) The bidder or any of its principals 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; and e) The bidder has not abused the Employer's Supply Chain Management System. f) The bidder has not failed to perform on any previous contract. g) has complete the Compulsory Enterprise Questionnaire 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 tender process.
8. PROVIDE COPIES OF THE CONTRACT DOCUMENT CI. F.3.18	The number of paper copies of the signed Contract to be provided by the Employer to the successful bidder is one

PREFERENCE POINTS CLAIM FORM IN TERMS OF THE PREFERENTIAL PROCUREMENT REGULATIONS 2017

This preference form must form part of all bids invited. It contains general information and serves as a claim form for preference points for Broad-Based Black Economic Empowerment (B-BBEE) Status Level of Contribution

NB: BEFORE COMPLETING THIS FORM, BIDDERS MUST STUDY THE GENERAL CONDITIONS, DEFINITIONS AND DIRECTIVES APPLICABLE IN RESPECT OF B-BBEE, AS PRESCRIBED IN THE PREFERENTIAL PROCUREMENT REGULATIONS, 2017.

1. GENERAL CONDITIONS

1.1 The following preference point systems are applicable to all bids:

- the 80/20 system for requirements with a Rand value of up to R50 000 000.00 (all applicable taxes included); and
- the 90/10 system for requirements with a Rand value above R50 000 000.00 (all applicable taxes included).

1.2 -The value of this bid is estimated to not exceed R50 000 000.00 (all applicable taxes included) and therefore the 80/20 system shall be applicable; or

- The 80/20-preference point system will be applicable to this tender.

1.3 Points for this bid shall be awarded for:

- (a) Price; and
- (b) B-BBEE Status Level of Contributor.

1.4 The maximum points for this bid are allocated as follows:

	POINTS
PRICE	80
B-BBEE STATUS LEVEL OF CONTRIBUTOR	20
Total points for Price and B-BBEE must not exceed	100

1.5 Failure on the part of a bidder to submit proof of B-BBEE Status level of contributor together with the bid, will be interpreted to mean that preference points for B-BBEE status level of contribution are not claimed.

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

2. DEFINITIONS

- (a) **“B-BBEE”** means broad-based black economic empowerment as defined in section 1 of the Broad-Based Black Economic Empowerment Act;
- (b) **“B-BBEE status level of contributor”** means the B-BBEE status of an entity in terms of a code of good practice on black economic empowerment, issued in terms of section 9(1) of the Broad-Based Black Economic Empowerment Act;
- (c) **“bid”** means a written offer in a prescribed or stipulated form in response to an invitation by an organ of state for the provision of goods or services, through price quotations, advertised competitive bidding processes or proposals;
- (d) **“Broad-Based Black Economic Empowerment Act”** means the Broad-Based Black Economic Empowerment Act, 2003 (Act No. 53 of 2003);
- (e) **“EME”** means an Exempted Micro Enterprise in terms of a code of good practice on black economic empowerment issued in terms of section 9 (1) of the Broad-Based Black Economic Empowerment Act;
- (f) **“functionality”** means the ability of a tenderer to provide goods or services in accordance with specifications as set out in the tender documents;
- (g) **“prices”** includes all applicable taxes less all unconditional discounts;
- (h) **“proof of B-BBEE status level of contributor”** means:
 - 1) B-BBEE Status level certificate issued by an authorized body or person;
 - 2) A sworn affidavit as prescribed by the B-BBEE Codes of Good Practice;
 - 3) Any other requirement prescribed in terms of the B-BBEE Act;
- (i) **“QSE”** means a qualifying small business enterprise in terms of a code of good practice on black economic empowerment issued in terms of section 9 (1) of the Broad-Based Black Economic Empowerment Act;
- (j) **“rand value”** means the total estimated value of a contract in Rand, calculated at the time of bid invitation, and includes all applicable taxes;

3. POINTS AWARDED FOR PRICE**3.1 THE 80/20 OR 90/10 PREFERENCE POINT SYSTEMS**

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

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

Where

P_s = Points scored for price of bid under consideration

P_t = Price of bid under consideration

$P_{\min}$ = Price of lowest acceptable bid

4. POINTS AWARDED FOR B-BBEE STATUS LEVEL OF CONTRIBUTOR

- 4.1 In terms of Regulation 6 (2) and 7 (2) of the Preferential Procurement Regulations, preference points must be awarded to a bidder for attaining the B-BBEE status level of contribution in accordance with the table below:

B-BBEE Status Level of Contributor	Number of points (90/10 system)	Number of points (80/20 system)
1	10	20
2	9	18
3	6	14
4	5	12
5	4	8
6	3	6
7	2	4
8	1	2
Non-compliant contributor	0	0

5. BID DECLARATION

- 5.1 Bidders who claim points in respect of B-BBEE Status Level of Contribution must complete the following:

6. B-BBEE STATUS LEVEL OF CONTRIBUTOR CLAIMED IN TERMS OF PARAGRAPHS 1.4 AND 4.1

- 6.1 B-BBEE Status Level of Contributor: = (maximum of 20 points)

(Points claimed in respect of paragraph 7.1 must be in accordance with the table reflected in paragraph 4.1 and must be substantiated by relevant proof of B-BBEE status level of contributor.

7. SUB-CONTRACTING

- 7.1 Will any portion of the contract be sub-contracted?

(Tick applicable box)

YES		NO	
-----	--	----	--

7.1.1 If yes, indicate:

i) What percentage of the contract will be subcontractedë ë ë ë ë .ë ë ë ë %

ii) The name of the sub-contractor ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ..

iii) The B-BBEE status level of the sub-contractorë ë ë ë ë ..

iv) Whether the sub-contractor is an EME or QSE

(Tick applicable box)

YES		NO	
-----	--	----	--

v) Specify, by ticking the appropriate box, if subcontracting with an enterprise in terms of Preferential Procurement Regulations,2017:

Designated Group: An EME or QSE which is at last 51% owned by:	EME √	QSE √
Black people		
Black people who are youth		
Black people who are women		
Black people with disabilities		
Black people living in rural or underdeveloped areas or townships		
Cooperative owned by black people		
Black people who are military veterans		
OR		
Any EME		
Any QSE		

8. **DECLARATION WITH REGARD TO COMPANY/FIRM**

8.1 Name of company/firm: ë ..

8.2 VAT registration number: ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë .ë ë ë ë ë ë ë ë ë ë ë ..

8.3 Company registration number: ë ë ë ë ë .ë ë ë ë ë ë ë ë ë .ë ë ë ë ë ë ë ë ë ë ..

8.4 TYPE OF COMPANY/ FIRM

- ☐ Partnership/Joint Venture / Consortium
☐ One-person business/sole propriety
☐ Close corporation
☐ Company
☐ (Pty) Limited

[TICK APPLICABLE BOX]

8.5 DESCRIBE PRINCIPAL BUSINESS ACTIVITIES

ë ..

ë ..

ë ..

ë ..

8.6 COMPANY CLASSIFICATION

- ☐ Manufacturer
☐ Supplier
☐ Professional service provider
☐ Other service providers, e.g. transporter, etc.

[TICK APPLICABLE BOX]

8.7 MUNICIPAL INFORMATION

Municipality where business is situated:

Registered Account Number:

Stand Number:

8.8 Total number of years the company/firm has been in business:

8.9 I/we, the undersigned, who is / are duly authorised to do so on behalf of the company/firm, certify that the points claimed, based on the B-BBE status level of contributor indicated in paragraphs 1.4 and 6.1 of the foregoing certificate, qualifies the company/ firm for the preference(s) shown and I / we 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 6.1, the contractor may be required to furnish documentary proof to the satisfaction of the purchaser that the claims are correct;
- iv) If the B-BBEE status level of contributor has been claimed or obtained on a fraudulent basis or any of the conditions of contract have not been fulfilled, the purchaser may, in addition to any other remedy it may have
 - (a) disqualify the person from the bidding 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 bidder or contractor, its shareholders and directors, or only the shareholders and directors who acted on a fraudulent basis, be restricted by the National Treasury 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.

WITNESSES

1.

2.

..... .

SIGNATURE(S) OF BIDDERS(S)

DATE:

ATTACH B-BBEE VERIFICATION CERTIFICATE

ANNEXURE A SUPPLY CHAIN MANAGEMENT

EVALUATION PROCESS AND CRITERIA

The following evaluation process and criteria will be used to evaluate all bids submitted:

1. Administrative Compliance – Phase One

1.1 All bids duly lodged will be examined to determine compliance with bidding requirements and conditions. Bids with obvious deviations from the requirements/conditions, will be eliminated from further evaluation.

1.2 Critical Criteria:

The following critical criteria have been identified for this bid and any noncompliance thereto will lead to the bid being regarded as non-responsive and disqualified from further evaluation:

- Provide a valid CSD number. (Attach CSD Registration Summary Report)
- All Pages of the Bid document must be initialed.
- Completed and signed declaration on past SCM practices form.
- Compulsory enterprise questionnaire completed.
- Signed J/V agreement must be attached (Where applicable).
- Proof of registration with CIDB attached.
- Proof of Municipal Rates and Taxes statement of account for the company and all the directors which are not older than three (3) months or Signed Valid lease agreement for service providers who are renting or leasing offices or Letter from tribal authority not older than 3 Months.
- Complete **MBD5** and submit Audited or Reviewed Financial Statements (**AFS**) for the last three (3) years. ñ (Only where the tender amount **exceeds R10mil** - including VAT).
- Complete and signing of the declaration of interest form (**MBD4**).
- All corrections made in the document, including bills of quantities, must be initialed.
- Bid document must be printed in colour coding as per page 5.

2. Functionality – Phase Two (50 points allocation)

The bidders who complied administratively are considered for further evaluation on ability to execute the project.

The assessment of functionality will be done in terms of the evaluation criteria and minimum threshold as specified. A bid will be disqualified if it fails to meet the minimum threshold for functionality as per the bid invitation.

2.1 Relevant Experience of Company (30 points)

This will take into consideration similar contracts successfully completed by the bidder.

NB. Proof of largest similar project must be attached (e.g Completion certificate). Failure to provide proof will result in disqualification of points.

The score will be calculated as follows:

$$R_t = \frac{L_c}{T_{avg}} \times R_{max}$$

Where:

R_t = Points for relevant experience of company

L_c = Largest similar contract over the last **three (3) years. (Determined on project size).**

T_{avg} = Average value of tendered amounts of eligible tenders.

R_{max} = Maximum points allocated for relevant experience of company.

(R max = 30)

2.2 Plant and Equipment (10 points)

This will be assessed against a minimum number of different types of plant and equipment required to successfully complete the project within the stipulated construction period as determined by the engineer.

Access to plant may be in a form of ownership, hire or leasing arrangements, orders etc. A letter of intent from hiring or leasing companies stating the number and type of plant and equipment on which arrangement has been made must be submitted. Any changes to the lease/hire agreement must be approved by the Municipality prior commencement.

NB. 50% of points will be allocated to equipment leased/hired.

Consultants Estimation				
(A) Plant and equipment required	points allocation	(B) Minimum Plant required	(C) Bidder Plant own	(D) Bidder Plant hire
TLB	3	1		
Excavator (20-ton minimum)	4	1		
10m3 Tipper Trucks	3	3		

NB. Proof of ownership on equipment indicated above must be submitted with the bid document. Failing to submit will result in disqualification of points.

2.3 Financial Status (10 points)

This will be assessed against Bank ratings as follows: **(Bank letter must be submitted)**

Bank Rating	Score
A	10
B	10
C	7
D	5
E	2
F,G,H	0

NB: A bid will be disqualified if it fails to meet the minimum threshold of 60% on functionality and a minimum of 15 points on relevant experience.

2.4 Commercial Risk Analysis

Prior to being recommended for further evaluation, a bid will be subjected to risk analysis to ensure that it would, if accepted, not place the Municipality or the bidder, at undue risk.

A risk analysis will be performed to ascertain if any of the following might present an unacceptable commercial risk to the Municipality:

- (a) Unduly low tendered sums
- (b) Unduly high individual rates
- (c) Unduly low rates
- (d) Imbalances in pricing

It is in the best interests of the Municipality to amend an error which will cause the bid to be rejected on the basis of it presenting an unacceptable commercial risk.

❖ EVALUATION OF BIDS

- a) All bids received shall be evaluated in terms of the Supply Chain Management Regulations, Polokwane Municipality Supply Chain Management Policy (on request from Municipality), the preferential procurement regulation 2017, and other applicable legislations.
 - b) The Council reserves the right to accept all, some, or none of the bids submitted ñ either wholly or in part ñ and it is not obliged to accept the lowest bid.
- ❖ **By submitting this bid, bidder authorises the Council or its delegate(s) to carry out any investigation deemed necessary to verify the correctness of the statements and documents submitted and that such documents reasonably reflect the ability of the Bidder to provide the goods and services required by the Council.**

PLEASE NOTE

- ❖ **The Municipal Manager may cancel a contract awarded to a person if:**
- a) The person committed a corrupt or fraudulent act during the procurement process or in the execution of the contract, or
 - b) An official or other role player committed any corrupt or fraudulent act during the procurement process or in the execution of the contract that benefited that person.
- ❖ **The Municipal Manager may reject the bid or quote of any person if that person or any of its directors has:**
- c) Failed to pay municipal rates and taxes or municipal service charges and such rates, taxes and charges are in arrears for more than three months;
 - d) Failed, during the last five years, to perform satisfactorily on a previous contract with the Polokwane Municipality or any other organ of State after written notice was given to that bidder that performance was unsatisfactory;
 - e) Abused the supply chain management system of the Municipality or have committed any improper conduct in relation to this system;
 - f) Been convicted of fraud or corruption during the past five years;
 - g) Wilfully neglected, reneged on or failed to comply with any government, municipal or other public sector contract during the past five years; or
 - h) Been listed in the Register for Tender Defaulters in terms of section 29 of the Prevention and Combating of Corrupt Activities Act (No. 12 of 2004) or has been listed on National Treasury's database as a person prohibited from doing business with public sector.

Tendered rates

Rates for all the bids which have complied with the bid conditions will be assessed for the following:

- Comparison of rates and amounts with the average tendered amount.
- Sensitivity Analysis of Rates (i.e. whether the rates are balanced, acceptable, etc).
- Expected cash flows requirements.

NB: Bids with unbalanced rates will be disqualified for further evaluation on price and preference points system

3 Business Registration

Prospective bidders shall be registered:

- a) With the South African Revenue Services for all categories of taxes applicable to it.
- b) Central Supplier Database (CSD)
- c) With the Compensation Commissioner
- d) With the Construction Industry Development Board. (Minimum grading of **6CE** is required).

4 Acceptance of Tender Offer (Cl. F3.13)

Tender offers will only be accepted if:

- a) The bidder has in his or her possession a Central Suppliers Database Registration Number (CSD Number);
- b) The bidder is registered with the Construction Industry Development Board in an appropriate contractor grading designation. (Minimum grading of **6CE** is required);
- c) The bidder or any of its principals 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; and
- d) The bidder has not abused the Employer's Supply Chain Management System.
- e) The bidder has not failed to perform on any previous contract.
- f) has complete the Compulsory Enterprise Questionnaire 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 tender process.

5. Provide copies of the Contract Document (Cl. F3.18)

The number of paper copies of the signed Contract to be provided by the Employer to the successful bidder is **one**

Annexure A: Standard Conditions of Tender

F.1 General

F.1.1 Actions

The employer and each Tenderer submitting a Tender offer shall comply with these conditions of Tender. In their dealings with each other, they shall discharge their duties and obligations as set out in F.2 and F.3, timeously and with integrity, and behave equitably, honestly and transparently.

F.1.2 Tender Documents

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

F.1.3 Interpretation

F.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.

F.1.3.2 These conditions of Tender, the Tender data and Tender schedules which are only required for Tender evaluation purposes, shall not form part of any contract arising from the invitation to Tender.

F.1.3.3 For the purposes of these conditions for the calling for expressions of interest, the following definitions apply:

- a) **Comparative offer** means the Tenderer's financial offer after the factors of non-firm prices, all unconditional discounts and any other Tendered parameters that will affect the value of the financial offer have been taken into consideration
- b) **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; and
- c) **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
- d) **Quality (functionality)** means the totality of features and characteristics of a product or service that bear on its ability to satisfy stated or implied needs

F.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 read, copied and recorded. Writing 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.

F.1.5 The employer's right to accept or reject any Tender offer

F.1.5.1 The employer may accept or reject any variation, deviation, Tender offer, or alternative Tender offer, and may cancel the Tender process and reject all Tender offers at any time before the formation of a contract. The employer shall not accept or incur any liability to a Tenderer for such cancellation and rejection, but will give written reasons for such action upon written request to do so.

F.1.5.2 The employer may not subsequent to the cancellation or abandonment of a Tender process or the rejection of all responsive Tender offers re-issue a Tender covering substantially the same scope of work within a period of six months unless only one Tender was received and such Tender was returned unopened to the Tenderer.

F.2 Bidder's obligations**F.2.1 Eligibility**

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.

F.2.2 Cost of Tendering

Accept that 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 satisfy requirements.

F.2.3 Check documents

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

F.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.

F.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.

F.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.

F.2.7 Clarification meeting

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

F.2.8 Seek clarification

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

F.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.

F.2.10 Pricing the Tender offer

F.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 14 days before the closing time stated in the Tender data.

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

F.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.

F.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.

F.2.11 Alterations to documents

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. Erasures and the use of masking fluid are prohibited.

F.2.12 Alternative Tender offers

F.2.12.1 Submit alternative tender offer only if a main tender offer, strictly in accordance with all the requirements of the tender document, is also submitted. The alternative tender offer is to be submitted with the main tender offer together with a schedule that compares the requirements of the tender document with the alternative requirements the tenderer proposes.

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

F.2.13 Submitting a Tender offer

F.2.13.1 Submit a Tender offer to provide the whole of the works, services or supply identified in the contract data and described in the scope of works, unless stated otherwise in the Tender data.

F.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 in black ink.

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

F.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 Tenderers proposing to contract as joint ventures shall state which of the signatories is the lead partner whom the employer shall hold liable for the purpose of the Tender offer.

F.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.

F.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.

F.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.

F.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.

F.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.

F.2.15 Closing time

F.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. Proof of posting shall not be accepted as proof of delivery. The employer shall not accept Tender offers submitted by telegraph, telex, facsimile or e-mail, unless stated otherwise in the Tender data.

F.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.

F.2.16 Tender offer validity

F.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.

F.2.16.2 If requested by the employer, consider extending the validity period stated in the Tender data for an agreed additional period.

F.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 total of the prices or substance of the Tender offer is sought, offered, or permitted. The total of the prices stated by the Tenderer shall be binding upon the Tenderer.

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

F.2.18 Provide other material

F.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.

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

F.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.

F.2.20 Submit securities, bonds, policies, etc.

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.

F.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.

F.2.22 Return of other Tender documents

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

F.2.23 Certificates

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

F.3 The employer's undertakings**F.3.1 Respond to clarification**

Respond to a request for clarification received up to five working days before the Tender closing time stated in the Tender Data and notify all Tenderers who drew procurement documents.

F.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 seven days before the Tender closing time stated in the Tender Data. If, as a result a Tenderer applies for an extension to the closing time stated in the Tender Data, the Employer may grant such extension and, shall then notify all Tenderers who drew documents.

F.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.

F.3.4 Opening of Tender submissions

F.3.4.1 Unless the two-envelope system is to be followed, open valid Tender submissions in the presence of Tenderers' agents who choose to attend at the time and place stated in the Tender data. Tender submissions for which acceptable reasons for withdrawal have been submitted will not be opened.

F.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, the total of his prices, preferences claimed and time for completion, if any, for the main Tender offer only.

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

F.3.5 Two-envelope system

F.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 Tenderers' agents who choose to attend at the time and place stated in the Tender data and announce the name of each Tenderer whose technical proposal is opened.

F.3.5.2 Evaluate the quality of the technical proposals offered by Tenderers, then advise Tenderers who remain in contention for the award of the contract of the time and place when the financial proposals will be opened. Open only the financial proposals of Tenderers, who score in the quality evaluation more than the minimum number of points for quality stated in the Tender data, and announce the score obtained for the technical proposals and the total price and any preferences claimed. Return unopened financial proposals to Tenderers whose technical proposals failed to achieve the minimum number of points for quality.

F.3.6 Non-disclosure

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

F.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.

F.3.8 Test for responsiveness

F.3.8.1 Determine, on 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.

F.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) Detrimentially affect the scope, quality, or performance of the works, services or supply identified in the Scope of Work,
- b) Change the Employer's or the Tenderer's risks and responsibilities under the contract, or,
- c) Affect the competitive position of other Tenderers presenting responsive Tenders, if it were to be rectified. Reject a non-responsive Tender offer, and not allow it to be subsequently made responsive by correction or withdrawal of the non-conforming deviation or reservation.

F.3.9 Arithmetical errors

F.3.9.1 Check responsive Tender offers for arithmetical errors, correcting them in the following manner:

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

- b) If bills of quantities (or schedule of quantities or schedule of rates) apply and there is an error in the line item total resulting from the product of the unit rate and the quantity, the line item total shall govern and the rate shall be corrected. Where there is an obviously gross misplacement of the decimal point in the unit rate, the line item total as quoted shall govern, and the unit rate shall be corrected.
- c) Where there is an error in the total of the prices either as a result of other corrections required by this checking process or in the Tenderer's addition of prices, the total of the prices shall govern and the Tenderer will be asked to revise selected item prices (and their rates if bills of quantities apply) to achieve the Tendered total of the prices.

F.3.9.2 Consider the rejection of a Tender offer if the Tenderer does not correct or accept the correction of his arithmetical errors in the manner described in F.3.9.1.

F.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.

F.3.11 Evaluation of Tender offers

F.3.11.1 General

Appoint an evaluation panel of not less than three persons. Reduce each responsive Tender offer to a comparative offer and evaluate it using the Tender evaluation method that is indicated in the Tender Data and described below:

Method 1: Financial offer	1) Rank Tender offers from the most favourable to the least favourable comparative offer.
	2) Recommend highest ranked Tenderer for the award of the contract, unless there are compelling and justifiable reasons not to do so.
Method 2: Financial offer and preferences	1) Score Tender evaluation points for financial offer.
	2) Confirm that Tenderers are eligible for the preferences claimed and if so, score Tender evaluation points for Preferencing.
	3) Calculate total Tender evaluation points.
	4) Rank Tender offers from the highest number of Tender evaluation points to the lowest.
	5) Recommend Tenderer with the highest number of Tender evaluation points for the award of the contract, unless there are compelling and justifiable reasons not to do so.
Method 3: Financial offer and quality	1) Score quality, rejecting all Tender offers that fail to score the minimum number of points for quality stated in the Tender data.
	2) Score Tender evaluation points for financial offer.
	3) Calculate total Tender evaluation points.
	4) Rank Tender offers from the highest number of Tender evaluation points to the lowest.
	5) Recommend Tenderer with the highest number of Tender evaluation points for the award of the contract, unless there are compelling and justifiable reasons not to do so.
Method 4: Financial offer, quality and preferences	1) Score quality, rejecting all Tender offers that fail to score the minimum number of points for quality stated in the Tender data.
	2) Score Tender evaluation points for financial offer.
	3) Confirm that Tenderers are eligible for the preferences claimed, and if so, score Tender evaluation points for Preferencing.

	4) Calculate total Tender evaluation points.
	5) Rank Tender offers from the highest number of Tender evaluation points to the lowest.
	6) Recommend Tenderer with the highest number of Tender evaluation points for the award of the contract, unless there are compelling and justifiable reasons not to do so.

Score financial offers, preferences and quality, as relevant, to two decimal places.

F.3.11.2 Scoring Financial Offers

Score the financial offers of remaining responsive Tender offers using the following formula:

$$NFO = W1 \times A$$

where:

NFO = the number of Tender evaluation points awarded for the financial offer.

W1 = the maximum possible number of Tender evaluation points awarded for the financial offer as stated in the Tender Data.

A = a number calculated using either formulas 1 or 2 below as stated in the Tender Data.

Formula	Comparison aimed at achieving	Option 1	Option 2
1	Highest price or discount	$A = (1 + \frac{P - P_m}{P_m})$	$A = P / P_m$
2	Lowest price or percentage commission / fee	$A = (1 - \frac{P - P_m}{P_m})$	$A = P_m / P$

where:

P_m = the comparative offer of the most favourable Tender offer.

P = the comparative offer of Tender offer under consideration.

F.3.11.3 Scoring quality (functionality)

Score quality in each of the categories in accordance with the Tender Data and calculate total score for quality.

F.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.

F.3.13 Acceptance of Tender offer

F.3.13.1 Accept Tender offer only if the Tenderer complies with the legal requirements stated in the Tender Data.

F.3.13.2 Notify the successful Tenderer of the employer's acceptance of his Tender offer by completing and returning one copy of the form of offer and acceptance before the expiry of the validity period stated in the Tender data, or agreed additional period. Providing the form of offer and acceptance does not contain any qualifying statements, it will constitute the formation of a contract between the employer and the successful Tenderer as described in the form of offer and acceptance.

F.3.14 Notice to unsuccessful Tenderers

After the successful Tenderer, has acknowledged the employer's notice of acceptance, notify other Tenderers that their Tender offers have not been accepted.

F.3.15. Prepare contract documents

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,
- c) other revisions agreed between the employer and the successful Tenderer, and
- d) the schedule of deviations attached to the form of offer and acceptance, if any.

F.3.16 Issue final contract

Prepare and issue the final draft of contract documents to the successful Tenderer for acceptance as soon as possible after the date of the employer's signing of the form of offer and acceptance (including the schedule of deviations, if any). Only those documents that the conditions of Tender require the Tenderer to submit, after acceptance by the employer, shall be included.

F.3.17 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.

F.3.18 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.

A: SCHEDULE OF LABOUR CONTENT

The Tenderer must complete the table below to reflect the labour force anticipated to be employed on this contract, including labour employed by sub-contractors.

The specified target value is **8%** of the contract value

Type of Labour	Man-hours	Minimum Wage Rate per Unit	Total Wage Cost (Excl VAT)
Permanent Labour			
Temporary Labour			
SMME/HDI's Labour			
TOTAL PERCENTAGE			

Notes to Tenderer:

- (1) Labour is defined as hourly paid personnel.
- (2) The penalty will be applied for non-compliance during the contract or for fraudulent disclosure
- (3) The minimum wage rate to be R191.60 per day
- (4) It's not expected from the Contractor to employ EPWP Local Labourer target for the whole duration of the project.

SIGNED ON BEHALF OF THE TENDERER: ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë .

B: EMPLOYMENT OF AFFIRMATIVE BUSINESS ENTERPRISE (ABE)

Target values of work to be executed by and goods & services to be procured from ABEs shall be **10%**.

Schedule Item No	Name of ABE	Item Description/ Goods & Services to be provided	Value	
			Rands (Excl VAT)	% of Tender Sum (Excl VAT)
TOTAL				

Notes to tenderer:

1. Regardless whether the tenderer fits the classification of an SMME/PDI, as defined in Section 3.3 of this specification, the tenderer nevertheless retains the obligation to commit to the target values prescribed
2. Tenderers shall insert “unknown” if an SMME/PDI has not been selected prior to tender closing date.
3. The penalty will be applied for non-compliance during the contract or for fraudulent disclosure

SIGNED ON BEHALF OF THE TENDERER ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

B.1 EMPLOYMENT OF AFFIRMATIVE BUSINESS ENTERPRISE DECLARATION AFFIDAVIT (ABE).

It is understood and agreed that should this contract be awarded to me, an ABE Declaration Affidavit will be completed by each and every ABE employed by me on this contract and will be submitted to the Employer immediately upon demand by the Employer.

SIGNED ON BEHALF OF THE TENDERER ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

1. GENERIC TRAINING

Name of Training Institution:ë ë

Name of Programme:ë ë

Trainer's Name	Qualification	Subject

Notes to tenderer:

Provide details here, or attach hereto, the subjects to be covered and the manner in which the training is to be delivered.

SIGNED ON BEHALF OF THE TENDERERë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

2. ENGINEERING STUDENT TRAINING

Name of Training Institution:ë ë

Name of Programme:ë ë

Trainer's Name	Qualification	Subject

Notes to tenderer:

1. Provide details here, or attach hereto, the subjects to be covered and the manner in which the training is to be delivered.
2. Provision should also include on-job student / (in-service) training for the duration of the contract at a monthly stipend of R 4 500.00

SIGNED ON BEHALF OF THE TENDERER ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

POLOKWANE MUNICIPALITY

T2.1 List of Returnable Documents

The Tenderer must complete the following returnable documents:

1. Returnable Schedules required only for Tender evaluation purposes

- A. Certificate of Authority of Signatory
- B. Certificate of Registration with the Construction Industry Development Board
- C. Certificate of authority for joint ventures (where applicable)
- D. Compulsory Enterprise Questionnaire
- E. Record of Addenda to Tender Documents
- F. Proposed Amendments and Qualifications
- G. Form of Intent to Provide a Demand Guarantee
- H. Schedule of Subcontractors
- I. Schedule of Available Infrastructure, Resources and Experience
- J. Financial Information of the Bidder
- K. Certificate for Municipal Services and Payments: Annexure B
- L. Authorisation for deduction of outstanding amounts owed to Municipality: Annexure C
- M. Declaration of Bidder's Past Supply Chain Management Practices: MBD 8
- N. Declaration of interest: MBD 4
- O. Declaration for procurement above R10 Million: MBD 5
- P. Declaration certificate for local production and content: MBD 6.2
- Q. National industrial participation programme: SBD 5
- R. Certificate of the Independent Bid Determination: MBD 9
- S. Compliance with OHSA (Act 85 of 1993)
- T. B-BBEE Verification Certificate
- U. Original Bank rating letter not older than 30 days and related to the project.
- V. Proof of an accredited person, registered and certified as an installation electrician MUST be attached.

2. Other documents required only for Tender evaluation purposes

- Compensation Fund Registration Certificate
- Curricula Vitae of Personnel
- Rates of Labour and Materials (Day work Rates)
- A valid CSD number to be provided.
- Schedule of Labour Content
- Employment of ABE's
- ABE Declaration Affidavit
- Generic Training
- Complete MBD 5 where the bid amount inclusive of VAT exceeds R 10 million
- Complete and signed Declaration of Interest (MBD 4)

3. Other documents that will be incorporated into the contract

- 3.1 The offer portion of the C1.1 Offer and Acceptance
- 3.2 C1.2 Contract Data (Part 2)
- 3.3 C2.2 Bills of Quantities

T2.2 List of Returnable Documents**CERTIFICATE OF AUTHORITY OF SIGNATORY**

Indicate the status of the Tenderer by ticking the appropriate box hereunder. The Tenderer must complete the certificate set out below for the relevant category.

1	Company	
---	---------	--

2	Partnership	
---	-------------	--

3	Joint Venture	
---	---------------	--

4	Sole Proprietor	
---	-----------------	--

5	Close Corporation	
---	-------------------	--

A. Certificate for company

I, _____, chairperson of the board of directors of
 _____, hereby confirm that by resolution
 of the board (copy attached) taken on _____ 20____, Mr/Ms
 _____, acting in the capacity
 of _____, was authorised to sign all documents in
 connection with this Tender and any contract resulting from it on behalf of the
 company.

As witnesses:

1.

.....
 Chairman

.....
 Print Name

.....
 Print Name

2.

.....
 Date

.....
 Print Name

B. Certificate of partnership

We, the undersigned, being the key partners in the business trading as

....., hereby

authorise Mr/Ms, acting

in the capacity of, to sign all documents in

connection with the Tender for Contract, and

any contract resulting from it on our behalf.

Name	Address	Signature	Date

NOTE: This certificate is to be completed and **signed by each and all of the key partners** upon whom rests the direction of the affairs of the Partnership as a whole.

C. Certificate for Joint Venture

We, the undersigned, are submitting this Tender offer in Joint Venture and hereby

authorize Mr/Ms, authorised signatory of the

firm, acting in the capacity of lead partner, to

sign all documents in connection with the Tender offer for Contract

..... and any contract resulting from it on our behalf.

This authorisation is evidenced by the attached power of attorney signed by legally

authorised signatories of all the partners to the Joint Venture.

Name of Firm	Address	Authorising	
		Signature	Name
Lead Partner			

D. Certificate for sole proprietor

I, _____, hereby confirm that I am the sole owner of the business trading

as _____ ...

As witnesses:-

1. _____

Print Name

Signature: Sole Owner

Print Name
2. _____

Print Name

Print Name

Print Name

Date

E. Certificate for Close Corporation

We, the undersigned, being the key members in the business trading as _____ hereby

authorise Mr/Ms _____, to

act in the capacity of _____, to sign all documents in

connection with the Tender for Contract _____ and

any contract resulting from it on our behalf.

Name	Address	Signature	Date

Note: This Certificate is to be completed and signed by each and all of the key members upon whom rests the direction of the affairs of the Close Corporation as a whole.

CERTIFICATE OF REGISTRATION WITH THE CONSTRUCTION INDUSTRY DEVELOPMENT BOARD

1. General

The Register of Contractors is established by the Construction Industry Development Board in terms of the CIDB Act 38 of 2000 and Construction Industry Development Regulations as published in Government Gazette number 26427 of 2004.

The Act makes it mandatory for public sector clients to apply this register when considering Tenders. Any enterprise that submits a Tender or enters into contract for construction works with the public sector, must be registered.

Once-off joint ventures do not have to register, provided that each partner of the joint venture is separately registered.

2. Status

Tenderers shall fill in the following sections of this form, depending on their status:

2.1 Section A

Tenderers who have accomplished registration and can provide proof of their grading designation.

2.2 Section B

Tenderers who are in the process of registration of an update to an existing registration or a renewal.

2.3 Section C

Tenderers who have submitted the first application.

2.4 Section D

Tenderers submitting this Tender offer in Joint Venture and can provide proof that each partner of the Joint Venture is separately registered.

SECTION B

I, _____, acting in capacity of _____ was authorised to sign all documents in connection with this tender and any contract resulting from it on

behalf of the following entity: _____ hereby declare that the above mentioned entity has achieved registration with the Construction Industry Development Board on date _____, furthermore declare that the existing grading designation is:

Contract Value	
----------------	--

Type of Work		
--------------	--	--

and the following update has been applied for:

Amendment of category status	
Change of Particulars	
Annual confirmation of Particulars	
Renewal of Registration	

mark with "❄"

Signature of Tenderer

Signature of Witness

Print Name

Print Name

SECTION C

I, _____, acting in capacity of _____ was authorised to sign all documents in connection with this tender and any contract resulting from it on

behalf of the following entity: _____ hereby declare that the above mentioned entity has submitted its FIRST APPLICATION FOR REGISTRATION with the Construction Industry Development board on date _____.

I furthermore accept that failure to achieve registration with the Construction Industry Development Board in a category stipulated in the Tender Data within 10 days from the date of closing this tender, implies a non-responsive tender and warrants rejection of the Tender on account of non-compliance with the requirements of the Tender Data.

Signature of Tenderer

Signature of Witness

Print Name

Print Name

SECTION D

I, _____, acting in capacity of the LEAD PARTNER in the Joint Venture _____ was authorised to sign all documents in connection with this tender and any contract resulting from it, hereby declare that each partner of the Joint Venture is separately registered with the Construction Industry Development Board and declare that the grading designation is reflected in the following **symbols** on the registration certificates:

Name of Lead Partner:		
Contract Value		
Type of Work		

Name of 2 nd Partner:		
Contract Value		
Type of Work		

Name of 3 rd Partner:		
Contract Value		
Type of Work		

Signature of Tenderer

Signature of Witness

Print Name

Print Name

CERTIFICATE OF AUTHORITY FOR JOINT VENTURES (WHERE APPLICABLE)

Employer: ë

Contract Number: ë

NOTE 1 This form need only be completed in the event of a Joint Venture submitting this Tender.

NOTE 2 Fill in all the information requested in the spaces provided. Attach additional sheets if required.

NOTE 3 Provide a copy of the Joint Venture agreement. Demonstrate that the partners to the Joint Venture share in the ownership, control, management responsibilities, risks and profits of the Joint Venture. The Joint Venture agreement shall include specific details relating to:

- a) the contributions of capital and equipment;
- b) portions of the Contract to be performed by the partner's own resources; and
- c) portions of the Contract to be performed under the supervision of each partner.

NOTE 4 Provide copies of all written agreements between partners concerning the Joint Venture, including those that relate to ownership options and to restrictions/limits regarding ownership and control.

1. Joint Venture Particulars

Name ë

Postal Address: ë

Physical Address

ë ë

ë ë

Telephoneë ë

Faxë ë ë ë .ë ë

Name of authorized representativeë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

2. Identity of Partner No. 1Nameë
.....

Postal Address ë

Physical Address ë

ë ë

Telephoneë ë

3.

Postal Addressë ..

.ë .

Faxe ë .ë ...

4.

Postal Addressë ...

ë ë

Faxe ë .ë ...

5.

ë ...

ë ...

ë ...

6.

Partner No. 2 ë ë ë ë ë ë ë ë ë ë ..%

Partner No. 3 ë ë ë ë ë ë ë ë ë ..%

(ii) Partner percentage in respect of:

1. Profit and loss sharing:

Partner No. 1 ë ë ë ë ë ë ë ë ë ..%

Partner No. 2 ë ë ë ë ë ë ë ë ë ..%

Partner No. 3 ë ë ë ë ë ë ë ë ë ..%

2. Initial capital contribution

Partner No. 1 Rë ë ë ë ë ë ë ë ë .

Partner No. 2 Rë ë ë ë ë ë ë ë ë .

Partner No. 3 Rë ë ë ë ë ë ë ë ë .

(iii) Anticipated ongoing capital contributions:

Partner No. 1 R.....

Partner No. 2 R.....

Partner No. 3 R.....

(iv) Contributions of equipment (specify types, quality and quantities of equipment) to be provided by each partner:

Partner No. 1: ë .

ë ...

Partner No. 2:ë ..ë ë ë ë ...

ë ë

Partner No. 3:ë ..ë ë ë ...

ë ë

7. Recent contracts performed by partners in their own right or as partners in other joint ventures

a) Partner No. 1

(i) ë ..

(ii) ë ...

(iii) ë ..ë ...

(iv) ë ë ë ë ë ë ë ë ë ..ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ..

(v) ë ..ë ë ë ë ë ë ë ..

b) Partner No. 2

(i) ë ..

(ii)ë ...

(iii) ë ..ë ...

(iv) ë ë ë ë ë ë ë ë ë ..ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ...

(v) ë ..ë ë ë ë ë ë ë ...

c) Partner No. 3

(i) ë ..

(ii)ë ...

(iii) ë ..ë ...

(iv) ë ë ë ë ë ë ë ë ë ..ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ...

(v) ë ..ë ë ë ë ë ë ë ...

8. Control and participation in the joint venture

(Identify by name and firm those individuals who are, or will be, responsible for, and have authority to engage in the relevant management functions and policy and decision making, indicating any limitations in their authority, for example, co-signature requirements and monetary limits).

a) Joint Venture cheque signing

ë ë

ë ë

ë ë

b) Authority to enter into contracts on behalf of the Joint Venture

ë ë

ë

ë

c) Signing, co-signing or collateralizing of loans

ë ë

ë ë

ë ë

d) Acquisition of lines of credit

ë ë

ë ë

ë ë

e) Acquisition of demand bonds

ë ë

ë ë

ë ë

f) Negotiating and signing of labour agreements

ë ë

ë ë

ë ë

9. Management of the performance of the Contract

(Fill in the name and firm of the responsible person)

a) Supervision of field operationsë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ...ë

ë .ë ë

b) Major purchasingë ..

ë .ë ë

c) Estimating ë

ë .ë ë

d) Technical managementë ë ë ë ë ...ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

ë .ë ë

10. Management and control of the joint venture

a) Identify the managing partner

ë ë

ë ë

ë ë

b) What authority does each partner have to commit or obligate the other to financial institutions, insurance companies, suppliers, subcontractors or other parties participating in the performance of the contemplated works:

Partner No. 1: ë .

...ë ë

Partner No. 2: ë .

....ë ë

Partner No. 3: ë .

..ë ë

- c) Describe the management structure for the joint venture's work under this Contract

Management Function/Designation	Name	Partner

11. Personnel

- a) State the approximate number of operative personnel (by trade/function/discipline) needed to execute the Joint Venture contract.

Trade/function/discipline	Number

- b) State the number of operative personnel to be employed on the Contract who are currently in the employ of partners:

ë ë

- c) State the number of operative personnel who are not currently in the employ of the respective partners and shall be engaged on the project by the Joint Venture:

ë ë

- d) State the name of the individual who shall be responsible for hiring Joint Venture employees:

ë ë

- e) State the name of the partner who shall be responsible for the preparation of Joint Venture payrolls:

ë ë ë ..ë ë

ë ë

12. Services

List the firms who provide the following services:

Service	Name	Contact Person	Telephone No.
Accounting			
Auditing			
Banking			
Insurance			
Legal			

13. Control and structure of the Joint Venture

Briefly describe the manner in which the Joint Venture is structured and controlled.

ë ë

ë ë

ë ë

The undersigned warrants that he/she is duly authorised to sign this Joint Venture disclosure form and affirms that the foregoing statements are correct and include all the material information necessary to identify and explain the terms and operations of the Joint Venture and the intended participation of each partner in the undertaking.

The undersigned further covenants and agrees to provide the Employer with complete and accurate information regarding actual joint venture work and the payment therefore, and any proposed changes in any provisions of the Joint Venture Agreement, and to permit the audit and examination of the books, records and files of the Joint Venture, or those of each partner relevant to the Joint Venture, by duly authorized representatives of the Employer.

Duly authorized to sign on behalf ofë .
(the Joint Venture)

Signature: Print Name:

Address:

.....

Telephone:

Date:

Duly authorized to sign on behalf ofë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

(Partner No. 1)

Signature:Print Name:

Address:

.....

Telephone:

Date:

Duly authorized to sign on behalf ofë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

(Partner No. 2)

Signature:Print Name:

Address:

.....

Telephone:

Date:

Duly authorized to sign on behalf ofë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

(Partner No. 3)

Signature:Print Name:

Address:

.....

Telephone:

Date:

COMPULSORY ENTERPRISE QUESTIONNAIRE

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: Particulars of sole proprietors and partners in partnerships

Name*	Identity number*	Personal income tax number*

* Complete only if sole proprietor or partnership and attach separate page if more than 3 partners

Section 5: Particulars of companies and close corporations

Company registration number

Close corporation number

Tax reference number

Section 6: Record in the service of the state

Indicate by marking the relevant boxes with a cross, if any sole proprietor, partner in a partnership or director, manager, principal shareholder or stakeholder in a company or close corporation is currently or has been within the last 12 months in the service of any of the following:

- | | |
|---|---|
| <ul style="list-style-type: none"> • a member of any municipal council • a member of any provincial legislature • a member of the National Assembly or the National Council of Province • a member of the board of directors of any municipal entity <ul style="list-style-type: none"> • an official of any municipality or municipal entity | <ul style="list-style-type: none"> ☐ an employee of any provincial department, national or provincial public entity or constitutional institution within the meaning of the Public Finance Management Act, 1999 (Act 1 of 1999) ☐ a member of an accounting authority of any national or provincial public entity ☐ an employee of Parliament or a provincial legislature |
|---|---|

If any of the above boxes are marked, disclose the following:

Name of sole proprietor, partner, director, manager, principal shareholder or stakeholder	Name of institution, public office, board or organ of state and position held	Status of service (tick appropriate column)	
		Current	Within last 12 months

*insert separate page if necessary

Section 7: Record of spouses, children and parents in the service of the state

Indicate by marking the relevant boxes with a cross, if any spouse, child or parent of a sole proprietor, partner in a partnership or director, manager, principal shareholder or stakeholder in a company or close corporation is currently or has been within the last 12 months been in the service of any of the following:

• a member of any municipal council • a member of any provincial legislature • a member of the National Assembly or the National Council of Province • a member of the board of directors of any municipal entity • an official of any municipality or municipal entity	☐ an employee of any provincial department, national or provincial public entity or constitutional institution within the meaning of the Public Finance Management Act, 1999 (Act 1 of 1999) ☐ a member of an accounting authority of any national or provincial public entity ☐ an employee of Parliament or a provincial legislature
---	---

Name of spouse, child or parent	Name of institution, public office, board or organ of state and position held	Status of service (tick appropriate column)	
		Current	Within last 12 months

*insert separate page if necessary

The undersigned, who warrants that he / she is duly authorised to do so on behalf of the enterprise:

1. authorizes the Employer to obtain a tax clearance certificate from the South African Revenue Services that my / our tax matters are in order;
2. 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;
3. 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;
4. confirms that I / we are not associated, linked or involved with any other Tendering entities submitting Tender offers and have no other relationship with any of the Tenderers or those responsible for compiling the scope of work that could cause or be interpreted as a conflict of interest; and
5. 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	
Enterprise name			

RECORD OF ADDENDA TO TENDER DOCUMENTS

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

No.	Date	Title or Details

Attach additional pages if more space is required.

Signed		Date	
Name		Position	
Tenderer			

PROPOSED AMENDMENTS AND QUALIFICATIONS

The Tenderer should record any deviations or qualifications he may wish to make to the Tender documents in this Returnable Schedule. Alternatively, a Tenderer may state such deviations and qualifications in a covering letter to his Tender and reference such letter in this schedule.

The Tenderer's attention is drawn to clause F.3.8 of the Standard Conditions of Tender referenced in the Tender Data regarding the employer's handling of material deviations and qualifications.

Page	Clause or item	Proposal	
Signed		Date	
Name		Position	
Tenderer			

FORM OF INTENT TO PROVIDE A DEMAND GUARANTEE

If my/our Tender is accepted, I/we will, when required and within the time stipulated, provide a guarantee of

(*) Insurance Company (name) _____ ..

(of address) _____ .

(*) Commercial Bank (Name) _____

(Branch) _____ ..

(of address) _____ .

to be approved by you, the Employer, for the amount stipulated.

(*): delete whichever is not applicable.

I/we understand that failure to produce an acceptable Demand Guarantee within the stipulated period is a fundamental breach of Contract, entitling the Employer to:

- (i) withhold all payments which may be due to the Contractor pending compliance with the stipulated requirements to produce an acceptable Demand Guarantee.
- (ii) instruct the Contractor to cease all work pending provision of the Demand Guarantee, and
- (iii) cancel the Contract.

Signed	_____ .	Date	_____ .
Print Name	_____	Position	_____
Tenderer	_____ .		

SCHEDULE OF PROPOSED SUBCONTRACTORS

We notify you that it is our intention to employ the following Subcontractors for work in this contract. If we are awarded a contract, we agree that this notification does not change the requirement for us to submit the names of proposed Subcontractors in accordance with requirements in the contract for such appointments. If there are no such requirements in the contract, then your written acceptance of this list shall be binding between us.

We confirm that all Subcontractors who are contracted to construct a house are registered as home builders with the National Home Builders Registration Council.

No	Name and address of proposed Subcontractor	Nature and extent of work	Previous experience with Subcontractor.
1.			
2.			
3.			
4.			
5.			
Signed		Date	
Name		Position	
Tenderer			

SCHEDULE OF AVAILABLE INFRASTRUCTURE, RESOURCES AND EXPERIENCE**1. Bidder's List of Third Party Design Engineers**

In the event that the Tenderer desires to design all or part of the Works or submit any alternative, he/she shall list here-following, the Design Engineers, accomplished in the specific field of practice, which he/she proposes to employ for the purpose of third party certification of all works designed by the Tenderer for the Works.

- Notes: (i) All costs of third party designs shall be borne solely by the Tenderer.
(ii) This Schedule must be accurately completed. Phrases such as 'to be advised' will not be accepted.

Section of Works	Name and Address of Registered Engineer				ECSA Registration No.

2. Tenderer's Personnel Profile

Key Staff Permanently employed, of foreman level and above	Number of staff
Sub-Total	
Other Permanent Staff	Number of staff
Sub-Total	
Temporary Staff	Number of staff
Sub-Total	

10. Has work previously been performed for the Employer? YES/NO* -

Specifyë ë

11. Tenderer's Financial Ability to execute and complete the Works

Provide the estimated cash flow on the project in terms of submissions of payment certificates or payment schedules of the Employer.

NOTES APPLICABLE:

- (i) Value added tax to be included in all amounts
- (ii) Assume for the purpose of this estimate, payment of certificates within 30 days after receipt by the Employer.
- (iii) In calculation of the last column,
 $j = d$ $m = l + g$
 $k = j + e$ $n = m + h$
 $l = k + f$ etc
- (iv) Failure to detail the required information, shall automatically signify that the Tenderer lacks the infrastructure and resources necessary to execute and complete the Works

Month No. in Contract Period	Estimated amount in Rands (VAT included)			
	a Received	b Payments made	a-b Net cash flow	Cumulative cash flow
1	-		d	j
2			e	k
3			f	l
4			g	m
5			h	n
6			etc.	etc.
7				
8				
9				
10				
11				
12				
Maximum negative cash flow. Take the largest negative number in the last column and write in here → → → → →				
Signed	ë ë ë ë ë ë ë ë ë ë ë ë ë ë .		Date	ë ë ë ë ë ë ë ë ë ë ë ë ë ë .
Print Name	ë ë ë ë ë ë ë ë ë ë ë ë ë ë .		Position	ë ë ë ë ë ë ë ë ë ë ë ë ë ë .
Tenderer	ë .			

FINANCIAL INFORMATION OF TENDERER

This information sheet has to be filled in by the financier of the Tenderer, duly signed and stamped on behalf of the financial institution he represents.

Tenderer Details

Tender Description : _____ .

Contract Period : _____ .

Name of Tenderer : _____ .

Bank Account Number : _____ .

Tendered Amount : _____ .

Demand Guarantee will be provided by this Bank: YES ☐ NO ☐

If yes, state amount of Demand Guarantee: R _____

Financial Institution

Name of Commercial Bank : _____ .

Branch : _____ .

Name of Bank Manager : _____ .

Telephone Number : _____ .

I / We acting on behalf of the above Commercial Bank confirm that

_____ . (Tenderer)

has operated an account with us for the last years.

We have been requested to provide a bank rating based in relation to the financial capability of the Tenderer, taking into account directives set out in the following two tables.

Financial Capability	
Maximum value of contract that the Tenderer is considered capable of	Value on which Bank Rating must be used
up to R300 000	R24 000
R1 000 000	R78 000
R3 000 000	R240 000
R5 000 000	R480 000
R10 000 000	R900 000
R30 000 000	R2 400 000
R100 000 000	R7 800 000

The value on which our Bank Rating of the Tenderer is based is R _____ .

(In words _____ only)

The Bank Rating is code:

ANNEXURE: B**CERTIFICATE FOR MUNICIPAL SERVICES AND PAYMENTS**

TO: MUNICIPAL MANAGER, POLOKWANE MUNICIPALITY

FROM: _____(Name of Tenderer)

FURTHER DETAILS OF TENDERER(S); DIRECTORS/SHAREHOLDERS/PARTNERS, ETC.

Directors/share holders/Partner	Physical address of the Business	Municipal Account No.	Physical residential address of the Director/ Shareholder/ Partner	Municipal Account No.

NB: Please attach certified copy of ID document(s)_____
Signatory_____
Date**Witnesses**1. _____
Full Names_____
Signature_____
Date2. _____
Full Names_____
Signature_____
Date

FROM: _____ (Name of the Tenderer or Consortium)

Signed at _____ Date _____ Month _____ 20____

Print Name: _____

Signature: _____

Thus, done and signed for and on behalf of the Tenderer/Contractor

Signatory

Date _____

Witnesses

1. _____
Full Names

Signature

Date _____

2. _____
Full Names

Signature

Date _____

DECLARATION OF TENDERER'S PAST SUPPLY CHAIN MANAGEMENT PRACTICES

1. This Municipal Bidding Document must form part of all bids invited.
2. It serves as a declaration to be used by municipalities and municipal entities in ensuring that when goods and services are being procured, all reasonable steps are to combat the abuse of the supply chain management system.
3. **The of any bidder may be rejected if the bidder, or any of its directors have:**
 - a) Abused the Municipality's Supply Chain Management System or committed any improper conduct in relation to such system;
 - b) Been convicted for fraud or corruption during the past five years;
 - c) Wilfully neglected, reneged or failed to comply with any government, municipal or public sector contract during the past five years; or
 - d) Been listed in the Register for Tender Defaulters in terms of section 29 of the Prevention and Combating of Corruption Activities Act (No 12 of 2004).
4. **In order to give effect to the above, the following questionnaire must be completed and submitted with the bid.**

ITEM	QUESTION	YES	NO
4.1	Is the Tenderer or any of its directors listed on the National Treasury's database as a company or person prohibited from doing business with the public sector? (Companies or persons who are listed on this database were informed in writing of this restriction by the National Treasury after the audi alteram partem rule was applied).		
4.1.1	If so, furnish particulars:		
4.2	Is the Tenderer or any of its directors listed on the Register for Tender Defaulters in terms of section 29 of the Prevention and Combating of Corruption Activities Act (No 12 of 2004)? (To access this Register, enter the National Treasury's website www.treasury.gov.za, click on the icon "Register for Tender Defaulters" or submit your written request for a hard copy of the Register to facsimile number (012 326 5445).		
4.2.1	If so, furnish particulars:		
4.3	Was the Tenderer or any of its directors convicted by a court of law (including a court of law outside the Republic of South Africa) for fraud or corruption during the past five years?		
4.3.1	If so, furnish particulars:		
4.4	Does the Tenderer or any of its directors owe any municipal rates and taxes or municipal charges to the municipality/municipal entity, or any other municipality/municipal entity, that is in arrears for more than three months?		
4.4.1	If so, furnish particulars:		
4.5	Was any contract between the Tenderer and the municipality/municipal entity or any other organ of state terminated during the past five years on account of failure to perform on or comply with the contract?		
4.5.1	If so, furnish particulars:		

CERTIFICATION

I, THE UNDERSIGNED (FULL NAME) _____
CERTIFY THAT THE INFORMATION FURNISHED ON THIS DECLARATION FORM TO BE TRUE
AND CORRECT.

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

Signature

Date

Position

Name of Bidder

MBD 4 DECLARATION OF INTEREST

1. No bid will be accepted from persons in the service of the state¹.
2. Any person, having a kinship with persons in the service of the state, including a blood relationship, may make an offer or offers in terms of this invitation to bid. In view of possible allegations of favoritism, should the resulting bid, or part thereof, be awarded to persons connected with or related to persons in service of the state, it is required that the bidder or their authorized representative declare their position in relation to the evaluating/adjudicating authority.
3. In order to give effect to the above, the following questionnaire must be completed and submitted with the bid.

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

3.2 Identity Number: _____

3.3 Position occupied in the Company (director, trustee, shareholder): _____

3.4 Company Registration Number: _____

3.5 Tax Reference Number: _____

3.6 VAT Registration Number: _____

3.7 The names of all directors / trustees / shareholders members, their individual identity Numbers and state employee numbers must be indicated in paragraph 4 below.

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

3.8.1 If yes, furnish particulars: _____

¹MSCM Regulations: "in the service of the state" means to be

- (a) a member of
 - (i) any municipal council;
 - (ii) any provincial legislature; or
 - (iii) the national Assembly or the national Council of provinces;
- (b) a member of the board of directors of any municipal entity;
- (c) an official of any municipality or municipal entity;
- (d) an employee of any national or provincial department, national or provincial public entity or constitutional institution within the meaning of the Public Finance Management Act, 1999 (Act No.1 of 1999);
- (e) a member of the accounting authority of any national or provincial public entity; or
- (f) an employee of Parliament or a provincial legislature.

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

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

3.9.1 If yes, furnish particulars:

.....

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

3.10.1 If yes, furnish particulars:

.....

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

3.11.1 If yes, furnish particulars:

.....

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

3.12.1 If yes, furnish particulars:

.....

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

3.13.1 If yes, furnish particulars:

.....

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

3.14.1 If yes, furnish particulars:

.....

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

Full Name	Identity Number	State Employee Number

_____. _____.

Signature

Date

_____. _____.

Capacity

Name of Bidder

This document must be signed and submitted together with your Tender

1. THE NATIONAL INDUSTRIAL PARTICIPATION PROGRAMME**INTRODUCTION**

The National Industrial Participation (NIP) Programme, which is applicable to all government procurement contracts that have an imported content, became effective on the 1 September 1996. The NIP policy and guidelines were fully endorsed by Cabinet on 30 April 1997. In terms of the Cabinet decision, all state and parastatal purchases / lease contracts (for goods, works and services) entered into after this date, are subject to the NIP requirements. NIP is obligatory and therefore must be complied with. The Industrial Participation Secretariat (IPS) of the Department of Trade and Industry (DTI) is charged with the responsibility of administering the programme.

1 PILLARS OF THE PROGRAMME

1.1 The NIP obligation is benchmarked on the imported content of the contract. Any contract having an imported content equal to or exceeding US\$ 10 million or other currency equivalent to US\$ 10 million will have a NIP obligation. This threshold of US\$ 10 million can be reached as follows:

- (a) Any single contract with imported content exceeding US\$10 million, Or
- (b) Multiple contracts for the same goods, works or services each with imported content exceeding US\$3 million awarded to one seller over a 2 year period which in total exceeds US\$10 million. or
- (c) A contract with a renewable option clause, where should the option be exercised the total value of the imported content will exceed US\$10 million. or
- (d) Multiple suppliers of the same goods, works or services under the same contract, where the value of the imported content of each allocation is equal to or exceeds US\$ 3 million worth of goods, works or services to the same government institution, which in total over a two (2) year period exceeds US\$10 million.

1.2 The NIP obligation applicable to suppliers in respect of sub-paragraphs 1.1 (a) to 1.1 (c) above will amount to 30 % of the imported content whilst suppliers in respect of paragraph 1.1 (d) shall incur 30% of the total NIP obligation on a *pro-rata* basis.

1.3 To satisfy the NIP obligation, the DTI would negotiate and conclude agreements such as investments, joint ventures, sub-contracting, licensee production, export promotion, sourcing arrangements and research and development (R&D) with partners or suppliers

A period of seven years has been identified as the time frame within which to discharge the obligation

2. REQUIREMENTS OF THE DEPARTMENT OF TRADE AND INDUSTRY

2.1 In order to ensure effective implementation of the programme, successful Tenderers (contractors) are required to, immediately after the award of a contract that is in excess of **R10 million** (ten million Rands), submit details of such a contract to the DTI for reporting purposes.

2.2 The purpose for reporting details of contracts in excess of the amount of R10 million (ten million Rands) is to cater for multiple contracts for the same goods, works or services; renewable

contracts and multiple suppliers for the same goods, works or services under the same contract as provided for in paragraphs 1.1.(b) to 1.1. (d) above.

3 TENDER SUBMISSIONS AND CONTRACT REPORTING REQUIREMENTS OF TENDERERS AND SUCCESSFUL TENDERERS (CONTRACTORS)

3.1 Tenderers are required to sign and submit this Standard Tendering Document (SBD 5) together with the Tender on the closing date and time.

3.2 In order to accommodate multiple contracts for the same goods, works or services; renewable contracts and multiple suppliers for the same goods, works or services under the same contract as indicated in sub-paragraphs 1.1 (b) to 1.1 (d) above and to enable the DTI in determining the NIP obligation, successful Tenderers (contractors) are required, immediately after being officially notified about any successful Tender with a value in excess of R10 million (ten million Rands), to contact and furnish the **DTI with the following information:**

- Tender / contract number.
- Description of the goods, works or services.
- Date on which the contract was accepted.
- Name, address and contact details of the government institution.
- Value of the contract.
- Imported content of the contract, if possible.

3.3 The information required in paragraph 3.2 above must be sent to the Department of Trade and Industry, Private Bag X 84, Pretoria, 0001 for the attention of Mr Elias Malapane within five (5) working days after award of the contract. Mr Malapane may be contacted on telephone (012) 394 1401, facsimile (012) 394 2401 or e-mail at Elias@thedti.gov.za for further details about the programme.

4 PROCESSES TO SATISFY THE NIP OBLIGATION

4.1 Once the successful Tenderer (contractor) has made contact with and furnished the DTI with the information required, the following steps will be followed:

- the contractor and the DTI will determine the NIP obligation;
- the contractor and the DTI will sign the NIP obligation agreement;
- the contractor will submit a performance guarantee to the DTI;
- the contractor will submit a business concept for consideration and approval by the DTI;
- upon approval of the business concept by the DTI, the contractor will submit detailed business plans outlining the business concepts;
- the contractor will implement the business plans; and
- the contractor will submit bi-annual progress reports on approved plans to the DTI.

- 4.2 The NIP obligation agreement is between the DTI and the successful Tenderer (contractor) and, therefore, does not involve the purchasing institution

Bid number . Closing date:

Name of bidder

Postal address

Signature ... Name (in print)

Date

DECLARATION FOR PROCUREMENT ABOVE R10 MILLION (ALL APPLICABLE TAXES INCLUDED)

For all procurement expected to exceed R10 million (all applicable taxes included), Tenderers must complete the following questionnaire

- 1 Are you by law required to prepare annual financial statements for auditing?
 - 1.1 If yes, submit audited annual financial statements for the past three years or since the date of establishment if established during the past three years.

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 - 2 Do you have any outstanding undisputed commitments for municipal services towards any Municipality for more than three months or any other service provider in respect of which payment is overdue for more than 30 days?
 - 2.1 If no, this serves to certify that the Tenderer has no undisputed commitments for municipal services towards any municipality for more than three months or other service provider in respect of which payment is overdue for more than 30 days.
 - a. If yes, provide particulars.

ë .

ë .

ë .

ë
- * Delete if not applicable
- 3 Has any contract been awarded to you by an organ of state during the past five years, including particulars of any material non-compliance or dispute concerning the execution of such contract?

***YES / NO**

 - o If yes, furnish particulars

.....

ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ..
 - 4 Will any portion of goods or services be sourced from outside the Republic, and, if so, what portion and whether any portion of payment from the municipality / municipal entity is expected to be transferred out of the Republic?

***YES/NO**

 - o If yes, furnish particulars

ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

CERTIFICATION

I, THE UNDERSIGNED (NAME)

CERTIFY THAT THE INFORMATION FURNISHED ON THIS DECLARATION FORM IS CORRECT.

I ACCEPT THAT THE STATE MAY ACT AGAINST ME SHOULD THIS DECLARATION PROVE TO BE FALSE.

.....
Signature

.....
Date

.....
Position

.....
Name

DECLARATION CERTIFICATE FOR LOCAL PRODUCTION AND CONTENT

This Municipal Bidding Document (MBD) must form part of all Tenders 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, Tenderers must study the General Conditions, Definitions, Directives applicable in respect of Local Content as prescribed in the Preferential Procurement Regulations, 2011 and the South African Bureau of Standards (SABS) approved technical specification number SATS 1286:201x.

1. General Conditions

- 1.1 Preferential Procurement Regulations, 2011 (Regulation 9. (1) and 9. (3) make provision for the promotion of local production and content.
- 1.2 Regulation 9. (1) prescribes that in the case of designated sectors, where in the award of Tenders local production and content is of critical importance, such bids must be advertised with the specific bidding condition that only locally produced goods, services or works or locally manufactured goods, with a stipulated minimum threshold for local production and content will be considered.
- 1.3 Regulation 9. (3) prescribes that where there is no designated sector, a specific bidding condition may be included, that only locally produced services, works or goods or locally manufactured goods with a stipulated minimum threshold for local production and content, will be considered.
- 1.4 Where necessary, for Tenders referred to in paragraphs 1.2 and 1.3 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 and B-BBEE.
- 1.5 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.
- 1.6 The local content (LC) as a percentage of the Tender price must be calculated in accordance with the SABS approved technical specification number SATS 1286: 201x as follows:

$$LC = 1 - \left(\frac{x}{y} \right) \times 100$$

Where

x imported content

y Tender price 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 the South African Reserve Bank (SARB) at 12:00 on the date, one week (7 calendar days) prior to the closing date of the Tender as required in paragraph 4.1 below.

- 1.7 A Bid will be disqualified if:
 - The Tenderer fails to achieve the stipulated minimum threshold for local production and content indicated in paragraph 3 below; and this declaration certificate is not submitted as part of the Tender documentation.

2. Definitions

- 2.1** “**bid**” includes advertised competitive bids, written price quotations or proposals;
- 2.2** “**bid price**” price offered by the bidder, excluding value added tax (VAT);
- 2.3** “**contract**” means the agreement that results from the acceptance of a bid by an organ of state;
- 2.4** “**designated sector**” means a sector, sub-sector or industry that has been designated by the Department of Trade and Industry in line with national development and industrial policies for local production, where only locally produced services, works or goods or locally manufactured goods meet the stipulated minimum threshold for local production and content;
- 2.5** “**Duly sign**” means a Declaration Certificate for Local Content that has been signed by the 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).
- 2.6** “**imported content**” means that portion of the bid price represented by the cost of components, parts or materials which have been or are still to be imported (whether by the supplier or its subcontractors) and which costs are inclusive of the costs abroad, plus freight and other direct importation costs, such as landing costs, dock duties, import duty, sales duty or other similar tax or duty at the South African port of entry;
- 2.7** “**local content**” means that portion of the bid price which is not included in the imported content, provided that local manufacture does take place;
- 2.8** “**stipulated minimum threshold**” means that portion of local production and content as determined by the Department of Trade and Industry; and
- 2.9** “**Sub-contract**” means the primary contractor’s assigning, leasing, making out work to, or employing another person to support such primary contractor in the execution of part of a project in terms of the contract.

3. The stipulated minimum threshold(s) for local production and content for this bid is/are as follows:

<u>Description of services, works or goods</u>	<u>Stipulated minimum threshold</u>
_____	_____ %
_____	_____ %
_____	_____ %

4. Does any portion of the services, works or goods offered have any imported content?

YES / NO

- 4.1** If yes, the rate(s) of exchange to be used in this bid to calculate the local content as prescribed in paragraph 1.6 of the general conditions must be the rate(s) published by the SARB for the specific currency at 12:00 on the date, one week (7 calendar days) prior to the closing date of the bid.

The relevant rates of exchange information is accessible on www.reservebank.co.za.
Indicate the rate(s) of exchange against the appropriate currency in the table below:

Currency	Rates of exchange
US Dollar	
Pound Sterling	
Euro	
Yen	
Other	

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

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 TENDER No.

ISSUED BY: (Procurement Authority / Name of Municipality / Municipal Entity):
.....

NB 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 Tenderer.

I, the undersigned, (full names),

do hereby declare, in my capacity as

of(name of bidder entity), the following:

- The facts contained herein are within my own personal knowledge.
- I have satisfied myself that the goods/services/works to be delivered in terms of the above-specified Tender comply with the minimum local content requirements as specified in the Tender, and as measured in terms of SATS 1286.
- The local content has been calculated using the formula given in clause 3 of SATS 1286, the rates of exchange indicated in paragraph 4.1 above and the following figures:

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

If the bid is for more than one product, a schedule of the local content by product shall be attached.

- I accept that the Procurement Authority / Municipality /Municipal Entity has the right to request that the local content be verified in terms of the requirements of SATS 1286.
- I understand that the awarding of the Tender 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, may result in the Procurement Authority / Municipal /

Municipal Entity imposing any or all of the remedies as provided for in Regulation 13 of the Preferential Procurement Regulations, 2011 promulgated under the Policy Framework Act (PPFA), 2000 (Act No. 5 of 2000).

SIGNATURE: _____

DATE: _____

WITNESS No. 1 _____

DATE: _____

WITNESS No. 2 _____

DATE: _____

CERTIFICATE OF INDEPENDENT BID DETERMINATION

- 1 This Municipal Bidding Document (MBD) must form part of all bids¹ invited.
- 2 Section 4 (1) (b) (iii) of the Competition Act No. 89 of 1998, as amended, prohibits an agreement between, or concerted practice by, firms, or a decision by an association of firms, if it is between parties in a horizontal relationship and if it involves collusive bidding (or bid rigging).² Collusive bidding is a *pe se* prohibition meaning that it cannot be justified under any grounds.
- 3 Municipal Supply Regulation 38 (1) prescribes that a supply chain management policy must provide measures for the combating of abuse of the supply chain management system, and must enable the accounting officer, among others, to:
 - a. take all reasonable steps to prevent such abuse;
 - b. reject the bid of any bidder if that bidder or any of its directors has abused the supply chain management system of the municipality or municipal entity or has committed any improper conduct in relation to such system; and
 - c. cancel a contract awarded to a person if the person committed any corrupt or fraudulent act during the bidding process or the execution of the contract.
- 4 This MBD serves as a certificate of declaration that would be used by institutions to ensure that, when bids are considered, reasonable steps are taken to prevent any form of bid-rigging.
- 5 In order to give effect to the above, the attached Certificate of Bid Determination (MBD 9) must be completed and submitted with the bid:

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

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

CERTIFICATE OF INDEPENDENT BID DETERMINATION

I, the undersigned, in submitting the accompanying bid:

(Bid Number and Description)

in response to the invitation for the bid made by:

(Name of Municipality / Municipal Entity)

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

I certify, on behalf of: _____ that:

(Name of Bidder)

1. I have read and I understand the contents of this Certificate;
2. I understand that the accompanying bid will be disqualified if this Certificate is found not to be true and complete in every respect;
3. I am authorized by the bidder to sign this Certificate, and to submit the accompanying bid, on behalf of the bidder;
4. Each person whose signature appears on the accompanying bid has been authorized by the bidder to determine the terms of, and to sign, the bid, on behalf of the bidder;
5. For the purposes of this Certificate and the accompanying bid, I understand that the word "competitor" shall include any individual or organization, other than the bidder, whether or not affiliated with the bidder, who:
 - (a) has been requested to submit a bid in response to this bid invitation;
 - (b) could potentially submit a bid in response to this bid invitation, based on their qualifications, abilities or experience; and
 - (c) provides the same goods and services as the bidder and/or is in the same line of business as the bidder
6. 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 consortium³ will not be construed as collusive bidding.
7. In particular, without limiting the generality of paragraphs 6 above, there has been no consultation, communication, agreement or arrangement with any competitor regarding:
 - (a) prices;
 - (b) geographical area where product or service will be rendered (market allocation)
 - (c) methods, factors or formulas used to calculate prices;
 - (d) the intention or decision to submit or not to submit, a bid;
 - (e) the submission of a bid which does not meet the specifications and conditions of the bid; or

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

8. In addition, there have been no consultations, communications, agreements or arrangements with any competitor regarding the quality, quantity, specifications and conditions or delivery particulars of the products or services to which this bid invitation relates.
9. 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 **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.**

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

ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

Signature

ë ë ë ë ë ë ë ë ë ë ë ë

Date

ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë .

Position

ë ë ë ë ë ë ë ë ë ë ë ë

Name of Bidder

COMPLIANCE WITH OHSA (ACT 85 OF 1993)

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

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

Signature of Bidder: ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë ë

Date: ë ë ë ë ë ë ë ë ë ë ë ë

DAY WORK SCHEDULE

This Day work Schedule shall be used for the valuation of any additional or substituted work which cannot conveniently be valued at the rates and prices submitted in the schedule of quantities.

In respect of labour and materials used in the additional or substituted work not covered in the Day work Schedule the Contractor shall be paid the actual cost plus the percentage allowance stated in the schedule of quantities.

The Tenderer shall quote hereunder rates which shall apply for payment purposes if the Engineer orders additional or substituted work to be carried out on a day work basis and shall therefore be in accordance with the requirements of clause 37(2) of the General Conditions of Contract.

➤ LABOUR AND MATERIALS

Rates and prices entered in the schedule shall be held to allow for net cost of labour and materials delivered to site respectively with the percentage allowances stated in the schedule of quantities.

➤ PLANT AND EQUIPMENT

The Tenderers shall list all major items of plant and equipment to be used on the works and which may be required for use on day works. The proposed hire rates of these items shall be entered against each type of machine, such rates to include for all relevant costs of plant hire inclusive of fuels and lubricants but exclusive of labour charges for the operators, which will be paid for under sub-clause (1) above.

The rates for plant items not listed in the schedule will be the ruling plant hire rates, inclusive of fuels and lubricants but exclusive of labour charges for the operators, inclusive of a 7,5% handling charge. It is therefore in the Tenderers interest to ensure that the list is complete.

Should there be insufficient space on the pages provided; the Tenderer shall add further pages as required.

THE RATES FOR THE PLANT AND EQUIPMENT MENTIONED IN THE SCHEDULE SHALL BE FILLED IN FOR THE ITEMS REQUESTED. SHOULD AN ITEM BE OMITTED IT SHALL BE DEEMED TO HAVE BEEN INCLUDED IN THE OTHER DAYWORKS RATES.

• LABOUR

DESIGNATION		RATE	
		R	C
Pipe Layers	per hour		
Plant Operators	per hour		
Truck Drivers	per hour		
Labour - unskilled	per hour		
- semi-skilled	per hour		
- skilled	per hour		

• **MATERIALS**

DESIGNATION		RATE	
		R	C
Cement	per 50 kg pocket delivered		
Concrete Sand	per m ³ delivered		
Concrete Aggregate	per m ³ delivered		

• **TRANSPORT**

DESIGNATION	RATE	
	R	C
Per cubic metre kilometre		

• **PLANT AND EQUIPMENT**

ITEM	DESCRIPTION	NON-WORKING RATE*		OPERATING RATE		PER
	Excavator	R	c	R	C	UNIT
	LDV					
	Tipper 10 cubic meter					
	Grader (140G or equivalent)					
	Roller					
	16000Litres Water Tanker					
	TLB					

*Only applicable on authority of the Employer's Agent.

POLOKWANE MUNICIPALITY

BID NUMBER: PM63/2021

**BID DESCRIPTION: OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)
PROJECT**

PART C1: AGREEMENTS AND CONTRACT DATA

C1.1: FORM OF OFFER AND ACCEPTANCE

C1.2: CONTRACT DATA

C1.3: FORM FOR PERFORMANCE GUARANTEE

C1.4: FORM FOR RETENTION MONEY GUARANTEE

**C1.5: AGREEMENT IN TERMS OF SECTION 37(2) OF THE OCCUPATIONAL HEALTH AND
SAFETY ACT No 85 OF 1993**

C1.6: FORM FOR ADJUDICATORS AGREEMENT

ACCEPTANCE

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

The terms of the contract are contained in

Part 1: Agreements and Contract Data (which include this Agreement)

Part 2: Pricing Data

Part 3: Scope of Work

Part 4: Site Information

and drawings and documents or parts thereof, which may be incorporated by reference into parts 1 to 4 above.

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

The Tenderer shall, within 7 days of 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 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 the 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 Tenderer receives one fully completed copy of this original document, including the Schedule of Deviations (if any). Such date should be confirmed in a manner that can be read, copied and recorded and shall be accepted by the contracting parties as the Commencement Date. This agreement shall constitute a binding contract between the parties.

Signature(s)

Print Name(s)

Capacity

For the Tenderer

ë
(Name and address of Employer Organization)

Signature of witness Date: ë ë ë ..ë

Print Name

SCHEDULE OF DEVIATIONS

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

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

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

Any change or addition to the Tender documents arising from the above agreements and recorded here shall also be incorporated into the final Contract Document.

3.1 Subject:

Details:

3.2 Subject:

Details:

3.3 Subject:

Details:

By the duly authorized representatives signing this Schedule of Deviations, the Employer and the Contractor agree to and accept the foregoing Schedule of Deviations as the only deviations from and amendments to the documents listed in the Tender Data and addenda thereto as listed in the Tender Schedules, as well as any confirmation, clarification or changes to the terms of the offer agreed by the Contractor and the Employer in concluding this process of offer and acceptance; in witness thereof the parties hereto have caused this agreement to be executed.

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

Signed by:

Signed by:

Print Name:

Print Name:

Address:

Address:

For and on behalf of the **Employer** in the Presence of

For and on behalf of the **Contractor** in the presence of

Witness:

Witness:

Print Name:

Print Name:

Date:

Date:

POLOKWANE MUNICIPALITY

BID NUMBER: PM63/2021

BID DESCRIPTION: OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2

C.1.2 Contract Data

CONTENTS

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C.1.2.1.2.3 Additional clauses to the General Conditions of Contract

C.1.2.1. Part 1: Data provided by the Employer**C.1.2.1.1 Conditions of Contract**

The Conditions of Contract are:

- the 'General Conditions of Contract' as they appear in the commercially-available publication 'General Conditions of Contract for Construction Works, Third Edition, 2015' hereinafter referred to as 'GCC 2015' and
- Specific data as contained in this Contract Data.

Each party to the Contract shall purchase its own copy of the GCC 2015 that applies to this Contract, available from its publisher:

South African Institution of Civil Engineering
Private Bag X200
Halfway House
1685
South Africa

Tel +27 (0)11 805 5947

The following Notes apply:**Note 1**

The GCC 2015 makes several references to the Contract Data.

Each item of data below is cross-referenced to the clause in the Conditions of Contract to which it applies. Notwithstanding anything specified to the contrary, the Contract Data shall take precedence in the interpretation of any ambiguity or inconsistency between it and the GCC 2015.

The documents forming the Contract are to be taken as mutually explanatory of one another. For the purpose of interpretation, the priority of the documents shall be in accordance with the following order of precedence:

- (a) The Form of Offer and Acceptance.
- (b) Amendments to the General Conditions of Contract within the Contract Data.
- (c) Additional conditions to the General Conditions of Contract within the Contract Data.
- (d) Corrigenda to the General Conditions of Contract.
- (e) The General Conditions of Contract.
- (f) The Specifications, Drawings, Schedules and other documents forming part of the Contract (in that order) contained in the Scope of Work and the Site Information.

If any ambiguity or discrepancy is found in the documents, the Engineer needs to be contacted to issue any necessary clarification or instruction.

Note 2

Certain pro-forma forms and pro-forma agreements contained in the GCC 2015 have been adapted for this particular contract. Those pro-forma forms and pro-forma agreements contained in the GCC 2015 do not apply where replaced by similar pro-forma forms and pro-forma agreements in this document.

C.1.2.1.2 Contract-specific Data

The following contract-specific data, referring to the General Conditions of Contract, are applicable to this Contract:

C.1.2.1.2.1 Compulsory Data

Clause	Data		
1.1.1.13	The Defects Liability Period is 12 months		
1.1.1.14	The time for achieving Practical Completion is 08 months		
1.1.1.15	The name of the Employer is Polokwane Municipality		
1.1.1.26	The Pricing Strategy of a Re-measurement Contract shall apply		
1.2.1.2	The address of the Employer is: Physical address: Civic Centre Landdros Mare Street Polokwane City Postal address: PO Box 111 Polokwane 0700 e-mail address: mapula@polokwane.gov.za Contact numbers: Corporate: 015 290 2346 Direct: 015 290 2335		
1.1.1.16	The name of the Employers Agent is: Mont Consulting Engineers Engineers		
1.2.1.2	<table> <tr> <td> <u>Physical Address:</u> 29 Bendor Drive. Pro Park, Pro Arch Building Bendor, Polokwane 0700 Tel.: (015) 291 4173 E-mail: admin@montce.co.za </td> <td> <u>Postal Address:</u> P.O. Box 1249 Fauna Park Polokwane 0787 Fax: (015) 291 4218 </td> </tr> </table>	<u>Physical Address:</u> 29 Bendor Drive. Pro Park, Pro Arch Building Bendor, Polokwane 0700 Tel.: (015) 291 4173 E-mail: admin@montce.co.za	<u>Postal Address:</u> P.O. Box 1249 Fauna Park Polokwane 0787 Fax: (015) 291 4218
<u>Physical Address:</u> 29 Bendor Drive. Pro Park, Pro Arch Building Bendor, Polokwane 0700 Tel.: (015) 291 4173 E-mail: admin@montce.co.za	<u>Postal Address:</u> P.O. Box 1249 Fauna Park Polokwane 0787 Fax: (015) 291 4218		

Clause	Data			
3.3.1	The Employers Agent shall obtain the specific approval of the Employer before executing any of his functions or duties according to the following table:			
	GCC Clause No	Description	Requires EWA*	Delegated to ER*
	3.2.1	Employers Agent's Representative appointment and termination	Y	
	3.2.4	Employers Agent's Representative acting on Engineer's behalf	Y	
	4.5.4	Payment for notices and fees	Y	
	4.7.1	Fossils, etc on Site	Y	
	5.7.2	Work at night	Y	
	5.7.3	Acceleration of rate of progress	Y	
	5.7.3	Payment for acceleration	Y	
	5.9.1	Instructions and drawings on Commencement Date		Y
	5.11.1	Suspension of the Works		Y
	5.11.3	Proceeding with Works after suspension	Y	
	5.12.4	Acceleration instead of extension of time	Y	
	5.13.2	Reduction in penalty		Y
	6.3.1	Variation orders	Y	
	6.3.2.1	Confirmation of a Variation Order	Y	
	6.4.1.4	Day works as a Variation Order	Y	
	6.5.2	Materials for day works	Y	
	6.8.2	Contract Price Adjustment to apply	Y	
	6.8.3	Price adjustment for special material	Y	
	6.8.4	Costs due to changes in legislation	Y	
	6.11.1	Variations exceeding 20%		Y
	8.2.2.2	Damage due to excepted risks		Y
	10.1.5	Consultation on Contractor's claim	Y	Y
	10.1.5	Ruling on Contractor's claim	Y	N

Clause	Data
	*The following abbreviations apply: EAR Employers Agent's Representative EAWA Employers Agent's Written Action N No NA Not Applicable Y Yes
4.9.1	The Contractor shall deliver to the Employers Agent's, on a monthly basis, a detailed inventory of Construction Equipment kept on Site, full particulars given for each day of the month. Distinction shall be made between Owned Equipment and Hired Equipment as well as Equipment in working order and Equipment out of order. Such inventory shall be submitted by the seventh day of the month following the month to be reported.
4.10.2	The Contractor shall deliver to the Employers Agent's, on a monthly basis, a return in detail of supervisory staff and the number of categorized classes of labour employed each day for the said period by the Contractor for execution of the Contract. Such return shall be submitted by the seventh day of the month following the month to be reported.
5.3.1	The documentation required before commencement with Works execution are: Health and Safety Plan (Refer to Clause 4.3) A signed Agreement between the Employer and the Contractor for the Works to be completed by the Contractor in terms of the provisions of Section 37(2) of the Occupational Health and Safety Act (Act No.85 of 1993) and the Construction Regulations promulgated thereunder (Refer to Clause 4.3). Proof of payment to the Employer, that the Contractor has paid all contributions required in terms of the Compensation for Occupational Injuries and Diseases Act, No 130 of 1993 (Refer to Clause 4.3). Initial programme (Refer to Clause 5.6). Security (Refer to Clause 6.2). Insurance (Refer to Clause 8.6).
5.3.2	The time to submit the documentation required before commencement with Works execution is 14 Days .
5.4.2	The access and possession of Site shall not be exclusive to the Contractor but shall be as set out elsewhere in the Contract.
5.8.1	The non-working Days are Sundays. The special non-working Days are: Statutory public holidays; and All annual year-end shutdown periods as recommended by the South African Federation of Civil Engineering Contractors (SAFCEC),
	and which commence after the Commencement Date and which commence before the Due Completion Date.
5.13.1	The penalty for failing to complete the Works is 0,1 percent of contract price per calendar day.
5.16.3	The latent defect period is 10 years, commencing on the Day after the date of certification of Practical Completion.

Clause	Data
6.5.1.2.3	The percentage allowance to cover overhead charges is: 50 per cent for labour; and 15 per cent for materials.
6.8.2	Contract Price Adjustment: The contract shall be subject to Contract Price Adjustment. The value of the certificates issued shall be adjusted in accordance with the Contract Price Adjustment Schedule included in the General Conditions of Contract. The value of "x" is 0.15 The values of the coefficients are: a = 0.25 Labour b = 0.3 Contractor's equipment c = 0.35 Material d = 0.1 Fuel The Province wherein the larger part of the Site is located is Polokwane. The applicable industry for the Producer Price Index for material is Diesel The area for the Producer Price Index for fuel is Example Fuel index area The base month is November 2022
6.8.3	
6.10.1.5	The percentage advance on materials not yet built into the Permanent Works is 80%. Proof of ownership is required.
6.10.3	The limit of retention money is 10% of the value of the Contract Price. A Retention Money Guarantee is compulsory. A penalty will be applied for non-delivery of the Retention Money Guarantee as required. The penalty will be 10% of the value of the completion Retention Money Amount per calendar month for late delivery of the said Retention Money Guarantee.
8.6.1.1.2	The value of Plant and materials supplied by the Employer to be included in the insurance sum is nil .
8.6.1.1.3	The amount to cover professional fees for repairing damage and loss to be included in the insurance sum is a maximum of 10% (ten percent) of the Contract Sum.
8.6.1.3	The limit of indemnity for liability insurance is equal to the contract amount.
10.5.1	Dispute resolution shall be by standing adjudication, use GCC 2015, Appendix 5.
10.7.1	The determination of disputes shall be by arbitration.

Clause	Data
	Payment for labour-intensive component of the works <i>Payment for works identified in the Scope of Works as being labour-intensive shall only be made in accordance with the provisions of the Contract if the works are constructed strictly in accordance with the provisions of the Scope of Work. Any payment for such works shall not relieve the Contractor in any way from his obligations either in contract or in delict.</i>
	Linkage of payment for labour-intensive component of works to submission of project data <i>The Contractor's payment invoices shall be accompanied by labour information for the corresponding period in a format specified by the employer. If the contractor chooses to delay submitting payment invoices, labour returns shall still be submitted as per frequency and timeframe stipulated by the Employer. The contractor's invoices shall not be paid until all pending labour information has been submitted.</i>
	Applicable Labour Laws <i>The current Ministerial Determination (also downloadable at www.epwp.gov.za), Expanded Public Works Programmes, issued in terms of the Basic Condition of Employment Act of 1997 by the Minister of Labour in Government Notice, shall apply to works described in the scope of work as being labour-intensive and which are undertaken by unskilled workers.</i>

C.1.2.1.2.2 Variations to the General Conditions of Contract

Clause	Data
1.1.1.16	Employer's Agent Add the following after the first paragraph: “Employer's Agent shall have the same meaning and be synonymous with Engineer/engineer throughout the Contract document.”
2.5.1	Cession <i>Amend Clause 2.5.1 as follows:</i> <i>Delete the words “without the written consent of the other”</i>
5.3.3	Time to instruct commencement of the Works Add the following to Clause 5.3.3 after the last sentence: "The Contractor shall not commence working until they have an approved project specific health and safety plan in terms of the Occupational Health and Safety Act, 1993: Construction Regulations, 2014 and complied with the initial requirements thereof."
5.14.1	Practical Completion Replace the last sentence of the second paragraph: "Should the Employer's Agent fail on expiry of 14 days." with the following: "Should the Employer's Agent not issue such a list within 14 days, Practical Completion shall be deemed to have been achieved on the said fourteenth day."
5.14.2	Issue of Certificate of Practical Completion Replace "the Employer's Agent" in the second and third lines with the following: ", the Contractor shall notify the Employer's Agent, who shall inspect the Works and the Employer's Agent"
5.14.4	Certificate of Completion Replace "the Employer's Agent" in the third line of the first paragraph with: ", the Contractor shall notify the Employer's Agent, who shall inspect the works and the Employer's Agent"
5.14.5.1	Consequences of Completion <i>Amend Clause 5.14.5.1 as follows:</i> <i>In the second line, substitute the word “Guarantor” with “Contractor”</i>

Clause	Data
1.1.1.16	Employer's Agent Add the following after the first paragraph: “Employer's Agent shall have the same meaning and be synonymous with Engineer/engineer throughout the Contract document.”
6.2	Security <i>Replace Sub-Clauses 6.2.1 and 6.2.2 with:</i> “The Contractor shall deliver to the Employer within such time as may be stated in the Contract Data, a Demand Guarantee, of an Insurance Company registered in terms of the Short-term Insurance Act (Act 53 of 1998) or of a registered Commercial Bank, in a sum equal to the amount stated in the Contract Data. The Demand Guarantee shall be issued by an entity subject to the approved of the Employer, and shall conform in all respects to the format contained in the Contract Data. The security to be provided by the Contractor shall be a Demand Guarantee of 10% of the Contract Sum. Wherever a joint venture constitutes the contracting party, the Demand Guarantee shall be issued on behalf of the joint venture. Failure to produce an acceptable Demand Guarantee within the period stated in the Contract Data, is a fundamental breach of Contract, entitling the Employer to cancel the Contract by due notice in terms of Clause 9.2 with specific reference to Sub-clause 9.2.2.5 as amended in the Contract Data.”
6.3.1	Variations <i>Amend Clause 6.3.1 as follows:</i> <i>In the first paragraph, third line, after the words "or for any reason appropriate", add the phrase</i> <i>", including the limiting of contract expenditure so as not to exceed the Employer's budgeted project funding, "</i> <i>Add the following phrase to the last paragraph of Clause 6.3.1.6, after the words "ascertaining the amount of the Contract Price":</i> <i>", and no such variation shall give reason for consideration of any claim in terms of Clause 6.11.”</i>
6.3.2	Orders for Variations to be in writing Omit the words “Provided that” under Clause 6.3.2 and omit Clause 6.3.2.1.
6.9.2	Definition of “materials” <i>Amend Clause 6.9.2, as follows:</i> <i>Substitute the word 'plant' with ‘Plant’</i>

Clause	Data
1.1.1.16	Employer's Agent Add the following after the first paragraph: “Employer's Agent shall have the same meaning and be synonymous with Engineer/engineer throughout the Contract document.”
6.10.1	Interim Payments <i>Amend Clause 6.10.1.5 as follows:</i> <i>In the third line, add the words “not yet” before the words “built into”</i>
6.10.5	Payment of retention money <i>Amend Clause 6.10.5 as follows:</i> <i>In the second line, add the words ‘, if any,’ after the words ‘Defects Liability Period’</i>
6.10.6	Set-off and delayed payments <i>Amend Clause 6.10.6.2 as follows:</i> <i>Delete the words ‘Contractor's Bank’ and substitute with the words ‘Employer's Bank’</i>
6.11	Variations exceeding 15 per cent <i>Replace the marginal heading with:</i> “Variations exceeding 20 per cent” <i>Replace “15 per cent” with “20 per cent” in the text of this Sub-Clause</i>
7.8.2	Cost of making good of defects <i>Amend Clause 7.8.2.1 as follows:</i> <i>In the first line, correct the spelling of ‘therefore’.</i>
8.3.1	Excepted risks <i>Amend Clause 8.3.1.12 as follows:</i> <i>In the second line, delete the words ‘Employer or any of their’ and substitute with ‘or any of its’</i>
8.6.6	Contractor to produce proof of payment “The Contractor shall before commencement of the Works produce to the Employer's Agent: 8.6.6.1 The policies by which the insurances are effected, 8.6.6.2 Proof that due payment of all premiums there under, covering the full required period has been made, and 8.6.6.3 Proof of continuity of the policies for the required period.

Clause	Data
1.1.1.16	Employer's Agent Add the following after the first paragraph: “Employer's Agent shall have the same meaning and be synonymous with Engineer/engineer throughout the Contract document.”
	Should, during the currency of the Contract, the required period of insurance be extended for any reason, the Contractor shall timeously extend (so as to maintain) the said insurances for the full extended duration. The Employer's Agent shall be empowered to withhold all payment certificates until the Contractor has complied with his obligations in terms of this Clause 8.6.6.”
8.6.7	Remedy on Contractor's failure to insure <i>Delete sub-clause 8.6.7 and substitute with:</i> “Failure on the part of the Contractor to effect and keep in force any of the insurances referred to in Clause 8.6.1 and its sub-clauses, is a fundamental breach of Contract, entitling the Employer to cancel the Contract by due notice in terms of Clause 9.2 and with specific reference to sub-clause 9.2.2, as amended in the Contract Data.”
9.1.2	State of emergency <i>In the <u>fourth</u> line, delete the words ‘supply of’ and substitute with ‘availability of’</i>
9.2	Termination by Employer <i>Delete the contents of Clause 9.2 and substitute with:</i> 9.2.1 The Employer may terminate the Contract by written notice to the Contractor if: 9.2.1.1 Sequestration of the Contractor's estate is ordered by a Court with due jurisdiction, or 9.2.1.2 The Contractor publishes a notice of surrender or presents a petition for the surrender of his estate as insolvent, or makes a compromise with his creditors, or assigns in favour of his creditors, or agrees to carry out the Contract under the supervision of a committee representing his creditors, or (being a company) goes into liquidation, whether provisionally or finally (other than a voluntary liquidation for the purpose of amalgamation or reconstruction), or if the Contractor assigns the Contract without having first obtained the Employer's consent in writing, or if execution is levied on his goods, or 9.2.1.3 The Contractor, or anyone on his behalf, or in his employ, offers to any person in the employ of the Employer or the Engineer, a gratuity or reward or commission, or 9.2.1.4 The Contractor furnished materially inaccurate information in his Tender, which had a bearing on the award of the Contract, or 9.2.1.5 The Contractor has abandoned the Contract.

Clause	Data
1.1.1.16	Employer's Agent Add the following after the first paragraph: “Employer's Agent shall have the same meaning and be synonymous with Engineer/engineer throughout the Contract document.”
	9.2.2 If the Contractor: 9.2.2.1 Has failed to commence the Works in terms of Clause 10 hereof, or has suspended the progress of the Works for fourteen (14) days after receiving from the Engineer written notice to proceed, or 9.2.2.2 Has failed to provide the Guarantee in terms of Clause 7 within the time stipulated in the Contract Data, or
	9.2.2.3 Has failed to proceed with the Works with due diligence, or 9.2.2.4 Has failed to remove materials from the Site or to pull down and replace work within fourteen (14) days after receiving from the Engineer written notice that the said materials or work have been condemned and rejected by the Engineer in terms of these conditions, or 9.2.2.5 Is not executing the Works in accordance with the Contract, or is neglecting to carry out his obligations under the Contract, or 9.2.2.6 Has, to the detriment of good workmanship or in defiance of the Engineer's instructions to the contrary, sublet any part of the Contract, or 9.2.2.7 Has assigned the Contract or any part thereof without the Employer's consent in writing, then the Employer may give the Contractor 14 days notice to rectify the default, and if the Contractor fails to rectify the default in said 14 days, then, without further notice, notify the Contractor in writing of the termination of the Contract and expel the Contractor and order the Contractor to vacate the site within 24 hours of issue of the Notice of Termination and to hand the Site over to the Employer, and the Employer may then enter upon the Site and the Works without affecting the rights and powers conferred on the Employer or the Engineer by the Contract and the Employer may himself complete the Works or may employ another contractor to complete the Works, and the Employer or such other contractor may use for such completion so much of the Construction Equipment, Temporary Works and materials brought onto the Site by the Contractor as the Employer may think proper, and the Employer may at any time sell any of the said Construction Equipment, Temporary Works and unused materials and apply the proceeds of sale towards payment of any sums that may be due or become due to the Employer by the Contractor under the Contract. In such circumstances the Contractor shall forthwith vacate the Site and shall not be entitled to remain on the Site on the grounds that he is entitled to do so on a right of retention until amounts due to him have been paid, neither will the Contractor be entitled to any further payments in terms of this Contract.

Clause	Data
1.1.1.16	Employer's Agent Add the following after the first paragraph: “Employer's Agent shall have the same meaning and be synonymous with Engineer/engineer throughout the Contract document.”
	9.2.3 If the Contractor, having been given notice to rectify a default in terms of 9.2.2 above, rectifies said default, but later repeats the same or substantially the same default, then the Employer may notify the Contractor of the immediate termination of the Contract, and proceed as stated in the paragraph following the word “writing” in Clause 9.2.2.7 above. 9.2.4 Should the amounts that the Employer must pay to complete the Works, exceed the sum that would have been payable to the Contractor on due completion by him, then the Contractor shall upon demand pay to the Employer the difference, and it shall be deemed a debt due by the Contractor to the Employer and shall be recoverable accordingly. Provided that should the Contractor on demand not pay the amount of such excess to the Employer, such sum may be determined and deducted by the Employer from any sum due to or that may become due to the Contractor under this or any previous or subsequent contract between the Contractor and the Employer.”

C.1.2.1.2.3 Additional clauses to the General Conditions of Contract:

Clause	Data
1.1	Definitions <i>Add the following at the end of Sub-Clause 1.1.1:</i> 1.1.1.35 "Client" as used in the Occupational Health and Safety Act - Construction Regulations, means Employer. 1.1.1.36 "Principal Contractor" as used in the Occupational Health and Safety Act - Construction Regulations, means Contractor.
4.12	Contractor's superintendence <i>Add the following sub-clause 4.12.4 to Clause 4.12:</i> Where a form is included in the Contract Data for this purpose, the Tenderer shall fill in the name of the person he proposes to entrust with the post of Construction Manager on this Contract in the space provided therefore. Previous experience of this person on work of a similar nature during the past five (5) years is to be entered on the form. The Contractor's Construction Manager shall be on Site at all times when work is being performed. The person shall be subject to approval of the Employers Agent in writing and shall not be replaced or removed from Site without the written approval of the Employers Agent
5.6	Programme <i>Add the following sub-clause 5.6.6 to Clause 5.6:</i> Failure on the part of the Contractor to deliver to the Employers Agent, the Ç programme of the Works in terms of Clause 5.6.1 and Ç supporting documents in terms of Clause 5.6.2 Within the period stated in the Contract Data, shall be sufficient cause for the Engineer to retain 25 per centum of the value of the Fixed Charge and Value-related items in assessment of amounts due to the Contractor, until the Contractor has submitted aforementioned first Programme of the Works and Supporting Documents
5.9.7	Employers Agent's to approve Contractor's Designs and Drawings <i>Add the following at the end of Sub-Clause 5.9.7</i> All designs, calculations, drawings and operation and maintenance manuals shall be fully endorsed by a third party registered engineer, accomplished in such specific field of practice and the cost thereof shall be borne solely by the Contractor. Once the alternative design has been approved, the Contractor shall indemnify and hold harmless the Employers Agent, the Employer, their agents and assigns, against all claims howsoever arising out of the said design, whether in contract or delict

Clause	Data
5.11	Suspension of the Works <i>Add the following sub-clause 5.11.7 to Clause 5.11:</i> ôIf the Contractor does not receive from the Employer the amount due under an Interim Payment Certificate within 28 days after expiry of the time stated in sub-clause 6.10.4 within which payment is to be made (except for deductions in accordance with sub-clauses 6.10.1.6 and 6.10.1.7), the Contractor may, after giving 14 days notice to the Employer, suspend the progress of the Works. The Contractor's action shall not prejudice his entitlements to a claim in terms of Clause 10.1 and to cancellation of the Contract in terms of Clause 9.3. If the Contractor subsequently receives full payment of the amount due under such Interim Payment Certificate before giving a notice of cancellation of the Contract, the Contractor shall resume normal working as soon as is reasonably practicable.ô
5.12	Extension of Time for Practical Completion <i>Add the following at the end of Sub-Clause 5.12.2.2:</i> ôThe extension of time to be allowed due to abnormal rainfall shall be calculated separately for each calendar month or part thereof in accordance with the following formula: $V = (Nw - Nn) + \frac{Rw - Rn}{x}$ where V = Extension of time in calendar days for the calendar month under consideration Nw = Actual number of days during the calendar month on which a rainfall of 10 mm or more has been recorded Rw = Actual recorded rainfall for the calendar month Rn = Average rainfall for the calendar month, as derived from existing rainfall records x = 20
	The rainfall records which shall provisionally be accepted for calculation purposes are: Based on records taken at: Rainfall Station : Polokwane Years of record: 2006 – 2016

Clause	Data																																																																																																																																																																																																																																																																																														
	<table><tr><td colspan="13">Table 1 – RAINFALL RECORDS FOR PERIOD: 2006– 2016</td></tr><tr><td colspan="13">RAINFALL STATION: Polokwane Lat: 23.8570 Lon: 29.451 Height 1226 m</td></tr><tr><td colspan="13">Average No of Days with Rainfall exceeding 10mm: 9.8 days/year</td></tr><tr><td colspan="13">Average Rainfall: 488.6 mm/year station no: 0677802BX</td></tr><tr><td>MON</td><td>AVE</td><td>ST</td><td>N DAY</td><td>NUM</td><td>1</td><td>5.1</td><td>10.1</td><td>20.1</td><td>50.1</td><td>100.1</td><td>MAX R</td><td>MAX RAIN</td></tr><tr><td>MON</td><td></td><td>DEV</td><td>RAIN</td><td>MON</td><td>5</td><td>10</td><td>20</td><td>50</td><td>100</td><td>900</td><td>DAY</td><td>DATE</td></tr><tr><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></tr><tr><td>MON</td><td>AVE</td><td>ST</td><td>N DAY</td><td>NUM</td><td>1</td><td>5.1</td><td>10.1</td><td>20.1</td><td>50.1</td><td>100.1</td><td>MAX R</td><td>MAX RAIN</td></tr><tr><td>MON</td><td></td><td>DEV</td><td>RAIN</td><td>MON</td><td>5</td><td>10</td><td>20</td><td>50</td><td>100</td><td>900</td><td>DAY</td><td>DATE</td></tr><tr><td>JAN</td><td>65.9</td><td>39.3</td><td>65.9</td><td>11</td><td>3.4</td><td>2.1</td><td>1.3</td><td>0.7</td><td>0</td><td>0</td><td>38</td><td>1/18/2013</td></tr><tr><td>FEB</td><td>47.3</td><td>49.7</td><td>47.3</td><td>11</td><td>1.6</td><td>0.9</td><td>1.1</td><td>0.6</td><td>0</td><td>0</td><td>49</td><td>2/26/2006</td></tr><tr><td>MAR</td><td>58.4</td><td>33.2</td><td>58.4</td><td>11</td><td>3</td><td>1.3</td><td>1.1</td><td>0.7</td><td>0.1</td><td>0</td><td>51.5</td><td>3/27/2006</td></tr><tr><td>APR</td><td>43.3</td><td>46.6</td><td>43.3</td><td>11</td><td>1.5</td><td>1</td><td>0.7</td><td>0.5</td><td>0.1</td><td>0</td><td>68</td><td>4/4/2011</td></tr><tr><td>MAY</td><td>10.4</td><td>14</td><td>10.4</td><td>11</td><td>0.5</td><td>0.4</td><td>0.3</td><td>0.1</td><td>0</td><td>0</td><td>29.2</td><td>5/8/2009</td></tr><tr><td>JUN</td><td>1.7</td><td>3.6</td><td>1.7</td><td>11</td><td>0.3</td><td>0</td><td>0.1</td><td>0</td><td>0</td><td>0</td><td>12</td><td>6/10/2009</td></tr><tr><td>JUL</td><td>2.4</td><td>4.3</td><td>2.4</td><td>11</td><td>0.3</td><td>0.1</td><td>0.1</td><td>0</td><td>0</td><td>0</td><td>12.1</td><td>7/4/2007</td></tr><tr><td>AUG</td><td>2.3</td><td>5.6</td><td>2.3</td><td>11</td><td>0.2</td><td>0</td><td>0.1</td><td>0</td><td>0</td><td>0</td><td>19.2</td><td>8/15/2011</td></tr><tr><td>SEP</td><td>6.6</td><td>8.2</td><td>6.6</td><td>11</td><td>0.4</td><td>0.4</td><td>0.1</td><td>0.1</td><td>0</td><td>0</td><td>22.5</td><td>9/4/2015</td></tr><tr><td>OCT</td><td>48.1</td><td>29.5</td><td>48.1</td><td>11</td><td>1.5</td><td>0.7</td><td>1.4</td><td>0.6</td><td>0</td><td>0</td><td>38.2</td><td>10/29/2009</td></tr><tr><td>NOV</td><td>97.7</td><td>40.5</td><td>97.7</td><td>11</td><td>3.1</td><td>2</td><td>1.3</td><td>1.5</td><td>0.2</td><td>0</td><td>65.5</td><td>11/12/2008</td></tr><tr><td>DEC</td><td>104.6</td><td>56.3</td><td>104.6</td><td>11</td><td>3.8</td><td>1</td><td>1.7</td><td>1.9</td><td>0.1</td><td>0</td><td>55</td><td>12/16/2014</td></tr><tr><td>YR</td><td>488.6</td><td></td><td>67.9</td><td></td><td>19.5</td><td>9.8</td><td>9.2</td><td>6.8</td><td>0.5</td><td>0</td><td>488.6</td><td></td></tr></table> The factor (Nw - Nn) shall be considered to represent a fair allowance for days during which rainfall exceeds 10 mm and the factor (Rw - Rn)/x shall be considered to represent a fair allowance for those days when rainfall does not exceed 10 mm but wet conditions prevent or disrupt work. The total extension of time shall be the algebraic sum of all monthly totals for the contract period, but if the algebraic sum is negative the time for completion shall not be reduced due to subnormal rainfall. Extensions of time for a part of a month shall be calculated using pro rata values of Nn and Rn. For this project the rainfall formula will only apply as background information, or dispute resolution. Extension of time for rainfall will only be granted on Actual Delays experienced; noted and agreed upon by the engineer.	Table 1 – RAINFALL RECORDS FOR PERIOD: 2006– 2016													RAINFALL STATION: Polokwane Lat: 23.8570 Lon: 29.451 Height 1226 m													Average No of Days with Rainfall exceeding 10mm: 9.8 days/year													Average Rainfall: 488.6 mm/year station no: 0677802BX													MON	AVE	ST	N DAY	NUM	1	5.1	10.1	20.1	50.1	100.1	MAX R	MAX RAIN	MON		DEV	RAIN	MON	5	10	20	50	100	900	DAY	DATE														MON	AVE	ST	N DAY	NUM	1	5.1	10.1	20.1	50.1	100.1	MAX R	MAX RAIN	MON		DEV	RAIN	MON	5	10	20	50	100	900	DAY	DATE	JAN	65.9	39.3	65.9	11	3.4	2.1	1.3	0.7	0	0	38	1/18/2013	FEB	47.3	49.7	47.3	11	1.6	0.9	1.1	0.6	0	0	49	2/26/2006	MAR	58.4	33.2	58.4	11	3	1.3	1.1	0.7	0.1	0	51.5	3/27/2006	APR	43.3	46.6	43.3	11	1.5	1	0.7	0.5	0.1	0	68	4/4/2011	MAY	10.4	14	10.4	11	0.5	0.4	0.3	0.1	0	0	29.2	5/8/2009	JUN	1.7	3.6	1.7	11	0.3	0	0.1	0	0	0	12	6/10/2009	JUL	2.4	4.3	2.4	11	0.3	0.1	0.1	0	0	0	12.1	7/4/2007	AUG	2.3	5.6	2.3	11	0.2	0	0.1	0	0	0	19.2	8/15/2011	SEP	6.6	8.2	6.6	11	0.4	0.4	0.1	0.1	0	0	22.5	9/4/2015	OCT	48.1	29.5	48.1	11	1.5	0.7	1.4	0.6	0	0	38.2	10/29/2009	NOV	97.7	40.5	97.7	11	3.1	2	1.3	1.5	0.2	0	65.5	11/12/2008	DEC	104.6	56.3	104.6	11	3.8	1	1.7	1.9	0.1	0	55	12/16/2014	YR	488.6		67.9		19.5	9.8	9.2	6.8	0.5	0	488.6	
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Clause	Data
6.10	Payments <i>Add the following at the end of Sub-Clause 6.10.1:</i> “The Contractor shall complete the Contractor’s Monthly Report Schedule which pro forma documentation is obtainable from the Employer’s Agent. Pursuant to Sub-Clause (1), these, duly signed by all concerned, together with the Contractor’s statement and a VAT invoice in original format are to be submitted to the Employer’s Agent. Issue by the Employer’s Agent to the Employer and Contractor of any signed payment certificate is conditional to this information being fully endorsed, accurately and timeously submitted to the Employer’s Agent” <i>Add the following at the end of Sub-Clause 6.10.1.5:</i>
9.3	“All documentary evidence of such materials shall be unambiguous with respect to ownership having fully passed to the Contractor on or before the date of submittal of the Contractor’s monthly statement. Should the Contractor fail to supply unambiguous documentary evidence, he shall, prior to submittal of his monthly statement, deliver to the Employer a Guarantor Guarantee in the form contained in the Appendices to the Contract Data.” Termination by the Contractor <i>Add the following at the end of Sub-Clause 9.3:</i> 9.3.5 In addition to, or as an alternative to the rights to termination contained in this Clause 9.3, the Contractor may notify the default to the Employer, with a copy to the Employer’s Agent, and if the default is not rectified within 10 days the Contractor may suspend progress of the works until a date 7 days after the default is rectified. The Contractor shall be entitled to extension of time to the extent of delay caused by or resulting from such suspension, and to payment of additional costs caused by or resulting from the suspension. Such extension of time and additional costs shall be promptly ascertained by the Employer’s Agent, who shall then grant the extension of time and include the additional costs in all future payment certificates. Such suspension, extension of time and/or payment of additional costs, shall not prejudice the Contractor’s rights to cancel the contract.”

C.1.2.2 Part 2: Data provided by the Contractor

The General Conditions of Contract, as specified in Part 1, shall be used as a basis for this Data which is required to be completed.

Each item of data given below is cross-referenced to the clause in the Conditions of Contract to which it mainly applies.

Clause	Data
1.1.1.9	The Name of the Contractor is:
1.2.1.2	The address of the Contractor is: Physical address:
1.2.1.2	Postal address: e-mail address: ë Contact numbers: Corporate: Direct: Mobile: Fax:

POLOKWANE MUNICIPALITY
(Not to be completed at tender stage)

C1.3 Performance Guarantee

In accordance with clause 6.2.1 of General Conditions of Contract, 3rd Edition 2015

Contract No: -----

Description of Contract: -----

GUARANTOR DETAILS AND DEFINITIONS

“Guarantor” means: -----

----- (Please put name of firm)

Physical address: -----

Postal address: -----

Tel:-----

Fax: -----

“Employer” means: **POLOKWANE MUNICIPALITY.**

“Contractor” means: -----

----- (Please put name of firm)

“Guarantee sum” means: 10% of the contract amount

“Employer’s Agent” means: -----

“Works” means: Permanent works together with temporary works

“Site” means: The land and other places, made available by the Employer for the purpose of the contract, on under over in or through which the works are to be executed or carried out.

“Contractor” means: The Agreement made in terms of the Form of Offer and Acceptance and such amendments or additions to the Contractor as may be agreed in writing between the parties.

“Contract Sum” means: The accepted amount inclusive for tax of R-----

Amount in words: -----

“Expiry Date” This Guarantee shall expire upon the issue of the **Completion Certificate** issued by Polokwane Municipality signed by the Director of Water and Sanitation Services, as such date is advised to the Guarantor in writing confirmed by the Employer.

CONTRACT DETAILS

Employer's Agent issues: Interim Payment Certificates, Final Payment Certificate and the Certificate Completion of the Work as defined in the Contract.

PERFORMANCE GUARANTEE

1. The Guarantor's liability shall be limited to the amount of the Guaranteed Sum.
2. Expiry Date—This Guarantee shall expire upon the issue of the final completion certificate issued by Polokwane Municipality signed by the Director Water and Sanitation, as such date is advised to the Guarantor in writing confirmed by the Employer
The Employer's Agent and/or the Employer shall advise the Guarantor in writing of the date on the Certificate of the works has been issued.
3. The Guarantor hereby acknowledges that:
 - 3.1. Any reference in this performance Guarantee to the Contract is made for the purpose of convenience and shall not be construed as any intention whatsoever to create an accessory obligation or any intention whatsoever to create a surety ship;
 - 2.6 . Its obligation under this Performance Guarantee is restricted to the payment of money.
4. Subject to the Guarantor's maximum liability referred to in 1, the Guarantor hereby undertakes to pay the Employer the sum certified upon receipt of the documents identified in 4.1 to 4.3:
 - 4.1. A copy of a first written demand issues by the Employer to the Contractor stating that payment of a sum certified by the Employer's Agent and/ or Employer in an Interim or Final Payment Certificate has not been made in terms of the Contract and failing such payment within seven (7) calendar days, the Employer intends to call upon the Guarantor to make payment in terms of 4.2;
 - 4.2. A first written demand issued by the Employer to the Guarantor at the Guarantor's physical address and / or postal address with a copy to the Contractor stating that period of seven (7) days has elapsed since the first written demand terms of 4.1 and the sum certificate has still not been paid;
 - 4.3. A copy of the aforesaid payment certificate which entails the Employer to receive payment in terms of the Contract sum in 4.
5. Subject to the Guarantor's maximum liability referred to in 1, the Guarantor undertakes to pay to the Employer the Guaranteed sum or the full outstanding balance upon receipt of a first written demand from the Employer to the Guarantor at the Guarantor's physical address and/ or postal address calling up this Performance Guarantee, such demand stating that:
 - 5.1. The contractor has been termination due to the Contractor's default and this performance Guarantee is called up in terms of 5; or

- 5.2. A provisional or final sequestration or liquidation court order has been granted against the Contractor and that the Performance Guarantee is called up in terms of 5; and
- 5.3. The aforesaid written demand is accompanied by a copy of the notice of termination and/or the provisional /final sequestration and/or the provisional liquidation court order.
6. It is recorded that the aggregate amount of payments required to be made by the Guarantor in terms of 4 and 5 shall not exceed the Guarantor's maximum liability in terms of 1.
7. Payment by the Guarantor in terms of 4 or 5 shall be made within seven (7) calendar days upon receipt of the first written demand to the guarantor.
8. Payment by Guarantor in terms of 5 will only be made against the return of the original Performance Guarantee by the Employer.
9. The Employer shall have the absolute right to arrange his affairs with the Contractor in any manner which the Employer may deem fit and the Guarantor shall not have the right to claim his release from his Performance Guarantee on account alleged to be prejudicial to the Guarantor.
10. The Guarantor chooses the physical address and postal address as stated above for the service of all notices for all purposes in connection herewith.
11. This Performance Guarantee is neither negotiable nor transferable and shall expire in terms of 2, where after on claims will be considered by the Guarantor. The original of this Guarantee shall be returned to the Guarantor after it has expired.
12. This Performance Guarantee, with the required demand notices in terms of 4 or 5, shall be regarded as a liquid document for the purposes of obtaining a court order.
13. Where this Performance Guarantee is issued in the Republic of South Africa the Guarantor hereby consents in terms of Section 45 of the Magistrate's Court Act No 32 of 1944, as amended, to the jurisdiction of the Magistrate's Court of any district having jurisdiction in terms of Section 28 of the said Act, notwithstanding that the amount of the claim may exceed the jurisdiction of the Magistrate's Court.

Sign at -----

Date -----

Guarantor's signatory (1) -----

Capacity -----

Guarantor's signatory (2) -----

Capacity -----

Witness signatory (1) -----

Witness signatory (2) -----

RETENTION MONEY GUARANTEE
(Not to be completed at tender stage)

C1.4 Retention Guarantee

Contract No: ..

Description of Contract: ..
 ..

GUARANTOR DETAILS AND DEFINITIONS

“Guarantor” means: ..
(Please put name of Firm)

Address: ..
 ..

Postal Address: ..
 ..

Tel: ..

Fax: ..

“Employer” means: **POLOKWANE MUNICIPALITY**

“Contractor” means: ..
(Please put name of Firm)

“Guarantee sum” means: 5% of the works done to date amount

“Employer’s Agent” means: ..
(Please put name of Firm)

“Works” means: Permanent works together with temporary works

“Site” means: The land and other places, made available by the Employer for the purpose of the contract, on under over in or through which the works are to be executed or carried out.

“Contract” means: The agreement made in terms of the Form of Offer and Acceptance and such amendments or additions to the Contractor as may be agreed in writing between the parties.

“Contract Sum” means: The accepted amount inclusive for tax of Rë ..

Amount in words: ...ë ..
 ...ë ..

“Expiry Date” means: This Guarantee shall expire upon the issue of the **Final Completion Certificate** issued by Polokwane Municipality signed by the Director of Engineering Services, as such date is advised to the Guarantor in writing confirmed by the Employer.

CONTRACT DETAILS

Employer's Agent issues: Interim Payment Certificates, Final Payment Certificate and the Certificate Completion of the Work as defined in the Contract.

RETENTION GUARANTEE

1. The Guarantor's liability shall be limited to the amount of the Guaranteed Sum.
2. Expiry Date—This Guarantee shall expire upon the issue of the final completion certificate issued by Polokwane Municipality signed by the Director of ENGINEERING Services, as such date is advised to the Guarantor in writing confirmed by the Employer
The Employer's Agent and/or the Employer shall advise the Guarantor in writing of the date on the Certificate of the works has been issued.
3. The Guarantor hereby acknowledges that:
 - 3.1. Any reference in this performance Guarantee to the Contract is made for the purpose of convenience and shall not be construed as any intention whatsoever to create an accessory obligation or any intention whatsoever to create a surety ship;
 - 2.7 . Its obligation under this Retention Guarantee is restricted to the payment of money.
4. Subject to the Guarantor's maximum liability referred to in 1, the Guarantor hereby undertakes to pay the Employer the sum certified upon receipt of the documents identified in 4.1 to 4.3:
 - 4.1. A copy of a first written demand issues by the Employer to the Contractor stating that payment of a sum certified by the Employer's Agent and/ or Employer in an Interim or Final Payment Certificate has not been made in terms of the Contract and failing such payment within seven (7) calendar days, the Employer intends to call upon the Guarantor to make payment in terms of 4.2;
 - 4.2. A first written demand issued by the Employer to the Guarantor at the Guarantor's physical address and / or postal address with a copy to the Contractor stating that period of seven (7) days has elapsed since the first written demand terms of 4.1 and the sum certificate has still not been paid;
 - 4.3. A copy of the aforesaid payment certificate which entails the Employer to receive payment in terms of the Contract sum in 4.
5. Subject to the Guarantor's maximum liability referred to in 1, the Guarantor undertakes to pay to the Employer the Guaranteed sum or the full outstanding balance upon receipt of a first written demand from the Employer to the Guarantor at the Guarantor's physical address and/ or postal address calling up this Performance Guarantee, such demand stating that:
 - 5.1. The contractor has been terminated due to the Contractor's default and this Retention Guarantee is called up in terms of 5; or
 - 5.2. A provisional or final sequestration or liquidation court order has been granted against the Contractor and that the Retention Guarantee is called up in terms of 5; and
 - 5.3. The aforesaid written demand is accompanied by a copy of the notice of termination and/or the provisional /final sequestration and/or the provisional liquidation court order.

6. It is recorded that the aggregate amount of payments required to be made by the Guarantor in terms of 4 and 5 shall not exceed the Guarantor's maximum liability in terms of 1.
7. Payment by the Guarantor in terms of 4 or 5 shall be made within seven (7) calendar days upon receipt of the first written demand to the guarantor.
8. Payment by Guarantor in terms of 5 will only be made against the return of the original Retention Guarantee by the Employer.
9. The Employer shall have the absolute right to arrange his affairs with the Contractor in any manner which the Employer may deem fit and the Guarantor shall not have the right to claim his release from his Retention Guarantee on account alleged to be prejudicial to the Guarantor.
10. The Guarantor chooses the physical address and postal address as stated above for the service of all notices for all purposes in connection herewith.
11. This Retention Guarantee is neither negotiable nor transferable and shall expire in terms of 2, where after on claims will be considered by the Guarantor. The original of this Guarantee shall be returned to the Guarantor after it has expired.
12. This Retention Guarantee, with the required demand notices in terms of 4 or 5, shall be regarded as a liquid document for the purposes of obtaining a court order.
13. Where this Retention Guarantee is issued in the Republic of South Africa the Guarantor hereby consents in terms of Section 45 of the Magistrate's Court Act No 32 of 1944, as amended, to the jurisdiction of the Magistrate's Court of any district having jurisdiction in terms of Section 28 of the said Act, notwithstanding that the amount of the claim may exceed the jurisdiction of the Magistrate's Court.

Sign at -----

Date -----

Guarantor's signatory (1) -----

Capacity -----

Guarantor's signatory (2) -----

Capacity -----

Witness signatory (1) -----

Witness signatory (2) -----

POLOKWANE MUNICIPALITY
(Not to be completed at tender stage)

C1.5 OCCUPATIONAL HEALTH AND SAFETY AGREEMENT

This agreement is mandatory for all contractors appointed by the Polokwane Municipality or any other institution that do work for or on behalf of Municipality.

OCCUPATIONAL HEALTH AND SAFETY ACT, 1993
AND
CONSTRUCTION REGULATIONS 2014

AGREEMENT WITH MANDATORY
In terms of Section 37(1) and (2) of the OHSACT
WRITTEN AGREEMENT ENTERED INTO AND BETWEEN

POLOKWANE MUNICIPALITY
(Client)

AND

(Principal Contractor or Contractor)

Compensation Commissioner Number: _____ .
(Attach a copy of the Registration Certificate to this agreement)

▪ **REQUIREMENTS:**

1. The Principal Contractor/Contractor's attention is drawn to the General Duties of Employers to their Employees as required by Section 8 of the Act.
2. The Principal Contractor/Contractor is required to:
 - 2.1 Sign a written Agreement with Mandatory as required by Sect 37(1)(2) of the Act before commencing any work on site.
 - 2.2 Ensure that all your employees receive the necessary Induction Training and have proof thereof in their records.
 - Note: You must ensure that all employees under your control are informed, instructed and trained by a competent person regarding any hazard and the related work procedures before any work commences.
 - 2.3 Ensure the provision of Welfare Facilities for your employees as per Construction Regulation 30.
 - 2.4 Provide the Client/Principal Contractor with your SHE Plan and Specifications.
 - 2.5 Ensure that Method Statements, Risk Assessments and Safe Work Procedures are done and available.
 - 2.6 Provide the Client/Principal Contractor with written appointment of the person who is going to manage the Construction Work per Construction Regulation 8(1).

- 2.7 Provide the Client/Principal Contractor with written designation of your nominated Health and Safety Representative as per Section 17(1).
- Note: Your Health and Safety Representative will be expected to attend the Client/Principal Contractor safety meetings.
- 2.8 If you employ more than five (5) persons, you are required to provide your own First Aid Box (GSR 3(2)).
- 2.9 Where more than ten (10) persons are employed, the Principal Contractor/Contractor are required to provide your own qualified First Aider as per GSR 3(4).
- Note: Where the Principal Contractor/Contractor has difficulty in complying with items 2.7 and 2.8 above, you may arrange/come to an agreement with the Client/Principal Contractor to make use of his First Aid facilities in case of injury. You will be expected to communicate such an agreement to your employees.
- 2.10 When working with Hazardous Chemical Substances, comply with HCS Reg. 3.
- Note: Asbestos and Lead Regulations are separate.
- 2.11 When using a Materials Hoist, comply with the requirements of Construction Regulation 19.
- 2.12 When using Lifting Machines and Lifting Tackle, comply with DMR 19.
- Note: You may be required to appoint a Banks man to control Lifting/Slings operations.
- 2.13 When erecting/using Scaffolding comply with the requirements of SANS 10085 "Access Scaffolding"
- 2.14 When erecting/using Suspended Scaffolding comply with the requirements of Construction Regulation 17.
- 2.15 When doing Demolition Work, comply with Construction Regulation 14.
- 2.16 When doing blasting to comply with Explosives Regulations Chapter 10.
- 2.17 When doing Excavation Work, comply with Construction Regulation 13.
- 2.18 When doing Electrical Installations, comply with the requirements of Construction Regulation 24.
- Note: Electrician to provide a copy of registration as per Electrical Installations Regulation 9(3).
- 2.19 When using Construction Vehicles, comply with Construction Regulation 23.
- 2.20 When using/erecting Temporary Works, comply with Construction Regulation 12.
- 2.21 When working over or in close proximity to Water, comply with Construction Regulation 26.
- 2.22 Ensure that good Housekeeping, Stacking and Storage principles are applied on this project as per Construction Regulations 27 and 28.

- 2.23 Ensure that appropriate measures are taken to avoid the risk of Fire/Explosion and comply with requirements of Construction Regulation 29.
- 2.24 If you are going to work at heights a Fall Protection Plan must be submitted (roof work included) as per the requirements of Construction Regulation 10.
- 2.25 When using explosive actuated fastening devices, comply with Construction Regulation 21
- 2.26 When Welding, Flame Cutting/Soldering, comply with GSR 9.
- 2.27 When working in Confined Spaces, comply with GSR 5.
3. The Principal Contractor/Contractor is responsible for providing their own legal safety documents and registers to comply with the Act's requirements. A copy of the OHS Act of 1993 and the Construction Regulations 2014 will be available for perusal in the Principal Contractor's site office.
4. The Principal Contractor/Contractor is required to comply with General Safety Regulations 2 (1) to (7) and provide your employees with:

Personal protective equipment which will allow them to carry out their work in a safe manner, e.g. hard hats, safety harnesses, gloves, safe footwear, eye protection, ear protection, waterproof clothing etc.
5. Reporting of Incidents of Occupational Diseases shall be done as per General Admin. Regulation 8 (Also see Sect 24 of the Act).
6. Compensation for Occupational Injuries and Diseases Act (No. 130 of 1993).

You are required to provide the Client/Principal Contractor with proof of registration with the Compensation Commissioner/Federated Employer(s) Mutual when signing this agreement. If you are not registered, the Client/Principal Contractor may deduct the necessary amounts from your progress payments and pay it over to the Commissioner to ensure that you are insured. See Section 80 and 89 of the COID Act.

Thus done and signed at _____ on this ____ day of _____, 20__.

WITNESSES:

1. _____

CONTRACTOR

2. _____

CLIENT

POLOKWANE MUNICIPALITY
(Not to be completed at tender stage)

C1.5: Adjudicators Agreement

This agreement is made on the.....day of 20.....between: The Employer

(name of company / organisation)
of

(address).....

.....and the Contractor

(name of company /organisation)

of (address).....

.....(hereinafter called **the Parties**)

and

(name).....of (address)

.....

(hereinafter called **the Adjudicator**)

Disputes or differences may arise/have arisen* between the Parties under a Contract dated.....

and known as Contract No.....

(Contract title)

and these disputes or differences shall be/have been* referred to adjudication in accordance with the CIDB Adjudication Procedure, (hereinafter called "**the Procedure**") and the Adjudicator may be or has been requested to act.

(* Delete as necessary)

IT IS NOW AGREED as follows:

- The rights and obligations of the Adjudicator and the Parties shall be as set out in the Procedure.
- The Adjudicator hereby accepts the appointment and agrees to conduct the adjudication in accordance with the Procedure.
- The Parties bind themselves jointly and severally to pay the Adjudicator's fees and expenses in accordance with the Procedure as set out in the Contract Data.
- The Parties and the Adjudicator shall at all times maintain the confidentiality of the adjudication and shall endeavour to ensure that anyone acting on their behalf or through them will do likewise, save with the consent of the other Parties which consent shall not be unreasonably refused.

- The Adjudicator shall inform the Parties if he intends to destroy the documents which have been sent to him in relation to the adjudication and he shall retain documents for a further period at the request of either Party.

SIGNED by:

(Signature): (Signature):(Signature):

Name:

who warrants that he/ she is
duly authorised to sign for and
on behalf of the **First Party** in
the presence of

Witness:

(Signature).....(Signature).....(Signature).....

Name:

who warrants that he/ she is the
duly authorised to sign for
and on behalf of the **Second
Party** in the presence of

Witness:

Name:

Adjudicator in the
presence of

Witness:

Name:

Address:

.....

Date:

Name:

Address:

.....

Date:

Name:

Address:

.....

Date:

POLOKWANE MUNICIPALITY**PROJECT DESCRIPTION: OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2****C2.1 PRICING INSTRUCTIONS****1. GENERAL**

The pricing instructions describe the criteria and assumptions which will be assumed in the Contract that the Bidder has taken into account when developing his prices. The Bills of Quantities record the Contractor's rates for providing supplies, services, engineering and construction works in accordance with the Scope of Work.

The terms of payment and the provisions for price adjustment, if applicable, are established in the Contract Data. These items are not described in the Pricing Data.

The Bidder's obligations in pricing the Bidder offer and the Employer's undertakings in the checking and correction of arithmetical errors are dealt with in the Standard Conditions of Bidder contained in Annexure F of SANS 294, as amended in and read in conjunction with the Bidder Data.

2. DOCUMENTS MUTUALLY EXPLANATORY

The documents forming the Contract are to be taken as mutually explanatory of one another. The Bill of Quantities forms an integral part of the Contract Documents and shall be read in conjunction with the Bidder Data, Contract Data, Scope of Work, Site Information General and Special Conditions of Contract, the Specifications and the Drawings.

3. DEFINITIONS

For the purpose of this Bill of Quantities, the following words shall have the meanings hereby assigned to them:

Unit	:	The unit of measurement for each item of work as defined in the Scope of Work and Site Information.
Quantity	:	The number of units of work for each item.
Rate	:	The payment per unit of measurement at which the Contractor Contracts to do the work.
Amount	:	The product of the quantity and the rate Bidded for an item.
Sum	:	An amount contracted for an item, the extent of which is described in the Bill of Quantities, the specifications or elsewhere but the quantity of work of which is not measured in any units.

4. DESCRIPTIONS

Descriptions in the Bill of Quantities are abbreviated and comply generally with those in the Standardised Specifications. Clause 8 of each Standardised Specification, read together with the relevant clauses of the Scope of Work, set out what ancillary or associated activities are included in the rates for the operations specified. Should any requirements of the measurement and payment clause of the applicable Standardised Specification, or the Scope of Work, conflict with the terms of the Bill, the requirements of the Standardised Specification or Scope of Work, as applicable, shall prevail.

5. REFERENCES

The clauses in a specification in which further information regarding the schedule item can be obtained appear under 'Reference clause' in the Bill. The reference clauses indicated are not necessarily the only sources of information in respect of scheduled items. Further information and specifications may be found elsewhere in the contract documents. Standardised Specifications for this contract is SABS 1200 series.

6. UNITS OF MEASUREMENT

The units of measurement indicated in the Bill of Quantities are metric units.

The following abbreviations are used in the Bill of Quantities:

%	=	per cent
h	=	hour
ha	=	hectare
kg	=	kilogram
kl	=	kilolitre
km	=	kilometre
km-pass	=	kilometre-pass
kW	=	kilowatt
l	=	litre
m	=	metre
mm	=	millimetre
MN	=	meganewton
MN-m	=	meganewton-metre
MPa	=	megapascal
m ²	=	square metre
m ³	=	cubic metre
m ³ -km	=	cubic metre-kilometre
m ² -pass	=	square metre-pass
no	=	number
PC sum	=	Prime Cost sum
Prov Sum	=	Provisional Sum
sum	=	lump sum
t	=	ton (1 000 kg)

7. NET MEASUREMENTS

Unless otherwise stated, items are measured net in accordance with the drawings, and no allowance is made for off-cuts and waste.

8. QUANTITIES

The quantities set out in these Bills of Quantities are approximate and do not necessarily represent the actual amount of work to be done. The quantities of work accepted and certified for payment will be used for determining payments due and not the quantities given in the Bills of Quantities.

The Contract Amount to be determined in accordance with the conditions of contract identified in the Contract Data shall be computed from the actual quantities of authorized work done, value at rates determined in terms of the Contract Data, against the respective items in the Bill of Quantities.

9. CURRENCY

All rates and sums of money quoted in the Bill of Quantities shall be in Rand and whole cents. Fractions of a cent shall be discounted.

10. VALUE ADDED TAX

Value Added Tax shall be excluded from the rates and sums contracted for the various items of work included in the Bill of Quantities. VAT will be added as a single entry to the summary.

11. RATES AND PRICES

11.1 General

- a) The Contractor must price each item in the Bill of Quantities in BLACK INK. Reproduced computer printouts of the Bills of Quantities will not be acceptable.
- b) The rates and prices to be inserted in the Bill of Quantities shall cover all the services and incidentals for the work described under the several items. Such prices and rates shall cover all costs and expenses that may be required in and for the execution of the work described, and shall cover the cost of all general risks, liabilities and obligations set forth or implied in the documents on which the Bidder is based, as well as overhead charges and profit. Reasonable prices shall be inserted as these will be used as a basis for assessment of payment for additional work that may have to be carried out.
- c) Where the Contractor is required to furnish detailed drawings and designs or other information in terms of the Contract Data, all costs thereof shall be deemed to have been provided for and included in the unit rates and sum amounts contracted for the items scheduled in the Bill of Quantities. Separate additional payments will not be made.
- d) A price or rate is to be entered against each item in the Bill of Quantities, whether the quantities are stated or not. An item against which no price is entered will be considered to be covered by the other prices or rates in the Bill. The Contractor will not be paid for items against which no rate or lump sum has been entered in the Bill of Quantities.
- e) Should the Contractor group a number of items and contract one lump sum for such group of items, this single lump sum shall apply to that group of items and not to each individual item.

- f) Should the Contractor indicate against any item that compensation for such item is included in another item, the rate for the item included in another item shall be deemed nil.
- g) A submission may be regarded as non-responsive if any rates or lump sums in the Bill of Quantities are, in the opinion of the Employer, unreasonable or out of proportion.

11.2 Rate only items

The Contractor shall fill in a rate (in the rate column) against all items where the words "rate only" appear in the Amount column, which rate will constitute payment for work which may be done in terms of this item. Such "rate-only" items are used where it is estimated that little or no work will be required under the item or where the item is to be considered as an alternative to another item for which a quantity is given.

11.3 Arithmetic

Excepting where Sum Amounts are required or where Provisional Sums have been indicated, the Contractor shall enter an applicable rate in the Rate Column of the Bill of Quantities for each scheduled item. He shall also enter an appropriate sum in the Amount column for each scheduled item, by determining in the applicable line item the product of the Quantity and the Unit Rate.

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

If bills of quantities (or schedule of quantities or schedule of rates) 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.

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.

11.4 Labour Intensive work

Those parts of the contract to be constructed using labour-intensive methods have been marked in the bill of quantities with the letters LI in a separate column or as a prefix or suffix against every item so designated. The works, or parts of the works so designated are to be constructed using labour-intensive methods only. The use of plant to provide such works, other than plant specifically provided for in the scope of works, is a deviation from the contract. The items marked with the letters LI are not necessarily an exhaustive list of all the activities which must be done by hand, and this clause does not over-ride any of the requirements in the generic labour intensive specification in the Scope of Works.

Where minimum labour intensity is specified by the design the contractor is expected to use their initiative to identify additional activities that can be done labour-intensively in order to comply with the set minimum labour intensity target.

Payment for items which are designated to be constructed labour-intensively (either in this schedule or in the Scope of Works) will not be made unless they are constructed using labour-intensive methods. Any unauthorised use of plant to carry out work which was to be done labour-intensively will not be condoned and any works so constructed will not be certified for payment.

12. VARIATION IN TEXT

No alteration, erasure or addition is to be made in the text of the Bill of Quantities. Should any alteration, erasure or addition be made, it will not be recognized; the original wording of the Bill of Quantities will be adhered to.

C2.2: BILL OF QUANTITIES

This Schedule of Quantities forms part of the Contract Documents as listed in the Schedule of Documents and shall be read in conjunction with the General Conditions, the Specifications and the Drawings must be submitted, duly completed, on the closing date of Tenders.

Bidders must complete the Schedule of Quantities and fill in the unit rate and total amount for each item. Errors of extensions as entered in the Schedule may be corrected by the Employer but **RATES WILL BE FIXED AND NOT SUBJECT TO PRICE VARIATIONS.** (ALL RATES MUST BE COMPLETED, EVEN WHERE NO QUANTITY IS INDICATED)

The short description of items in the Schedule of Quantities are for identification purposes only, the work covered by the items being fully specified in the relevant clauses in the Specifications. The Bidder must therefore allow in the unit price for ordering, obtaining, supplying, delivering to site, installation and commissioning of the relevant equipment with their accessories.

The quantities reflected in the Schedule of Quantities are approximate only and do not necessarily represent the actual amount of work to be done (DO NOT USE BILL OF QUANTITIES FOR ORDERING PURPOSES). Allowance for off-cuts and scrap shall be allowed for in the unit rates. The Contract Price for the completed Contract shall be computed from the actual quantities (quantities can decrease or increase) of authorised work done to the satisfaction of the Engineer valued at the prices tendered against the respective items in the Schedule of Quantities, and shall include such authorised provisional amounts and items of extra work as have become payable in terms of the Contract Documents. Extra material shall not be paid for and shall be removed from site. When no price is shown for a item, it will be taken to be included elsewhere.

Bidders are advised to check their items extensions and total additions as to many arithmetical errors occurring in the priced Schedule of Quantities will disqualify the Bidder.

Except where Sum Amounts are required or where Provisional Amounts have been indicated, the Bidder shall enter an applicable rate in the Rate Column of the Schedule of Quantities for each scheduled item. He shall also enter an applicable sum in the Amount Column for each scheduled item. Should the Schedule not be completed in the manner herein specified, the tender may either be rejected or the Contractor will not be paid for items against which rates or sum amounts, as applicable, have not been entered. In the event of the latter procedure items not paid for will be regarded as covered by other rates entered in the Schedule of Quantities.

Payment based on the rates tendered in the Schedule shall cover all the services and incidentals included in the works covered by the Contract and shall be made in accordance with the General Conditions, the Specifications and the Agreement pertaining to the Contract.

Where the Contractor is required to furnish detailed drawings and designs or other information in terms of the Contract Documents, all costs shall be deemed to have been provided for and included in the unit rates and sum amounts tendered for the items scheduled in the Schedule of Quantities AND SEPARATE ADDITIONAL PAYMENT WILL NOT BE MADE.

Unit prices quoted in the Schedule of Quantities must include for such small installation materials as are required for the complete installation in accordance with the Specifications.

Writing in the Schedule must be done in black to facilitate clear photocopying.

The Contractor shall keep record of all material delivered to site, and shall submit such record to the Engineer at every site inspection. Material not installed shall be kept in the site yard or store and the material shall be kept readily available for inspection.

Application for payment, accompanied by supporting documentation, shall be submitted to the Engineer on a predetermined date which date shall be a suitable date in each month, agreed upon by all parties concerned with the payment. Claims for additional work in a particular month, for which no written

instruction has not yet been issued, if applicable, must also accompany the monthly application for payment. Late claims will not be considered.

All units' rates and sum amounts shall exclude Value Added Tax, as applicable and in accordance with the ruling rate as laid down by the Government, and all prices shall be quoted in South African currency.

The work listed hereunder is fully described in the specifications or shown on drawings. The contractor shall, however, refer to the general conditions of contract, special conditions and all the drawings

DAYWORK SCHEDULE

Bidders are to complete the schedule below, **showing all rates**, which will apply to any work ordered by the Engineer. Payment will be made at the rates entered in the Schedule and these rates shall cover the supervision, transport, the use of all tools, etc. and shall include profits.

POLOKWANE MUNICIPALITY**PROJECT DESCRIPTION:** _____**C2.2 BILL OF QUANTITIES**

The following is a sample Bill of Quantities for a typical conventional road project with bill items indicated with ΔIôto be executed by Labour Intensive methods.

Section D 1000: Provision for Structured Training					
Item	Description	Unit	Quantity	Rate	Amount
D10.01	Accredited Training				
	Training allowance paid to targeted labour in terms of formal training days	Person days of Training	(insert No. of Workers to be employed x Training days)	(insert the specified daily wage rate)	(insert amount)
	Extra over for the administration payment of training allowances to targeted labour (25% of training allowance)	Sum			(insert amount)
	Transport and accommodation of workers for training where it is not possible to undertake the training in close proximity to the site (provisional sum)	Sum	(Insert Provisional sum)		(insert amount)

BILL OF QUANTITIES
Contents

Description

Schedule 1 Preliminary and General

Schedule 2 Reticulation Network

Schedule 3 Boreholes

Schedule 4 Dayworks

Summary of Bills

Calculation of Tender Sum form

POLOKWANE LOCAL MUNICIPALITY
CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)
BID NUMBER: PM63/2021
SCHEDULE 1 : PRELIMINARY AND GENERAL

ITEM NO.	PAYM. REF.	DESCRIPTION	UNIT	QTY	RATE	AMOUNT
1	SABS 1200A	<u>GENERAL</u> THE GENERAL ITEMS EXCLUDING THE PROVISIONAL ITEMS NOT TO BE MORE THAN 15% OF THE PROJECT VALUE.				
1.1	8.3	<u>Fixed Charges and Value Related Items</u>				
1.1.1	8.3.1	Contractual Requirements	Sum	1.00		
1.1.2	8.3.2	<u>Establish facilities on site</u>				
1.1.2.1	8.3.2.1	i) <u>Facilities for Engineer</u>				
		a) Supply and erect Name Board as per drg.	Sum	1.00		
		b) Furnished office	Sum	1.00		
1.1.2.2	8.3.2.2	ii) <u>Facilities for Contractor</u>				
		a) Offices and storage sheds	Sum	1.00		
		b) Workshops	Sum	1.00		
		c) Ablution and latrine facilities	Sum	1.00		
		d) Tools and equipment	Sum	1.00		
		e) Water supply, electric power and communication	Sum	1.00		
		f) Dealing with water	Sum	1.00		
		g) Access	Sum	1.00		
		h) Plant	Sum	1.00		
		i) Fencing off site of construction camp	Sum	2.00		
		j) Operation Health & Safety	Sum	1.00		
1.1.3	8.3.3	Other fixed-charge obligations	Sum	1.00		
1.1.4	8.3.4	Removal of site establishment	Sum	1.00		
CARRIED FORWARD						

POLOKWANE LOCAL MUNICIPALITY
CONSTRUCTION OF OLIFANTSPPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)
BID NUMBER: PM63/2021
SCHEDULE 1 : PRELIMINARY AND GENERAL

ITEM NO.	PAYM. REF.	DESCRIPTION	UNIT	QTY	RATE	AMOUNT
BROUGHT FORWARD						
1.2	8.4	<u>TIME RELATED ITEMS</u>				
1.2.1	8.4.1	Contractual Requirements	Month	8.00		
1.2.2	8.4.2	<u>Operation and Maintenance of Facilities on Site</u>				
1.2.2.1	8.4.2.1	i) <u>Facilities for Engineer</u>				
		a) Furnished office	Month	8.00		
1.2.2.2	8.4.2.2	ii) <u>Facilities for Contractor</u>				
		a) Offices and storage sheds	Month	8.00		
		b) Workshops	Month	8.00		
		c) Laboratories	Month	8.00		
		d) Living accomodation	Month	8.00		
		e) Ablution and latrine facilities	Month	8.00		
		f) Tools and equipment	Month	8.00		
		g) Water supply, electric power and communication	Month	8.00		
		h) Dealing with water	Month	8.00		
		i) Access	Month	8.00		
		j) Plant	Month	8.00		
		k) Fencing off site of construction camp	Month	8.00		
		l) Operation Health & Safety	Month	8.00		
1.2.3	8.4.3	Supervision for duration of construction	Month	8.00		
1.2.4	8.4.4	Company and Head Office overhead costs for the duration of the Contract	Month	8.00		
1.2.5	8.4.5	Other time related obligations	Month	8.00		
CARRIED FORWARD						

POLOKWANE LOCAL MUNICIPALITY
CONSTRUCTION OF FOLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)
BID NUMBER: PM63/2021
SCHEDULE 1 : PRELIMINARY AND GENERAL

ITEM NO.	PAYM. REF.	DESCRIPTION	UNIT	QTY	RATE	AMOUNT
BROUGHT FORWARD						
1.3	8.5	SUMS STATED PROVISIONALLY BY THE ENGINEER				
		<u>Provisional Sum</u>				
1.3.1		Material to be used during execution of dayworks	Prov. Sum	1.00	10,000	10,000.00
1.3.2		Relocating of existing services	Prov. Sum	1.00	10,000	10,000.00
1.3.3		Community Liaison Officer @ R 4500/month.	Prov. Sum	8.00	4,500	36,000.00
1.3.4		Provision for PSC Seating @ R 140.00/PSC Member	Prov. Sum	8.00	980	7,840.00
1.3.5		Provision for PSC Induction Training Catering	Prov. Sum	1.00	800	800.00
1.3.6		Provision for Labour remuneration during training duration	Prov. Sum	30.00	191.60	5,748.00
1.3.7		Provision for Inservice Training Student	Prov. Sum	8.00	4,500	36,000.00
1.3.8		Provision for Landownership (Royalties)	Prov. Sum	1.00	10,000	10,000.00
1.3.8		Percentage adjustment to item 1.3.1 to cover the expenses of the contractor with regard to item 1.3.1 (Maximum 10%)	%	116388.00		
1.4	8.8	TEMPORARY WORKS				
		<u>Existing Services</u>				
		a) Excavation by hand in soft material to expose services.	m ³	50.00		
		b) Protection of open trenches until construction in vicinity is complete. As some of the work is to be done in residential areas the Contractor is fully responsible for safeguarding all open trenches at all times, especially at night holidays and over weekends and Protection of all structures, works, open trenches etc.	sum	1.00		
1.5		TRAINING				
		Provisional Sum for Labour Training	Prov. Sum	1.00	160,000	160,000.00
		Extra over for the administration payment of training allowance to targeted labour	%	160000.00		
TOTAL CARRIED FORWARD TO SUMMARY						

POLOKWANE LOCAL MUNICIPALITY
CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)
BID NUMBER: PM63/2021
SCHEDULE 2: RETICULATION NETWORK

ITEM NO.	PAYM. REF.	DESCRIPTION	UNIT	QTY	RATE	AMOUNT
1	SABS 1200DA 8.3.2	<u>EARTHWORKS : SMALL WORKS EXCAVATION</u> Excavate for trenches, footings and existing services in all material, backfill and compact, including disposal of surplus/unsuitable material withing a freehaul distance of 5km	m ³	200.00		
1.1 (LI)						
1.2	8.3.2	<u>Extra-over item 1.1 for</u> <i>NOTE: No claim for rock excavation will be entertained unless the contractor has timeously notified the engineer prior to removal and before backfill</i>				
		a) Intermediate excavation (Prov.)	m ³	5.00		
		b) Hard rock excavation (Prov.)	m ³	5.00		
2	SABS 1200DB 8.3.1	<u>EARTHWORKS : PIPE TRENCHES SITE CLEARANCE</u>				
2.1		a) Clear vegetation and trees of girth up to 1m (4m Wide on pipeline route)	m	30,944.00		
3	8.3.2(a)	<u>EXCAVATION</u> Excavate in all materials for trenches for pipes with a diameter up to 400mm uPVC backfill, compact and dispose of surplus/unsuitable material Pipes up to 125mm dia for depths				
3.1		a) Up to 1.0m	m	Rate only		Rate only
		b) Over 1.0m up to 2.0m	m	25,960.00		
		Pipes over 125mm dia up to 700mm dia for depths				
		a) Up to 1.0m	m	Rate only		Rate only
		b) Over 1.0m up to 2.0m	m	4,984.00		
3.2	SABS 1200DB 8.3.2	<u>Extra-over item 2.1 and 2.2 for</u> <i>NOTE: No claim for rock excavation will be entertained unless the contractor has timeously notified the engineer prior to removal and before backfill</i>				
		a) Intermediate excavation (Prov.)	m ³	742.66		
CARRIED FORWARD						

POLOKWANE LOCAL MUNICIPALITY
CONSTRUCTION OF FOLIFANTSPPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)
BID NUMBER: PM63/2021
SCHEDULE 2: RETICULATION NETWORK

ITEM NO.	PAYM. REF.	DESCRIPTION	UNIT	QTY	RATE	AMOUNT
BROUGHT FORWARD						
(LI)		b) Hard rock excavation (Prov.)	m ³	517.00		
		c) Excavate and dispose of unsuitable material from trench bottom (Prov.)	m ³	517.00		
4	8.3.3	<u>EXCAVATION ANCILLARIES</u>				
4.1	8.3.3.1	Make up deficiency in backfill material (Prov.)				
		a) From other necessary excavations on site	m ³	Rate only		Rate only
		b) By importation from designated borrow pits	m ³	1,237.76		
		c) By importation from commercial or off-site sources selected by the contractor	m ³	Rate only		Rate only
4.2	8.3.3.2	Opening and closing down of designated borrow pit	Sum	1.00		
4.3	8.3.3.3	Compaction in road reserves	m ³	464.16		
4.4	8.3.3.4	<u>Overhaul</u>				
		a) Limited overhaul (1.0 to 3.0km) (Prov.)	m ³	517.00		
		b) Long overhaul (Prov.)	m ³ .km	517.00		
5	8.3.5	<u>EXISTING SERVICES</u>				
		a) Excavate and expose of existing services for inspection or crossing purposes	m	200.00		
6	8.3.6	<u>FINISHING</u>				
6.1		<u>Reinstate road surfaces complete with all courses</u>				
		a) Sealed surface	m ²	Rate only		Rate only
		b) Gravel surface	m ²	41.00		
7 (LI)	1200LB	<u>PIPE BEDDING</u>				
7.1	8.2.1	<u>Provision of bedding from trench excavation</u>				
		a) Selected granular material	m ³	5,643.00		
		b) Selected fill material	m ³	5,643.00		
CARRIED FORWARD						

POLOKWANE LOCAL MUNICIPALITY
CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)
BID NUMBER: PM63/2021
SCHEDULE 2: RETICULATION NETWORK

ITEM NO.	PAYM. REF.	DESCRIPTION	UNIT	QTY	RATE	AMOUNT
BROUGHT FORWARD						
7.2	8.2.2 8.8.2.2	<u>Bedding by importation</u> <u>From borrow pits</u> a) Selected granular material b) Selected fill material	m ³ m ³	51.70 51.70		
	8.2.2.3	<u>From commercial source (Prov)</u> a) Selected granular material b) Selected fill material	m ³ m ³	Rate only Rate only		Rate only Rate only
		Overhaul for imported material for bedding cradle and selected fill blanket (Provisional)	m ³ .km	Rate only		Rate only
8 (LI)	1200GA 8.2	<u>CONCRETE: SMALL WORKS</u> <u>FORMWORK</u>				
8.1	8.2.1	Rough formwork to bases and slabs less than 400mm high	m ²	10.00		
	8.3	REINFORCEMENT Mesh ref 198	m ²	10.00		
8.2	8.3.1	High tensile steel bars 10mm	t	0.50		
	8.3.2	Mild Steel Bars 10mm	t	0.50		
8.3	8.4.2	CONCRETE Blinding layer in 15Mpa concrete to a thickness of 75mm	m ²	10.00		
		20Mpa concrete mpa to pipe encasing of all diameters and thrust blocks	m ³	20.00		
9 (LI)	1200L	<u>uPVC PRESSURE PIPE AND PIPE FITTINGS</u>				
9.1	8.2.1	Supply, lay, bed and test the following uPVC pressure pipes (conforming with SABS 966-1976 specifications) in 6m lengths each pipe fitted at one end with socket for Mechanical jointing, in the following diameters :				
CARRIED FORWARD						

POLOKWANE LOCAL MUNICIPALITY
CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)
BID NUMBER: PM63/2021
SCHEDULE 2: RETICULATION NETWORK

SCHEDULE 2: RETICULATION NETWORK							
ITEM NO.	PAYM. REF.	DESCRIPTION	UNIT	QTY	RATE	AMOUNT	
BROUGHT FORWARD							
9.2	8.2.2	a) 315mm dia Class 9	m	Rate Only		Rate Only	
		b) 250mm dia Class 9	m	Rate Only		Rate Only	
		c) 200mm dia Class 9	m	2,138.00			
		d) 200mm dia Class 12	m	1,452.00			
		e) 160mm dia Class 9	m	1,394.00			
		f) 110mm dia Class 9	m	5,615.00			
		g) 110mm dia Class 12	m	2,472.00			
		h) 90mm dia Class 9	m	9,756.00			
		i) 90mm dia Class 12	m	8,117.00			
		<u>FITTINGS AND SPECIALS FOR FIXING ONTO uPVC PIPES</u>					
		Fittings to be suitable for coupling directly (mechanically) onto pipes. Each fitting socketed for mechanical jointing. Fittings for PVC class 16 (unless otherwise specified) Fittings to be of PVC, Cast Iron or epoxy coated steel.					
		Bends					
		a) 355 mm Dia x 90°	no	Rate only		Rate only	
		b) 355 mm Dia x 45°	no	Rate only		Rate only	
		c) 355 mm Dia x 22,5°	no	Rate only		Rate only	
		d) 355 mm Dia x 11.25°	no	Rate only		Rate only	
		a) 200 mm Dia x 90°	no	8		Rate only	
		b) 200 mm Dia x 45°	no	Rate only			
		c) 200 mm Dia x 22,5°	no	4			
		d) 200 mm Dia x 11.25°	no	4			
		a) 160 mm Dia x 90°	no	1			
		b) 160 mm Dia x 45°	no	4			
		c) 160 mm Dia x 22,5°	no	2			
		d) 160 mm Dia x 11.25°	no	4			
		a) 110 mm Dia x 90°	no	8			
		b) 110 mm Dia x 45°	no	3			
		c) 110 mm Dia x 22,5°	no	9			
		d) 110 mm Dia x 11.25°	no	28			
		a) 90 mm Dia x 90°	no	30			
		b) 90 mm Dia x 45°	no	23			
		c) 90 mm Dia x 22,5°	no	35			
		d) 90 mm Dia x 11.25°	no	57			
CARRIED FORWARD							

POLOKWANE LOCAL MUNICIPALITY
CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)
BID NUMBER: PM63/2021
SCHEDULE 2: RETICULATION NETWORK

ITEM NO.	PAYM. REF.	DESCRIPTION	UNIT	QTY	RATE	AMOUNT
BROUGHT FORWARD						
		Reducing Tees				
		a) 355 x 200	no	1		
		b) 200 x 160	no	1		
		c) 200 x 110	no	7		
		d) 160 x 90	no	21		
		Equal Tees				
		a) 200	no	1		
		b) 160	no	10		
		c) 110	no	2		
		d) 90	no	16		
		End Caps				
		a) 200	no	1		
		b) 160	no	1		
		c) 110	no	1		
		d) 90	no	5		
9.2	8.2.8	Recover old pipeline for inspection by engineer depth range not exceeding 2m	m	500.00		
	8.2.9 (b)	Relay pipeline	m	500.00		
10 (LI)		<u>ISOLATION VALAVES</u> Supply and construct isolation valves including valve chambers as per drawing. MONT-STD-WTR-0019	no	5.00		
11 (LI)	SABS 1200L	<u>STANDPIPE CONNECTIONS</u> The rate shall cover the cost, as applicable, of providing the pipes and meter box, saddle, ferrules, stoptaps, marker posts excavation, connecting to the water main, laying in light sandy material, jointing, backfilling, testing, standpipes and complete the service connection as per drawing MONT-STD-WTR-0017	no	71.00		
TOTAL CARRIED FORWARD TO SUMMARY						

POLOKWANE LOCAL MUNICIPALITY
CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)
BID NUMBER: PM63/2021
SCHEDULE 3: BOREHOLES

ITEM NO.	PAYM. REF.	DESCRIPTION	UNIT	QUANT.	RATE	AMOUNT
1		<u>EQUIPPING OF BOREHOLES</u>				
		<u>H04-2878</u>				
		<u>BOREHOLE PIEWORK</u>				
		Total H = 185m, Q = 0.9l/s, Pump Depth = 60m				
1.1		Supply and installation of Borehole equipment, this includes Borehole mono pump complete with pump head, 15kw motor, suitable columns and stabilizers, switch box and gear.	No	1.00		
1.2		Outlet Pipework 90mm diameter, Complete with Control Valve, Check Valve, Scour and Water Meter (All fittings and Valves to be PN 16)	No	1.00		
1.3		Control Panel complete with Level and Pressure Control	No	1.00		
1.4		Testing and commissioning of boreholes	No	1.00		
1.5		Provisional sum for application of Eskom power line and connection.	Prov Sum	1.00	120000	R 120,000.00
1.6		Overheads, charges and profit in respect of the item above.	%	120000.00		
2		<u>H04-2895</u>				
		<u>BOREHOLE PIEWORK</u>				
		Total H = 205m, Q = 2.5l/s, Pump Depth = 80m				
2.1		Supply and installation of Borehole equipment, this includes Borehole mono pump complete with pump head, 15kw motor, suitable columns and stabilizers, switch box and gear.	No	1.00		
2.2		Outlet Pipework 90mm diameter, Complete with Control Valve, Check Valve, Scour and Water Meter (All fittings and Valves to be PN 16)	No	1.00		
2.3		Control Panel complete with Level and Pressure Control	No	1.00		
2.4		Testing and commissioning of boreholes	No	1.00		
CARRIED FORWARD						

POLOKWANE LOCAL MUNICIPALITY**CONSTRUCTION OF OLIFANTSPPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)****BID NUMBER: PM63/2021****SCHEDULE 3: BOREHOLES**

ITEM NO.	PAYM. REF.	DESCRIPTION	UNIT	QUANT.	RATE	AMOUNT
BROUGHT FORWARD						
2.5		Provisional sum for application of Eskom power line and connection.	Prov Sum	Rate Only	60000	Rate Only
2.6		Overheads, charges and profit in respect of the item above.	%	Rate Only		Rate Only
3		<u>H04-2879</u> <u>BOREHOLE PIEWORK</u> H = 189m, Q = 1.4l/s, Pump Depth = 60m Supply and installation of Borehole equipment, this includes Borehole mono pump complete with pump head, 15kw motor, suitable columns and stabilizers, switch box and gear.				
3.1		Outlet Pipework 90mm diameter, Complete with Control Valve, Check Valve, Scour and Water Meter (All fittings and Valves to be PN 16)	No	1.00		
3.2		Control Panel complete with Level and Pressure Control	No	1.00		
3.3		Testing and commissioning of boreholes	No	1.00		
3.4		Provisional sum for application of Eskom power line and connection.	Prov Sum	Rate Only	60000	Rate Only
3.5		Overheads, charges and profit in respect of the item above.	%	Rate Only		Rate Only
4		<u>H04-2884</u> <u>BOREHOLE PIEWORK</u> H = 176m, Q = 10.0l/s, Pump Depth = 55m Supply and installation of Borehole equipment, this includes Borehole mono pump complete with pump head, 15kw motor, suitable columns and stabilizers, switch box and gear.				
4.1		Outlet Pipework 90mm diameter, Complete with Control Valve, Check Valve, Scour and Water Meter (All fittings and Valves to be PN 16)	No	1.00		
4.2		Control Panel complete with Level and Pressure Control	No	1.00		
4.3		Testing and commissioning of boreholes	No	1.00		
4.4						
TOTAL CARRIED FORWARD TO SUMMARY						

POLOKWANE LOCAL MUNICIPALITY

CONSTRUCTION OF FOLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)

BID NUMBER: PM63/2021

SCHEDULE 4: DAYWORKS

ITEM NO.	PAYM. REF.	DESCRIPTION	UNIT	QTY	RATE	AMOUNT	
1.1	SABS 1200A 8.7	<u>Dayworks Labour</u>					
		a) Contractor's Representative	hr	20			
		b) Surveyor	hr	Rate Only		Rate Only	
		c) Qualified artisan	hr	20			
		d) Foreman, leader-hand (9 hr/workday)	workday	10			
		e) Semi-skilled labourer (9 hr/workday)	workday	10			
		f) Labourer (9 hr/workday)	workday	20			
1.2		<u>Planthire : Work Rates on Site</u>					
		<u>Tipper truck (specify capacity)</u>					
		a) 5m³ (small)	hr	20			
		b) 10m³ (large)	hr	40			
		<u>Flat bed truck (specify capacity)</u>					
		a) ton (large)	km	250			
		LDV	km	2500			
		Wheel loader: m³ bucket (specify type)	hr	20			
		<u>Bull dozer</u>					
		a) m³ (large)	hr	Rate Only		Rate Only	
		<u>TLB (Tractor Loader Backhoe)</u> (..... m³ bucket) (specify type)	hr	20			
		<u>Compactor</u>					
		a) (specify applied force) kg	hr	40			
		<u>Concrete mixer (specify dry/wet capacity)</u>					
		a) (small towable)	hr	Rate Only		Rate Only	
		<u>Miscellaneous</u>					
a) Compressor with capacity of ± 10m³/min	hr	20					
b) Water pump with 80mm outlet - diesel driven	hr	40					
TOTAL CARRIED FORWARD TO SUMMARY							

POLOKWANE LOCAL MUNICIPALITY

CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME
PHASE 2 (MULTI-YEAR)

BID NUMBER: PM63/2021

DESCRIPTION	AMOUNT
SCHEDULE 1 : PRELIMINARY AND GENERAL SCHEDULE 2: RETICULATION NETWORK SCHEDULE 3: BOREHOLES SCHEDULE 4: DAYWORKS SUB TOTAL 1	
Add 3% for Escalation SUB TOTAL 2 Add 10% Contingencies Allowance	
SUB TOTAL 3	
ADD 15% VAT	
TOTAL CONTRACT AMOUNT	

POLOKWANE MUNICIPALITY

PROJECT DESCRIPTION: OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)

CALCULATION OF TENDER SUM

TOTAL FOR SCHEDULE OF QUANTITIES (brought forward)

R

ESCALATION

(3.0%)

SUN-TOTAL 2

CONTINGENCIES The sum provided here is under the sole control.
of the employer and may be deducted in whole or in part

(10.0%)

R

SUB-TOTAL 3

R

15% VAT

R

TOTAL TENDER SUM CARRIED FORWARD TO FORM OF OFFER

R

PART C3: SCOPE OF WORK

C3.1: DESCRIPTION OF WORKS

C3.2: LIST OF DRAWINGS

C3.3: PROCUMENT

C3.4: CONSTRUCTION

**C3.5: INTERNATIONAL, NATIONAL AND POLOKWANE MUNICIPALITY
STANDARDS**

C3.6: HEALTH AND SAFETY SPECIFICATIONS

C3.7: ENVIRONMENTAL MANAGEMENT DURING CONSTRUCTION

C3.8: MANAGEMENT OF WORKS

POLOKWANE MUNICIPALITY**PROJECT DESCRIPTION: OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)****C3 Scope of Work**

As much as is economically feasible all work shall be implemented by employing Labour Intensive Construction methods. Over and above the normal Building and Allied works to be implemented by employing skilled and unskilled labour the works specified in the “Guidelines for the Implementation of Labour-Intensive Infrastructure Projects under the Expanded Public Works Programme (EPWP)” shall be undertaken using Labour Intensive Construction methods

C3.1 DESCRIPTION OF THE WORKS**C3.1.1 Employer’s objectives**

The employer’s objectives are to deliver public infrastructure using labour intensive methods in accordance with EPWP Guidelines

Labour-intensive works

Labour-intensive works shall be constructed/maintained using local workers who are temporarily employed in terms of this Scope of Work.

Labour-intensive competencies of supervisory and management staff

Contractors shall engage supervisory and management staff in labour-intensive works that have completed the skills programme including Foremen/Supervisors at NQF “National Certificate: Supervision of Civil Engineering Construction Processes” and Site Agent/Manager at NQF level 5 “Manage labour-intensive Construction Processes” or equivalent QCTO qualifications.

C3.1.2 Overview of the works

The work will be carried using Labour- Intensive approach as much as possible. Labour-intensive works comprise the activities described in SANS 1921-5, Earthworks activities which are to be performed by hand, and its associated specification data. Such works shall be Constructed using local workers who are temporarily employed in terms of this Scope of Work.

C3.1.3 Extent of the works

The works entails:

Reticulation Network

Construction of 30.944km reticulation network with valves and all ancillary works as follows:

1.	200 mm uPVC medium pressure pipes	-	Class 09.	2 138 m
2.	200 mm uPVC medium pressure pipes	-	Class 12.	1 452 m
3.	160 mm uPVC medium pressure pipes	-	Class 09	1 394 m
4.	110 mm uPVC medium pressure pipes	-	Class 09	5 615 m
5.	110 mm uPVC medium pressure pipes	-	Class 12	2 472 m
6.	90 mm uPVC medium pressure pipes	-	Class 09	9 756 m
7.	90mm uPVC medium pressure pipes	-	Class 12	8 117 m
8.	Isolation Gate Valves	-		05 no.

9. Standpipe Connections - 71 no.

Boreholes

Equipping, electrification and commissioning of boreholes. Boreholes to consist of cast in-situ concrete pump houses, suitable pump and motor and necessary fittings and ancillary works.

10. H04-2878
11. H04-2895
12. H04-2879
13. H04-2884

Commissioning of the Works and Maintenance as per contract data.

C3.1.4 Location of the Works

The limits of the project are as shown on the locality plan bound into the book of drawings to be received together with this document. The project area is located approximately 25km north west of Polokwane City Central Business District in the Limpopo province. Access to site from Polokwane CBD is via the Nelson Mandela Drive which connects to road R 567 from Seshego to Gilead/Matlala. The site of works is located at;

Latitude: 23°49'20.68"S Longitude: 29°21'30.89"E

The site shall not only include the works area for the construction of the new services but shall be extended in the broader sense to take account of all areas occupied by the Contractor, be it deliberate or unintentional, in the execution of the contract.

C3.1.5 Temporary Works

No Temporary works are envisaged on the contract.

C3.1.6 General Information

C3.1.7 Labour Regulations

C3.1.7.1 Payment for the labour-intensive component of the works

Payment for works identified in clause 2.3 of the Extent of the Project in the Project Specifications as being labour-intensive shall only be made in accordance with the provisions of the Contract if the works are constructed strictly in accordance with the provisions of the scope of work. Any non-payment for such works shall not relieve the Contractor in any way from his obligations either in contract or in delict.

C3.1.7.2 Applicable labour laws

The Ministerial Determination for Special Public Works Programmes, issued in terms of the Basic Conditions of Employment Act of 1997 by the Minister of Labour in **Government Notice N° R949 in Government Gazette 33665 of 22 October 2010**, as reproduced below, shall apply to works described in the scope of work as being labour intensive and which are undertaken by unskilled or semi-skilled workers.

C3.1.7.3 Introduction

This document contains the standard terms and conditions for workers employed in elementary occupations on a Special Public Works Programme (SPWP). These terms and conditions do NOT apply to persons employed in the supervision and management of a SPWP.

In this document ñ

- (a) ádepartmentômeans any department of the State, implementing agent or contractor;
- (b) áemployerômeans any department, implementing agency or contractor that hires workers to work in elementary occupations on a SPWP;
- (c) áworkerômeans any person working in an elementary occupation on a SPWP;
- (d) áelementary occupationômeans any occupation involving unskilled or semi-skilled work;
- (e) ámanagementômeans any person employed by a department or implementing agency to administer or execute an SPWP;
- (f) átaskômeans a fixed quantity of work;
- (g) átask-based workômeans work in which a worker is paid a fixed rate for performing a task;
- (h) átask-rated workerômeans a worker paid on the basis of the number of tasks completed;
- (i) átime-rated workerômeans a worker paid on the basis of the length of time worked.

C3.1.7.4 Terms of Work

1. Workers on a SPWP are employed on a temporary basis.
2. A worker may NOT be employed for longer than 24 months in any five-year cycle on a SPWP.
3. Employment on a SPWP does not qualify as employment as a contributor for the purposes of the Unemployment Insurance Act 30 of 1966.

C3.1.7.5 Normal Hours of Work

An employer may not set tasks or hours of work that require a worker to workñ

- (a) more than forty hours in any week
- (b) on more than five days in any week; and
- (c) for more than eight hours on any day.

4. An employer and worker may agree that a worker will work four days per week. The worker may then work up to ten hours per day.
5. A task-rated worker may not work more than a total of 55 hours in any week to complete the tasks allocated (based on a 40-hour week) to that worker.

C3.1.7.6 Meal Breaks

6. A worker may not work for more than five hours without taking a meal break of at least thirty minutes duration.
7. An employer and worker may agree on longer meal breaks.
8. A worker may not work during a meal break. However, an employer may require a worker to perform duties during a meal break if those duties cannot be left unattended and cannot be performed by another worker. An employer must take reasonable steps to ensure that a worker is relieved of his or her duties during the meal break.
9. A worker is not entitled to payment for the period of a meal break. However, a worker who is paid on the basis of time worked must be paid if the worker is required to work or to be available for work during the meal break.

C3.1.7.7 Special Conditions for Security Guards

1. A security guard may work up to 55 hours per week and up to eleven hours per day.
2. A security guard who works more than ten hours per day must have a meal break of at least one hour or two breaks of at least 30 minutes each.

C3.1.7.8 Daily Rest Period

1. Every worker is entitled to a daily rest period of at least eight consecutive hours. The daily rest period is measured from the time the worker ends work on one day until the time the worker starts work on the next day.

C3.1.7.9 Weekly Rest Period

1. Every worker must have two days off every week. A worker may only work on their day off to perform work which must be done without delay and cannot be performed by workers during their ordinary hours of work (emergency work).

C3.1.7.10 Work on Sundays and Public Holidays

1. A worker may only work on a Sunday or public holiday to perform emergency or security work.
2. Work on Sundays is paid at the ordinary rate of pay.
3. A task-rated worker who works on a public holiday must be paid ñ
 1. the worker's daily task rate, if the worker works for less than four hours;
 2. double the worker's daily task rate, if the worker works for more than four hours.
4. A time-rated worker who works on a public holiday must be paid ñ
 1. the worker's daily rate of pay, if the worker works for less than four hours on the public holiday;
 2. double the worker's daily rate of pay, if the worker works for more than four hours on the public holiday.

C3.1.7.11 Sick Leave

1. Only workers who work four or more days per week have the right to claim sick-pay in terms of this clause.
2. A worker who is unable to work on account of illness or injury is entitled to claim one day's paid sick leave for every full month that the worker has worked in terms of a contract.
3. A worker may accumulate a maximum of twelve days'sick leave in a year.
4. Accumulated sick-leave may not be transferred from one contract to another contract.
5. An employer must pay a task-rated worker the worker's daily task rate for a day's sick leave.
6. An employer must pay a time-rated worker the worker's daily rate of pay for a day's sick leave.
7. An employer must pay a worker sick pay on the worker's usual payday.
8. Before paying sick-pay, an employer may require a worker to produce a certificate stating that the worker was unable to work on account of sickness or injury if the worker is ñ
 1. absent from work for more than two consecutive days; or
 2. absent from work on more than two occasions in any eight-week period.
9. A medical certificate must be issued and signed by a medical practitioner, a qualified nurse or a clinic staff member authorised to issue medical certificates indicating the duration and reason for incapacity.
10. A worker is not entitled to paid sick-leave for a work-related injury or occupational disease for which the worker can claim compensation under the Compensation for

Occupational Injuries and Diseases Act.

C3.1.7.12 Maternity Leave

1. A worker may take up to four consecutive months of unpaid maternity leave.
2. A worker is not entitled to any payment or employment-related benefits during maternity leave.
3. A worker must give her employer reasonable notice of when she will start maternity leave and when she will return to work.
4. A worker is not required to take the full period of maternity leave. However, a worker may not work for four weeks before the expected date of birth of her child or for six weeks after the birth of her child, unless a medical practitioner, midwife or qualified nurse certifies that she is fit to do so.
5. A worker may begin maternity leave ñ
6. four weeks before the expected date of birth; or
7. on an earlier date ñ
 - (i) if a medical practitioner, midwife or certified nurse certifies that it is necessary for the health of the worker or that of her unborn child; or
 - (ii) if agreed to between employer and worker; or
 - (iii) on a later date, if a medical practitioner, midwife or certified nurse has certified that the worker is able to continue to work without endangering her health.
8. A worker who has a miscarriage during the third trimester of pregnancy or bears a stillborn child may take maternity leave for up to six weeks after the miscarriage or stillbirth.
9. A worker who returns to work after maternity leave, has the right to start a new cycle of twenty-four months employment, unless the SPWP on which she was employed has ended.

C3.1.7.12 Family responsibility leave

Workers, who work for at least four days per week, are entitled to three days paid family responsibility leave each year in the following circumstances -

- (a) when the employee's child is born;
- (b) when the employee's child is sick;
- (c) in the event of a death of ñ
 - (i) the employee's spouse or life partner;
 - (ii) the employee's parent, adoptive parent, grandparent, child, adopted child, grandchild or sibling.

C3.1.7.13 Statement of Conditions

An employer must give a worker a statement containing the following details at the start of employment ñ

- (a) the employer's name and address and the name of the SPWP;
- (b) the tasks or job that the worker is to perform; and
- (c) the period for which the worker is hired or, if this is not certain, the expected duration of the contract;
- (d) the worker's rate of pay and how this is to be calculated;
- (e) the training that the worker will receive during the SPWP.
- (f) An employer must ensure that these terms are explained in a suitable language to any employee who is unable to read the statement.
- (g) An employer must supply each worker with a copy of these conditions of employment.

C3.1.7.14 Keeping Records

Every employer must keep a written record of at least the following ñ

- (a) the worker's name and position;
- (b) in the case of a task-rated worker, the number of tasks completed by the worker;
- (c) in the case of a time-rated worker, the time worked by the worker;
- (d) payments made to each worker.
- (e) The employer must keep this record for a period of at least three years after the completion of the SPWP.

C3.1.7.15 Payment

1. An employer must pay all wages at least monthly in cash or by cheque or into a bank account.
2. A task-rated worker will only be paid for tasks that have been completed.
3. An employer must pay a task-rated worker within five weeks of the work being completed and the work having been approved by the manager or the contractor having submitted an invoice to the employer.
4. A time-rated worker will be paid at the end of each month.
5. Payment must be made in cash, by cheque or by direct deposit into a bank account designated by the worker.
6. Payment in cash or by cheque must take place ñ
 1. at the workplace or at a place agreed to by the worker;
 2. during the worker's working hours or within fifteen minutes of the start or finish of work;
 3. in a sealed envelope which becomes the property of the worker.

C3.1.7.16 An employer must give a worker the following information in writing –

- (a) the period for which payment is made;
- (b) the numbers of tasks completed or hours worked;
- (c) the worker's earnings;
- (d) any money deducted from the payment;
- (e) the actual amount paid to the worker.
- (f) If the worker is paid in cash or by cheque, this information must be recorded on the envelope and the worker must acknowledge receipt of payment by signing for it
- (g) If a worker's employment is terminated, the employer must pay all monies owing to that worker within one month of the termination of employment.

C3.1.7.17 Deductions

1. An employer may not deduct money from a worker's payment unless the deduction is required in terms of a law.
2. An employer must deduct and pay to the SA Revenue Services any income tax that the worker is required to pay.
3. An employer who deducts money from a worker's pay for payment to another person must pay the money to that person within the time period and other requirements specified in the agreement law, court order or arbitration award concerned.
4. An employer may not require or allow a worker to ñ
 1. repay any payment except an overpayment previously made by the employer by mistake;
 2. state that the worker received a greater amount of money than the employer actually paid to the worker; or

3. pay the employer or any other person for having been employed.

C3.1.7.18 Health and Safety

1. Employers must take all reasonable steps to ensure that the working environment is healthy and safe.
2. A worker must ñ
 1. work in a way that does not endanger his/her health and safety or that of any other person;
 2. obey any health and safety instruction;
 3. obey all health and safety rules of the SPWP;
 4. use any personal protective equipment or clothing issued by the employer;
 5. report any accident, near-miss incident or dangerous behaviour by another person to their employer or manager.

C3.1.7.19 Compensation for Injuries and Diseases

1. It is the responsibility of the employers (other than a contractor) to arrange for all persons employed on a SPWP to be covered in terms of the Compensation for Occupational Injuries and Diseases Act, 130 of 1993.
2. A worker must report any work-related injury or occupational disease to their employer or manager.
3. The employer must report the accident or disease to the Compensation Commissioner.
4. An employer must pay a worker who is unable to work because of an injury caused by an accident at work 75% of their earnings for up to three months. The employer will be refunded this amount by the Compensation Commissioner. This does NOT apply to injuries caused by accidents outside the workplace such as road accidents or accidents at home.

C3.1.7.20 Termination

1. The employer may terminate the employment of a worker for good cause after following a fair procedure.
2. A worker will not receive severance pay on termination.
3. A worker is not required to give notice to terminate employment. However, a worker who wishes to resign should advise the employer in advance to allow the employer to find a replacement.
4. A worker who is absent for more than three consecutive days without informing the employer of an intention to return to work will have terminated the contract. However, the worker may be re-engaged if a position becomes available for the balance of the 24-month period.
5. A worker who does not attend required training events, without good reason, will have terminated the contract. However, the worker may be re-engaged if a position becomes available for the balance of the 24-month period.

C3.1.7.21 Certificate of Service

- On termination of employment, a worker is entitled to a certificate stating ñ
- (a) the worker's full name;
 - (b) the name and address of the employer;
 - (c) the SPWP on which the worker worked;

- (d) the work performed by the worker;
- (e) any training received by the worker as part of the SPWP;
- (f) the period for which the worker worked on the SPWP;
- (g) any other information agreed on by the employer and worker.

C3.1.7.22 Contractor's default in payment to Labourers and Employees

1. Any dispute between the Contractor and labourers, regarding delayed payment or default in payment of fair wages, if not resolved immediately may compel the Employer to intervene.
2. The Employer may, upon the Contractor defaulting payment, pay the moneys due to the workers not honoured in time, out of any moneys due or which may become due to the Contractor under the Contract.

C3.1.7.23 Provision of Handtools

1. The Contractor shall provide his labour force with hand tools of adequate quality, sufficient in numbers and make the necessary provisions to maintain the tools in good and safe working conditions

C3.1.7.23 Reporting

The Contractor shall submit monthly returns/reports as specified below:

1. Signed Muster rolls/pay sheets of temporary workers and permanent staff detailing the number, category, gender, rate of pay and daily attendance.
 2. Copies of identity documents of workers
 3. Number of persons who have attended training including nature and duration of training provided
 4. Assets created, rehabilitated or maintained in accordance with indicators in the EPWP M&E framework
5. Plant utilization returns
6. Progress report detailing production output compared to the programme of works

C3.2 LIST OF DRAWINGS

The followings list of drawings are applicable to the contract

NO.	DRAWING DESCRIPTION	DRAWING NO.	SHEET NO.
1	LOCALITY PLAN	PLK-002-WTR-000	SHEET 1 OF 1
2	GENERAL SURVEY LAYOUT PLAN	PLK-002-WTR-000	SHEET 1 OF 1
3	RETICULATION LAYOUT PLAN	THLM-001-WTR-001	SHEET 1 OF 1
4	INFORMATION BOARD	MONT-STD-WTR-0001	SHEET 1 OF 1
5	PIPELINE MARKER DETAILS	MONT-STD-WTR-0002	SHEET 1 OF 1
6	PIPE TRENCH DETAILS	MONT-STD-WTR-0003	SHEET 1 OF 1
7	PIPE BEDDING DETAILS	MONT-STD-WTR-0004	SHEET 1 OF 1
8	HORIZONTAL THRUST BLOCKS FOR PIPE REDUCERS	MONT-STD-WTR-0005	SHEET 1 OF 1
9	HORIZONTAL THRUST BLOCKS BENDS AND T- JUNCTION	MONT-STD-WTR-0006	SHEET 1 OF 1
10	VERTICAL THRUST BLOCKS BENDS & T- JUNCTIONS	MONT-STD-WTR-0007	SHEET 1 OF 1
11	PIPE ANCHOR BLOCKS ON SLOPES STEEPER THAN 1 TO 10	MONT-STD-WTR-0008	SHEET 1 OF 1
12	STANDPIPE CONNECTION TYPICAL DETAILS	MONT-STD-WTR-0017	SHEET 1 OF 1
13	RETICULATION ISOLATION VALVE DETAILS	MONT-STD-WTR-0019	SHEET 1 OF 1

C3.3 PROCUREMENT POLICY

Bids will be assessed under the provisions of the following Acts and its Regulations: Municipal Finance Management Act, (Act 56 of 2003); BBBEE, Supply Chain Management Policy of the municipality in accordance with the specifications and in terms of 90:10 preferential points system and functionality. The minimum threshold for functionality is 60%, bidders who score less than 60% will not be considered for further evaluation.

C3.4 CONSTRUCTION

C3.5.1 Applicable standards for construction works

The following parts of SANS 1921 Construction works standards and associated specification data are applicable to the works:

SANS 1921

SANS 1921

The abovementioned South African National Standards make several references to the Specification Data for data, provisions and variations that make these standards applicable to this contract. The Specification Data shall have precedence in the interpretation of any ambiguity or inconsistency between it and these standards.

Each item of Specification Data given below is cross-referenced to the clause in the standard to which it mainly applies.

The associated Specification Data is as follows:

SANS 1921-1, Construction and management requirements for works contracts – Part 1: General engineering and construction works	
Clause	Specification data
Essential data	
4.1.7	There are no requirements for drawings, information and calculations for which the contractor is responsible
4.2.1	The responsibility strategy assigned to the contractor for the works is A.
4.2.2	The structural engineer is not applicable on this project.
4.3.1	The planning, programme and method statements are to comply with the following: 1) Detailed activity programming. 2) Critical path determination 3) Mitigation measure planning The Contractor's programme to be submitted in terms of the Conditions of Contract must take full account of all matters as may impact of the sequence of executing the various components of the Works and the requisite rate of progress of the Works, as specified in or reasonably to be required from the Contract. The Construction Programme to be submitted by the Contractor should: 1. Be in the form of a bar chart 2. Clearly indicate the start and end dates and duration of all construction activities and identify the critical path 3. Be linked to the cash flow that would be required for payments If the Contractor is falling behind in its Construction Programme, the Contractor shall submit a revised programme of how the lost time would be regained to ensure completion of the Works at or before the Due Completion Date. Any proposals by the Contractor to increase the tempo of work must incorporate positive steps to increase production either by the provision of more labour and Plant on the Site, or by using the available labour and Plant in a more efficient manner.

	Failure on the part of the Contractor to submit or to work according to the programme or revised programmes shall be sufficient reason for the Engineer to take steps to terminate the Contract The Contractor's programme shall make allowances for the presence of such other contractors on the Site as are described below. This may involve adapting the Contractor's programme to accommodate the work of such other contractors and ensuring access to their sites along prescribed routes over the Site of this Contract. At this stage other known Contractors working close to the Site of Works are: 1. Nil
4.3.3	The notice period for inspection is 2 working days
4.7.3	The overbreak allowances for blasting are not provided for separately in the scope of work.
4.9.3	The trees and shrubs which are not to be disturbed would be identified on site prior to construction.
4.12.2	The onus to produce work that conforms in quality and accuracy of detail to the requirements of the Specifications and of the Drawings rests with the Contractor, and the Contractor shall, at his own expense, institute a quality-control system and provide experienced engineers, foremen, surveyors, materials technicians, other technicians and technical staff, together with all transport, instruments and equipment to ensure adequate supervision and positive control of the quality of the Works at all stages of the Contract. The costs of the Contractor's supervision and process control, including all testing carried out by the Contractor, will be deemed to be included in the rates tendered for the various items of work. The Contractor's attention is drawn to the provision of the various Standardised Specifications regarding the minimum frequency of process control testing that is to be executed. The Contractor shall, at his own discretion, increase this frequency where necessary to ensure adequate control of the quality of the Works at all times. Upon completion submission of each portion of the Works to the Engineer for examination, the Contractor shall furnish the Engineer with the results of relevant tests, measurements and levels, thereby indicating compliance with the Specifications. The Engineer will not examine or inspect any portion of work submitted for approval unless the request for inspection and approval is accompanied by relevant tests, measurements and levels
4.12.2	The fabrication drawings that the contractor is to provide and deliver to the employer would be for any detailed workshop drawings of any components that are called for on the drawings
4.14.3	The office accommodation, equipment, accommodation for site meetings and other facilities for use by the employer and his agents are: 1) Site office which shall be used for site meetings and for the contractor's use. Such an office shall comprise a minimum of 20m² in area and 3 m high, be ventilated, have good lamination, must be reasonably sound proof, and have a hard floor construction. It shall be furnished with a desk on which drawings can be rolled open and on which there is sufficient writing space and sufficient temporary chairs or benches to accommodate all persons present at site meetings. 2) The use of the Contractor's leveling and measuring tools.
4.14.5	The Contractor is required to provide latrine and ablution facilities.

4.14.6	The Contractor shall provide, erect and maintain one (1) contract name board at a positions and location as directed by the Engineer. The name board shall be manufactured in accordance with the requirements set out in SABS 1200 AB. The Engineer shall provide thee wording that is required.
4.17.1	The requirements for the termination, diversion or maintenance of existing services are reflected on the drawings and project specifications.
4.17.3	Services which are known to exist on the site are either reflected on the contract drawings or would be pointed out on site (confirmed in writing by means of site instruction)
4.17.4	The requirements for detection apparatus are either carefully exposing by hand or electronic means. Provision was made in the Bills of Quantities for the required methods.

Variations			
None			
Additional clauses			
1 Site meetings and procedures			
The Employer's Representative and the Contractor shall hold meetings relating to the progress of the works at regular intervals and at other such times as may be necessary. The Contractor shall attend all site meetings and shall ensure that all persons under his jurisdiction are notified timeously of all site meetings should the Employer's Representative require their attendance at such meetings. The Contractor shall keep on site a set of minutes of all site meetings, daily records of resources (people and equipment employed), a site instruction book, a complete set of contract working drawings and a copy of the procurement document and make these available at all reasonable times to all persons concerned with the contract.			
2 Water and electricity			
The Employer does not warrant that any water supply or electricity supply that may exist is adequate for the proper execution of the works. The responsibility strategies in terms of the tabulation below that will apply to the contract is: a) water : A b) electricity : A			
Service	Option		
	A	B	C
	Contractor responsibility	Employer responsibility	
Water	The Contractor is to provide, and remove and make good upon completion, all the necessary temporary plumbing connections and purchase water from the local authority for the works at his own cost.	The Contractor shall make, and upon completion remove, all the necessary connections to the Employer's water supply at designated points and make use of water free of charge for construction purposes only.	The Contractor shall make, and upon completion remove, all the necessary connections and water meters to the Employer's water supply at designated points and be responsible for costs associated with all water consumed.
Electricity	The Contractor is to provide, and remove and make good upon completion, all the necessary temporary electrical connections and installations and purchase electricity from the local authority / ESKOM for the works at his own cost.	The Contractor shall make, and upon completion remove, all the necessary electrical connections to the Employer's electrical supply at designated points and make use of electricity free of charge for construction purposes only.	The Contractor shall make, and upon completion remove, all the necessary connections and meters to the Employer's electrical supply and be responsible for costs associated with all electricity consumed.

3.5 APPLICABLE NATIONAL AND INTERNATIONAL STANDARDS

See Section E of this document for Specifications.

4.0.2 Particular / generic specifications

See Section E of this document for Specifications.

4.1.0 EPWP labour intensive specification

4.1.1 Labour intensive competencies of supervisory and management staff

Contractors having a CIDB contractor grading designation of 6CE/ 5CE PE and higher shall only engage supervisory and management staff in labour intensive works who have either completed, or for the period 1 April 2004 to 30 June 2006, are registered for training towards, the skills programme outlined in Table 1.

The managing principal of the contractor, namely, a sole proprietor, the senior partner, the managing director or managing member of a close corporation, as relevant, having a contractor grading designation of 1CE, 2CE, 3CE and 4CE shall have personally completed, or for the period 1 April 2004 to 30 June 2006 be registered on a skills programme for the NQF level 2. All other site supervisory staff in the employ of such contractors must have completed, or for the period 1 April 2004 to 30 June 2006 be registered on a skills programme for, the NQF level 2 unit standards or NQF level 4 unit standards.

Table 1: Skills programme for supervisory and management staff

Personnel	NQF level	Unit standard titles	Skills programme description
Team leader / supervisor	2	Apply Labour Intensive Construction Systems and Techniques to Work Activities	This unit standard must be completed, and any one of these 3 unit standards
		Use Labour Intensive Construction Methods to Construct and Maintain Roads and Stormwater Drainage	
		Use Labour Intensive Construction Methods to Construct and Maintain Water and Sanitation Services	
		Use Labour Intensive Construction Methods to Construct, Repair and Maintain Structures	
Foreman/ supervisor	4	Implement labour Intensive Construction Systems and Techniques	This unit standard must be completed, and any one of these 3 unit standards
		Use Labour Intensive Construction Methods to Construct and Maintain Roads and Stormwater Drainage	
		Use Labour Intensive Construction Methods to Construct and Maintain Water and Sanitation Services	
		Use Labour Intensive Construction Methods to Construct, Repair and Maintain Structures	
Site Agent / Manager (i.e. the contractor's most senior representative that is resident on the site)	5	Manage Labour Intensive Construction Processes	Skills Programme against this single unit standard

4.2.0 Employment of unskilled and semi-skilled workers in labour-intensive works – According to SANS 1914-5.

4.2.1 Requirements for the sourcing and engagement of labour.

4.2.1.1 Unskilled and semi-skilled labour required for the execution of all labour intensive works shall be engaged strictly in accordance with prevailing legislation and SANS 1914-5, Participation of Targeted Labour.

4.2.1.2 The rate of pay set for the EPWP per task or per day is R 175.00

4.2.1.3 Tasks established by the contractor must be such that:

1. the average worker completes 5 tasks per week in 40 hours or less; and
2. the weakest worker completes 5 tasks per week in 55 hours or less.

4.2.1.4 The contractor must revise the time taken to complete a task whenever it is established that the time taken to complete a weekly task is not within the requirements of 4.2.1.3.

4.2.1.5 The Contractor shall, through all available community structures, inform the local community of the labour intensive works and the employment opportunities presented thereby. Preference must be given to people with previous practical experience in construction and / or who come from households:

- a) where the head of the household has less than a primary school education;
- b) that has less than one full time person earning an income;
3. where subsistence agriculture is the source of income.
- d) those that are not in receipt of any social security pension income

4.2.1.6 The Contractor shall endeavour to ensure that the expenditure on the employment of temporary workers is in the following proportions:

4.2.2.0 Specific provisions pertaining to SANS 1914-5

4.2.2.1 Definitions

Targeted labour: Unemployed persons who are employed as local labour on the project.

4.2.2.2 Contract participation goals

4.2.2.2.1 There is no specified contract participation goal for the contract. The contract participation goal shall be measured in the performance of the contract to enable the employment provided to targeted labour to be quantified.

4.2.2.2.2 The wages and allowances used to calculate the contract participation goal shall, with respect to both time-rated and task rated workers, comprise all wages paid and any training allowance paid in respect of agreed training programmes.

4.2.2.3 Terms and conditions for the engagement of targeted labour

Further to the provisions of clause 3.3.2 of SANS 1914-5, written contracts shall be entered into with targeted labour.

4.2.2.2.4 Variations to SANS 1914-5

4.2.2.2.4.1 The definition for net amount shall be amended as follows:

Financial value of the contract upon completion, exclusive of any value added tax or sales tax which the law requires the employer to pay the contractor.

4.2.2.2.4.2 The schedule referred to in 5.2 shall in addition reflect the status of targeted labour as women, youth and persons with disabilities and the number of days of formal training provided to targeted labour.

4.2.2.2.5 Training of targeted labour

4.2.2.2.5.1 The contractor shall provide all the necessary on-the-job training to targeted labour to enable such labour to master the basic work techniques required to undertake the work in accordance with the requirements of the contract in a manner that does not compromise worker health and safety.

4.2.2.2.5.2 The cost of the formal training of targeted labour will be funded by the provincial office of the Department of Labour. This training should take place as close to the project site as practically possible. The contractor, must access this training by informing the relevant provincial office of the Department of Labour in writing, within 14 days of being awarded the contract, of the likely number of persons that will undergo training and when such training is required. The employer must be furnished with a copy of this request.

4.2.2.2.5.3 A copy of this training request made by the contractor to the DOL provincial office must also be faxed to the EPWP Training Director in the Department of Public Worksñ Cinderella Makunike, Fax Number 012 328 6820 or email cinderella.makunike@dpw.gov.za Tel: 083 677 4026.

4.2.2.2.5.4 The contractor shall be responsible for scheduling the training of workers and shall take all reasonable steps to ensure that each beneficiary is provided with a minimum of six (6) days of formal training if he/she is employed for 3 months or less and a minimum of ten (10) days if he she is employed for 4 months or more.

4.2.2.2.5.5 The contractor shall do nothing to dissuade targeted labour from participating in training programmes.

4.2.2.2.5.4 An allowance equal to 100% of the task rate or daily rate shall be paid by the contractor to workers who attend formal training, in terms of 4ë 2.2.2.5.4 above.

4.2.2.2.5.5 Proof of compliance with the requirements of 4ë 2.2.2.5.2 to 4ë 2.2.2.5.6 must be provided by the Contractor to the Employer prior to submission of the final payment certificate.

4.3 Certification by recognized bodies – See Section E – Project Specifications.

4.4 Plant and materials provided by the employer – N/A

4.5 Services and facilities provided by the employer – See Section E – Project Specifications PS 7 Page E-

- 1. Plant and equipment - See Section E – Project Specifications PS A 4 and for the purpose of Labour – Intensive approach, the following plants and equipments are recommended for ensuring quality production:**

1. Compaction of fills by using hand operated tampers.

2. Borrow pits operations and haulage of materials.

With any other means of ensuring maximum use of local labour and provided that where a maximum size, type or capacity of plant or equipment is indicated above, the plant and equipment utilized by the Contractor shall not exceed that specified for the particular operation without the prior consent of the Engineer. Where no maximum size or type of equipment is specified for an operation which is labour intensive specified or not, the size, capacity and type of mechanical plant or equipment utilized shall be at the discretion of the Contractor.

The plant and equipment used on the site shall not be inferior to that described in the Schedule of Plant and Equipment.

3.6 HEALTH AND SAFETY SPECIFICATIONS

**POLOKWANE
MUNICIPALITY**

**Coherent Health & Safety
Specifications**



**PROJECT NAME: CONSTRUCTION OF OLIFANTSPOORT
REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)**

Bid number: PM63/2021

FOREWORD

These health & safety specifications have been compiled in terms of the Occupational Health & Safety Act no. 85 of 1993 and Construction Regulations of 7 February 2014 as amended. It must be clear that this document is a management tool and should be used by the Principal Contractor and Contractors to comply with the Act and regulations.

Should there be any contradiction between this document and the Act; the Act must take preference except where explicitly stated.

Similarly, where this document is silent on a specific health & safety requirement, the Act must be used as the minimum requirement.

Should you be unclear about anything set out in this document, please contact this office. These specifications are site specific and include all works to be done by the principal contractor. The principal contractor will be responsible for all the work on site.

Every endeavour has been made to address the most critical aspects relating to Health and Safety issues to assist contractors in adequately providing for Health and Safety of employees on site. However, the Principal Contractor is required to ensure they stay compliant with statutory requirements and construction programs and processes and include such aspects in their Health and Safety file.

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CONSTRUCTION OLIFANTSPOORT RWS PHASE 2
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 - 3.7.13** Construction Health & Safety Officer
- 3.8** Physical Requirements
 - 3.8.1** Earthworks (including Trenching and excavations)
 - 3.8.2** Edge Protection, Barricading and Penetrations (CR 10)
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- 3.9** Plant, Machinery and Equipment
 - 3.9.1** Construction Vehicles & Mobile Plant
 - 3.9.2** Pressure Equipment
 - 3.9.3** Hired Plant and Machinery
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 - 3.9.5** Electrical Installations and Portable Electrical Tools
- 3.10** Occupational Health
 - 3.10.1** Industrial Hygiene (exposure to physical and chemical stress factors)
 - 3.10.1.1** Noise
 - 3.10.1.2** Ergonomics
 - 3.10.2** Hazardous Chemical Substances (HCS)
 - 3.10.3** Welfare Facilities
 - 3.10.4** Alcohol and other Drugs
 - 3.10.5** COVID-19

4. Omissions from the Site-Specific Health and Safety Specifications

Annexure A

Primary Health & Safety Compliance

Annexure B

Principal Contractor and Contractors' Responsible Persons

Annexure C

General Compliance Requirements

Annexure D

Occupational Health & Safety - Health & Safety pricing guidelines

Annexure E

Occupational Health & Safety File Index

Annexure F

Notification of Construction work

Gazette 37305 shall specifically apply to all persons involved in the construction work pertaining to this project.

“Purpose of the Act” –To provide for the health and safety of persons at work and the health and safety of persons in connection with the use of plant and machinery; the protection of persons other than persons at work against hazards to health and safety arising out of or in connection with the activities of persons at work; to establish an advisory council for occupational health and safety; and to provide for matters connected therewith.

“Agent” –means a competent person who acts as a representative for a Polokwane Municipality.

“Polokwane Municipality” –means any person for whom construction work is performed; **“Construction manager”** means a competent person responsible for the management of the physical construction processes and the coordination, administration and management of resources on a construction site;

“Construction site” means a workplace where construction work is being performed.

“Construction supervisor” means a competent person responsible for supervising construction activities on a construction site.

“Construction work” means any work in connection with -

- a) The construction, erection, alteration, renovation, repair, demolition or dismantling of or addition to a building or any similar structure; or
- b) The construction, erection, maintenance, demolition or dismantling of any bridge, dam, canal, road, railway, runway, sewer or water reticulation system; or the moving of earth, clearing of land, the making of excavation, piling, or any similar civil engineering structure or type of work;

“Contractor” means an employer who performs construction work.

“Designer” means-

- a) A competent person who-
Prepares a design.
Checks and approves a design.
Arranges for a person at work under his or her control to prepare a design, including an employee of that person where he or she is the employer; or
Designs temporary work, including its components.
- b) An architect or engineer contributing to or having overall responsibility for a design.
- c) A building services engineer designing details for fixed plant.
- d) A surveyor specifying articles or drawing up specifications.
- e) A contractor carrying out design work as part of a design and building project; or an interior designer, shopfitter, or landscape architect.

“Health and Safety File” –means a file, or other record containing the information by the Construction Regulations.

“Health and Safety Plan” –means a site, activity or project specific documented plan in accordance with the Polokwane Municipality 's health and safety specification.

“Health and Safety Specification” –means a site, activity or project specific document prepared by the Polokwane Municipality pertaining to all health and safety requirements related to construction work.

“Method Statement” –means a document detailing the key activities to be performed to reduce as reasonably as practicable the hazards identified in any risk assessment.

“Principal contractor” means an employer appointed by the Polokwane Municipality to perform construction work.

“Risk Assessment” –means a program to determine any risk associated with any hazard at a construction site, to identify the steps needed to be taken to remove, reduce or control such hazard.

1.5 Abbreviations:

GMR: General Machinery Regulations

OHS Act: Occupational Health & Safety Act. Act 85 of 1993

Constr Reg: Construction Regulation 2014

ORHVS: Operating Regulations for High Voltage Systems PPE:

Personal Protective Equipment

2. OCCUPATIONAL HEALTH & SAFETY MANAGEMENT

2.1 ROLES

Polokwane Municipality / Agent

- a) Prepare a baseline risk assessment and issue a health and safety specification to the Principal Contractor, Designer and include the specification in tender documentation.
- b) The Polokwane Municipality or the appointed Polokwane Municipality Agent will appoint each Principal Contractor for this project or phase/section of the project in writing for assuming the role of Principal Contractor as intended by the Construction Regulations.
- c) The Polokwane Municipality or the appointed Polokwane Municipality Agent shall discuss, negotiate, and approve the contents of the specified project health and safety plan submitted by the Principal and Sub Contractor.
- d) The Polokwane Municipality or his Agent will take reasonable steps to ensure that the health and safety plan of the Principle and Sub Contractor is correctly implemented and maintained. Monthly audits shall be conducted to monitor the compliance.
- e) In the event of design changes the Polokwane Municipality or the appointed Agent on his behalf will ensure that enough resources will be provided to implement the work safely.
- f) The Polokwane Municipality or his appointed Agent on his behalf will prevent the Principal Contractor and/or the Contractor from commencing or continuing with construction work should the Principal Contractor and/or the Contractor at any stage in the execution of the works be found to:

have failed to have complied with any of the administrative measures required by the Construction Regulations in preparation for the construction project or any physical preparations necessary in terms of the Act

*have failed to implement or maintain their health and safety plan;
have executed construction work which is not in accordance with their health and safety plan;
have acted in any way which may pose a threat to the health and safety of any person(s) present on the site of the works or in its vicinity, irrespective of him/them being employed or legitimately on the site of the works or in its vicinity.*

Designer

- Must consider the health and safety specifications of the Polokwane Municipality.
- Before the tender process, the designer must make available a report to the Polokwane Municipality about:
 - All the relevant health and safety information about the design of the relevant structure that might affect the pricing of the construction work.
 - The geotechnical -science aspects, where appropriate.
 - The loading that the structure is design to withstand.
- Inform the Polokwane Municipality in writing of any known or anticipated dangers or hazards related to the project.
- Make available all relevant information required for the safe execution of the work upon being designed or when the design is subsequently altered.
- During the design consider the hazards relating to any subsequent maintenance to be performed with the minimum risk.
- During the design stage cognizance of ergonomic design principals must be applied to minimize ergonomic related hazards in all phases of the life cycle of a structure.

2.2 Implementation of the Health and Safety Specifications (Drafting of the coherent Health & Safety Plan)

These health & safety specifications document forms an integral part of the contract, and the Principal Contractor is expected to use it when compiling its project-specific coherent health & safety plan. The Principal Contractor must forward a copy of these specifications to all Contractors at their bidding stage so that they can in turn prepare coherent health & safety plans relating to their operations.

3. OCCUPATIONAL HEALTH & SAFETY MANAGEMENT SYSTEM ELEMENTS

3.1 Scope of the Project

These Specifications set out the requirements for eliminating or if this is not possible, for minimising as far as reasonably practicable, the risk of incidents and injuries occurring at Polokwane Municipality. **This document covers work to be undertaken of the project and sets out the rules and procedures for engagement on the project.** The scope also addresses legal compliance, Polokwane Municipality standards, hazard identification and risk assessment, risk control, and the promotion of a health and safety culture amongst those working on the project. The health & safety specifications also make provision for the protection of those persons other than employees.

3.2 The Extent of the works:

Reticulation Network

Construction of 30.944km reticulation network with valves and all ancillary works as follows:

200 mm uPVC medium pressure pipes	Class 09.	2 138 m
200 mm uPVC medium pressure pipes	Class 12.	1 452 m
160 mm uPVC medium pressure pipes	Class 09	1 394 m
110 mm uPVC medium pressure pipes	Class 09	5 615 m
110 mm uPVC medium pressure pipes	Class 12	2 472 m
90 mm uPVC medium pressure pipes	Class 09	9 756 m
90mm uPVC medium pressure pipes	Class 12	8 117 m
Isolation Gate Valves		05 no.
Standpipe Connections	-	71 no.

Boreholes

Equipping, electrification and commissioning of boreholes. Boreholes to consist of cast in-situ concrete pump houses, suitable pump and motor and necessary fittings and ancillary works.

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3.3.1 Application

This specifications document is a legal compliance document compiled in terms of the OHS Act & Construction Regulations 2014 and is therefore binding. The document must be read in conjunction with other relevant legislation.

3.3.2 Definitions

The definitions as listed in the OHS Act 85/1993 and Construction Regulations (February 2014) shall apply.

3.3. Minimum Administrative Requirements

3.4.1 Notification of Intention to Commence Construction Work

The Principal Contractor must notify the Provincial Director of the Department of Labour in writing before construction work commences. A copy of this notification must be held in the Principal Contractor's health & safety file on site. The fax transmission slip will serve as proof of notification.

See attached **Annexure "F"**

3.4.2 Assignment of the Principal Contractor's / Contractors' Responsible Persons to supervise and Co-ordinate Health and Safety on Site

The Principal Contractor and all Contractors must make supervisory appointments as well as other relevant appointments in writing (as stipulated by the OHS Act and Construction Regulations 2014). See attached **Annexure 'B'** for more detail on what health & safety management appointments are relevant on this project.

3.4.3 Competence of the Principal Contractor's / Contractors' Appointed Competent Persons

The Principal Contractor and Contractors' competent persons for the various risk management portfolios must fulfil the criteria as stipulated in terms of the definition 'Competent' in accordance with the Construction Regulations (February 2014).

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

The Principal Contractor must have in its possession a letter of good standing issued by its Compensation Assuror as proof of registration. Contractors must also hold proof of workman's compensation assurance registration in the form of a letter of good standing and forward a copy to the Principal Contractor before they begin work on site. Contractors must always be in good standing while carrying out work on site.

3.4.5 Health and Safety Organogram

Including all appointed risk management competent persons. In cases where appointments have not yet been made, the organogram shall reflect the intended positions.

The organogram must be updated when there are changes in the Site Management Structure and dated accordingly. The organogram merely serves as a quick reference to who is responsible for what risk portfolio in what area.

3.4.6 Preliminary Hazard Identification and Risk Assessments, Progress Hazard Identification and Risk Assessments Reviews.

The Principal Contractor must cause preliminary hazard identification and risk assessment to be performed under the leadership of a competent person before commencement of construction work. On this project detailed task- specific risk assessments based on the proposed sequence of work (method of work) must be compiled. Generic risk assessments will not be accepted.

The assessed risks, together with written safe work procedures for the 'medium & high-risk' rated activities must form part of the coherent site-specific health and safety plan submitted for approval by House of Safety. The risk assessments must include:

- a) A list of hazards identified as well as potentially hazardous tasks;
- b) The risks which may result based on the list of hazards and tasks;
- c) A set of safe work procedures to be implemented with the aim of eliminating or if this is not possible, reducing and/or controlling the risks as far as reasonably practicable to ALARP (as low as reasonably practicable);
- d) A monitoring and review procedure of the risk assessments as they change i.e. how will the risk assessments be reviewed, when will they be reviewed and by whom.

The Principal Contractor must ensure that all Contractors inform, instruct and train their workers regarding any hazards, the associated risks and the related safe work procedures to be implemented before any work commences and thereafter at regular intervals as the risks change and as new risks develop. This training should be carried out in the form of toolbox health & safety talks.

Contractors must conduct their own toolbox talks and submit proof of these talks in the form of attendance registers to the Principal Contractor at least every two weeks. Every worker on site must undergo such toolbox safety talks with the attendance registers kept in the Principal Contractor's safety file.

Contractors must conduct their own hazard identifications and risk assessments specific to their operations and forward a copy to the Principal Contractor.

The Principal Contractor when required must report on the status of these Contractor risk assessments to the Polokwane Municipality i.e. at audits.

3.4.7 General Record Keeping

The Principal Contractor and all Contractors must keep and maintain all the necessary Health and Safety records to demonstrate compliance with these Coherent Specifications, the OHS Act 85/1993, and the Construction Regulations (February 2014). The Principal Contractor must also ensure that all records of incidents/injuries, emergency procedures, training, planned maintenance inspections, monthly contractor audits, etc. are kept in the health

& safety file(s) held in the site office. The Principal Contractor must ensure that every Contractor keeps its own health & safety file, maintains the file, and makes it available on request (the file must include the Contractor's health & safety plan and all relevant records). Such 'Contractor safety files' must be audited by the Principal Contractor monthly with audit reports kept as proof.

3.4.8 Injury / Incident Reporting and Investigation

Injuries are to be categorised into first aid; medical; disabling (lost day); and fatal. When reporting injuries to the Polokwane Municipality, these categories must be used. The Principal Contractor must investigate all injuries. All Contractors must report injuries to the Principal Contractor immediately and the Principal Contractor must inform the Polokwane Municipality immediately. All incidents reportable in terms of the provisions of Section 24 of the OHS Act must be reported to the local Dept. of Labour in the prescribed manner.

3.4.9 Consolidation of Health & Safety Documentation

It is the duty of the Principal Contractor to ensure that all documentation required to be kept or generated during the construction phase is consolidated into one set of documents that must be handed over to the Polokwane Municipality upon completion of the construction work. This consolidated safety file(s) should include instructions from the design team that will be required for the continued safe operation and maintenance of the new structure(s).

3.4.10 Offences and Penalties

Penalties may be imposed on the Principal Contractor and Contractors for ongoing non-compliance with the provisions of the Polokwane Municipality's coherent health & safety specifications, the Principal Contractor's coherent health & safety plan, site health & safety procedures and rules. Non-compliances identified during safety agent audits and visits will be categorised into one of three levels based on severity. These will be as follows: Life threatening situation - a prohibition order will be issued by means of a written instruction in the site instruction book or an explanation in an audit report. This activity must be seized immediately, and corrective measures taken. Serious injury possible - a contravention notice will be issued with a time frame for compliance stipulated. Minor or no injury may result - an improvement notice will be issued. The corrective measures stipulated in the audit report must be taken. The methodology used to decide the above levels will be causally linked to the risk assessments of the Principal Contractor and contractors, Polokwane Municipality Standards. The decision of the safety Agent will be final.

3.4 Principal Contractors, Contractors and Sub-contractors

3.5.1 Principal Contractor's and Contractors' Requirements

The Principal Contractor must ensure that all Contractors appointed by them comply with these Specifications, the Principal coherent health & safety plan as well as the OHS Act, Construction Regulations (February 2014), and other relevant legislation that may relate to the activities directly or indirectly. A Contractor, when appointing other Contractors as 'Sub-contractors', shall mutatis mutandis ensure compliance as if it was the Principal Contractor.

The Principal Contractor may only allow a Contractor to begin work on site after receiving a coherent health & safety plan which must include a project specific hazard identification, risk assessments and safety measures. The Principal Contractor must test competency and finally approve his sub-contractor coherent site-specific health and safety plan. The Principal Contractor must audit each of its contractors monthly, with audit reports kept in the health & safety file on site. The audit must include an

administrative assessment as well as a physical inspection of the contractor's site activities. The Principal Contractor must stop any Contractor from carrying out construction work that is not in accordance with the Principal Contractor's and/or Contractor's health & safety plan or if there is an immediate threat to the health and safety of persons.

The Principal Contractor shall take all reasonable steps necessary to ensure co-operation between all contractors to enable each of those contractors to comply with the provisions of the Construction Regulations;

The Principal Contractor shall take all reasonable steps to ensure that each contractor's coherent health and safety plan is implemented and maintained on the construction site: Provided that the steps taken shall include periodic audits at intervals mutually agreed upon between the Principal Contractor and contractors, but at least once every month;

The Principal Contractor must ensure that where changes are brought about to the design and construction, that sufficient health and safety information and appropriate resources are made available to contractors to allow them to execute the work safely;

The Principal Contractor must ensure that every contractor is registered and in good standing with a recognised compensation fund or with a licensed compensation insurer prior to work commencing on site;

The Principal Contractor must ensure that potential contractors submitting tenders have made provision for the cost of health and safety measures during the construction process;

The Principal Contractor shall discuss and negotiate with the contractor the contents of the coherent health and safety plan and shall finally approve that plan for implementation;

The Principal Contractor shall hand over a consolidated health and safety file to the Polokwane Municipality upon completion of the construction work and shall include a record of all drawings, designs, materials used and other similar information concerning the completed structure;

The Principal Contractor may only appoint a contractor to perform construction work when such Principal Contractor is reasonably satisfied that the contractor he or she intends to appoint, has the necessary competencies and resources to perform the construction work safely and that the contractor is an approved Polokwane Municipality contractor.

3.5.2 Principal Contractor / Contractor Competency Assessment

The Principal Contractor must be reasonably satisfied that the contractors it intends to appoint have the necessary competencies and resources to safely conduct the work they will be appointed for. This should be established at tender stage and before appointments are made. One of the preferred ways of determining whether a contractor is competent is to make sure the contractor is an accredited contractor for Polokwane Municipality. Once the contractor is appointed, but before it begins work on site a site- specific safety plan must be discussed and negotiated with the Principal

Contractor. Such safety plan must be approved for implementation by the Principal Contractor.

The Principal Contractor and Contractors should submit the following documentation for perusal and verification by the Polokwane Municipality and Principal Contractor respectively:

- Coherent health & safety plan as compiled for this project; (including Risk assessments, safe work procedures, fall protection plan, PTW Issuer/PTW Holder certificates
- Management Structure as envisaged at tender (organogram);
- Letter of Good Standing with the Compensation Commissioner or FEM;
- Proof of health & safety training and other related training; (CV and certificates) Legislative appointment letters
- Notification of Construction work; (proof notification was done)

3.5.3 Pricing for Occupational Health & Safety Compliance All parties bidding to do work on this construction project must ensure that they have made provision for the cost of complying with this Specifications document as well as with the OHS Act and incorporated Regulations as a minimum requirement in their tender documentation. It must also be taken into consideration that time is money, which implies that sufficient time must be allowed for the implementation of the minimum OHS standards. No additional claims will be entertained at a later stage should a compliance requirement be prescribed in the OHS Act, incorporated regulations or in this Specifications document.

3.5.4 Contractors' Coherent Health & Safety Plans [Construction Regulations 7]

1. Introduction:

The Construction Regulations (2014) aims to improve overall management and co-ordination of Health, Safety and Welfare throughout the Construction Phase and reduce the large number of serious and fatal injuries and cases of ill health, which occur every year in the Construction Industry.

In terms of the Construction Regulations (2014), the Principal Contractor is required to develop a Health and Safety Plan before work commences on site and review it throughout the Construction Phase. The degree of detail required in the Health and Safety Plan and the time and effort in preparing it should be in proportion to the nature, size and level of Health and Safety risks involved in the project. Projects involving minimal risks will call for simple, straightforward plans. Large projects or those involving significant risks such as this project will need much more detail.

2. What should the construction health & safety plan cover?

The Construction Health and Safety Plan should set out the arrangements for ensuring the Health and Safety of everyone carrying out the construction work as well as all other persons who may be affected by it. The index of this plan must be in line with Annexure:

3.5.5 *Communication and Management of the work*

The Principal Contractor must indicate in its health and safety management plan that it has made provision for the following:

- a. Management structure and responsibilities
- b. Health and Safety goals for the project and arrangements for monitoring and review of Health and Safety performance i.e. safety meetings; contractor meetings; risk assessment review, etc
- c. Arrangement for:
 - i. Regular liaison between parties on site i.e. meetings
 - ii. Consultation with the work force i.e. toolbox talks
 - iii. The exchange of design information between the Polokwane Municipality, designers, and Contractors on site
 - iv. Selection and control of Contractors i.e. selection criteria; inspections; audits, etc.
 - v. Site health & safety induction and onsite training i.e. toolbox talks
 - vi. Welfare facilities, first aid, emergency planning and fire prevention strategy
 - vii. The reporting and investigation of injuries and incidents including near misses what the intended system will be
 - viii. The production, approval and review of risk assessments, safe work procedures and method statements and how does the company's risk assessment system work.
- d. Site specific rules and procedures.

3.5 Polokwane Municipality identified Hazards and Potentially Hazardous Situations

See attachment.

Other possible risks you need to consider.

- 1. Existing services
- 2. Interface with the public
- 3. Hazardous chemical such as solvents, cleaning agents, cement, fuels, oils, epoxies, etc.
- 4. Site security and access control issues
- 5. Relocation and protection of existing services
- 6. Finishing trades

3.6.1 Unforeseeable Hazards

The Principal Contractor must immediately notify Contractors as well as the Polokwane Municipality, in writing, of any hazardous or potentially hazardous situations that may arise during the performance of construction activities so that the necessary precautions may be taken before such work begins.

3.6 Site Operational Requirements

3.7.1 Health and Safety Representative(s)

The Principal Contractor and all Contractors must ensure that Health and Safety Representative(s) are appointed under consultation with the employees. The H&S representatives must be competent to carry out their functions. The appointments must be in writing. The Health and Safety Representatives should carry out monthly inspections, keep records of the inspections and report all findings to the Responsible Person or safety officer forthwith and at monthly health & safety committee meetings. At least one Health & safety representatives are required by all Employers on site.

3.7.2 Health and Safety Committees

The Principal Contractor must ensure that project health and safety committee meetings are held monthly with minutes kept. Meetings must be chaired by the Principal Contractor's Responsible Person [CR 7(1) person]. All Contractors'

Responsible Persons and Health & Safety Representatives must attend the Principal Contractor's monthly health & safety meetings. The Principal Contractor's appointed supervisors must also attend health & safety meetings. The following topics must be tabled at meetings: management appointments and risk management portfolios; sub-contractor legal compliance issues; injuries and incidents; hazards and risk assessments (present and foreseen); safety procedures; method statements for upcoming activities; planned inspections and registers/record keeping, etc. The committee chairperson must sign off and date the minutes.

3.7.3 Health and Safety Training

3.7.3.1 Induction

The Principal Contractor must ensure that all site personnel including all sub-contractors undergo the agreed health & safety induction training session held and managed by the P/Contractor before any worker starts work on the project. A record of attendance must be kept in the health & safety file. Workers must carry proof of inductions on their person while on site i.e. identification passport cards or like be agreed.

3.7.3.2 Awareness

The Principal Contractor must ensure that, on site, periodic toolbox health & safety talks take place at least once every two weeks. All site personnel including all sub-contractors must attend safety talks at such intervals and keep proof thereof. These talks should deal with risks relevant to the construction work at hand i.e. they should be based on the job-specific risk assessments and safe work procedures. Records of attendance must be kept in the P/contractor's health & safety file. All contractors' employees must attend safety awareness toolbox talks carried out by their supervisors; the attendance registers must be copied to the Principal Contractor together with information on the information discussed at the session.

3.7.3.3 Competence

All competent persons must have the knowledge, experience, training, and qualifications specific to the work they have been appointed to supervise, control and/or carry out. This must be assessed on a regular basis e.g. training, evaluation, and periodic audits by the Polokwane Municipality, progress meetings, etc. The Principal Contractor is responsible to ensure that Competent Contractors are appointed to carry out construction work on site.

3.7.4 Health & Safety Audits, Monitoring and Reporting

The Principal Contractor is obligated to conduct monthly audits on all Contractors appointed by it and keep audit reports in its health & safety file. Contractors must audit their sub-contractors and keep records of these audits in *their* health & safety files, made available on request. The Polokwane Municipality Agent will conduct monthly audits on the Principal Contractors' safety management plan.

3.7.5 Emergency Procedures

The procedure must detail the response procedures including the following key elements:

- List of key competent personnel;
- Details of emergency services;
- Actions or steps to be taken in the event of the specific types of emergencies;
- Evacuation procedures: including routes and exits to be available on a drawing.
- Emergency procedure(s) must include, but shall not be limited to fire; spills; injury to employees; damage to material / equipment / plant; use of hazardous substances; bomb threats; major incidents/injuries; evacuation; etc.
- The Principal Contractor must advise the Polokwane Municipality in writing forthwith, of any emergency situations, together with a record of action taken/action to be taken.
- A contact list of all service providers (Fire Department, Ambulance, Police, Medical and Hospital, etc.) must be maintained and made available to site personnel.
- The emergency plan will need to be reviewed from time to time as conditions/environment changes i.e. as building work increases in extent.

3.7.6 First Aid Boxes and First Aid Equipment

The Principal Contractor and all Contractors must appoint First Aider(s) in writing. The Principal Contractor must appoint at least one First Aider to start with, which first aider must be certificated. Copies of valid certificates are to be kept on site. The Principal Contractor must provide at least 1 (one) first aid box, adequately always stocked. Due to the nature of this project i.e. satellite workstations/areas, further first aid boxes must be provided close to the various workstations to allow for quick, effective treatment of injured persons. As the work progresses and the structure increases in height, extra first aid

3.7.7 *Personal Protective Equipment (PPE) and Clothing*

The Contractor must ensure that all site workers are issued with and wear the appropriate PPE as indicated in their risk assessments. The Contractors must always make provision and keep adequate quantities of SANS approved PPE on site according to their risk assessments. Safety harnesses are mandatory wherever work takes place in an elevated area where safe working platforms or ladders are not possible. Overalls clearly indicating the Contractor's logo must be worn and all sub-contractors must conform to this requirement. Eye protection must be worn by those working grinders, skill saws, and high- pressure water cleaners. Even those workers near these operations will also be required to wear such eye protection.

Safe footwear will be required by all workers. A high visibility vest is mandatory on a Polokwane Municipality site.

3.7.8 *Occupational Health and Safety (OHS) Signage*

The Principal Contractor must provide adequate on-site OHS signage. Including but not limited to: 'construction work - no unauthorised entry', 'beware of overhead work', 'hard hat area', first aid - to be posted up at all work areas/zones.

Signage must also be posted up at strategic locations to warn the public of diversions, alternative through ways and other irregularities caused by construction work (pedestrians and motorists).

Signs are also required as per law e.g. scaffolding and other potential risk areas/operations such as exposed edges and openings and trenches/excavations where persons are at work. Safety signs and awareness posters will also be required in strategic locations on site such as frequently used access routes, stairways, and entrances to structures and buildings where the workers will continuously be made aware of health & safety. Health & safety signage must be well maintained including weekly inspections, cleaning, replacement, and repair.

3.7.9 *Public and Site Visitor Health & Safety*

Public walkways and roadways must be kept clean and free of construction materials to prevent any negative impact on the public. Public roadways and

walkways will have to be cleaned on a regular basis - daily inspections to be conducted by the Principal Contractor with action to be taken without delay (daily).

Site visitors must be briefed on the hazards they may be exposed to as well as what measures are in place or should be taken to control these hazards. The Construction Regulations require that a record of these 'inductions' be kept on site. It is advised that a visitor book with site rules leaflet be kept at the

reception/site office and all visitors to be directed to such point where they must read through the site safety information and sign the visitor book. It will be the Principal Contractor's prerogative to decide whether site visitors require supervision while on site. Visitor hard hats must be kept in the site office.

3.7.10 Access to Site

Where any permits are necessary from the local authorities, this will be the Principal Contractor's responsibility. The road surface of all public and private roadways and pavements/pedestrian walkways must remain in a reasonably clean state, free of excessive sand, stone, water, or other construction related materials. The access gate(s) must be controlled, and visitors must sign in and report to the site office for further instruction.

3.7.11 Night Work (After Hours)

No night work will be allowed within the hazardous zone on this project without prior approval from the Polokwane Municipality /Polokwane Municipality 's Agent and the Construction Health and Safety Agent. Additional health and safety requirements will then be applicable.

3.7.12 Transport of Workers

The Principal Contractor and other Contractors may not transport: Persons together with goods or tools unless there is an appropriate area or section to store the tools or equipment; Contractors must adhere to the National Road Traffic Act.

3.7.13 Construction Health & Safety Officer

A full-time construction safety officer (in terms of Construction Regulation 8) will be required on this project. **The construction health and safety officer must be registered with SACPCMP.** The construction officer will be required to carry out at least the following duties:

- a) Health & safety audits and inspections on site including administrative and Physical audits of all Contractors' health & safety plans, files and activities, and record findings in the form of audit reports to be kept in the health & safety file;
- b) Assess, and finally approve contractor safety plans;

3.7 Physical Requirements

3.8.1 Earthworks (including Trenching and excavations)

The Principal Contractor and relevant Contractors must make provision in their tender for the shoring of excavations where the soil conditions warrant it or if this is not possible cut it back -excavation walls must be battered back to a safe angle, termed the safe angle of repose.

The Principal Contractor has the following options: first option is to shore or brace the excavation, should this not be practical then such excavation must be battered back to the safe angle of repose (second option). Should the first two options not be deemed necessary by the Contractor, then permission must be given in writing by the appointed competent excavation supervisor (third option). Where uncertainty pertaining to the stability of the soil exists, the decision of a professional engineer or professional technologist competent in excavations shall be decisive. Such permission must be in writing.

The following is relevant to excavations:

- Excavations/trenches are inspected before every shift and a record of these inspections is kept;
- Safe work procedures have been communicated to the workers;
- The safe work procedures are always enforced and maintained by the Principal Contractor's and Contractors' responsible persons;
- Excavations next to permanent or temporary roadways - ensure that no load, material, plant or equipment is placed or moved near the edge of any excavation where it is likely to cause its collapse and thereby endangering the safety of any person, unless precautions such as the provision of sufficient and suitable shoring or bracing are taken to prevent the sides from collapsing;
- Ensure that where the stability of an adjoining building, structure or road is likely to be affected by the making of an excavation, steps are taken that may be necessary to ensure the stability of such building, structure or road as well as the safety of persons
- Cause convenient and safe means of access to be provided into every excavation in which persons are required to work and such access shall not be further than 6m from the point where any worker within the excavation is working;
- Ascertain as far as is reasonably practicable, the location and nature of electricity, water, gas, or other similar services which may in any way be affected by the work to be performed. The necessary steps must then be taken to render the circumstances safe for all persons involved;
- Cause every excavation which is accessible to the public or which is adjacent to public roads or thoroughfares, or where the safety of persons may be endangered, to be
- Adequately protected by a barrier or fence of at least one meter in height and as close to the excavation as is practicable; and provided with warning illuminates or any other clearly visible boundary indicators at night or when visibility is poor;
- Cause warning signs to be positioned next to an excavation within which persons are working or carrying out inspections or tests

3.8.2 Edge Protection, Barricading and Penetrations (CR

10) A Contractor must ensure that—

- All unprotected openings in floors, edges, slabs, hatchways, and stairways are adequately guarded, fenced, or barricaded or that similar means are used to safeguard any person from falling through such openings;
- No person is required to work in a fall risk position, unless such work is performed

- safely as contemplated in sub-regulation (2);
- A detailed Fall Arrest and Rescue Plan will be drafted and implemented on site.
- The above-mentioned plan will be demonstrated on instruction of the Polokwane Municipality's Agent.

3.8.3 Deliveries, Waste Removal, Stacking/Storage of Materials

The Principal Contractor and other relevant contractors must ensure that there is an appointed stacking supervisor and all materials, formwork and all equipment is stacked and stored safely, on level, compact ground, out of access ways and no more than three times the minimum base width in height. Pallets of bricks may not be stacked more than two above each other and must be on timber pallets. No construction materials or equipment may be stacked or stored in public areas unless authorised by the Polokwane Municipality and fenced off as per the Polokwane Municipality's requirements. Waste materials must be kept within designated construction zones. The Principal Contractor will be responsible for co-ordinating and managing this function.

3.8.4 Fire Extinguishers and Fire Fighting Equipment

The Principal Contractor and relevant Contractors shall provide adequate, regularly serviced firefighting equipment located at strategic points on site, specific to the classes of fire likely to occur. The appropriate notices and signs must be posted up as required. A minimum of four 9 kg dry chemical powder fire extinguishers must be available in and around the site office establishment and stores. Fire extinguishers must also be placed at all work zones/areas, in strategic locations. Wherever 'hot work' is taking place, additional fire extinguishers must be on hand. Contractors are responsible for ensuring compliance with hot work procedures and must be in possession of method statements detailing the safe working procedures. 'Hot work' includes all work that generates a spark or flame and may therefore result in a fire. Further, during the finishing stages of the construction phase when the finishing trades are on site, fire extinguishers will be required at strategic locations within the work areas - to be supplied and managed by the Principal Contractor.

3.8.5 Traffic Control

The Principal Contractor shall ensure that a fulltime traffic safety officer be appointed in writing, upon the commencement of construction activities. The traffic safety officer shall be tasked with regular inspections and movement of road traffic signs as per the approved traffic accommodation plans and will report to the safety officer.

The principal Contractor must prepare a site specific a Traffic Accommodation Plan that should be signed off by the relevant appointed Engineer on this project.

This document must indicate the potential risk to the public or environment posed by all vehicles travelling to and from the areas of construction for the purpose of the construction work and proposes methods to eradicate or minimize these risks. Such a plan must include the following aspects:

- Design of Traffic Management Plan
- Site specific base line risk assessment

- Protection of employees
- Protection of pedestrians
- Specific signage and distances applicable
- Applicable training
- Appointments of road safety officers
- Management after hours/weekend/adverse weather conditions
- Setup and clearing of signage

Only SABS approved temporary road signage must be used. Note that the Principal Contractor must always enough signage available.

The Principal Contractor will also put in place flagmen to control the entry and exit of vehicles to and from the site onto the public road. These flag personnel must be highly visible and must have been trained. Flag personnel may not use cell phones while on duty.

3.8 *Plant, Machinery and Equipment*

3.9.1 Construction Vehicles & Mobile Plant

"Construction Plant" includes all types of plant including but not limited to, cranes, piling rigs, excavators, construction vehicles, compaction plant, batch plants and lifting equipment.

The Principal Contractor must ensure that such plant complies with the requirements of the OHS Act, Construction Regulations (Feb 2014) and any manufacturers specifications. The Principal Contractor and all relevant

contractors must inspect and keep records of inspections on construction vehicles and mobile plant used on site. Only authorised/competent persons in the possession of the necessary training certificates and in possession of a certificate of medical fitness may operate construction vehicles and mobile plant.

Appropriate PPE and clothing must always be provided and maintained in good condition.

Reverse alarms must be installed on construction vehicles i.e. trucks, digger loaders, etc.

Vehicles and pedestrian traffic must be safely separated, preventing any unnecessary interfacing.

Any vehicle or mobile plant using any public road must be roadworthy and carry a certificate proving this. Likewise, any operator of such construction vehicle or mobile plant will have to carry the necessary driver's license.

3.9.2 *Pressure Equipment*

The Principal Contractor and all relevant Contractors must comply with the Pressure Equipment Regulations, including:

Providing competency and awareness training to the operators/users;
Providing the relevant PPE and clothing;

Inspecting equipment regularly (every 3 months) and keeping records of these inspections;

Providing appropriate firefighting equipment (Fire Extinguishers) on hand;

Ensuring that oxygen and acetylene bottles are secured in an upright position, do not show signs of corrosion or damage, and have flash back arrestors fitted on both torch & bottle ends of hoses.

3.9.3 *Hired Plant and Machinery*

The Principal Contractor must ensure that any hired plant and machinery used on site is safe for use and complies with the minimum legislated requirements. The necessary requirements as stipulated by the OHS Act and Construction Regulations shall apply. The Principal Contractor shall ensure that operators hired with machinery are competent and that competency and medical certificates are kept on site in the health & safety file. Any load test requirements and inspections in terms of legislation must be complied with and copies of load test certificates and inspections must be kept in the health & safety file. All relevant contractors

3.9.4 *General Machinery*

The Principal Contractor and relevant contractors must ensure compliance with the Driven Machinery Regulations, which includes carrying out risk assessments on the machines, inspecting machinery regularly, appointing a competent person to inspect and ensure maintenance, issuing PPE and relevant clothing, and training those who use machinery.

3.9.5 *Electrical Installations and Portable Electrical Tools*

The Polokwane Municipality will ensure as far as possible that the Principal Contractor is made aware of the positions of all electrical power lines. The Principal Contractor must notify the Polokwane Municipality should it not be sure of the location of any electrical power lines.

The Principal Contractor must comply with the Electrical Installation Regulations, the Electrical Machinery Regulations, and the Construction Regulations (CR 24).

The Principal Contractor must keep a copy of the Certificate of Compliance (CoC) for its temporary electrical power supply. A revised CoC is required whenever the installation is altered or changed in any way. All temporary electrical installations must be inspected at least weekly by a competent person appointed in writing with records kept. Portable electrical tools and equipment must be visually inspected daily with records kept. It is advised that the P/Contractor appoints the electrical contractor to inspect the temporary electrical installation on a weekly basis with feedback given in a report so that any maintenance and repairs can be undertaken. Such appointed inspector must 'stop' or isolate any distribution board that is unsafe for use.

3.9 *Occupational Health*

3.10.1 Industrial Hygiene (exposure to physical and chemical stress factors)

Exposure of workers to occupational health hazards and risks is quite common in any work environment, especially in construction. Occupational exposure is a major problem, and all Contractors must ensure that proper health and hygiene measures are put in place to prevent exposure to these hazards. Prevent inhalation, ingestion, and adsorption through the skin of hazardous chemical substances.

3.10.1.1 Noise induced hearing loss is a highly underrated occupational condition. Occupational noise emitted by construction machinery and power tools must be controlled as far as possible by implementing engineering solutions such as noise dampening, regular maintenance, servicing, and inspection, screening off the noise, and reducing the number of persons exposed. Personal protective equipment such as earmuffs and earplugs must also be used in conjunction with engineering controls to reduce noise exposure to below the acceptable levels.

3.10.1.2 Ergonomics is the study of how workers relate to their workstations. We advise the Principal Contractor and Contractors to take this into consideration when conducting risk assessments, thereby improving the worker-task relationship, which will in turn improve productivity and reduce chronic conditions such as back strains, joint problems and mental fatigue, amongst others.

3.10.2 *Hazardous Chemical Substances (HCS)*

The Principal Contractor and other relevant contractors must provide the necessary training and information as far as the use, transport, and storage of HCS. The Principal Contractor must ensure that the use, transport, and storage of HCS are carried out as prescribed in the HCS Regulations. The Principal Contractor and contractors must ensure that all hazardous chemicals on site have Material Safety Data Sheets (MSDS) on site and the users are made aware of the hazards and precautions that need to be taken when using the chemicals. The First Aiders must be made aware of the MSDS's and how to treat HCS incidents appropriately. Copies of the MSDS's must be kept in the first aid box and in the store. All containers must be clearly labelled.

Flammable substances must be stored separately, away from other materials, and in a well-ventilated area (appropriate cross ventilation). A competent person should be appointed to be in control of this portfolio.

Stores must be well ventilated, preventing the build-up of flammable and toxic gases/vapours. Should fuel storage containers be used, they must conform to the general environmental legislation and Environmental Management Plan (if a requirement on this site). The necessary safety signage must be posted up - 'no naked flames', 'no smoking'. Two 9 kg DCP fire extinguishers must be placed near to the fuel containers, but not within 5 m of the containers. These extinguishers are over and above the minimum four required for the offices and stores.

3.10.3 *Welfare Facilities*

The Principal Contractor must supply sufficient toilets (1 toilet per 30 workers), clean, lockable changing facilities, hand washing facilities, soap, toilet paper, and hand drying material. Waste bins must be strategically placed around site and emptied regularly. Workers must not be exposed to hazardous materials/substances while

eating and must be provided with adequate, sheltered eating areas complete with benches and tables. Stores may not double up a change rooms or mess areas.

3.10.4 *Alcohol and other Drugs*

No alcohol and/or other drugs will be allowed on site. No person may be under the influence of alcohol or any other drugs while on the construction site. Any

person on prescription medication must inform his/her superior, who shall in turn report this to the Principal Contractor forthwith. Any person suffering from any illness/condition that may have a negative effect on his/her (anyone else's health or safety performance must report this to his/her superior, who shall in turn report this to the Principal Contractor forthwith. Any person suspected of being under the influence of alcohol or other drugs must be sent home immediately, to report back the next day for a preliminary inquiry. The Contractor concerned must follow a full disciplinary procedure and a copy of the disciplinary action must be forwarded to the Principal Contractor for its records.

3.10.5 COVID- 19

Response plan

This International pandemic will force the contractors and clients to think about the workplace that the employees work in and the applicable PPE to safeguard the employees against this COVID 19 virus. Polokwane Municipality have drawn up a checklist with all the necessary equipment and guidelines that will need to be in place before construction can start. The checklists are written using the above-mentioned acts, regulations, and guidelines. This checklist is listed as annexure A. The SHE committee shall have a meeting in the first week of starting to discuss the plan forward with COVID 19.

Access control

The client and the contractor will remain responsible to ensure that the correct measures are taken at the entrance of the construction site. The contractor shall have a thermometer available at each entrance to measure the temperature of each of the employees and visitors that enters and exits the site. The following is equipment and processes that will need to be in place at each entrance:

NOTE: This shall be done when entering the site as well as exiting the site every time

- Employee or security available at each gate
- Every entrance to site must have a thermometer
- Every entrance shall have a sanitation bottle to sanitize every person entering the sites hands
- Every person shall complete the sign in register that will enable the contractor to track the person in case of a possible positive case
- Non-essential visitors will not be allowed to enter the site
- All persons entering the site shall have a mask or a face shield on when entering, if not no access will be given to the person
- All hand sanitizer that is used must have 70% alcohol and the certificate must be available on site

Documents that need to be updated

Document control will be a critical path to ensure that all employees knows the exact risks and mitigation factors around the COVID 19 virus.

- Baseline risk assessment shall be written on COVID 19 to ensure all the risks is covered and discussed to the employees
- Health and safety policy would need to be changed to address the COVID 19 pandemic
- All safe work procedures shall cover COVID 19
- COVID 19 guideline or procedure shall be drawn up and available in the safety file and discussed to all employees. This procedure will explain how the contractor will ensure that the virus does not spread during construction
- A guideline on what the process will be if an employee or a visitor is showing symptoms of the COVID 19 virus
- COVID 19 Toolbox talks shall be held with all employees to explain to the employees what the COVID 19 virus is
- Applicable Checklist & register should be in place to ensure that all the measures that is stipulated in the Client OHS Spec, Baseline Risk assessment, COVID procedure and contractor OHS Plan
- Sign in register will need to be available at every site entrance where the employee or site security can write down the temperature of the employee or Visitor
- All Health and safety related policies will need to be revised to ensure that COVID 19 is cover and explained in all of them in the applicable manner
- COVID 19 manager shall be appointed on site. This employee shall be on site full-time.

Hand sanitation points

Hand sanitation points will need to be placed at strategic places as well as the high-risk area. The first place where sanitation station shall be placed is at all site entrances. High risk areas will be identified by the following:

- Areas where employees are in frequent and/or close contact (i.e. within 1,5 Meter of people)

The high-risk areas will have additional sanitation stations, all employees shall wear mask or face shield when working closer than 1, 5 Meter from the nearest employee. Employees will be trained to wash hands more frequently or to use sanitizer more frequently.

The hand sanitizer that will be used shall have more than 70% of Ethyl alcohol. This needs to be ensured by the safety office on site as well as a Material Safety Data Sheet (MSDS) available close by for confirmation of the 70%. The hazardous chemical register shall be available in the flammable store. This register shall also include the hand sanitizer.

Hand washing posters shall be available at all hand washing stations to ensure that all employees know what the correct way is of washing your hands to cover all the areas. Informational posters about COVID 19 shall also be visible at these areas to ensure that employees know how the virus spreads and how to prevent spreading. The sanitisation stations will need to be cleaned on a regular basis.

Cleaning & disinfecting

All work surfaces need to be cleaned and disinfected on a regular basis. The chemical that will be used to clean the surfaces must have a minimum of 70% Ethyl Alcohol and the MSDS for that specific sanitizer must be available in the safety file under the MSDS's section. Plant, site offices & construction sites shall be decontaminated before the start of the site. The contractor that decontaminated the site shall issue a certificate to explain it has been done and explain what chemicals was used.

Offices

- All offices must have a biochemical hazardous bin with a medical waste bag that can be sealed
- The offices need to be cleaned on a regular basis
- If disposable gloves are being used, they must be discarded in the medical waste bin.
- Only employees that is working in the office will be allowed in the offices
- All visitors must arrange with office personnel if they have an appointment with one of the office employees to move outside and have the appointment outside or in a well-ventilated area and if possible, keep social distancing distance (1,5 Meter)
- Cleaners must focus on cleaning the following areas: desks, printers, door handles, kettles, microwaves & office equipment (cabinets, staplers, punchers) etc.
- No utensils shall be shared
- All employees shall sanitise their hands before and after using building plans

Ablution Facilities

- All ablution facilities shall have a washing station or a sanitation station.
- Sufficient paper towels shall be available to dry off hands after sanitizing
- All ablution facilities must have a biochemical hazardous bin, with a medical waste bag that can be sealed
- Paper towels shall be discarded into the medical waste bin provided at the ablution facilities
- Ablution facilities must always be cleaned on a more regular basis to ensure a clean surface
- Chemical toilets ratio is reduced to 1-10 employees and flush toilets ratio is reduced 1-15 employees
- Cleaners must focus on the most touch areas when cleaning ablution facilities (toilet handles, door handles, taps, basins surfaces, toilet seats etc.)

Eating areas

The eating areas in construction is a high risk since the employees under normal circumstances would have sit within 1, 5 Meter of each other.

- Eating areas will need to make bigger to accommodate all employees at once but still implement social distancing of 1, 5 Meter at least.
- All eating areas must have a biochemical hazardous bin, with a medical waste bag that can be sealed
- All Servite that was used or paper towels that was used to dry hands after using the sanitation station must be discarded in the hazardous bin.
- All eating areas shall have a washing station or a sanitation station
- Lunch breaks should be staggered between contractors / employees to ensure that during lunch the social distancing 1, 5 Meter can still be

implemented.

- All chairs, Tabletops and drinking water taps need to be cleaned after each lunch break
- Notice board shall be placed at the eating area to ensure that all employees see all posters and notices
- Clean drinking water need to be supplied to all employees at the eating area

Waste management

The waste management on site will be a critical path and will need to be monitored. The PPE and cleaning material that will be discarded will be medical (biological hazardous) waste. This will need to be separated from normal waste, all medical waste bins will need to have a waste bag that can seal and need to be removed by a registered service provider. Hazardous bins shall be foot operated to ensure employees do not touch the lid of the hazardous bin.

Paper towels

Paper towels shall be supplied to by the contractor at all sanitation stations and washing stations for employees to dry their hands. These towel papers will be discarded in the medical waste bins. The contractor shall ensure that sufficient paper towels is in storage for a fast and effective replacements

PPE

All disposable PPE shall be discarded in these medical waste bins. Disposable PPE will be the following: dust masks, surgical masks etc.

Disinfectants

The sanitizers that will be available throughout the site if finished and not refilled will be discarded as medical waste. The contractor must ensure that sufficient stock of hand sanitizer and soap is available in the storeroom. This chemicals and soap shall be recorded as it is booked out of the storeroom.

Wastewater

The water that will be used at the hand washing points will need be stored in a container with a lid. This infected water will then need to be treated before the water can be discarded in a normal municipal sewage system.

Personal Protective Equipment (PPE)

COVID 19 be prevented from spreading using the correct PPE. The COVID 19 virus is spread by small droplets that can be enter the body at the face through the nose, mouth, and the eyes. This is the critical areas that must be protected at all cost to prevent the employees from getting the feared COVID 19 virus.

The disposable PPE will be treated as biological hazardous waste as explained above in waste management

The Contractor shall supply all employees with 2 cloth masks (1 to wear, 1 to wash). The cloth masks will be checked every morning at the entrance of the gate to ensure that employees are washing the cloth masks. This is an example of a cloth mask:

If the employees are working in a high-risk area, the contractor will need to have a look at alternative measures to protect the employee's eyes as well as mouth and nose area. Face shields is a perfect example of an alternative way to protect our workers. There are different types of face shields on the market, from loose face shields with a strap to face shield and hard hat combination.

Below is an example of these alternative equipment that will need to be in place in high risk areas when possible:

Employees will only be required to wear hand gloves when the task will require it (will be stipulated in the risk assessment). When for example the employee will do grinding work and the face shield will not last then the employee will be required to wear goggles and a normal dust mask.

Accommodation

When the contractor provides accommodation to the employees on site the following shall be in place:

- The quantity of employees must be looked at that is accommodated on site
- The restrictions on the number of employees using the same ablution facilities
- Cutlery & utensils shall not be shares between employees
- Social distancing between employees (at least 1,5 Meter) when in sleeping quarters and in cooking facilities
- The employees shall practice good personal hygiene and shall sanitise areas that on a regular basis that is used by all employees
- Employees shall not share any personal belongings with each other for example: clothes & towels

Transportation

The transportation of employees shall be monitored by the site safety officer as well as site management. Transportation will be arranged that all employees always implement the social distance of at least 1, 5 Meter from each other. Employee using transportation as well as drivers will always wear mask to prevent the spread of the virus. Employees shall sanitize their hands before using transportation and after using transportation. Transporting employees in big quantities must always be prevented if possible. All transport shall be disinfected before and after use. If employees drive with personal transport, sufficient parking must be made available

COVID 19 Signage's

The applicable signage's shall be displayed at all the applicable places for example all the notice boards that is identified in this document. The contractor shall as far as reasonably practicably post posters about COVID 19 to ensure that all employees know the essential information of the virus. The signage's will be essential to show employees with the use of pictograms what is the most important factors to keep in mind on site. All hand sanitation station shall have a sign that states it is a sanitation station and while have a poster to explain to employees exactly how to wash their hands to prevent getting infected.

This is examples of signs that shall be visible all over site to keep reminding employees of the risks. The site entrances shall get additional signage's to explain to visitor and employees the applicable PPE for the site. These signs are examples of signs that shall be visible at the site entrances:

COVID 19 Posters

The contractor will be responsible to display posters on all notice boards on site as stipulated to ensure that employees are informed of the COVID 19 virus. The responsibility is with the contractor to communicate these posters to the employees and the train them on all the precaution measures and the keep them informed.

3 Omissions from the Site-Specific Health and Safety Specifications

Every endeavor has been made to address the most critical aspects relating to Health and Safety issues to assist the contractor in adequately providing for the Health and Safety of employees on site. However, the Principal Contractor is required to ensure they stay compliant with statutory requirements and construction programs and processes and include such aspects in their Health and Safety File.

PRIMARY HEALTH AND SAFETY COMPLIANCE

Project: CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)

ANNEXURE A

The Principal Contractor and Contractors must submit compliance with Annexure 'A' before commencing on work on site. **Compliance with Annexure 'A' must be maintained and proven to the Safety Agent at audits.**

HSS Item no.	Requirement	Legal Reference	Compliance required:
A1	Health & Safety Plan (H & S Plan)	Constructions Regs.	Withing one weeks of receipt of these specifications
A2	Notification of intention to commence construction / building work	Complete schedule 1 (Construction Regs.)	Before commencement on site
A3	Assignment of responsible persons to supervise construction work	OHS Act ~ Section 16(2) appointee ~ all written appointments under the construction regulations 2014	Before commencement on site
A4	Competence of responsible persons in the form of CV's related work history of appointees	OHS Act ~ Section 16(2) appointee ~ all written appointments under the construction regulations 2014	Together with H & S Plan
A5	Compensation for occupational injuries and diseases - proof of registration and in good standing	COIDA or FEMA	Together with H & S Plan
A6	Health and safety organogram showing all safety management portfolios and positions	Polokwane Municipality requirement	Together with H & S Plan
A7	Initial hazard identification and risk assessment document	Construction regulations	Together with H & S Plan
A8	Fall protection plan (first draft) as defined in the construction regulations	Construction regulations	Together with H & S Plan

HSS = health & safety specifications

OHS Act = occupational health & safety Act

CR = construction regulations

COIDA = compensation for occupational injuries and diseases Act

ASSIGNMENT OF PRINCIPAL CONTRACTOR'S AND CONTRACTORS' RESPONSIBLE PERSONS

Project: OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)

ANNEXURE B

The Principal Contractor must make all the management appointments as set out below. Compliance with annexure 'B' to be maintained and proven to the safety agent at audits (Further appointments could become necessary as the project progresses).

Item no.	Appointment	Legal Reference	Requirement
B1	CEO Assignee	Section 16(2)	A competent person to assist the CEO in achieving compliance with the OHS Act - PI Contractor's I Contractor's Responsible person
B2	Construction Work Manager	CR 8(1)	A full time competent person to Supervise and be responsible for health & safety related issues on site. The person is appointed by the Section 16(2)
B3	Assistant Construction Work Manager	CR 8(2)	A full time competent person(s) to assist the CR 8(1) appointee with daily supervision of construction work safety. One of the CR8(2) appointees must be designated to fulfill the role of the CR6(1) when such person is not on site. Make this clear in the appointment letter
B4	Health & Safety Representative(s)	Section 17	A competent person(S) to be appointed to represent the workforce in H & S matters. Reps may attend safety meetings, conduct monthly site audits, attend incident / injury investigations and make recommendations as far as H&S goes.
B5	Health & Safety Committee Member(s)	Sectin 19	H&S reps, site supervisors / foreman and the safety officer should make up the committee, with the CR8(1) appointee chairing the committee.
B6	Incident Investigator	GAR 9	A competent person to head up the investigation team and co-ordinate incident / injury investigation ons site.
B7	Risk assessment co-ordinator	CR9	A competent person to co-ordinate the drafting / reviewing / distribution of risk assessments on behalf of the principal contractor. The same applies to contractors. NQF Level 5

B8	Fall protection plan co-ordinator	CR10	A competent person to co-ordinate the drafting / reviewing / distribution of Fall Protection Plan. The same applies to contractors. NQF Level 4
B9	Emergency plan co-ordinator	Contractor Needs to be in line with service stationERP	A competent person to co-ordinate the drafting / reviewing / distribution of the site emergency procedures / evacuation plan. Such person must be fulltime on site so as to take charge of emergency situations.
B10	First Aider(s)	GSR 3	A certified person to address first aid situations and take charge of injuries. Level 1 certificate
B11	Lifting machine and lifting tackle supervisor	DMR 18	A competent P/Contractor employee to co-ordinate the management of lifting machines and tackle, ensuring that such equipment is safe for use at all times, inspected when necessary and repaired when required. The operators, banks men and contractors to liases with this person
B12	Scaffolding inspector	SANS 10085 - 2004	A competent person to inspect scaffolding before use and every time after bad weather, etc.
B13	Scaffold supervisor (P/Contractor)	SANS 10085 - 2004	A competent P/Contractor employee to supervise all scaffolding on site, ensuring that scaffolds are safe for use, inspected, extended / altered, repaired when required and that all trades are co-ordinated and authorised to work on such scaffolds
B14	Scaffolding erector	SANS 10085 - 2004	A competent person(s) to erect scaffolding - leader of the scaffold team
B15	Formwork & support work supervisor (Temporary Works)	CR12	A competent person to supervise all formwork & support work erection & dismantling. This person must also ensure that the equipment is safe and that all the necessary inspections (pre, during, post & every day thereafter) are carried out & records kept by the competent inspectors. Design drawings must be available to this supervisor.
B16	Excavation supervisor / inspector	CR13	A competent person to supervise & inspect excavation work (daily) and ensure that excavations are safe. Records of inspections must be kept by this person.

B17	Ladder inspector	GSR13A	A competent person to inspect ladders daily and ensure they are safe for use, keeping monthly record.
B18	Stacking supervisor	CR28	A competent person to supervise all stacking and storage operations
B19	Explosive powered tools inspector / supervisor	CR21	A competent person to inspect & clean the tool daily, store the tool in a safe location, ensure that cartridges are signed out and in, and control all operations thereof.
B20	Temporary electrical installations inspector	CR24	A competent person to inspect all temporary electrical installations. Including weekly inspections and record keeping.
B21	Portable Electrical Tool Inspector	CR 24	A competent person to co-ordinate / inspect portable electrical tools, leads and plugs.
B22	Fire-fighting equipment inspector	CR29	A competent person to co-ordinate & inspect fire fighting equipment. Including ad-hoc checks and monthly inspections with records kept.
B23	Construction vehicles & mobile plant supervisor	CR23	A competent person(s) to co-ordinate the safety of all construction vehicles & mobile plant. Ensuring that daily inspections are done and records kept, that safety measures are in place, that operators are certified and authorised to operate and that maintenance and services are carried out when required.
B24	Construction safety officer	CR8(6)	A competent person to fulfill the functions as set out in these HSS

GENERAL COMPLIANCE REQUIREMENTS

Project: OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)

ANNEXURE C

The Principal Contractor and Contractors must comply with but not be limited to the requirements tabled below: Prove compliance with annexure 'C' at audits conducted by the safety agent.

Item no.	What	When	Output	Reviewed by Polokwane Municipality Agent
C1	Construction - phase Health & Safety Plan	Monthly review	Principal Contractor to indicate the status of Contractors health & safety plans	
C2	Health & Safety File(s)	Open file when construction begins and maintain throughout	Have file on hand at audits. Contractors to report on their file at monthly health & safety audits by the Principal Contractor.	
C3	OHS Act and relevant Regulations	Monthly review	To be kept in the health & safety file on site.	
C4	Health & Safety Induction training, PTW Procedures	Every worker before he/she starts work	Attendance registers to be kept	
C5	Awareness Training (Tool Box Talks)	At least once a week	Attendance registers to be kept	
C6	Health & Safety Meetings	Monthly	Meeting minutes to be kept	
C7	Health & Safety Reports	Monthly	Report covering: - Incidents / injuries and investigations - Non conformances by employees & Contractors - reports - Internal H&S audit reports	

C8	Audits on contractors	Monthly	<u>Report covering:</u> • H&S File / Plan • WCA status • Appointment letters • Section 37(2) agreements • Risk assessment & safe work procedures • Physical site inspection • Any other contractor specific requirements	
C9	Emergency procedured	Monthly evaluation of procedure	Compile written procedure as well as tel. Numbers	
C10	Risk assessments & fall protection plan	Updated and signed off	Documented risk assessments to be available	
C11	Method statements	Drawn up and distributed before workers are exposed to the risks	Documented set of method statements reviewed and signed off.	
C12	General Inspections	Daily	<u>Report OHS Act compliance:</u> • Excavations • Portable electrical tools • Formwork & support work • Explosive powered tools	
C13	General Inspections	Daily	• Scaffolding • Temporary Electrical Installations	
C14	General Inspections	Monthly	• Fire fighting equipment • Ladders	

C15	General Inspections	Monthly	• Lifting tackle • Oxy-acetylene cutting & welding sets • Fall prevention and arrest equipment	
C16	General Inspections	6-Monthly	• Lifting machines	
C17	Load tests / performance tests	Annually / once erected, before use	• Lifting machines	
C18	List of Contractors	List to be updated weekly	Compile a list of contractors: Name, supervisor, company tel. Numbers and trade.	
C19	Workman's Compensation	Ongoing	Compile a list of Contractors workman's Compensation proof of good standing.	
C20	Construction site rules & Section 37(2) Mandatary Agreements	Ongoing	Compile a list of all signed up Mandataries. Proof of agreement documents to be kept in H&S file.	

OCCUPATIONAL HEALTH & SAFETY – HEALTH & SAFETY COSTS TO BE INCLUDED IN THE PRINCIPAL CONTRACTOR'S / CONTRACTORS' PRICE

Project: OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)

ANNEXURE D

In terms of the Construction Regulations (2014), it is the Polokwane Municipality's duty to ensure that the cost for health & safety has been provided for by the Principal Contractor, before appointment.

Acting on behalf of our Polokwane Municipality, we require the following health & safety costs to be included by the Principal Contractor. It must be made noticeably clear that these are just some of the health & safety costs to be included in your tender price. It is the duty of the Principal Contractor and Contractors to ensure that all aspects of the Occupational Health & safety Act 85/1993 and Construction Regulations are catered for.

Pricing for Occupational Health and Safety measures should include the following if applicable:

ITEM	DESCRIPTION
1	Supply of all items of Personal Protective Clothing/Equipment & ensure use thereof for full compliance
1.1	Steel toe capped safety boots
1.2	Overalls
1.3	Reflective vests (high visibility)
1.4	Hard hats
1.5	Dust masks
1.6	Hearing protection
1.7	Hand gloves
1.8	Any other: Principal Contractor to specify
2	Supply and provision of Equipment for working at Heights & ensure use thereof for full compliance
2.1	Fall protection equipment (Safety Harness)
2.2	Double lanyard harness
2.3	Fall protection plan
2.4	Scaffolding access ladders/toe boards/handrails
2.5	Portable Ladders
2.6	Any other: Principal Contractor to specify:
3	Barricading: Supply & install, including removal upon completion to ensure full compliance to legislation
3.1	Rigid type barricading
3.2	Temporary fence barricading along perimeter of excavated area
3.3	Danger tape pre-warning tape
3.4	Any other: Principal Contractor to specify:
4	Related Training
4.1	First Aid Training
4.2	Health and Safety Representative training

ANNEXURE E

The Occupational health and Safety File must consist out of the following documentation:

INDEX

1	Appointment Letter from Polokwane Municipality.
2	Notification of Construction work.
3	Letter of Good standing - COID
4	Copy of Public Liability Insurance Policy and UIF Registration
5	Health and Safety Specifications
6	Scope of Work
7	Tool and Machinery list
8	Method Statement of all work that will be conducted.
9	Risk Assessment Guide / Procedure
10	Baseline Risk Assessments
11	Safe Work Procedures for all Risks
12	Health and Safety Information from Designer
13	Medical Certificates\Copy of ID'S and Personal Information
14	All Health and Safety Related Policies
15	Section 37.2 Agreements
16	Induction Training Information
17	Site Specific Emergency numbers and Emergency Plan
18	Site Specific Fall Protection and Rescue Plan
19	Site Specific Health and Safety Plan
20	Incident / Accident Management Control
21	Traffic Management Plan
22	Contractor Control Procedures
23	Environmental Management
24	Hazardous Chemical Substance Register and MSDS
25	Example of Monthly Health and Safety Report
26	COVID - 19 Management Plan
27	Health and Safety Organogram and Occupational Health and Safety (Construction) Appointments - With Competencies
28	Certificates for all lifting equipment
29	Sample of all registers that will be used on site.
30	Copy of Construction Building Plans (A4)
31	Copy of the Occupational Health and Safety Act and Construction Regulations 2014

ANNEXURE F

OCCUPATIONAL HEALTH AND SAFETY ACT, 1993

(Regulation 4 of the Construction Regulations. 2014) NOTIFICATION OF CONSTRUCTION WORK

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

(b) Name and tel. No of principal contractor's contact person:

2. Principal contractor's compensation registration number:

3. (a) Name and postal address of Polokwane Municipality:

(b) Name and tel. No of Polokwane Municipality's contact person or agent:

4. (a) Name and postal address of designer(s) for the project:

(b) Name and tel. No of designer(s) contact person:

5. Name and telephone number of principal contractor's construction supervisor on site appointed in terms of regulation 8(1).

6. Names of principal contractor's sub-ordinate supervisors on site appointed in terms of regulation 8(2).

7. Exact physical address of the construction site or site office:

8. Nature of the construction work:

9. Expected commencement date: _____

10. Expected completion date: _____

11. Estimated maximum number of persons on the construction site.

Total: _____ Male: _____ Female: _____

12. Planned number of contractors on the construction site accountable to principal Contractor: _____

13. Name(s) of contractors already selected.

Principal Contractor

Date

Polokwane Municipality's Agent (where applicable)

Date

Polokwane Municipality

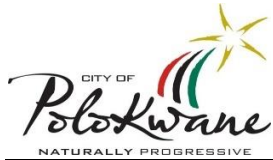
Date

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

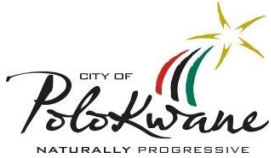
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Copies:

1. Original to **Department of Labour**



MATRIX		HAZARD EFFECT / CONSEQUENCE				
BASELINE RISK		1 Insignificant	2 Minor	3 Moderate	4 Major	5 Catastrophic
Loss Type						
Timeline		No impact on overall project timeline	May result in overall project timeline overrun of less than 5%	May result in overall project timeline overrun of between 5% and less than 20%	May result in overall project timeline overrun of between 20% and less than 50%	May result in overall project timeline overrun of 50% or more
Budget		No impact on the budget of the project	May result in overall project budget overrun of less than 5%	May result in overall project budget overrun of between 5% and less than 20%	May result in overall project budget overrun of between 20% and less than 50%	May result in overall project budget overrun of 50% or more
Investment Return – NPV loss		Less than R5m	R5m to less than R50m	R50M to less than R500m	R500m to R5b	R5b or more
Quality		No impact on quality	Minimal quality issues that can be addressed in a short timeframe with minimal interactions	Some quality issues that requires immediate management action	Significant quality issues that requires senior project management interaction	Significant quality issues that requires sponsorship intervention with significant resource and cost implications for rework
Safety / Health		First aid case / Exposure to minor health risk	Medical treatment case / Exposure to major health risk	Lost time injury / Reversible impact on health	Single fatality or loss of quality of life / Irreversible impact on health	Multiple fatalities / Impact on health ultimately fatal
Environment		Minimal environmental harm – L1 incident	Material environmental harm – L2 incident remediable short term	Serious environmental harm – L2 incident remediable within LOM	Major environmental harm – L2 incident remediable post LOM	Extreme environmental harm – L3 incident irreversible
Legal & Regulatory		No legal impact	Minor legal concerns with minor impact	Some legal concerns with manageable level of impact	Serious legal concerns and significant impact on operations	Legal non compliance with risk of shutdown of operations with significant cost impacts
Reputation / Social / Community		Slight impact - public awareness may exist but no public concern	Limited impact - local public concern	Considerable impact - regional public concern	National impact - national public concern	International impact - international public attention
LIKELIHOOD		RISK RATING				
5 Almost Certain	The unwanted event has occurred frequently; has a 90% and higher probability of reoccurring	11 Medium	16 Significant	20 Significant	23 High	25 High
4 Likely	The unwanted event has a probability of between 60% and less than 90% of occurring	7 Medium	12 Medium	17 Significant	21 High	24 High
3 Possible	The unwanted event has a probability of between 30% and less than 60% of occurring	4 Low	8 Medium	13 Significant	18 Significant	22 High
2 Unlikely	The unwanted event has a probability of between 1% and less than 30% of occurring	2 Low	5 Low	9 Medium	14 Significant	19 Significant
1 Rare	The unwanted event has never occurred, has a probability of less than 1% of occurring	1 Low	3 Low	6 Medium	10 Medium	15 Significant

**BASELINE RISK ASSESSMENT: OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)**

NO	HAZARD/ITEM	RISK ASSOCIATED WITH HAZARD	CONSEQUENCES	RR	HOW IS HAZARD TO BE DEALT	BY WHOM	BY WHEN
1.	PRE -CONSTRUCTION						
	FILE APPROVAL AND ADMINISTRATIVE REQUIREMENTS			21			
	No file approval as per OHS requirements and Client specifications	• Work commencing prior to file being available and approved • No valid registration with COIDA • Expired documentation (e.g competencies, equipment load test, medicals) • Documentation not available or approved as per required Client Spec and OHS Act and Regulations	• Construction delays • Penalties • Contravention notice from DOL		• No work comment until approval has been signed off • Client Health and safety specification • Client Health and safety specification • Baseline Risk Assessment • Site conditions evaluation.	-Client -Project manager -Appointed OHS Consultant- Principal Contractor	Before Principal Contractor establish site



	Legal appointments and competency	- Employee appointed not in possession of required or valid competencies as per Client Spec and the OHS Act and Regulations - Appointment not as per legal requirements - Lack of experience for appointed position - Lack of experience for appointed position valid competencies as per Client Spec and the OHS Act and Regulations - Appointment	- Construction delays - Penalties - Contravention notice form DOL	21	- No work commencement until approval has been signed off. - Client Health and safety specification. - Baseline Risk Assessment	-Client -Project manager -Appointed OHS Constant-Principal - -Contractor -Principal contractor	Before Principal Contractor establish site



		not as per legal requirements • Lack of experience for appointed position					
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	Required legal documentation as per OHS Act and Regulations	• Documentation not site specific • Policies and procedures not in place and approved • Employees not trained in policies and procedures and legal requirements	• Construction delays • Penalties • Contravention notice form DOL	21	• No work commencement until approval has been signed off. • Client Health and safety specification. • Baseline Risk Assessment • Training needs analysis to conducted by contractors • Communication o required documentation	Client -Project Manager -Appointed OHS - Consultant- Principal Contractor	Before principal Contractor establish site
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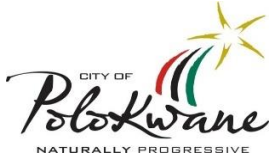
	Risk identification	- Method of works not site specific - Risk identification not in place or conducted	- Construction delays - Penalties - Contravention notice from DOL	21	- No work commencement until approval has been signed off. - Client Health and safety specification	-Client -Project Manager -Appointed OHS consultant – Principal Contractor -Competent risk assessor	Before principal Contractor establish site
		- Risk identification not site specific - Risk controls not sufficient - Risk assessor not competent - Continuous risk evaluation not			- Baseline Risk Assessment - Method statement of tasks - Site conditions evaluations		



		conducted					
	Induction and medical certificate of fitness	- Employees entering the site not being inducted. - Visitors entering site not being inducted/ signing visitor's induction form. -Induction being conducted on employees without them being in possession of a valid medical certificate of fitness in form annexure 3. The medical must be conducted by a register	- Construction delays - Penalties - Contravention notice from DOL	21	- Site induction can only be done with an employee if the required up to date medical is presented at the induction - Medical fitness certificated must be validated by the principal contractor to ensure adherence to minimum requirements and validity of the document. - Each person's ID or valid work permit must be inspected before induction	-Client -Project Manager -Appointed OHS Consultant – Principal Contractor	Before Principal Contractor establish site



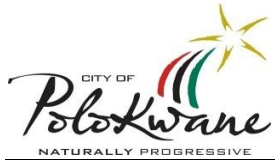
		Occupational Health Practitioner			can be allowed on site for the individual.		
		• Construction vehicle and mobile plant operators entering the site without being inducted • Driver or delivery vehicles not made aware of the specific site conditions • Employees being inducted without valid work permits /certified ID copies					



	List of employees and contractors	- Number of employees on site not listed on employees lists. - Number of contractors on site not listed on contractor list - Employee and contractor list not being updated as required	- Construction delays - Penalties - Contravention notice from DOL	21	- Record all employees working on site on the employees list. - Record all contractors on site on an updated contractors list. - Enter new employees and contractors on the list as soon as they have received the site induction.	-Client -Project Manager -Appointed OHS Consultant – Principal Contract or	Before Principal Contractor establish site
	Notification of construction work DOL	- Construction work commencing without an approved notification - Notification application not submitted to DOL within the prescribed timeframe	- Construction delays - Penalties - Contravention notice from DOL	21	The Client cannot allow any work to commence without a valid (stamp) notification of construction work in place	-Client -Project Manager -Appointed OHS Consultant – Principal -Contractor	Before Principal Contractor establish site



NO	HAZARD/ITEM	RISK ASSOCIATED WITH HAZARD	CONSEQUENCES	RR	HOW IS HAZARD TO BE DEALT	BY WHOM	BY WHEN



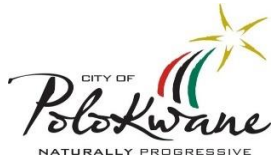
	Client and Designer duties	- Client not following requirements as stipulated in the regulations. - Designers not appointed in writing and not made aware of their duties - Designers not following their legal duties throughout the project	- Construction delays - Penalties - Contravention notice from DOL		- Client to follow legal requirements as stipulated in the regulation before and during the construction process. - Designers on the to sign agreement in acknowledgement of their duties on the project. - Designers to conduct the required inspections and review the required documentation as stipulated in the regulations	-Client -Project Manager Appointed OHS Consultant – Principal Contractor	Before Principal Contractor establish site
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1(b)	SITE ESTABLISHMENT						
	Fencing construction site	- The erector must follow the specific position as required - When digging for fence poles, services can be damage - When post get knocked in it can damage services	- Hand and back injuries - Physical injuries - Incorrect manual handling - Lost time injuries - Medical treatment cases - Interruption of services	13	- The site fence must be minimum of 1.8m high - Fence installation areas to be demarcated with netting when post and fence is being installed	-Construction Manager -Project Manager -Contractor - Safety Officer	During the erection of fence
	Security	No security in place at entrances to construction site	- Unauthorized entry to site - Injuries to	13	The principal contractor must appoint full time security personnel	Construction Manager Project Manager	Duration of construction phase

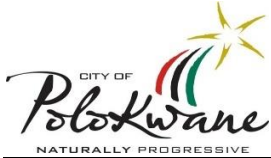


			unauthorized people on site • Theft of materials and equipment		to control the access onto the site at all times. • Dedicated access control sign books to be available for visitors sign ins.		
	Tempory water supply	• No proper water supply available on site	• Hygiene related diseases	13	• Only clean water may be used for human consumption and must be marked as safe to be used • Contaminated water areas to be	-Construction - Manager Project Manager	Duration of construction phase



					Indicated as unsafe for used		
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NO	HAZARD/ITEM	RISK ASSOCIATED WITH HAZARD	CONSEQUENCES	RR	HOW IS HAZARD TO BE DEALT	BY WHOM	BY WHEN
ROAD LAYER WORKS:							



	Temporary power supply	- No COC available for temporary electrical connection used on site - Temporary DB not installed in accordance with legal requirements	- Loss of production time - Fatality due to electrical - Damage of equipment - Fire	13	- Electrical installations can only be utilized once COC is issued - Electrical installations must be inspected weakly - Electrical installations must only be done by appointed electrical contractor	-Construction Manager -Project Manager -Contractor Safety Officer	
	Incompetent persons Uncontrolled site establishment activities Incorrect stacking procedures	- Injuries during off loading - Damage to property and or vehicles - Cuts and burns - Rushed activities - Incorrect supervision - Management team not identifying existing services	- Hand and back injuries - Dropping of equipment - Physical injuries - Incorrect manual handling - Potentially fatal accidents - Loss of limbs		- The principal contractor must ensure that site is established at the correct location as identified by the client - Principal contractors OHS file must be approved prior to site establishment begins-aligned to new Construction Regulation 2014	-Construction Manager -Contractor Safety Officer -Construction Manager	Before construction commences



		• Trip and fall Cuts • Collapsing of stacks • Incorrect manual handling • back injuries	• Lost time injuries • Medical treatment cases			
		• Incorrect manual handling -back injuries	• Financial claims		• All workers on site must be declared medically fit by an Occupational Health Practitioner. (Annexure 3) • Site-induction must be given to all employees to make them aware of the specific hazards • Proof of this should be placed on the OHS File. • Before the commencement of this phase a site- specific risk assessment must be conducted by a competent risk assessor.	



					• All the employees involved must be inducted on the risks; proof of this would be signing off on these risks. • Site specific safe work procedures must be followed during these activities • Relevant toolbox talks must also be held with employees. • The Contractor must ensure that correct serviceable tools are available during this phase. • Employees must be issued with correct PPE before works begin		
	Offloading heavy equipment and containers with mobile cranes.	• Defective mobile crane can cause accidents. • Damage lifting tackle • Unsecure offloading area could cause accidents	• Serious injury and fatalities • Standing time • Lost time injuries • 1st Aid medical treatment cases • Financial	13	• All lifting equipment including the mobile crane must be checked before allowed on site. • Ensure that the correct mobile crane to be used for	Construction Supervisor -Lifting tackle inspector Construction OHS officer	During site establishment

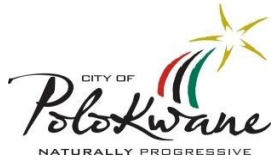


		Damage to property	implications		the offloading process. - Safe Working Load must be clearly displayed on the crane. - Load test certificate will be submitted to the client. - All unstable stacks to be dismantled and stacked over, in pre-determined area		
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	Housing:	Inadequate storing facilities Damage to material and equipment. Accumulation of waste. Environment pollution Facilities for employees. Electrical installation	Serious injuries Electrocuton Environmental impact -Personal injuries -Lost time in production -Damage to equipment and materials. -Injuries to	9	- Use site establishment checklist to ensure compliance with all items - Toilet facilities & staff welfare	-Construction Supervisor -Staff Welfare Inspector -Safety Officer -Qualified Electrician	During site Establishment Ongoing
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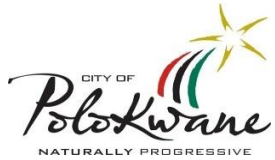
CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)

					as per Constru ction Reg 2014 • Toilet facilities 1.30(reg ula r service)		
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			Occupants and visitors		• Correct storing facilities for hazardous chemicals • Correct signage for all storage of hazardous materials • Proper storing facilities for tool and equipment. • Adequate waste bins available. • Regular cleaning of these bins. • Waste recycling is encourage		
					• A COC certificate for the temporary electrical installation by a register competent electrician		





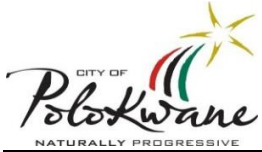
CONSTRUCTION							
NO	HAZARD/ITEM	RISK ASSOCIATED WITH HAZARD	CONSEQUENCES	PR	HOW IS HAZARD TO BE DEALT	BY WHOM	BY WHOM
1.	Excavation and filling Trenches	- Hazard rock material - Risk of collapsing excavations	- Manual handling injuries - Lost time injuries - Firs aid treatment		- Method statements - Issue base risk assessment - Inspections by	-Construction - Supervisor -Construction OHS Officer	Before and During task



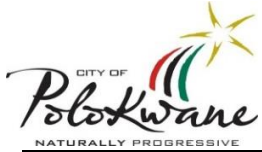
		- Seepage of subterranean water - Employees inhaling dangerous fumes - Skin a contact with hazardous substances			excavation supervisor - Proper train operators - Location of services	-Excavation Supervisor -Civil Engineer -Hazardous Chemical Supervisor	
2.	Blasting preparations	No proper authorization could lead to uncontrolled blasting operations	- Unsafe transporting could lead to fatalities & damage to property - Unqualified explosive manager could cause serious injuries		- Apply the explosive Regulation 17 Jan 2003 - Correct classification of explosives to be used. - Licensing of explosive workplace (Reg 4)	-Construction Supervisor -Foreman –Blasting Supervisor -Explosive Manager	Before and During blast
3.			Facilities or damage		- Competent explosives manager to be appointed (competency) - Blasting management plan to be submitted (site plan) - Explosive transport		



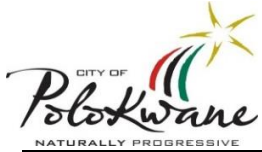
					permit • Access control measures to be implemented • Check for Emergency plan		
4.	Working in remote area's	• Snakes and insects	• Fatalities • Serious injuries • Lost times injuries		• If i know allergy to stings take appropriate medication on site. If feeling unwell after a site visit seek medical attention. • Wear long trouser and long sleeves, use insect repellent, avoid brushing through tall vegetation, check clothing for ticks and consult a doctor in the event of tick bite.	-Construction Supervisor -Excavation Supervisor -Construction OHS Officer	Ongoing



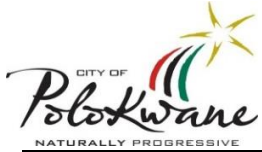
5.				21	- Never attempt to pick up any snakes unless trained and equipped to do so. - Take care to look at the ground when kneeling or placing hands on ground. - Wear safety boots and take care when picking up anything. - Educate employees with the assistance of posters of snakes of the surveying area.		
4.	Fire Protection	- Inadequate and wrongly placed fire equipment can cause delay in dealing with fire should it occur. - Poor housekeeping	- LTI Medical Cases/1st Aid Cases - May results in overall project overrun - Trip slip and falls - Serious injuries or possible fatalities when fire gets	13	- Adequate fire equipment to be provided and placed at suitable location - Monthly checklist of all fire equipments - Provide training and have fire drills	-Construction -Supervisor -Foreman -Fire Fighting -Foreman -Fire Fighting	Ongoing



		- Falling objects - Hand injuries - Back injuries - Strains - Non-availability of fire equipments - Untrained personnel using wrong type of equipment to extinguish the fire delays in searching for fire extinguisher. - Fire alarm not functional or inaudible - Access blocked and people trapped inside, fire	- out of control - Damage to property - Medical treatment - Bruises, broken limb 1st aid case treatment - Loss of life		- periodically Store material in demarcated areas - Cigarettes to be extinguished - Properly and thrown into rubbish bins. - Ashtrays and waste bins to be emptied daily - Fire escape routes and assembly points to be determined and clearly marked. - All workers must use appropriate PPE, - Close supervision - Discuss risk assessment with workers - Induction training Toolbox talks training	-Team -First Aider -Fire prevention supervisor	
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		fighting team not able to obtain access. • Shortage or nonoperation of fire fighting equipment. • Overcrowding an exit point during fire					
INSTALLATION OF STORM WATER:							
1.	Ergonomic	• Repetition movements resulting in MSDS • Grip force with hands, wrist, arms, resulting in muscle fatigue and	• Lost time injury • Medical treatment incidents • Body injuries • Heat exhaustion	13	• Employees trained recognise MSD symptoms • Encourage early reporting of MSD symptoms • Re-evaluate work procedures • Ensure regular resting periods. • Employees need	-Construction -Supervisor -Construction -OHS Officer -All employees -First aider	Ongoing



		inflammation Of the muscles and tendons. • Lift/lower force activities that could result in lower back injuries. • Working in awkward positions. • Extreme temperatures. • Activities that result in hand arm vibration that could result in that could result in MSD and white			proper training in lifting practices. • Job task observation. • Mechanical lifting where possible. • Redesigned tasks. • Trained first aider. • Sufficient fresh water hourly(600 ml). • Sunscreen should also be available. • Equipment with lowest vibration to be used. • Proper maintenance schedules must be in place. • Proper medical surveillance program in place.		
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		finger syndro me			Vibration reducing hand gloves must be used.		
2.	COVID-19		- Fever - Tiredness - Dry Cough - Runny nose - Sore Throat - Aches and Panes	17	The contractor must ensure that site is establishment at the correct location as identified by the client	- Complianc e COVID- 19 Officer	Ongoing
3.				9			



4.				13			
CONSTRUCTION OF OPEN DRAINS WITH STEEL REINFORCING WELDED MESH LINING:							
1.				10			



ANCILLARY ROAD WORKS: ROAD SIGNAGE/ROAD MARKINGS:							
1.				15			

C3.8 MANAGEMENT OF WORKS

5.0 Applicable SANS 1921 standards

The following parts of SANS 1921 Construction works standards and associated specification data are applicable to the works:

1. SANS 1921 ñ 5
2. SANS 1921 ñ 6

The abovementioned South African National Standards make several references to the Specification Data for data, provisions and variations that make these standards applicable to this contract. The Specification Data shall have precedence in the interpretation of any ambiguity or inconsistency between it and these standards.

Each item of Specification Data given below is cross-referenced to the clause in the standard to which it mainly applies.

The associated Specification Data is as follows:

SANS 1921-1, Construction and management requirements for works contracts – Part 1: General engineering and construction works	
Clause	Specification data
Essential data	
4.1.7	There are no requirements for drawings, information and calculations for which the contractor is responsible
4.2.1	The responsibility strategy assigned to the contractor for the works is A.
4.2.2	The engineer is Mr. T.E Muvhango
4.3.1	The planning, programme and method statements are to comply with the following: 1) Planned weekly progress in the form of a bar chart 2) Monthly Updating and forecast. 3) Critical Path Method. State requirements for format of programme, level of detail, critical path activities and their dependencies, frequency of updating, etc., if not provided in the contract data. Provide particulars of phased completion, programme constraints, milestone dates for completion, etc., as necessary. State requirements for sequencing, as required. State any requirements for software for programmes. ñ See PS 5 Page E-5.
4.3.3	The notice period for inspection is 2 Days.
4.7.3	The overbreak allowances for blasting are provided for in the scope of work.
4.9.3	The trees and shrubs which are not to be disturbed are identified in the scope of work.
4.12.2	The samples of materials, workmanship and finishes that the contractor is to provide and deliver to the employer are: N/A
4.12.2	The fabrication drawings that the contractor is to provide and deliver to the employer are: N/A
4.14.3	The office accommodation, equipment, accommodation for site meetings and other facilities for use by the employer and his agents are: 1) Site office which shall be used for site meetings and for the contractor's use. Such an office shall comprise a minimum of 20m² in area and 3 m high, be ventilated, have good lamination, must be reasonably sound proof, and have a hard floor construction. It shall be furnished with a desk on which drawings can be rolled open and on which there is sufficient writing space and sufficient temporary chairs or benches to accommodate all persons present at site meetings. 2) 2 Shades/covers for Engineers vehicle. ñ See PS 8 ñ Page E-7

4.14.5	The Contractor is required to provide latrine and ablution facilities- See Project Specifications PS 10.3 ñPage E-7
4.14.6	The requirements for the provision and erection of separate sign boards for consultants and subcontractors are: 1) The boards must comply with the official standard type signboard of the Employer and be at least 2750 x 1800 mm high. 2) The boards must be constructed with a firm flat exposed face using suitable material of firm construction, painted and lettered according to the standard drawings available from the Employer on request and mounted on sturdy pipe-standards at a height of 1800 mm above natural ground level. More see PS AB 5.1 Page E22.
4.17.1	The requirements for the termination, diversion or maintenance of existing services are: 1) Exposure of the service to determine extent of interference with the planned works and informing the Engineer.. 2) Coordinating with the responsible Authority for the diversion works 3) Take photo of the exposed service before and after diversion. 4) Record the new position of the service in the ñas built drawingsñ
4.17.3	Services which are known to exist on the site are: See PS 10-4 Page E-7.
4.17.4	The requirements for detection apparatus are: See PS 10-4 Page E-7.
4.18	The following standards and specifications shall be in addition to the provisions of 4.18: See PS 11 Page E-9

Variations

See PSA , PSG & PSHA Page E -10 to E - 16

(Compiler to state variations as required)

Additional clauses
**SANS 1921-5, Construction and management requirements for works contracts – Part 5:
Excavation activities which are to be performed by hand.**

Clause	Specification Data
Essential Data:	
5.1	The depth of trenches which are to be excavated by hand is 1, 5 meters.

Additional clauses:

1	Stone pitching and rubble concrete masonry All stone required for stone pitching and rubble concrete masonry, whether grouted or dry, shall be collected, loaded, off loaded and placed by hand. Sand and stone shall be hauled to its point of placement by means of wheelbarrows where the haul distance is not greater than 150m. Grout shall be mixed and placed by hand.
2	Manufactured Elements Elements manufactured or designed by the Contractor, such as manhole rings and cover slabs, precast concrete planks and pipes, masonry units and edge beams shall not individually, have a mass of more than 320kg. In addition the items shall be large enough so that four workers can conveniently and simultaneously acquire a proper hand hold on them.
SANS 1921-6, Construction and management requirements for works contracts – Part 6: HIV/AIDS awareness.	
4.2.1(a)	A qualified service provider is a service provider that is one that is accredited or provisionally accredited training service provider in the HIV/AIDS field. A list of accredited service providers can be obtained from the Construction SETA (CETA) (tel 011-265 5900), Health and Welfare SETA (HWSETA) (011-622 6852) or on the Health and Welfare SETA website: www.hwseta.org.za.
Additional clauses	
	The duration of each workshop is not to be less than 2 ½ hours.

6 Recording of weather

The Contractor shall erect an effective rainfall gauge on the site and record the daily rainfall figures in a book. Such book shall be handed to the employer's representative for his signature no later than 12 days after rain that is considered to justify an extension of time occurs according to Standard Condition of Contract Clause 45(3)(b), as follows:

(b) Abnormal climatic conditions, with the understanding that no extension of the time for completion shall be granted on the grounds of normal rainfall conditions, but extension of time in terms of clause 45.(2) of the General Conditions of Contract, on the grounds of abnormal rainfall or wet conditions, shall be calculated separately for each calendar month or part thereof, according to the following formula:

$$V = (N_w - N_n) + \frac{(R_w - R_n)}{X}$$

When the value of V for any month exceeds the number of days in the particular month, V will be the number of days in the month. When V is negative and its absolute value exceeds N_n , then V shall be taken as equal to the negative of N_n .

The symbols shall have the following meanings:

V	=	Extension of time in calendar days for the calendar month under consideration.
N_w	=	Actual number of days in the calendar month on which a rainfall of Y mm or more were recorded.
N_n	=	Average number of days, derived from existing rainfall records, on which a rainfall of Y mm or more were recorded for the calendar month.
R_w	=	Actual rainfall in mm recorded on the Site in an approved rain gauge for the calendar month under consideration.
R_n	=	Average rainfall in mm for the calendar month, derived from existing rainfall records.
Y	=	Daily rainfall base value in mm. (Refer to PS 12).
X	=	Average number of days per year with daily rainfall exceeding Y mm. (Refer to PS 12).

For the purposes of the contract N_n , R_n , X and Y shall have the values stipulated in the Project Specifications. The total extension of time is the algebraic sum of the monthly totals for the period concerned. Extension of time for parts of a month shall be calculated by using pro rata values of N_n and R_n . If the algebraic sum of the monthly totals is negative, no reduction of the time for completion as a result of rainfall shall be applicable. This formula does not take into consideration any delays as a result of flood damage which may cause further or simultaneous delays, and flood damage shall be treated separately for the purposes of extension of time for completion.

The factor $(N_w - N_n)$ is considered as a fair allowance for deviations from the normal for the number of days on which the rainfall exceeds Y mm. The factor $(R_w - R_n)/X$ is considered as a fair allowance for deviation from the normal for the number of days on which the rainfall does not exceed Y mm, but on which wet conditions will hamper or disrupt work.

7 Unauthorized persons

The Contractor shall keep NO unauthorized persons from the works at all times, and Under no circumstances may any person except guards be allowed to sleep on the building site.

The Contractor to keep a Site Visitor's Register and steps to be taken to ensure that all visitors (all persons who is not Contractor's regular employee) register before entering the site. Sign to be provided to direct all visitors to Site Office.

8 Management meetings

There will be scheduled monthly site progress meetings, which all parties to Contract must attend. The meeting will be conducted by the Engineer. The Contractor will be required to submit his progress and forecast progress for the project during this meeting as well as his achievements of the preferential project goals. The Project Labour, Plants and equipments, all site incidents and events to be reported. The Community to be represented by Project Steering Committee (PSC) and the Community Liaison Officer (CLO).

9 Electronic payments

The Contractor to provide all his banking details when requested for the purpose of Electronic payments when as when necessary.

11 Daily records – See PSA 6 Page E-11.

12 Payment certificates

Monthly progress payment certificate shall be submitted to the Engineer's Representative on site on the last day of the calendar month in which the work was done to allow for reconciliation of all quantities, rates, extensions and additions in the certificate. Upon approval by the Engineer's Representative, the certificate shall be submitted in typed Form to the Engineer before or on the 7th of each month following the month of measurement, together with the required number of copies, for certification. It will be assumed that the Contractor has made adequate provision in the prices tendered for manufacture/supply, delivery, assembly and commissioning all necessary aids required to execute the contract. The certificates shall be according to the standard format included in the annexure to these specifications.

Where day works have been instructed by the Engineer, the Contractor shall submit the returns to the Engineer for signature and approval within twenty-four (24) hours of the end of the working day on which the work was executed. Day work returns shall be submitted on forms included in the annexure to the Specifications.

PROJECT SPECIFICATIONS : ANNEXURE**VARIATIONS AND ADDITIONS TO THE STANDARDISED SPECIFICATIONS AND PARTICULAR ADDITIONAL SPECIFICATIONS**

The following variations and additions to the SABS 1200 Standardised Specifications as referred to in the main Portion of this document apply to this Tender. An amendment to SABS 1200 is indicated by the prefix 'PS'. The letters and numbers following these prefixes respectively indicate the relevant specification and clause numbers in SABS 1200 to which it applies.

PSA GENERAL**PSA 2 INTERPRETATIONS****PSA 2.3 DEFINITIONS**

Add the following:

Where labour based construction methods are applied, the meanings of the following words will be applicable to this Contract:

- Task - a fixed quantify of work, activity or operation.
- Worker - any person working in an elementary occupation on a labour based construction project
- Daily task - a task that is required to be completed within a working day.
- Task remuneration (order) - remuneration as paid for a completed task or job (order).
- Task based work - work in which a worker is paid a fixed rate for performing a task
- Task rated worker - a worker paid on the basis of the number of tasks completed
- Time rated worker - a worker paid on the basis of the length of time worked
- Daily rate - the remuneration of a day's work.
- Daily wage - see daily rate
- Daily task remuneration - the remuneration for a completed daily task.
- Labour intensive construction - the economically efficient employment of as great a portion of labour as is technically feasible to produce as high a standard of construction as demanded by the specification and allowed by the funding available, thus the effective substitution of labour for equipment.

PSA 2.7 SPECIFICATION DRAWINGS

Add the following:

Any specification drawings that are part of this project issued as part of the tender documentation or after contract award will be the basis for this Contract. Where such specification drawings depict items and standard structures according to layouts and details differing from those shown in the Standardised Specifications, the layouts and details shown in the drawings shall be adopted.

PSA 3 MATERIALS**PSA 3.1 QUALITY**

Add the following:

All material used in the Works shall, where such mark has been awarded for a specific type of material, bear the SABS mark. Alternatively, the Contractor shall furnish the Engineer with certificates of compliance of materials, which bear the official mark of the appropriate standard.

Add the following subclauses:

PSA 3.3 SUPPLY OF MATERIALS

The Contractor will be responsible to supply all the materials necessary for the proper execution of the works. The Contractor shall also be fully responsible for quality of materials used and/or installed.

The quantities of material set out in the Schedule of Quantities were determined with the best intention of providing the most accurate amounts as possible from the calculations, design drawings and documentation. These quantities must be considered as approximate quantities only and the Contractor must verify the quantities from site measurements prior to ordering the material. No liability will be attached to the Employer or his representatives in respect of materials ordered incorrectly from the amounts or the specifications as stated in the Schedule of Quantities.

PSA 3.4 MATERIALS SUPPLIED BY THE EMPLOYER

Materials designated in the tender documents to be supplied by the Employer shall not be obtained from any other source than the Employer. The Contractor shall make timeous requisitions for any such material in writing to the Engineer. A proper method of requesting, receiving and stock control shall be maintained by the Contractor.

The onus shall be entirely on the Contractor to ensure that only material of an acceptable quality is accepted for building into the Works.

PSA 4 PLANT**PSA 4.2 CONTRACTOR'S OFFICES, STORES AND SERVICES**

Add the following:

“The Contractor’s offices, sheds, stores and designated camp site shall be kept neat at all times and also be fenced off properly. Personnel may not reside on the site without written approval from the Employer.

One suitable toilet per 10 workers shall be supplied in close proximity of the site (offices and the Works area). The toilets shall be maintained in a sanitary method at all times.

Add the following subclauses:

“PSA 4.3 RESTRICTION ON THE USE OF PLANT

This Contract is **not** a labour intensive construction project.

Should labour intensive construction not be a requirement, the Employer however requests the Contractor to engage in as much as possible labour intensive construction methods as possible, as the work is being done in an area where poverty is rife.

The principles of the Expanded Public Works Programme would be applicable to this Contract where labour intensive practises are followed (whether LIC is a requirement or not). The following applicable SANS documentation would inter alia apply as well:

- SANS 1921-5 Part 5 : Earthworks activities which are to be performed by hand
- SANS 1914-5 : Part 5 : Participation of targeted labour

The Contractor shall use only hand tools and equipment in the construction of those portions(s) of the Works that are required in terms of the Project Specifications to be constructed using labour intensive construction methods.

PSA 4.4 SILENCING OF PLANT

The applicable regulations pertaining to noise and hearing conservation as provided for under the Occupational Health and Safety Act (Act No 85 of 1993 or amended) shall be adhered to. The Contractor shall implement all necessary steps to comply with the act at no additional cost other than which is included in the tendered rates.

PSA 5 CONSTRUCTION

PSA 5.1 SETTING OUT THE WORKS

PSA 5.1.3 Setting Out of the Works

Add the following:

“The Contractor shall verify at his own cost the accuracy of the pegs or bench marks pointed out as being available for use to set out the Works. Any discrepancies must be reported to the Engineer in writing.

All pegs or bench marks which are damaged during the Contract which were not in the direct way of the construction of the Works shall be replaced by a competent surveyor (or Land Surveyor if the positions were determined by a Land Surveyor in the first place) at the Contractor’s own cost.

Where labour-intensive works are applicable, the Contractor shall also be responsible for the setting out of daily tasks.

PSA 5.4 PROTECTION OF OVERHEAD AND UNDERGROUND SERVICES

Add the following:

“The Contractor shall ascertain the presence and exact position of all known services before any work commences by suitable means. The measurement and payment for such work will be based on the effective location of such services by a competent Contractor with suitable equipment for

the relevant service. Damage to any known service must be repaired at the Contractor's own cost.

Unknown services or the suspicion of services must be clarified prior to any work being done in the vicinity. If the Contractor does not take appropriate measures to locate such services, any repair of damage shall be at the Contractor's cost.

Protection of services during construction must be done. It will be expected that all reasonable measures are implemented to safeguard any exposed service. Before any exposed service is closed, the Engineer must inspect the position and provide written approval for the service to be closed. The closure of any existing service must at least be of equal (or better) standard than what the original cover was.

Alterations and repairs to existing services must be done to a standard that is at least equal or better than the original. The relevant authority for each service must be informed of all activities regarding activity to such a service and ultimate written acceptance of any work done to such a service must be obtained from the specific authority by the Contractor.

The Employer will not accept any responsibility or liability for damage done to any service whether it is a known or an unknown service.

PSA 5.7 SAFETY

Add the following:

The Contractor shall comply with all the latest regulations regarding the health and safety aspects on the Site of Works. The following aspects are highlighted, but does not limit the Contractor's obligations in any way:

- Provide the Employees on site with all the necessary safety materials, clothing, masks and equipment to ensure at least full compliance with the provisions of the latest amendment of the Occupational Health and Safety Act (Act 85 of 1993). Appropriate and effective measures must be instituted on site to ensure proper use of such equipment and clothing
- Provide, erect and maintain all barricades, safety signage and other measures to ensure safety of the Employees as well as the general public
- Keep all relevant and required safety measure records available on site at all times
- Ensure that subcontractors adhere to the requirements regarding health and safety at all times.

Add the following subclause:

PSA 5.9 SITE MEETINGS

The Contractor shall make available a suitable venue on site for the purposes of holding regular site meetings. These site meetings will generally be held once a month and will be attended by the Employer (and his representatives). These site meetings will be held to minute general progress, quality of work, problems experienced, claims, payments, safety, variations, etc and will specifically not address day-to-day matters.

The Contractor shall ensure that an authorised person with sufficient authority (usually the Site Agent) is available at each meeting so that meaningful discussions and resolutions can take place.

PSA TESTING

PSA 7.1 PRINCIPLES

PSA 7.1.1 Checking

Add the following:

6All test results obtained by the Contractor in the course of his process control of the Works shall be submitted to the Engineer or his Representative prior to requesting inspection of the relevant portions of the Works. Any request for inspection shall be submitted on the prescribed forms or the site request book.

The Contractor shall make suitable arrangements for process control prior to commencement with the Works. Should he intend using site personnel for this purpose he shall ensure that suitably trained and competent personnel take charge of the necessary test work, and that the necessary equipment is at their disposal prior to commencement of the Works. Failure to comply with these requirements shall be just cause for the Engineer to order suspension of the Works without additional remuneration in terms of Clause 39 of the Conditions of Contract, or for him to recommend determination to the Employer in terms of Clause 55 thereof.

The Contractor shall deliver to the Engineer, for his consideration, quality assurance programmes (as obtained from all the Contractor's proposed suppliers) prior to the Contractor's appointment of any suppliers.

Add the following subclause:

PSA 7. SITE REQUESTS AND SITE INSTRUCTIONS

A site diary, which will be supplied by the Contractor, must be filled in on a daily basis by the Contractor and submitted to the Engineer on a monthly basis.

A site request book, which will be supplied by the Contractor, must be used to register any requests and enquiries that the Contractor may have. This book will be used by the Contractor and Engineer to ensure smooth running of the Contract by having an accurate log of all requests on site.

A site instruction book, which will be supplied by the Engineer, shall be used to issue any variations or confirmation of actions taken on site. Each instruction will have its own unique number and be signed by the Engineer and Contractor. The original instruction will be issued to the Contractor and copies will be kept by the Engineer.

PSA 8 MEASUREMENT AND PAYMENT

Add the following:

6Monthly Progress Payment Certificates shall be submitted to the Engineer's Representative on Site in a neat typed form in accordance with the prescribed format, not later than the 25th of each month (or on the last working day prior to this date) in order to allow for checking and reconciliation of all quantities, rates, extensions and additions in the certificate. Each progress payment certificate shall include work executed or reasonably expected to be executed up to the 30th day of the specific month. The Engineer's Representative shall have a period of five (5) calendar days to review the draft certificate in collaboration with the Contractor where after it will be certified and submitted to the Employer for payment. The Contractor shall be responsible to supply four (4) additional copies of the agreed upon certificate. All quantity calculations and certificates submitted by the Contractor for checking shall be in accordance with the standard formats that are included in the Schedule of Quantities or an agreed alternative format.

Where dayworks have been instructed by the Engineer, the Contractor shall submit the returns to the Engineer for signature and approval within forty-eight (48) hours of the end of the working day on which the work was executed. Daywork returns shall be submitted on forms following the standard format for this purpose. Failure to comply with the terms of this clause could result in non-payment for such dayworks.

Commissioning forms must be attached to all invoices and submitted to the engineer for the approval of the payment certificates.

The tax invoice submitted with the certificate shall be dated the 1st of the month following the period certified. All costs for the preparation and submission of progress certificates shall be borne by the Contractor.

The submission of each monthly payment certificate shall be accompanied by a completed Progress Report. This report is a pre-requisite for the approval of each monthly payment certificate and shall be completed in full to illustrate all work completed the preceding month, as well as work in progress at the time of submission of the report. Labour intensive activities must be included in this report and must reflect financial as well as person days worked for each category of Employment and section of community separately for male and female Employees.

PSA 8.1 MEASUREMENT

PSA 8.1.2 Preliminary and General Item or Section

PSA 8.1.2.1 Contents

Replace the last sentence in subclause 8.1.2.1 (b) with:

“Separate items will be scheduled to cover the Fixed, Value-related and Time-related components of the Contractor’s Preliminary and General costs.”

PSA 8.1.2.2 Tendered sums

Replace the subclause with:

"Unless specific provision is made in the Specifications and/or the Schedule of Quantities for separate compensation for detailed site establishment items, the Contractor's tendered sums under items PSA 8.3 and PSA 8.4 shall collectively cover all charges for :

- Risks, costs and obligations in terms of the Conditions of Contract and of this standardised specification
- Head-office and site overheads and supervision
- Profit and financing costs
- Expenses of a general nature not specifically related to any item or items of the permanent or temporary work
- Providing such facilities on Site as may be required by the Contractor for the proper performance of the Contract and for its personnel, which includes but does not limit it to, providing offices, storage facilities, workshops, ablutions, for site services such as water, electricity, sewage and rubbish disposal, access roads and all other facilities required, as well as for the maintenance and removal on completion of the Works of these facilities and for the cleaning-up of the site of the Contractor’s establishment and reinstatement to not less than its original condition
- Providing one (1) name board as specified in SABS 1200 AB :Engineer’s Office
- Providing the facilities for the Engineer and his staff as specified in the Contract and their removal from the Site on completion of the Contract."

PSA 8.2 PAYMENT

PSA 8.2.1 Fixed-Charge and Value-Related Items

Replace the subclause with:

PSA 8.2.1.1 Fixed Charge Items

"Payment of fixed charges in respect of item 8.3.1 will be made as follows :

- (a) Eighty Percent (80%) of the sum tendered will be paid when the facilities have been provided and approved ; and
- (b) The remaining twenty percent (20%) will be paid when the Works have been completed, the facilities have been removed and the site of the Contractor's establishment has been cleared and cleaned to the satisfaction of the Engineer.

No adjustment will be made to the sum tendered in respect of item 8.3.1 should the value of the Works finally executed or the Time for Completion vary in any way from that specified in the Tender.

The tendered sum shall include the implementation, monitoring, management, reporting, etc of this project specific Construction Environmental Management Plan if it is included in the project specifications.

PSA 8.2.1.2 Value Related Items

Payment for the sum tendered under item 8.3.2 will be made in three separate instalments as follows:

- (a) The first instalment comprising of forty percent (40%) of the sum, will be paid when the Contractor has fulfilled all its obligations to date under this Specification, the General Conditions of Contract and the Special Conditions of Contract, and when the value of work certified for payment, excluding materials on Site and payments for preliminary and general items, is equal to not less than five percent (5%) of the total value of the work listed in the Schedule of Quantities.
- (b) The second instalment comprising of forty percent (40%) of the sum, will be made when the amount certified for payment, including retention monies but excluding this second instalment, exceeds fifty percent (50%) of the Tender Sum.
- (c) The final payment, which is twenty percent (20%) of the sum, will be made when the Works have been certified as completed and the Contractor has fulfilled all its obligations to date under this Specification, the General Conditions of Contract and the Special Conditions of Contract.

Should the value of the measured work finally completed be more or less than the Tender Amount, the sum tendered under item 8.3.2 will be adjusted up or down in relation to the Tender Amount, and this adjustment will be applied to the third instalment. The amounts to compare with will be the Tender Amount and the value of the completed Works excluding the amount tendered for under item 8.3.2

The tendered sum shall include the implementation, monitoring, management, reporting, etc of this project specific Construction Environmental Management Plan if it is included in the project specifications.

PSA 8.2.2 Time-related items

Replace the contents of subclause 8.2.2 with::

Subject to the provisions of subclauses 8.2.3 and 8.2.4, payment under item 8.4.1 (time-related item) will be made monthly in equal amounts, calculated by dividing the sum tendered for the item by the tendered contract period in months. Provided always that the total of the monthly amounts calculated for the item in this manner is not out of proportion with the value of the progress of the Works as a whole.

The tendered sum shall include the implementation, monitoring, management, reporting, etc of this project specific Construction Environmental Management Plan if it is included in the project specifications.

PSA 8.3 SCHEDULED FIXED-CHARGE AND VALUE-RELATED ITEMS

Replace the contents of subclause 8.3.1 with:

"PSA 8.3.1 Fixed Preliminary and General Charges - Unit : Sum

The sums tendered shall include full compensation for all fixed charge preliminary and general charges as described in Subclause PSA 8.1.2.2. Payment will be made as described in Subclause PSA 8.2.1.1."

PSA 8.3.2 Value-related Preliminary and General Charges - Unit : Sum

The sums tendered shall include full compensation for all value-related preliminary and general charges as described in subclause PSA 8.1.2.2. Payment will be made as described in subclause PSA 8.2.1.2."

PSA 8.4 SCHEDULED TIME-RELATED ITEMS

Replace the contents of subclause 8.4 with:

"PSA 8.4.1 Time-related preliminary and general charges - Unit : Sum

The sum tendered shall include full compensation for all time-related preliminary and general charges as described in subclause PSA 8.1.2.2. Payment will be made as described in subclause PSA 8.2.2."

PSA 8.5 SUMS STATED PROVISIONALLY BY ENGINEER

Replace the contents of subclause 8.5 with:

PSA 8.5.1 Works Executed by the Contractor

The Contractor will be reimbursed in substitution of the Provisional Sums if allowed for in the Schedule of Quantities for work to be executed by the Contractor, in the amounts determined in accordance with the provisions of Clause 45 of the Conditions of Contract.

PSA 8.5.2 Works Executed by Nominated Subcontractors

- a) Work to be executed by a Nominated Subcontractor - Unit : Prov Sum
- b) Overheads, charges and profit on item a) above - Unit : % or Sum

Sub-items a) and b) will be provided in the Schedule of Quantities for each different Nominated Subcontract included in the Contract.

The Contractor shall be reimbursed under sub-item a) for the respective Provisional Sums if allowed for in the Schedule of Quantities, and the amounts actually paid or payable by the

Contractor to the respective Nominated Subcontractors, in accordance with the provisions of Clause 45 of the Conditions of Contract.

If the Contractor has failed to insert a percentage or Sum (as applicable) for sub-item b) in its tender, or where no provision was made in the Tender Documents for Tenderers to make any such entry, the Contractor will (in accordance with the provisions of Sub-clause 48.1.2.1.1) be paid an amount equal to seven and one half percent (7.5%) of the amount actually certified by the Engineer for payment under sub-item a).

The percentage or sum (as applicable) paid under sub-item b) as aforesaid, shall be deemed to include for full and final compensation to the Contractor for all costs as may be incurred and all charges and profits associated with the engagement, supervision, administration and management of the Nominated Subcontractor and in fulfilling its obligations under the contract as the principal Contractor."

PSA 8.6 PRIME COST ITEMS

Replace the contents of subclause 8.6 with:

"PSA 8.6 PRIME COST SUMS

a) Description of Item to which Prime Cost Sum Applies - Unit : PC Sum

b) Charge Required by Contractor on Sub-item a) above - Unit : %

Sub-items a) and b) will be provided in the Schedule of Quantities for each different item to which a Prime Cost Sum applies.

The Contractor shall be reimbursed under sub-item(s) (a) for the respective Prime Cost Sums included in the Contract, the actual price(s) paid or payable by him in respect of the goods, materials or services supplied, and including any charges for the Contractor's labour, profit, carriage, establishment or other charges related to such goods, services or materials.

The Contractor shall be paid under sub-item b) the respective percentage as stated by the Contractor in its Tender, of the amount certified by the Engineer for payment under the related sub-item a). The percentages tendered by the Contractor for each respective sub-item b) included in the Schedule of Quantities shall be for full and final compensation to the Contractor in respect of any charge by the Contractor for labour, carriage profit, establishment and for any other charges related to the goods, services or materials supplied under the related sub-item a).ô

PSC SITE CLEARANCE**PSC 1 SCOPE**

Add the following:

ØWhere labour intensive construction methods are applied, the maximum boulder size for removal under this specification will be 50kg. Boulders between 50kg and 0.15 m³ (i.e. approx.. 450kg) will be deemed to be removable by other methods under this specification.Ø

PSC 3 MATERIALS**PSC 3.1 DISPOSAL OF MATERIAL**

Add the following:

ØMaterials arising from clearing and grubbing shall be disposed of as may be ordered by the Engineer. Trees and stumps necessarily removed shall not be burnt unless authorised by the Engineer, but shall be cut and stacked at areas designated by the Engineer.

The Contractor shall locate and obtain his own dumping site for the disposal of material. The Contractor shall comply with the requirements of any by-law, statute, ordinance, regulation or local authority requirements. The Employer will not accept any responsibility or liability in this regard.

No overhaul will be payable on the disposal of material arising from clearing and grubbing.Ø

PSC 5 CONSTRUCTION

Add the following:

ØWhere labour intensive methods are applied, the Contractor shall be expected to adhere to at least the following:

- Hand tools shall be utilised
- The use of motorised vehicles (trucks, etc) will only be permitted in cases where the distance of the cleared material is to be transported further than 150m. Provided always that such material must be loaded and off-loaded by labour
- The use of pneumatic hand held breaking equipment will be allowed to break down hard material to an acceptable size suitable for labour intensive construction methods.Ø

PSC5.1 AREAS TO BE CLEARED AND GRUBBED

Add the following:

ØThe areas to be cleared and grubbed will be indicated by the Engineer. Should a portion or the whole of the site have been cleared and grubbed by nature or by others prior to the start of construction, then no clearing and grubbing will be ordered or payment made with respect to the applicable portion of the site.

Where not specifically stated, pipeline routes shall be cleared to a distance of 1.5m on both sides of the pipeline centre line. Route markers or bench marks may not be disturbed by these actions.

PSC 5.2 CUTTING OF TREES

PSC 5.2.3 Preservation of Trees

Add the following:

The penalty in respect of every individual tree and shrub designated as a tree or shrub to be preserved that is damaged or removed unnecessarily by the Contractor, shall be R1 000. Trees that fall within areas upon which the Works are to be constructed or within areas that the Contractor must occupy for the proper construction of the Works will not be designated for preservation.

PSDB EARTHWORKS (PIPE TRENCHES)**PSDB 2 INTERPRETATIONS****PSDB 2.1 DEFINITIONS**

Add the following:

Commercial source : A source of material which is located and/or provided by the Contractor. It may include a borrow pit, quarry or any form of source for which the Contractor takes sole responsibility or purchases from.

Designated borrow pit : A borrow pit which the Employer provides for use on the Contract.

Fill : An embankment or terrace which is constructed from of material obtained from excavations or borrowpits and includes the earthworks up to the underside of the selected subgrade level.

Roadbed : The natural in-situ material on which any fill or pavement layers are constructed. This layer usually gets compacted prior to any works being constructed on top of it.

PSDB 3 MATERIALS**PSDB 3.1 CLASSES OF EXCAVATION**

Replace the subclause with:

“PSDB 3.1.1 Classifying for Excavation by Machine

Except that material will not be classified as boulder excavation (Class A or Class B), the excavation of material will, for purposes of measurement and payment, be classified as specified in subclause 3.1 of SABS 1200 D.

PSDB 3.1.2 Method of Classifying for Excavation by Labour Intensive Methods

Where it is specified or intended that the excavation of soft materials only shall be executed using Labour Intensive Construction Methods, the classification of the soft material to be so excavated will be based on the criteria given in PSDB 3.1.2 and the Contractor will be required to excavate all such soft material by labour intensive methods. However, when the material is classified as for machine excavation to be "intermediate" and is therefore no longer required to be excavated by labour intensive methods, it will be re-classified based on the criteria for machine excavation (ie SABS 1200 D subclause 3.1). Thus a material classified as "intermediate" for labour intensive construction may in terms of be deemed to be "soft" for machine excavation and will be measured and paid as such under such circumstances).

The classification of material other than "soft excavatability" shall be agreed upon before excavation may commence. The Contractor shall immediately inform the Engineer if and when the nature of the material being excavated changes to such an extent that a new classification is warranted for further excavation. Failure on the part of the Contractor to advise the Engineer in good time shall entitle the Engineer to reclassify, at his discretion, such excavated material.

PSDB 3.1.3 Classifying for Excavation by Labour Intensive Methods

The excavation of material will, in the case of work which is to be executed utilising Labour Intensive Construction Methods, be classified as follows for purposes of measurement and payment. The method of measurement (either Method 1 or Method 2 must be determined at the onset of the project and cannot be changed during project implementation.

Method 1**(a) Soft excavation****(i) Class 1**

Soft excavation Class 1 shall be excavation, including the excavation of boulders not exceeding 0.04 m^3 , in material that can be excavated and removed from the excavation by an average able bodied labourer or group of such labourers, at a rate of not less than 2.5 m^3 per 9.25 hour working day per labourer, using only a suitable shovel (without the use of a pick or other hand tool). The average volume/task can be accepted as 3.0 m^3 per labourer per day.

(ii) Class 2

Soft excavation Class 2 shall be excavation, including the excavation of boulders not exceeding 0.04 m^3 , (excluding soft excavation Class 1) in material that can be excavated and removed from the excavation by an average able bodied labourer or group of such labourers, at a rate of not less than 2.0 m^3 and not more than 2.0 m^3 per 9.25 hour working day per labourer, with the aid of picks or any other hand-swung tool and shovels. The average volume/task can be accepted as 2.5 m^3 per labourer per day.

(ii) Class 3

Soft excavation Class 3 shall be excavation, including the excavation of boulders not exceeding 0.04 m³ (excluding soft excavation Class 2) in material that can be excavated and removed from the excavation by an average able bodied labourer or group of such labourers, at a rate of not less than 1 m³ and not more than 2.5 m³ per 9.25 hour working day per labourer, with difficulty with the aid of picks or any other hand-swung tool and shovels. The average volume/task can be accepted as 2.0 m³ per labourer per day.

(b) Intermediate excavation

Intermediate excavation shall be excavation (excluding soft excavation) in material which requires ripping or loosening by mechanical means (eg assistance with pneumatic tools) prior to removal of the loosened material utilising the methods as described in PSDB3.1.3(a) above.

(c) Hard rock excavation

Hard rock excavation shall be excavation of boulders not yet decomposed exceeding 0.4 m³ and excavation in solid rock occurring in bulk or in banks or ledges, which requires loosening or breaking up by drilling, wedging, splitting or blasting or by other approved quarrying methods, prior to being excavated and removed from the excavation utilising picks, "crowbars", shovels and similar hand tools.

Such excavation generally includes materials such as formations of unweathered rock that can be removed only after blasting.

Method 2

The table below provides an alternative method for classification.

Materials Classification	Consistency		Number of DCP blows to Penetrate 100mm **	
	Granular soil	Cohesive soil	Granular soil	Cohesive soil
Soft Class 1	Very loose/loose	Very soft/soft	0 - 2	0 - 1
Soft Class 2	Loose/medium dense	Soft/stiff	2 - 6	1 - 5
Soft Class 3	Dense	Stiff/very stiff	7 - 15	6 - 8
Intermediate	Very dense	Very stiff	> 15	> 8
Rock	-	-	-	-
** Only applicable to materials comprising of not more than 10% gravel of size less than 10mm and materials containing no cobbles or isolated small boulders.				

Consistency of materials can be determined in accordance to the table below.

Granular Materials		Cohesive Materials	
Consistency	Description	Consistency	Description
Very loose	Crumbles very easily when scraped with a geological pick	Very soft	Geological pick head can easily be pushed in as far as the shaft of the handle
Loose	Small resistance to penetration by sharp end of a geological pick	Soft	Easily indented by thumb; sharp end of a geological pick can be pushed in 30 to 40 mm; can be moulded by fingers with some pressure
Medium dense	Considerable resistance to penetration by sharp end of a geological pick	Firm	Indented by thumb with effort; sharp end of a geological pick can be pushed in up to 10 mm; very difficult to mould with fingers; can just be penetrated with an ordinary hand spade
Dense	Very high resistance to penetration by sharp end of a geological pick; requires many blows for excavation	Stiff	Can be indented by thumb nail; slight indentation produced by pushing geological pick point into soil; cannot be moulded by fingers
Very dense	High resistance to repeated blows of a geological pick	Very stiff	Indented by thumb nail with difficulty; slight indentation produced by blow of a geological pick point

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PSDB 3.5 BACKFILL MATERIAL

Add the following:

(c) Cement Stabilised Backfilling

Backfilling shall be stabilised with 5% cement were ordered. The aggregate shall consist of approved soil or gravel containing stones not larger than 38 mm and a plasticity index not exceeding 10.

The soil or gravel shall be mixed with 5% cement and shall be compacted in layers of thickness not exceeding 100 mm to at least 90% modified AASHTO density.

(d) Soilcrete Backfilling

The aggregate for soilcrete shall be mixed with 5% cement and shall consist of approved soil or gravel containing stones not larger than 38 mm and with a plasticity index not exceeding 10.

The soil or gravel shall be mixed in a concrete mixer with the cement and enough water to acquire a consistency that allows the mixture to be placed with vibrators to fill all voids between the pipe and the sides of the trench. Shuttering must be used where necessary."

PSDB 5 CONSTRUCTION**PSDB 5.1 PRECAUTIONS****PSDB 5.1.3 Accommodation of Traffic and Access to Properties**

Add the following:

ØTraffic must be accommodated along the lengths of any pipelines which fall within or adjacent to any road reserve.

The Contractor shall include in his rates for accommodating traffic during the duration of the Contract, which shall cover all his obligations in this regard, including but not limited to temporary barricades; the erection and re-erection of existing and/or temporary traffic signs; lights and flagmen for the guarding and protection of the Works. The Contractor shall be responsible for making all necessary arrangements with the applicable traffic authorities

If crossing of the road in half widths is allowed, the road shall remain continuously open to traffic. The Contractor shall make provision to ensure the safe passage of traffic using this public road whilst installing the pipe through the road, and to ensure that any disruption to public is kept to a minimum providing safe detours when so instructed by the Engineer. Each half width shall be completed in one day. No open trenches will be allowed overnight. If the half width is not completed by 16:00 the trench shall be backfilled, in which case the Contractor shall re-excavate the trench at a later stage to complete the work at his own expense. All detours and signs shall

be erected and maintained in accordance with the latest issue of Road Signs Note 13 as issued by CSRA and CUTA.

PSDB 5.1.4 Existing Services That Intersect or Adjoin Trenches

Add the following:

Where any existing service occurs within the specified trench excavation, and the presence of such service is known before being uncovered, then the protection of the service will be scheduled and measured as provided for in Clause 8.3.5 of 1200DB. Only known services (as defined in Clause 5.4 of 1200A) shall be measured for payment.

Where an unknown existing service is damaged during construction, the Contractor shall undertake measures for the repair of such service. Such repair will either be measured and paid as dayworks or alternatively as a contractual variation in terms of Clause 37 of the General Conditions of Contract.

No construction activity which may affect the integrity of telephone or electrical poles or stays may be carried out without the prior written approval of the Engineer, which approval shall only be given subject to the acceptance of a modus operandi that will ensure the integrity of such structures during construction.

PSDB 5.2 MINIMUM BASE WIDTHS

Add the following:

The minimum base width of trench for pipes of external diameter less than 125 mm but larger than 70 mm laid at a depth of 1,5 m or less shall be 550 mm.

The minimum base width of trenches for pipes of external diameter less than 70 mm laid at a depth of 1,0 m or less shall be 400 mm.

The minimum base width of trenches where labour-based excavation is concerned shall be at least 150 mm on either side of the pipe's outer diameter to allow proper compaction of backfilling materials.

Where two pipes are placed in one trench, their side walls shall be 300 mm apart and the specified side allowance shall still be applicable.

PSDB 5.4 EXCAVATION

Add the following:

Trenches shall be of such a depth that the minimum cover over the pipes shall be 700 mm except at road crossings (or trafficked areas) where the minimum cover shall be 1 000 mm.

PSDB 5.5 TRENCH BOTTOMS

Add the following:

Should the Contractor remove more material than is required to secure the proper grade of the pipeline, the Contractor must, at his own cost, backfill the excess excavation with approved selected material or concrete as directed by the Engineer in each particular case.

PSDB 5.6 BACKFILLING**PSDB 5.6.3 Disposal of Soft Excavation Material**

Replace the contents of this subclause with:

All surplus or unsuitable materials arising from excavation shall be spoiled and spread within or adjacent to the Site of the Works or be spoilt at a spoil site established by Contractor. All haul shall be Freehaul (no payment made for haulage).

PSDB 5.6.8 Transport for Earthworks for Trenches

Replace the contents of this subclause with:

No overhaul will be payable on earthworks for pipe trenches, other than specified or approved by the Engineer.

PSDB 5.7 COMPACTION**PSDB 5.7.2 Areas Subject to Traffic Loads**

Add the following:

The requirements of Clause 5.7.2 shall apply only to pipes and sleeves crossing streets or paved areas and pipes running parallel to the road as described below.

All service trenches running parallel to the road of which the roadside edge of the trench is located less than 1,4 m away from the edge of the travelled way, will be subject to the requirements for the above mentioned clause.

The measurement and payment will apply to the full trench width. Pipes and sleeves crossing streets or paved areas will be measured and paid for to a length equal to the width of road or length of pavement crossed plus 1,4 m either side of the travelled edges.

Compaction of other pipe trenches running parallel to the roadway shall be considered areas subject to traffic loads only where instructed by the Engineer in writing. The volume will be computed from the minimum base width determined in accordance with Sub-Clause 5.2 and the depth from the top of the backfill to the top of the bedding.

PSDB 8 MEASUREMENT AND PAYMENT

PSDB 8.1 BASIC PRINCIPLES

Add the following:

“PSA 8.1.5 Works Executed Utilising Labour Intensive Construction Methods

Separate items will be provided for works covered by this Specification which are to be executed by Labour Intensive Construction methods and for works for which the utilisation of such methods is not required.

The trench depth increments referred to in Clause 8.1.2(b) shall be reduced to 0.5m intervals.

Trenches shall be measured volumetrically, irrespective of length.ô

PSDB 8.3 SCHEDULED ITEMS**PSDB 8.3.2 Excavation**

- (a) Excavate in all materials, for trenches, backfill compact and dispose of surplus material

Replace "of 1,0 m" in the first sentence of subclause 8.3.2(a) with as specified in the Schedule of Quantities

Add the following:

For Works Executed Utilising Labour Intensive Construction Methods:

The following additional items may be used in the Schedule of Quantities to make provision for the Labour Intensive Construction Methods.

Excavate, in materials as classified in the categories below for trenches, including backfill, compacting and disposing of surplus material utilising Labour Intensive Construction methods up to 1,5 m in depth. Deeper trenches will require stepped trenching and will be measured separately if needed. This is **not** an extra over amount and must include for all compensation that the Contractor requires for the trenching activity.

Labour intensive excavation of trenches, backfill, compact and dispose of:

- (1) Soft Excavation Class 1 by LIC Methods ñ Unit m³

- (2) Soft excavation Class 2 by LIC Methods ñ Unit m³

- (3) Soft excavation Class 3 by LIC Methods ñ Unit m³

- (4) Intermediate excavation by LIC Methods ñ Unit m³

- (5) Hard rock excavation by LIC Methods ñ Unit m³

Extra over the above for:

- (6) Backfill, compact and neaten by means of LIC Methods ñ Unit m³

- (7) Disposal of surplus material by means of LIC Methods within 50 m from the source of spoil material using wheel barrows Unit - m³

- (8) Disposal of surplus material by means of LIC Methods within 50 m to 100 m from the source of spoil material using wheel barrows Unit - m³

- (9) Disposal of surplus material by means of LIC Methods within 100 m to 150 m from the source of spoil material using wheel barrows Unit - m³

Backfill shall be in 100 mm thick layers compacted to 90% Modified AASHTO.

- (b) Extra over item (a) above for:

Add the following:

"(3) Hand excavation where ordered by the Engineer in:

- (a) Soft material - Unit : m³
- (b) Intermediate material - Unit : m³
- (c) Hard material - Unit : m³

The unit of measurement shall be the cubic metre of material, measured in place according to the authorised dimensions, which was excavated by hand on the specific prior written instructions of the Engineer ; provided always that the Engineer's said instruction shall have stated that measurement and payment for such hand excavation will be in accordance with this item.

The tendered rate shall include full compensation for the additional cost, effort and time resulting from excavating in the respective materials using hand methods only.

The Engineer shall not be obliged to authorise payment under this item in respect of any hand excavation carried out (whether ordered in writing or otherwise), which hand excavation was in any case necessary to achieve compliance by the Contractor of his obligations under the Contract to :

- (i) utilise construction appropriate to the nature of the specific parts of the Works; and/or
- (ii) protect existing structures and/or services ; and/or
- (iii) comply with all prevailing legislation and regulations.

(4) Backfill stabilised with 5% cement where directed by the Engineer - Unit : m³

The unit of measurement shall be the cubic metre of backfill material, measured in place after compaction according to the authorised dimensions, which was stabilised on the Engineer's instructions in accordance with Sub-clause PSDB 3.5(c).

The tendered rate shall include full compensation for supplying the cement and for selecting, mixing, backfilling and compacting the stabilised material to 90% of modified AASHTO density.

(5) Soilcrete backfill where directed by the Engineer - Unit : m³

The unit of measurement shall be the cubic metre of soilcrete placed on the Engineer's instructions in accordance with Sub-clause PSDB 3.5(d), measured in place according to the authorised dimensions.

The tendered rate shall include full compensation for supplying the cement and for selecting, mixing and placing the soilcrete as well as for the cost of shuttering if required."

Add the following subitem:

"(d) Excavate in all materials for stormwater inlet and outlet structures and for manholes, catchpits, valve chambers etc, irrespective of depth and backfill around structures : - Unit : m³

The unit of measurement shall be the cubic metre of material excavated, measured in place according to the authorised dimensions, and excluding the volume of material excavated and paid for under sub-item (a).

The tendered rate shall include for the costs of excavating in all materials, backfilling, compacting, trimming and tidying of the final surface around the structure, disposing of surplus and unsuitable materials and where applicable, selecting and keeping separate, excavated material suitable for use as backfill.

Add the following:

"PSDB 8.3.8 Stone Bedding Unit - m³

A bedding crushed stone wrapped in a geotextile blanket shall be measured per linear metre along the centreline of the trench. The provision, operation and removal of (a) de-watering pump where authorised by the Engineer will be measured as dayworks under the appropriate item in Schedule2. The items measured for payment shall be:

(1) 19 mm Crushed Stone ñ Unit m³

(2) Non-woven continuous filament polyester fabric (0.21 kg/sq m) ñ Unit m²⁶

PSDK**GABIONS AND PITCHING**

PSDK 5 CONSTRUCTION**PSDK 5.3 PITCHING****PSDK 5.3.3 Grouted Pitching**

Replace the words "(see table 4)" in the third paragraph with "(see table 2)"

PSG CONCRETE (STRUCTURAL)**PSG 3 MATERIALS****PSG 3.2 CEMENT****PSG 3.2.2 Alternative types of cement**

Replace the contents of the subclause with:

"Only ordinary Portland cement shall be used.

For the use any other type of cement, the Contractor shall obtain written approval from the Engineer."

PSG 3.2.3 Storage of cement

Add the following:

"Cement shall not be stored for longer than 3 months without the Engineer's permission."

PSG 4 PLANT**PSG 4.1 GENERAL**

Add the following subclause:

"PSG 4.1.1 Minimum Plant

The Contractor shall at least have the following plant available and in sound working order when mixing and placing concrete for any major concrete placing operation:

- (a) Two concrete mixers, each of sufficient capacity to complete a section between horizontal or vertical construction joints within 4 hours and without interruption.
- (b) Two weigh-batchers to supply the mixers.
- (c) Three concrete vibrators, at least one of which shall be powered by an internal combustion engine.
- (d) One air compressor.
- (e) Suitable and adequate plant to transport and raise concrete and other material and equipment from ground level to the top of the structure at all stages of construction.
- (f) Elevated storage tanks of adequate capacity to ensure that sufficient water will be available.

If the plant used for placing concrete for the structure is electrically powered, the Contractor shall also provide some other non-electrically powered standby means for placing concrete at an adequate rate in the event of a power failure.ô

PSG 4.5 FORMWORK**PSG 4.5.1 Design**

Add the following:

"All formwork or scaffolding required for any part of the Works shall be designed by the Contractor. Before commencing with the erection of any formwork or scaffolding, the Contractor shall submit the methods he proposes to use to the Engineer for approval. The Engineer has the authority to order alterations to the design or the sizes of any part of the formwork or scaffolding. The Contractor shall check the safety and suitability of all such alterations. The fact that the Engineer has approved or altered any part of the formwork or scaffolding shall not be construed as relieving the Contractor of his responsibility with regard to the strength and stability of the formwork or scaffolding."

PSG 4.5.2 Finishing

Add the following:

df not specified otherwise, concrete against which earth will be backfilled shall be classified as rough. The change from rough to smooth concrete finish shall be done at least 250 mm below the finished floor or ground level. All exposed concrete surfaces shall be classified as smooth.

PSG 4.5.3 Ties

Add the following:

δNo plugs, bolts, ties or clamps of any description used to hold the formwork will be allowed to project into or through the concrete unless approved by the Engineer.

Only approved tie-rods consisting of solid rods (that remain embedded in the concrete) and with removable ends shall be used to hold the formwork of the walls. The removable tie-rod ends shall facilitate removal without damage to the concrete, and no permanently embedded parts of such tie-rods shall have less than 50 mm of cover to the finished concrete surface.

The cavities left in the concrete when the tie-rod end cones are removed shall be soundly caulked with a cement mortar to which an approved shrinkage-reducing agent has been added, and shall be neatly finished to a smooth surface uniform with that of the surrounding concrete.

The cost of supplying special tie-rods as well as the filling of cavities left by the tie-rod cones shall be included in the rates tendered for formwork under the appropriate pay items.

Formwork may never be secured to reinforcing bars."

PSG 5 CONSTRUCTION**PSG 5.1 REINFORCEMENT****PSG 5.1.2 Fixing**

Add the following:

"The Engineer must inspect the reinforcing after it has been fixed in place, the formwork has been cleaned, cover blocks have been positioned, and before concreting commences.

Welding of reinforcing steel will not be permitted."

PSG 5.2 FORMWORK**PSG 5.2.1 Classification of finishes****2 Special**

Add the following:

"Special finish is obtained by first giving the surface a smooth finish with the joints between formwork panels forming an approved regular pattern suitable for the appearance of the structure. All projections shall then be removed, irregularities repaired and the surface rubbed or otherwise treated until it is smooth with an even texture, appearance and colour.

If the finish of exposed surfaces does not comply with the requirements for uniformity of the texture and appearance, the Contractor shall, when instructed to do so by the Engineer, rub down the exposed surfaces of the entire structure or any part thereof as specified below, entirely at his own cost. All repairs must be completed before the rubbing commences.

The surface shall be saturated with water for at least one hour. The initial rubbing of the face shall be carried out with a medium coarse carborundum stone together with a small amount of mortar of the same cement/sand ratio as the concrete being repaired. Rubbing shall continue until all form marks, projections and irregularities have been removed and a uniform surface has been obtained. The paste produced by the rubbing shall be kept in place. The final rubbing shall be carried out with a fine carborundum stone and water. This rubbing shall continue until the entire surface has a smooth, even texture and is uniform in colour. The surface shall subsequently be washed with a brush to remove surplus paste and powder."

Add the following subclauses:

"PSG 5.6 CONCRETE ANCHOR AND THRUST BLOCKS

At tees, bends, terminal valves, end caps, and where otherwise directed, anchor/thrust blocks shall be constructed to dimensions ordered, shown on the Drawings or agreed to by the Engineer. Unless otherwise specified, anchor/thrust blocks and pedestals shall be constructed of Class 15/19 concrete.

The concrete shall be well punned round the pipe and, if in trenches, against the undisturbed faces and bottom of the trench. Backfilling behind or under thrust faces will not be permitted. Excess excavation shall be replaced with the prescribed mix concrete given above for anchor/thrust blocks at the Contractor's expense, unless an item is scheduled to cover payment of overbreak. Care shall be taken to leave the joints accessible. No anchor/thrust blocks and pedestals shall be concreted until the approval of the Engineer has been obtained.

Should the Contractor offer an alternative method of coupling involving flexible joints, he shall design suitable thrust and anchor blocks in order to prevent movement of the pipeline under operating and test conditions. The working and test pressure to be used by the Contractor for the calculation of anchor and thrust blocks shall be in accordance with the design information that is issued together with the tender. The earth bearing pressure to be used for the calculation of anchor and thrust blocks shall be based on

field tests. The factor of safety to be used in calculating the above shall be 2.5.

PSG 5.7 GROUTING

Formwork for grouting shall comply with the applicable requirements of Sub-clause 5.2 of SABS 1200 G. Forms shall be caulked where necessary. Adequate clearance between forms and bed plates shall be provided to enable the grout to be worked into place.

The grout (of all free flowing grouts except epoxy grouts) shall be mixed to a homogenous uniform mixture and delivered ready for placing at a temperature between 15°C and 25°C. The materials and water shall be mixed in a mortar mixer for at least 3 minutes or, in the case of small jobs only, shall be thoroughly mixed by hand, the entire mass being turned over enough times to ensure even distribution of its components.

The mixing shall be done as close as possible to the place(s) where the grout is placed. No more grout shall be mixed at any one time than can be placed in a period of 20 minutes. After the grout has been mixed it shall not be re-tempered by the addition of water.

The grout (of all free-flowing grouts except epoxy grouts) shall be placed quickly and continuously to avoid the undesirable effects of over-working. These effects are segregation, bleeding and breaking-down of initial set. The method of placement shall be subject to approval. The means of placing the grout shall be such that the grout will completely fill the space to be grouted, will be thoroughly compacted, will be free of air pockets and will have evenly distributed contact over an area in excess of 80 % or, in the case of expanding grout, 95 % of the bearing area of the item to be supported.

Wherever applicable, grout shall be placed from one side only and where this is not practicable, care shall be taken to ensure that any entrapped air is released. After the grout has taken its initial set:

- (a) the forms shall be removed;
- (b) excess grout shall be so cut away as to leave a smooth and neatly finished job;
- (c) except where the grout is intended to provide resistance to side thrust, all edges shall be trimmed at 45°C to the vertical, from the bottom edge of the bed plate; and
- (d) all excess grout on or about the bed plate shall be removed.

Damage to paintwork, if any shall be repaired within 24 hours. Packing plates, shims and other levelling devices shall remain in position.

Dry-packed grout (standard dry sand and cement grout) shall have a minimum compressive strength at 28days of 20 MPa. The quantity of water after placing shall be kept to a minimum consistent with placing conditions, and the cement, sand and, where applicable, pea gravel proportioned by mass shall be as follows:

- (a) Where the clearance between bed plate and foundation is 25 mm or less: 1 part of Portland cement, and 2 parts of sand;

- (b) Where the clearance exceeds 25 mm: 1 part of Portland cement, 1 part of sand and 1 part of pea gravel. Dry-packed grout shall be rammed by means of tamping rods against form work placed along three sides of the bed plate.

The manufacturer's instructions shall be observed at all times when grout is used.

PSG 6 TOLERANCES

PSG 6.2 PERMISSIBLE DEVIATIONS

PSG 6.2.3 Specified Permissible Deviations

Add the following:

"Unless specified otherwise, the degree of accuracy II is applicable.

Every specified permissible deviation is binding in itself. The cumulative effect of permissible deviations will not be considered. The maximum permissible vertical deviation is subject to the other permissible deviations."

PSG 7 TESTS

PSG 7.1 FACILITIES AND FREQUENCY OF SAMPLING

PSG 7.1.1 Facilities

Add the following:

"The Contractor shall provide sufficient storage capacity for the concrete cubes and ensure that the cubes are cured in the correct manner on site. All test the cubes shall be tested by means of an approved, calibrated cube testing press installed on Site in a manner approved by the Engineer, or shall arrange to have them tested by an approved laboratory.

The cost of all testing, including the cost of sampling, storage and transport of samples shall be included in the rates tendered.

PSL MEDIUM-PRESSURE PIPELINES

PSL 3 MATERIALS

PSL 3.1 GENERAL

Add the following:

• The route and position of pipelines shall be marked on the surface by pipeline route markers as per the Drawings.

PSL 3.4 STEEL PIPES, FITTINGS AND SPECIALS

PSL 3.4.1 General

Add the following:

Steel pipelines over 200mm in diameter in excess of 500m in length shall be in accordance with the following Department of Water Affairs and Forestry specifications:

- DWS 1130 ñ DESIGN MANUFACTURE AND SUPPLY OF STEEL PIPES, SPECIALS AND FITTINGS FOR DUTIES UP TO 4.6 MPa DESIGN PRESSURE
- DWS 9900 SECTION C1 ñ CORROSION PROTECTION OF STEEL PIPES AND SPECIALS FOR PIPELINES.

The DWS 1130 specification will be added as annexures to this SABS 1200 L specification variation portion in this document if required on the specific project. The Contractor is to obtain the DWS 9900 specification by his own means.

PSL 3.4.2 Pipes of Nominal Bore up to 150 mm

Add the following:

"The pipes shall be 'normalised' or seamless steel pipes and shall be used with malleable cast-iron fittings complying with the requirements of SABS 509."

PSL 3.7 OTHER TYPES OF PIPES**PSL 3.7.2 Polyethylene Pipes**

Replace the contents of this subclause with:

"Polyethylene pipes shall be high density polyethylene pipes HDPE Type IV pipes with compression fittings and shall comply with SABS 533 Part II."

PSL 3.9 CORROSION PROTECTION**PSL 3.9.6 Corrosive soil**

Add the following:

"Steel pipes buried and in contact with corrosive soil shall be wrapped with Densopol 80 HT or a similar approved product in accordance with the manufacturer's instructions."

PSL 3.10 VALVES

Replace the contents of the subclause with:

"Valves shall comply with the following requirements:

- (a) Open anti-clockwise and shall have a non-rising spindle
- (b) A hand wheel is required unless reflected otherwise on the drawings

(c) If not specified the valve shall be of Class 16.

(d) Comply with the requirements of SABS 664.ô

PSL 4 PLANT

PSL 4.1 HANDLING AND RIGGING

Add the following:

“PSL 4.1.1 Transportation

Fittings, specials and valves shall be protected during transportation and handling against damage caused by impact, dropping, chafing, etc.

PSL 4.1.2 Off-loading and Storage

Pipes, fittings and specials shall at no time be laid, stacked or rolled directly onto the ground but shall be supported on suitable padded cradles or other approved material near each end of the pipe, fitting or special. Particular care shall be taken where pipes with fitted couplings are handled or stacked to prevent any pressure on the couplings.

PSL 4.1.3 Inspection on Delivery

The Engineer's Representative will thoroughly inspect all pipes, fittings and specials delivered to the site but his acceptance of same as being in good condition shall not relieve the Contractor of any of his obligations or responsibilities under this contract.

Materials rejected by the Engineer shall be removed from the site within 30 days and shall be replaced by other approved materials by the Contractor at his own expense.ô

PSL 5 CONSTRUCTION

Add the following:

“PSL 5.13 PIPELINE ROUTE MARKERS

Route markers for the pipelines shall be erected in the positions as directed and shall be manufactured according to the details shown on the Drawings."

PSL 7 TESTING**PSL 7.3 STANDARD HYDRAULIC PIPE TEST****PSL 7.3.1 Test Pressure and Time of Test****PSL 7.3.1.2**

Replace the subclause with:

"The test pressure for field testing shall be:

- 1.5 times the maximum working pressure
- The maximum working pressure shall be equal to the class of pipe

PSL 8 MEASUREMENT AND PAYMENT**PSL 8.2 SCHEDULED ITEMS****PSL 8.2.11 Anchor/Thrust Blocks and Pedestals**

Add the following:

The rate shall include for the concrete as well.

The tendered rates shall also include the wrapping of uPVC pipes and fittings with Densopol 80 or a similar approved material where the pipes and fittings come into contact with concrete."

Add the following items:

"PSL 8.2.16 Standpipes Complete:

(a) (Give description with reference to a drawing - Unit : number

(b) Etc for other descriptions

The tendered rate shall include full compensation for all excavations for the pipe, for the drain, if required, and for the base of the concrete pedestal (for the tap), for the supply and installation of all pipework and fittings including a 1,5 m long section of the supply pipe measured from the rising pipe, for the supply and installation of the taps, for backfilling the drain with stone and the trench with approved backfill material, for all formwork and concrete and for all equipment, labour and diverse material required to complete the standpipe as shown on the Drawings.

PSL 8.2.17 Marker Blocks:

- (a) (Give description with reference to a drawing) - Unit : number
- (b) Etc for other descriptions

The tendered rate shall include full compensation for all excavation and backfill, labour, equipment and materials to manufacture and install the blocks as shown on the Drawings.ô

PSLB BEDDING (PIPES)**PSLB 3 MATERIALS****PSLB 3.1 SELECTED GRANULAR MATERIAL**

Add the following:

"Selected granular material shall have a PI not exceeding 6. The stones and particles shall not be sharp-edged."

PSLB 3.3 BEDDING

Add the following:

"uPVC and HDPE pipes are deemed to be flexible pipes for the purposes of this subclause.

Unless specified otherwise, rigid pipes shall have a Class B bedding"

PSLB 8 MEASUREMENT AND PAYMENT**PSLB 8.1 PRINCIPLES****PSLB 8.1.5 Disposal of displaced material**

Replace the subclause with:

"Material displaced by the pipeline, of unacceptable quality for bedding support of fill, and by imported material from sources other than trench excavation, shall be disposed of at an approved site furnished by the Contractor. No haulage is payable for such material."

PSLB 8.1.6 Free-haul

Delete the words "of 0,5 km" in this subclause. Add the following:

óAll haulage shall be deemed Feehaul unless specifically otherwise specified.ô

PSLB 8.2 SCHEDULED ITEMS

PSLB 8.2.2 Supply only of bedding by importation

Add the following:

óAll haulage under all the subclauses shall be deemed Feehaul unless specifically otherwise specified.ô

Add the following item:

"PSLB 8.2.6 Extra over items 8.2.1 and 8.2.2 for bedding stabilised with 5% cement - Unit : m³

The tendered rate shall include full compensation for selecting, mixing, backfilling and compacting the stabilised material to 90% of modified AASHTO density."

POLOKWNAE MUNICIPALITY

PROJECT DESCRIPTION: OLIFANTSPOORT REGIONAL WATER SCHEME

C4: SITE INFORMATION

C4.1: LOCALITY PLAN

POLOKWANAE MUNICIPALITY**PROJECT DESCRIPTION: CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME
PHASE 2 (MULTI-YEAR)****C4: SITE INFORMATION****C4.1: LOCALITY PLAN****General**

This section describes the site at the time of the tender in order to enable the tenderer to price his tender accordingly and to decide upon his method of working, programming and risks.

The tenderer shall inform him / herself on the nature of the site and inspect the site.

The Employer will consider a tender only if the site inspection and/or tenderer's meeting arranged by the Engineer has been attended by a representative who must:

1. Be suitably qualified to comprehend the implications of the work involved, and
2. Be the tenderer him/herself or a person in the direct employ of the tenderer.

4.2 Site locationLocality Details

- | | | | |
|----|--------------|---|----------------------------------|
| 3. | Province | : | Limpopo Province |
| 4. | Municipality | : | Polokwane Municipality |
| 5. | Co-ordinates | : | 23°49'20.68"S 29°21'30.89"E |

4.3 Access to site and restrictions

The construction sites are situated in the existing villages as mentioned in 4.2. These sites can be reached via existing streets/roads and Provincial Roads.

The operation of construction vehicles on existing roads or streets, or on streets which have been completed on the level of sub-base or base or bituminous surface treatment, shall be limited to traffic with an axle load not exceeding that allowed by the Road Traffic Ordinance of the authority concerned, or any amendment thereof. Hauling is strictly forbidden on sections of streets that have been completed as described above. The Contractor shall make use of temporary haul roads, or where not practically possible, program his work in such a manner that the haulage of materials shall be restricted to that required for the particular section of street. No additional payment shall be made for the use of temporary haul roads and all relevant costs shall be deemed to be covered by the appropriate rates.

The Contractor must note that no additional payment will be made for the construction of temporary access roads to the construction site, borrow-areas or to the spoil sites, except for payment made under payment item A.8.3.2.2 of SABS 1200 A.

If the Contractor does not make use of existing streets for the hauling of materials to or from the site, he shall be held responsible to clear any spillage caused by his activities on or near the roads by whatever means necessary, within two (2) days after such spillage has occurred. No additional payment will be made for the clearance of spillage and all relevant costs will be deemed to be covered under the relevant items.

4.4 Security

The security of the Contractor's plant, employees, materials and site camp will be the Contractor's responsibility.

4.5 Nature of ground and subsoil conditions

The Contractor shall familiarize himself with the conditions on site.

The materials on site mainly consist of soft and hard material. The majority of excavation will be along the existing pipeline sections.

Also refer to the Project Specification "*PS 4 : NATURE OF GROUND AND SUBSOIL CONDITIONS ON SITE*".

C4.2 BID DRAWINGS

NO.	DRAWING DESCRIPTION	DRAWING NO.	SHEET NO.
1	LOCALITY PLAN	PLK-002-WTR-000	SHEET 1 OF 1
2	GENERAL SURVEY LAYOUT PLAN	PLK-002-WTR-000	SHEET 1 OF 1
3	RETICULATION LAYOUT PLAN	THLM-001-WTR-001	SHEET 1 OF 1
4	INFORMATION BOARD	MONT-STD-WTR-0001	SHEET 1 OF 1
5	PIPELINE MARKER DETAILS	MONT-STD-WTR-0002	SHEET 1 OF 1
6	PIPE TRENCH DETAILS	MONT-STD-WTR-0003	SHEET 1 OF 1
7	PIPE BEDDING DETAILS	MONT-STD-WTR-0004	SHEET 1 OF 1
8	HORIZONTAL THRUST BLOCKS FOR PIPE REDUCERS	MONT-STD-WTR-0005	SHEET 1 OF 1
9	HORIZONTAL THRUST BLOCKS BENDS AND T-JUNCTION	MONT-STD-WTR-0006	SHEET 1 OF 1
10	VERTICAL THRUST BLOCKS BENDS & T-JUNCTIONS	MONT-STD-WTR-0007	SHEET 1 OF 1
11	PIPE ANCHOR BLOCKS ON SLOPES STEEPER THAN 1 TO 10	MONT-STD-WTR-0008	SHEET 1 OF 1
12	STANDPIPE CONNECTION TYPICAL DETAILS	MONT-STD-WTR-0017	SHEET 1 OF 1
13	RETICULATION ISOLATION VALVE DETAILS	MONT-STD-WTR-0019	SHEET 1 OF 1



PLAN SYSTEM=WG27	
LENGEND	
FENCE	----
POWERLINE	
CADASTRAL	-----
SERVITUDE	-----
PIPELINE MARKER	①
TREE	⊙
BENCH MARK	△
WATER VALVE CHAMBER	⊞
CABLE MANHOLE	⊙
STREET LAMP POST	⊙
WATER VALVE	⊙
SEWER LINE	-----
SEWER MANHOLE	⊙
TELEPHONE LINE	

BENCH MARKS			
NAME	X	Y	Z
BM1	2838.08	2838.08	128.84
BM2	2838.08	2838.08	128.84
BM3	2838.08	2838.08	128.84
BM4	2838.08	2838.08	128.84
BM5	2838.08	2838.08	128.84
BM6	2838.08	2838.08	128.84
BM7	2838.08	2838.08	128.84
BM8	2838.08	2838.08	128.84
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BM98	2838.08	2838.08	128.84
BM99	2838.08	2838.08	128.84
BM100	2838.08	2838.08	128.84

TRIG BEACON			
NAME	X	Y	Z
TRIG1	2838.08	2838.08	128.84

NOTES:
1. Contour interval : 2.0m
2. Datum : mean sea level

Surveyed and drawn by:
THOTHOME GEOMATICS cc
Cell: 071 155 2008
Email: thothome@gmail.com
Fax: 071 155 2008
Postal Address: P.O. Box 436, Thornhill Plaza, Polokwane, 082
No. 116 Pien Street, Polokwane, 089

Project Number/Name:
**TOPOGRAPHICAL SURVEY
OLIFANTSPORT REGIONAL WATER
SCHEM/MOTONG WA PEREKISI-
PHASE 2 CONTRACT No. B4C38082019**

Scale: 1:7 500/AD
Reference Number: OLF-WATS/REV0
DATE OF SURVEY: DECEMBER 2020

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CONSULT

DESIGNED BY: T A MOSIA
CHECKED BY: T E MUHANGO
DRAWN BY: T A MOSIA
CHECKED BY: S B Z RANGANA



POLOKWANE MUNICIPALITY
P O BOX 111
POLOKWANE
0700
TEL: 015 - 290 2148
FAX: 015 - 290 2207

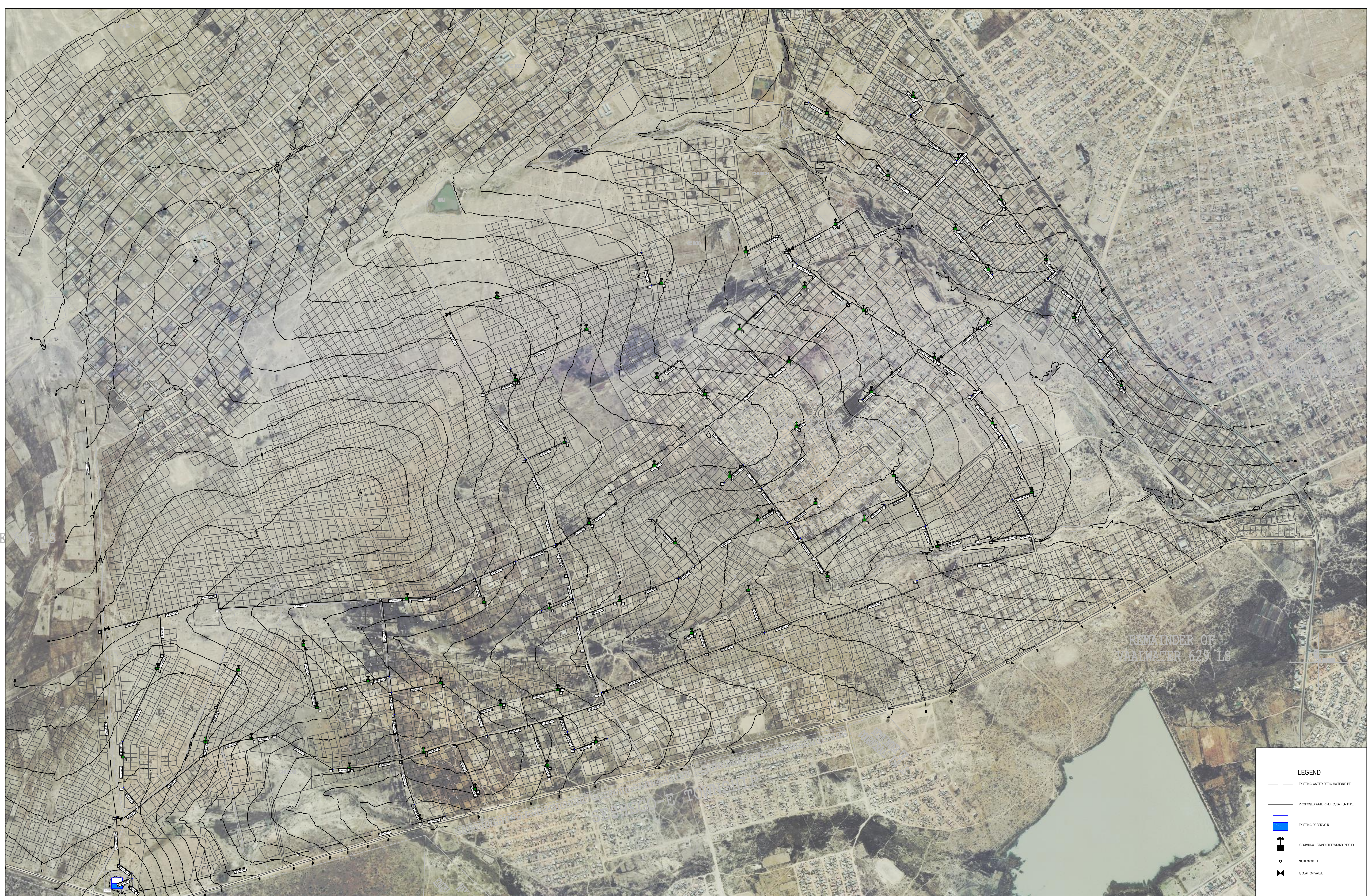


MONT CONSULTING ENGINEERS
PO BOX 1249
FAUNA PARK
0787
TEL: 015 - 291 4373
FAX: 015 - 291 4218



PROJECT: CONSTRUCTION OF OLIFANTSPORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)
BID NO.: PM63/2021
TITLE: GENERAL SURVEY LAYOUT PLAN

ISSUED FOR TENDER
For Polokwane Municipality
For Mont Consulting Engineers
DRAWING No: D1 K.M2.MTB.NNNN
DATE: 01 OF 01
SCALE: N.T.S.
PAPER SIZE: A1
REVISION: 00



REMAINDER OF
VALUATION 629 LS

LEGEND

EXISTING WATER RETICULATION PIPE

PROPOSED WATER RETICULATION PIPE

EXISTING RESERVOIR

COMMUNAL STAND PIPE/STAND PIPE ID

NODE/NODE ID

ISOLATION VALVE

01	19/02/2021	RETICULATION NETWORK EXTENSION & ADDITION VALVES	MCE
02			
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100			

DESIGNED BY	T A MOSIA
CHECKED BY	T E MUVHANGO
DRAWN BY	T A MOSIA
CHECKED BY	S B Z RANGANA

CITY OF

Polokwane

NATURALLY PROGRESSIVE

POLOKWANE MUNICIPALITY

P O BOX 111

POLOKWANE

0700

TEL: 015 - 290 2148

FAX: 015 - 290 2207

mont

consulting engineers

PO BOX 1249

FAUNA PARK

0787

TEL: 015 - 291 4373

FAX: 015 - 291 4218

PROJECT

CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME

PHASE 2 (MULTI-YEAR)

BID NO.: PM63/2021

TITLE

RETICULATION LAYOUT PLAN

ISSUED FOR TENDER

For: Polokwane Municipality

For: Mont Consulting Engineers

DRAWING NO:

PI K-002-WTR-001

SCALE

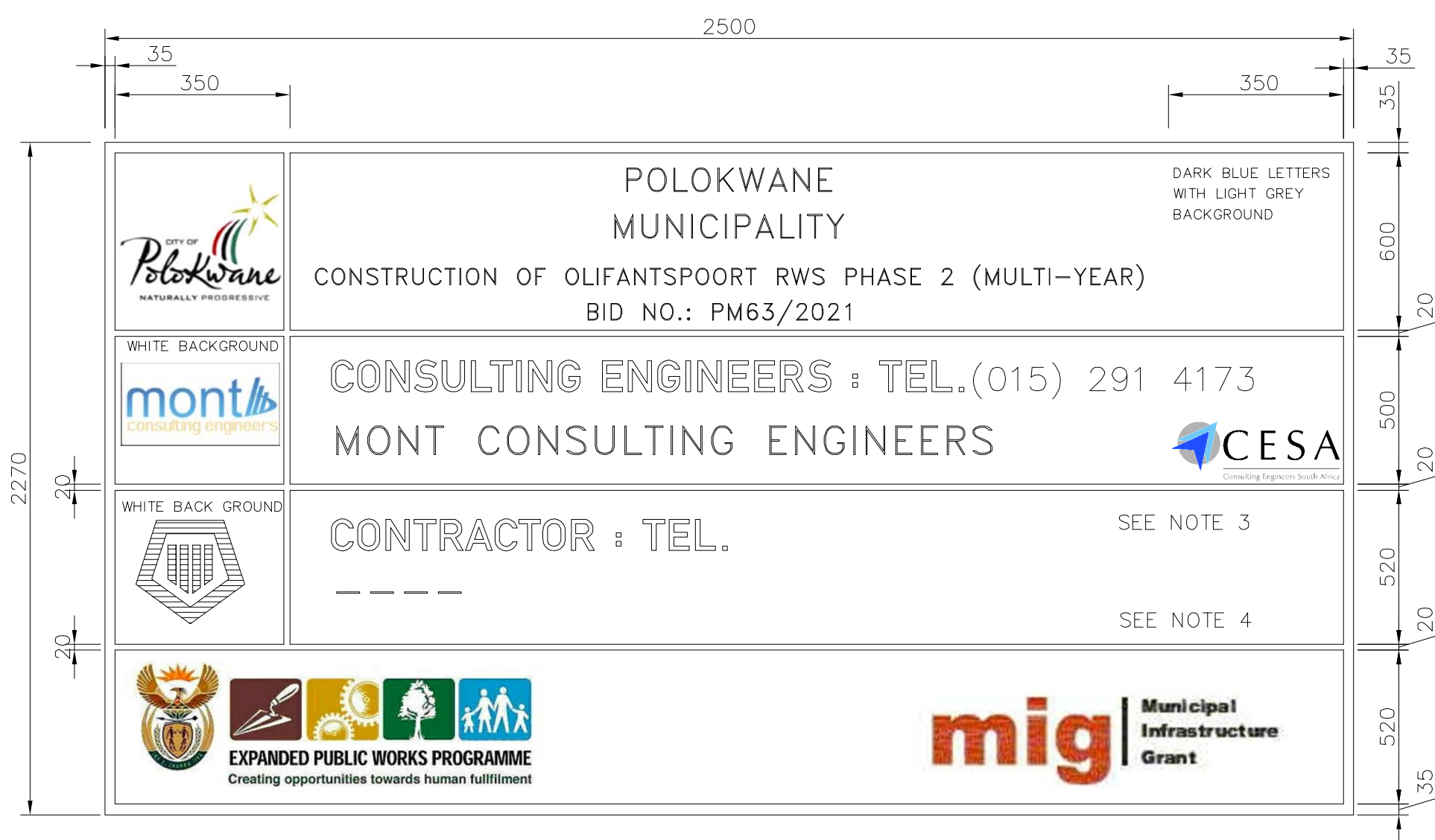
1:7500

PAPER SIZE

A1

PROVISION

01



FRONT ELEVATION
SCALE N.T.S.

NOTE 1
SITING AND ERECTION METHODS BY CONTRACTOR, TWO NAME BOARDS IN ENGLISH, SHALL BE ERECTED, POSITIONS TO BE DETERMINED BY ENGINEER ON SITE.

NOTE 2
BACKGROUND:
a. TOP SECTION SEMI-MATT WHITE
b. LEFT BOTTOM SECTION: SEMI-MATT WHITE
c. RIGHT BOTTOM SECTION: SEMI-MATT LIGHT GREY

NOTE 3
CONTRACT PERIOD/ CONTRACTOR TEL. - LETTER HEIGHT 102mm

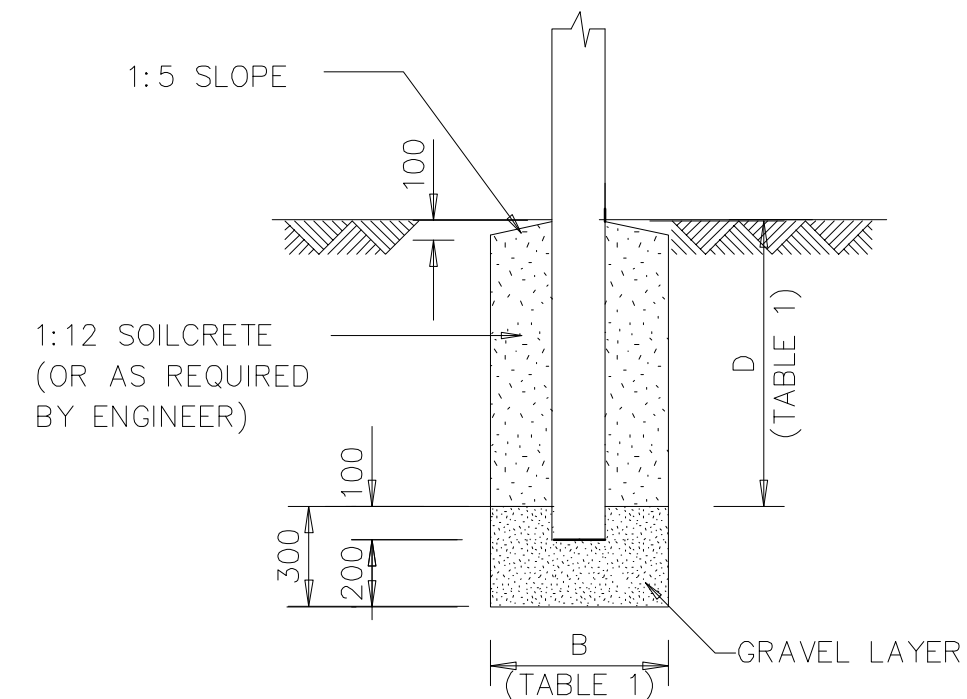
NOTE 4
NAME OF CONTRACTOR - LETTER HEIGHT 152mm

LETTERS
SERIES C, DARK BLUE

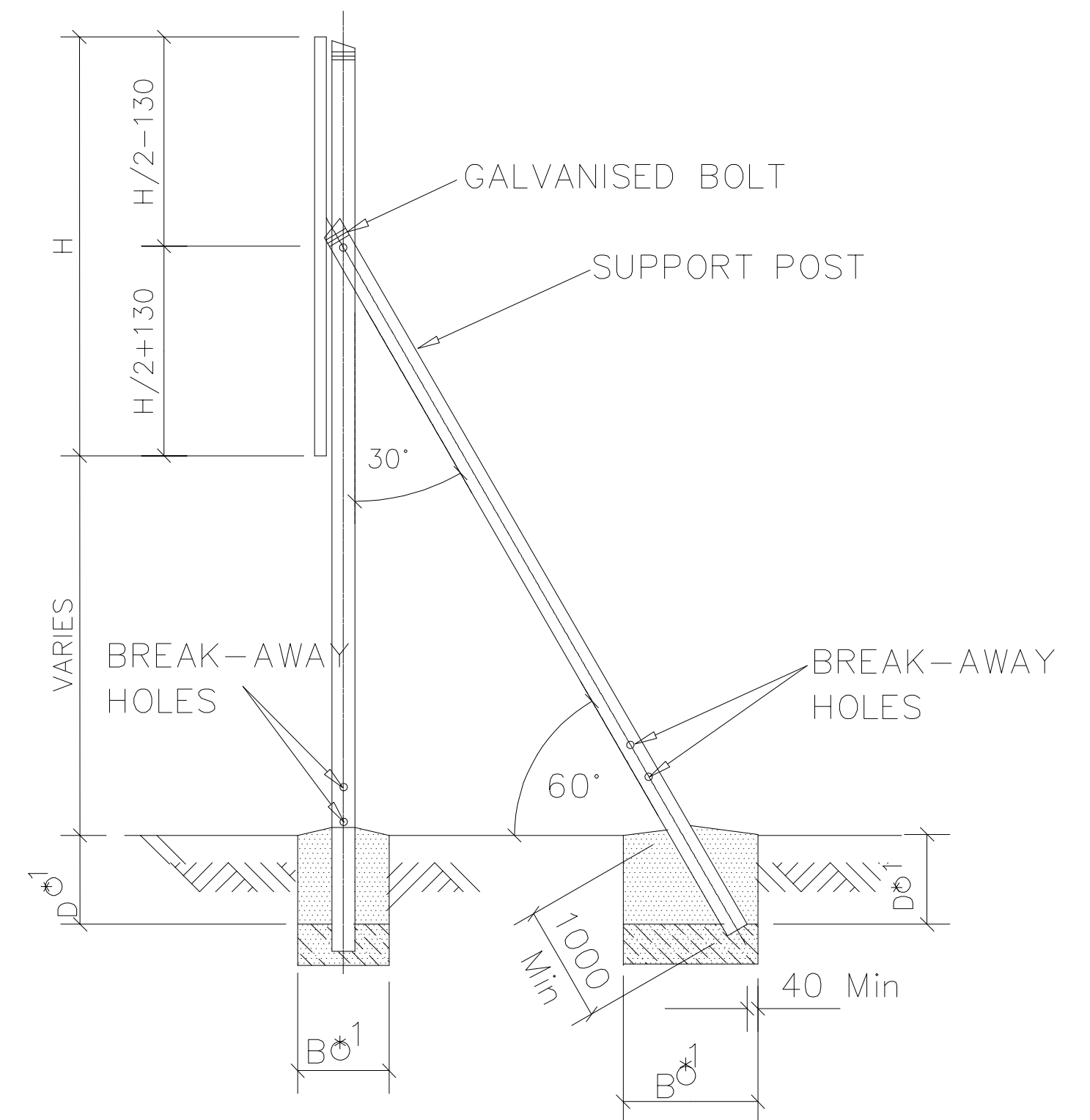
BORDER
GREEN NON-REFLECTIVE

EMBLEMS
MAY ONLY BE USED BY MEMBERS AND DISPLAYED IN FULL COLOUR

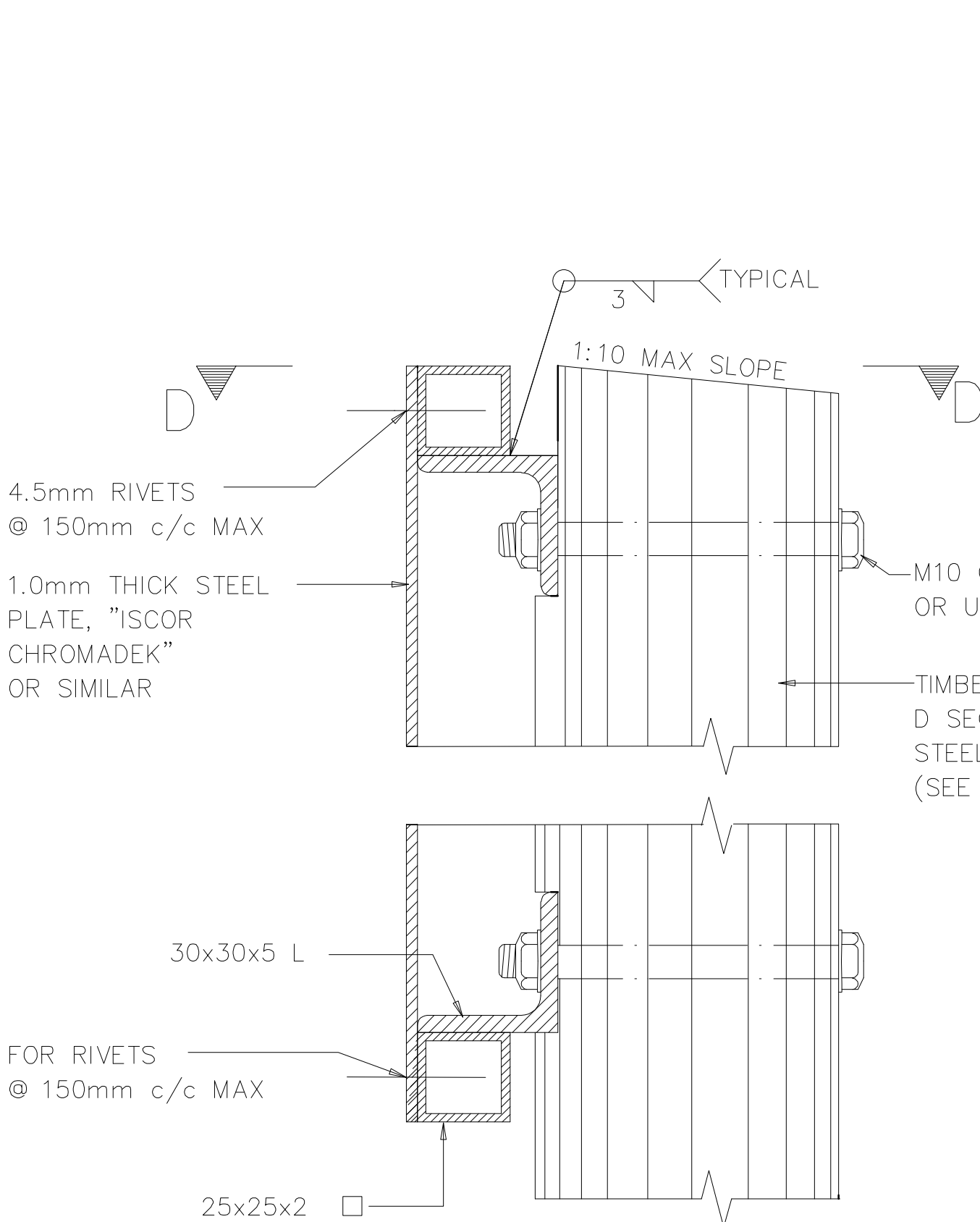
TABLE 1				
ERECTION DETAILS				
TYPE POST	UPRIGHT	STAY	D	B
TIMBER POST AND STAY	100mm	80mm	600mm	850mm
TIMBER POST	180mm	-	1000mm	1450mm
D SECTION STEEL POST	100mm x 4mm	-	1000mm	1450mm



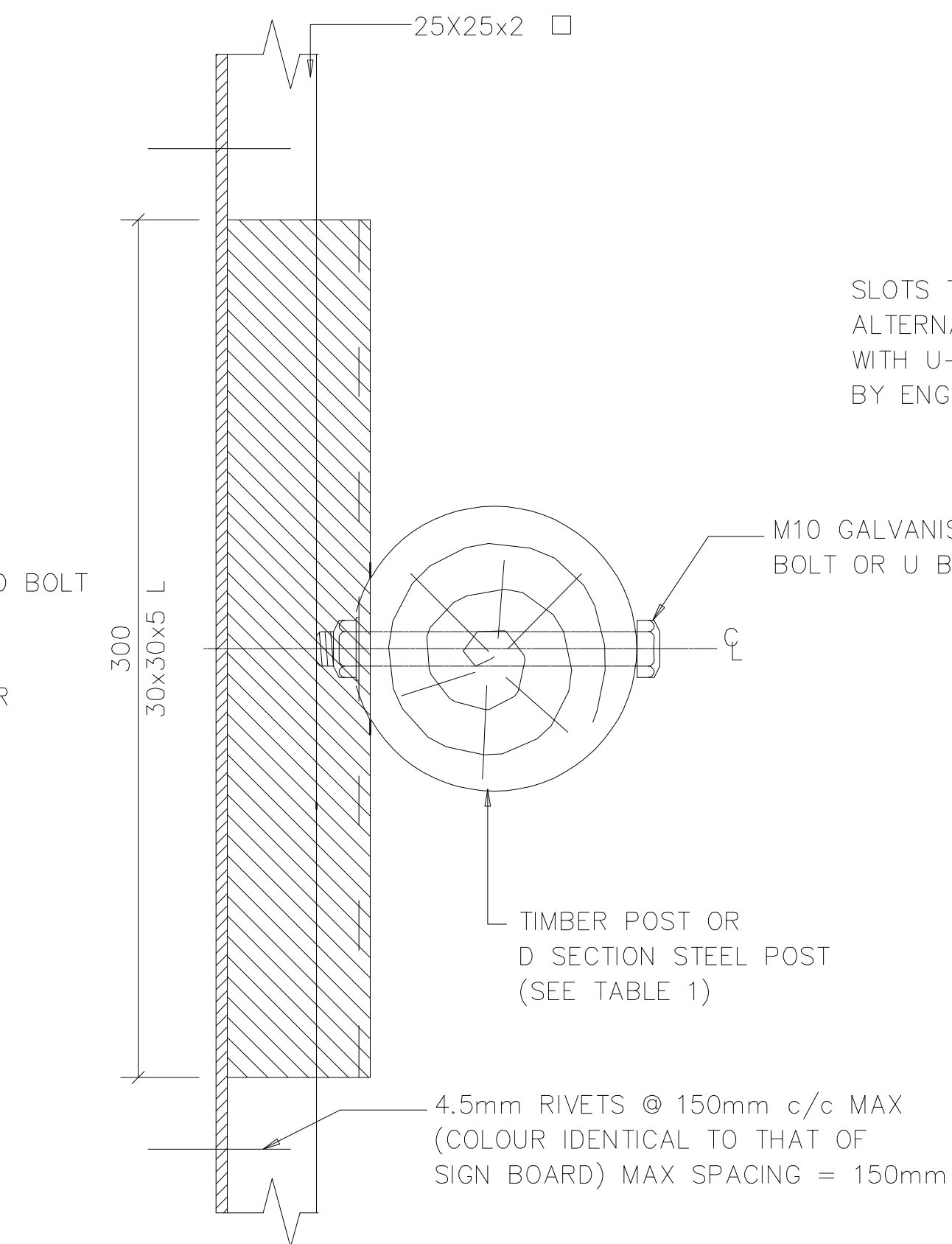
FOUNDATION DETAIL
N.T.S.



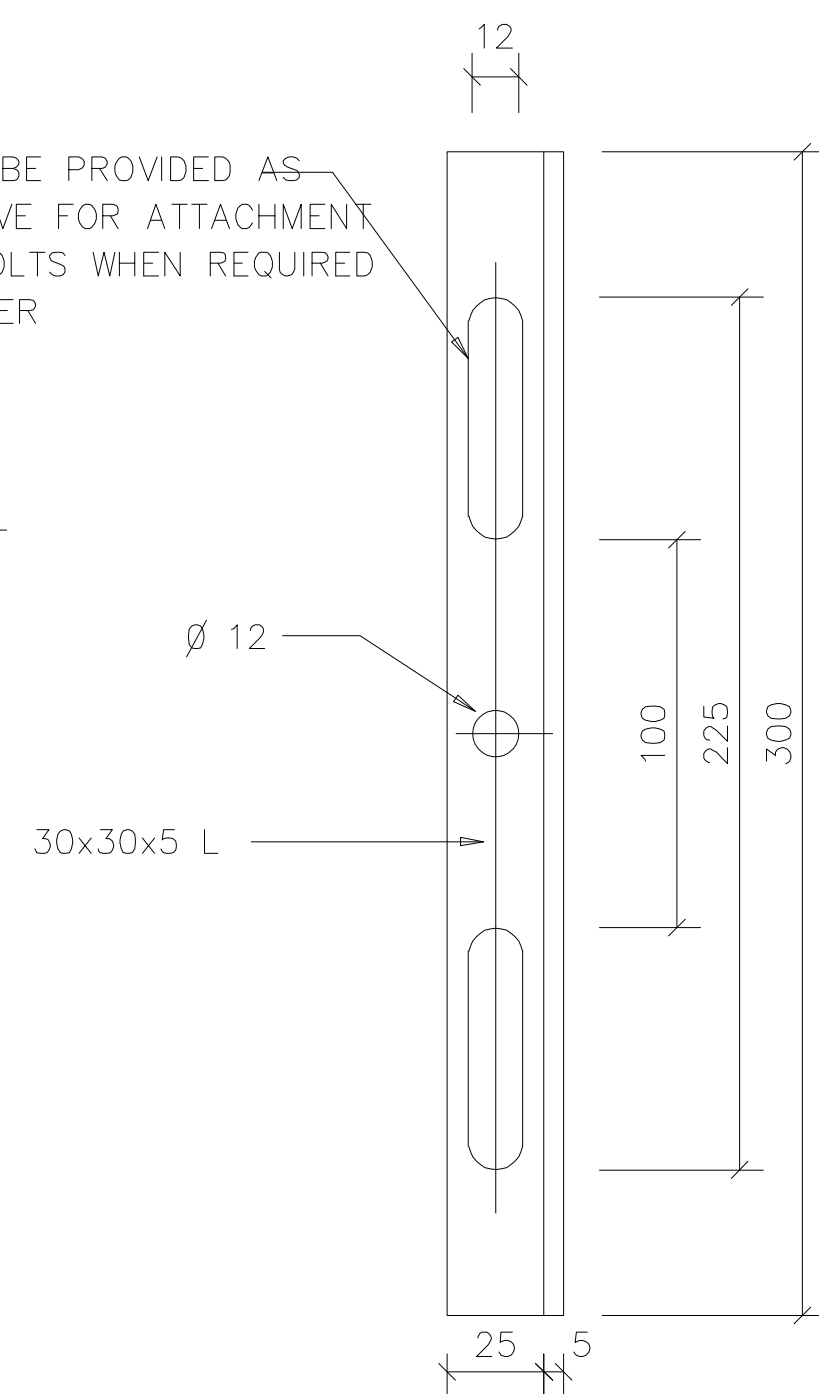
SIDE ELEVATION OF ROAD SIGN
N.T.S.



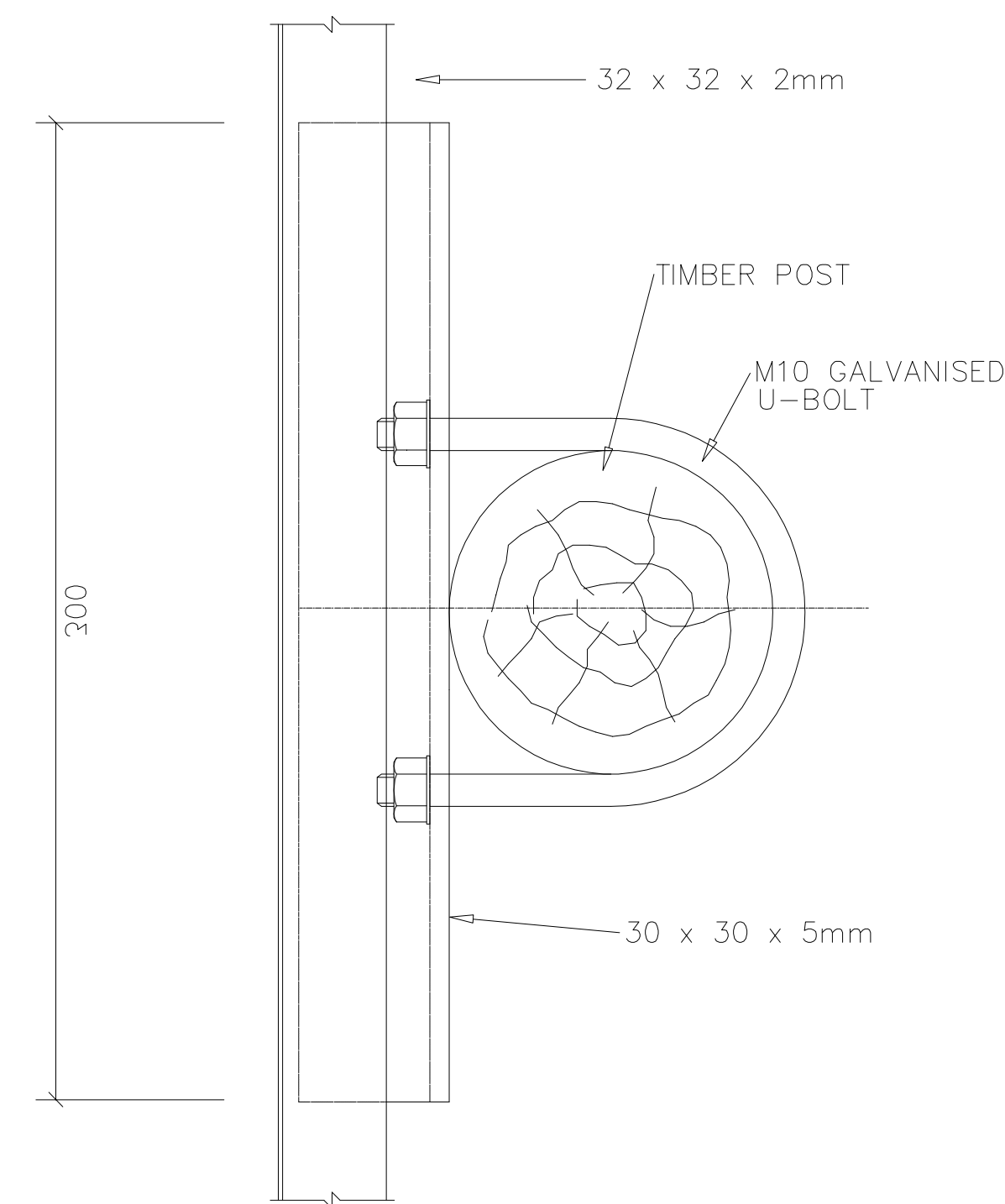
SIDE ELEVATION
N.T.S.



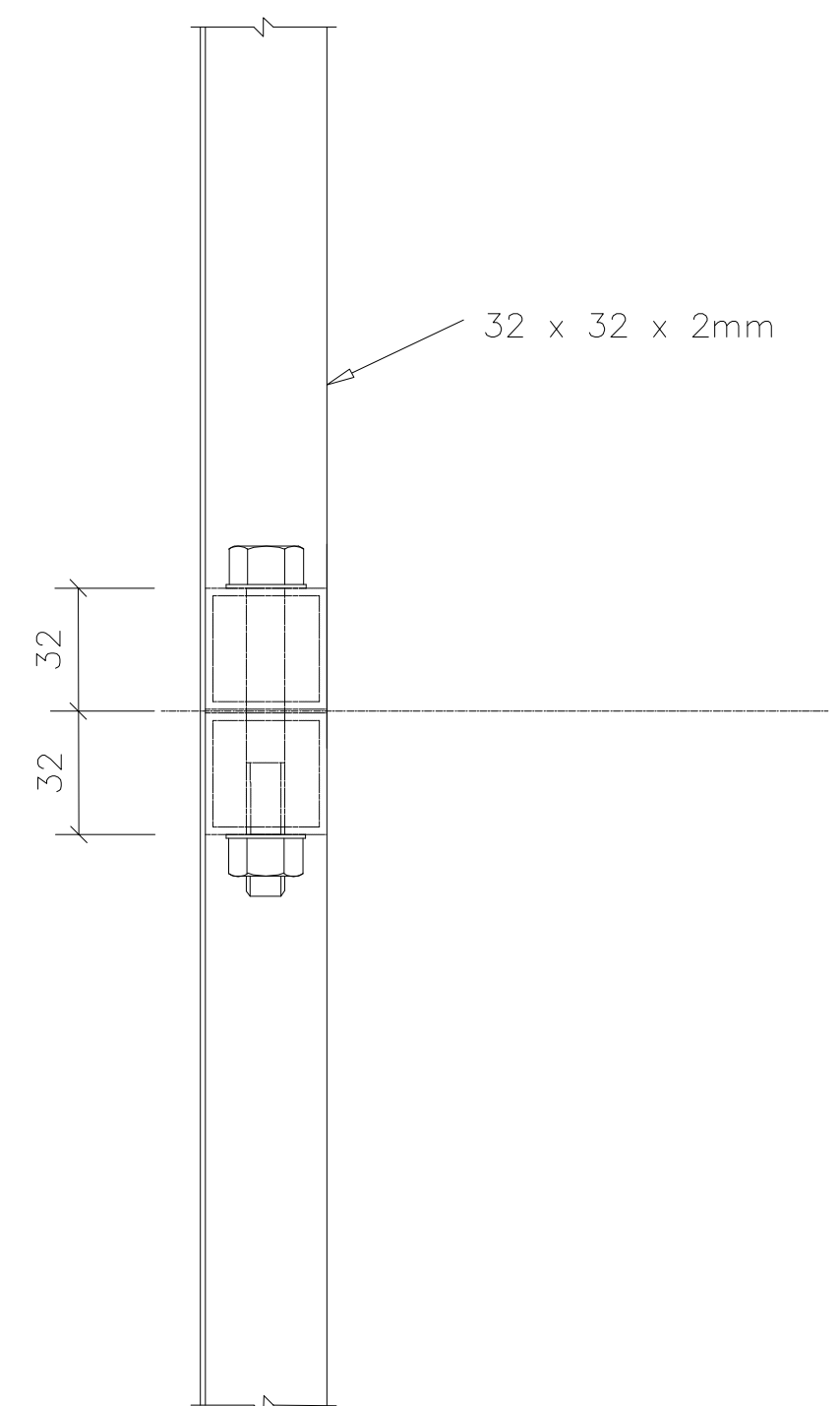
PLAN: SECTION D-D
N.T.S.



ELEVATION
ERECTION BRACKET
N.T.S.

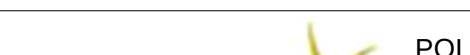


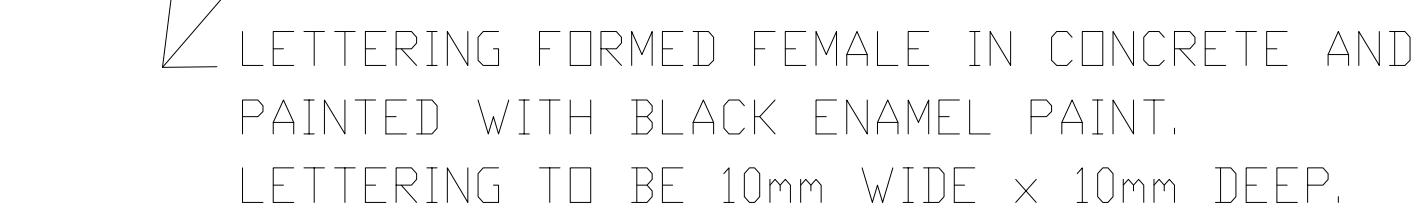
SECTION A-A
(WITH U-BOLT)
N.T.S.



SECTION B-B
(AT JOINT OF SIGN)
N.T.S.

FIXING DETAIL

										DESIGNED BY	SZB RANGANA		POLOKWANE MUNICIPALITY		MONT CONSULTING ENGINEERS		PROJECT CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)	ISSUED FOR TENDER 1 OF 1 SCALE AS SHOWN PAPER SIZE A1 REVISION nn
										CHECKED BY	PXA NDLOVU		P O BOX 111 POLOKWANE 0700		PO BOX 1249 FAUNA PARK 0787		BID NO.: PM63/2021	
										DRAWN BY	TA MOSIA		TEL: 015 - 290 2148 FAX: 015 - 290 2207		TEL: 015 - 291 4173 FAX: 015 - 291 4218		TITLE PROJECT INFORMATION BOARD	
										CHECKED BY	TE MUVHANGO							



										DESIGNED BY		SZB RANGANA		 CITY OF Polokwane NATURALLY PROGRESSIVE	PROJECT		POLOKWANE MUNICIPALITY		 mont consulting engineers	PO BOX 1249 FAUNA PARK 0787		MONT CONSULTING ENGINEERS		PROJECT CONSTRUCTION OF OLIFANTSPOORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)		ISSUED FOR TENDER (Signature)		SHEET NO. 1 OF 1	
										CHECKED BY		PKA NDOUW					SCALE AS SHOWN												
										DRAWN BY		TA MOSA					PAPER SIZE			A1									
										CHECKED BY		TE MUKHANGO					DRAWING NO. MONT-STA/ML/0007			REVISION 00									



1. MINIMUM DEPTH OF COVER:

2. BACKFILL COMPACTION REQUIREMENTS

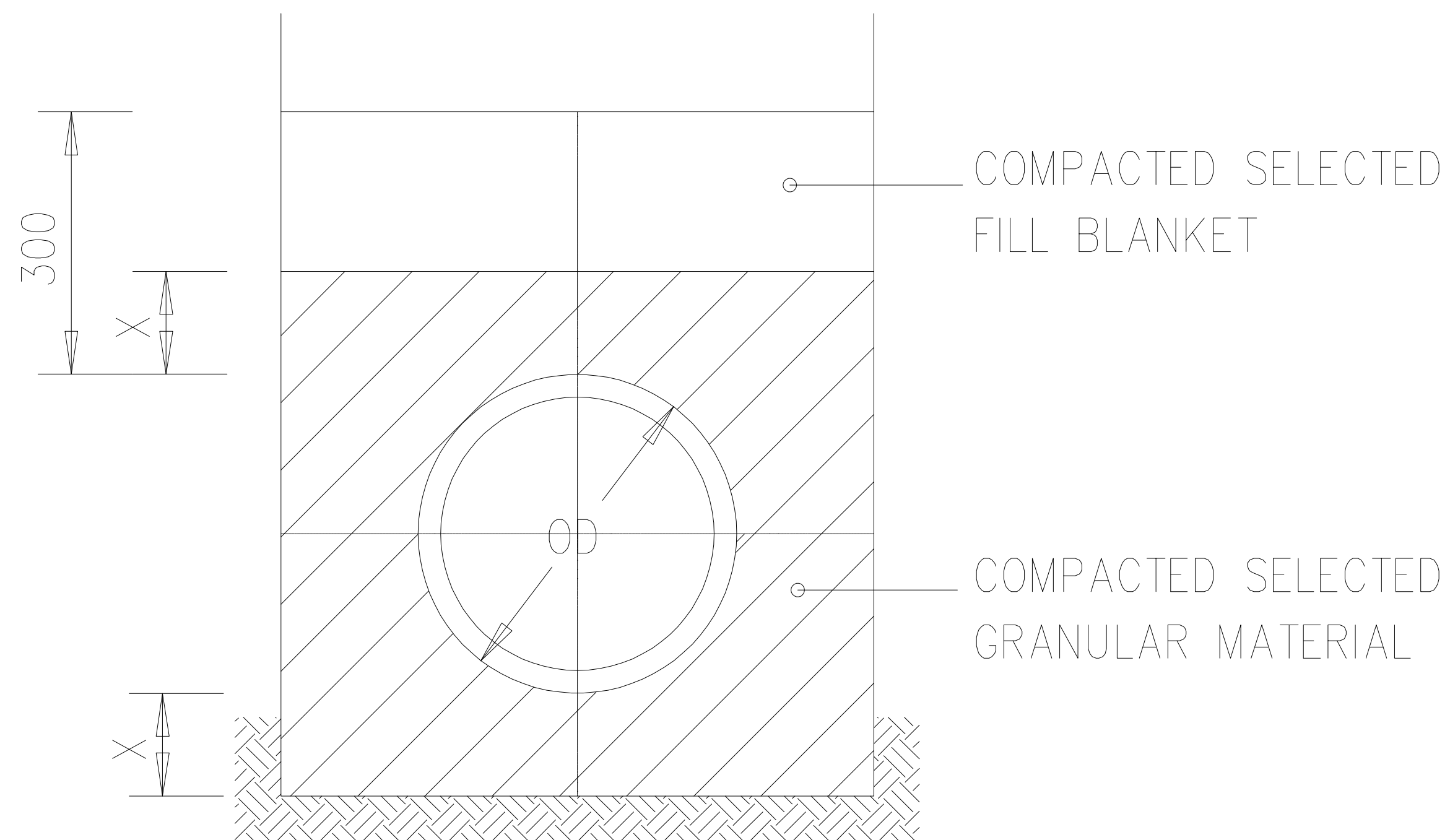
a) AREAS SUBJECT TO TRAFFIC LOADS:
REFER TO DRAWINGS IN NOTE 4

b) AREAS NOT SUBJECT TO TRAFFIC LOADS:
300mm LAYERS COMPACTED TO SAME DENSITY AS THAT OF UNDISTURBED SURROUNDING GROUND OR 90% OF MOD AASHTO MAXIMUM DENSITY, WHICHEVER IS THE GREATER

- | NOMINAL DIAMETER (mm) | | MINIMUM BASE WIDTH W (mm) |
|-----------------------|--------------------------------|---------------------------|
| OVER | UP TO | OD = OUTSIDE DIAMETER |
| – | 125 (DEPTH NOT EXCEEDING 1,5m) | 600 |
| – | 125 (DEPTH EXCEEDING 1,5m) | OD + 600 |
| 125 | 700 | OD + 600 |
| 700 | 1000 | OD + 800 |
| 1000 | 2000 | OD + 1000 |
| 2000 | – | OD + 1200 |

4. REFER TO FOLLOWING DRAWINGS:
MONT-STD-WTR-0004 - PIPE BEDDING CONSTRUCTION

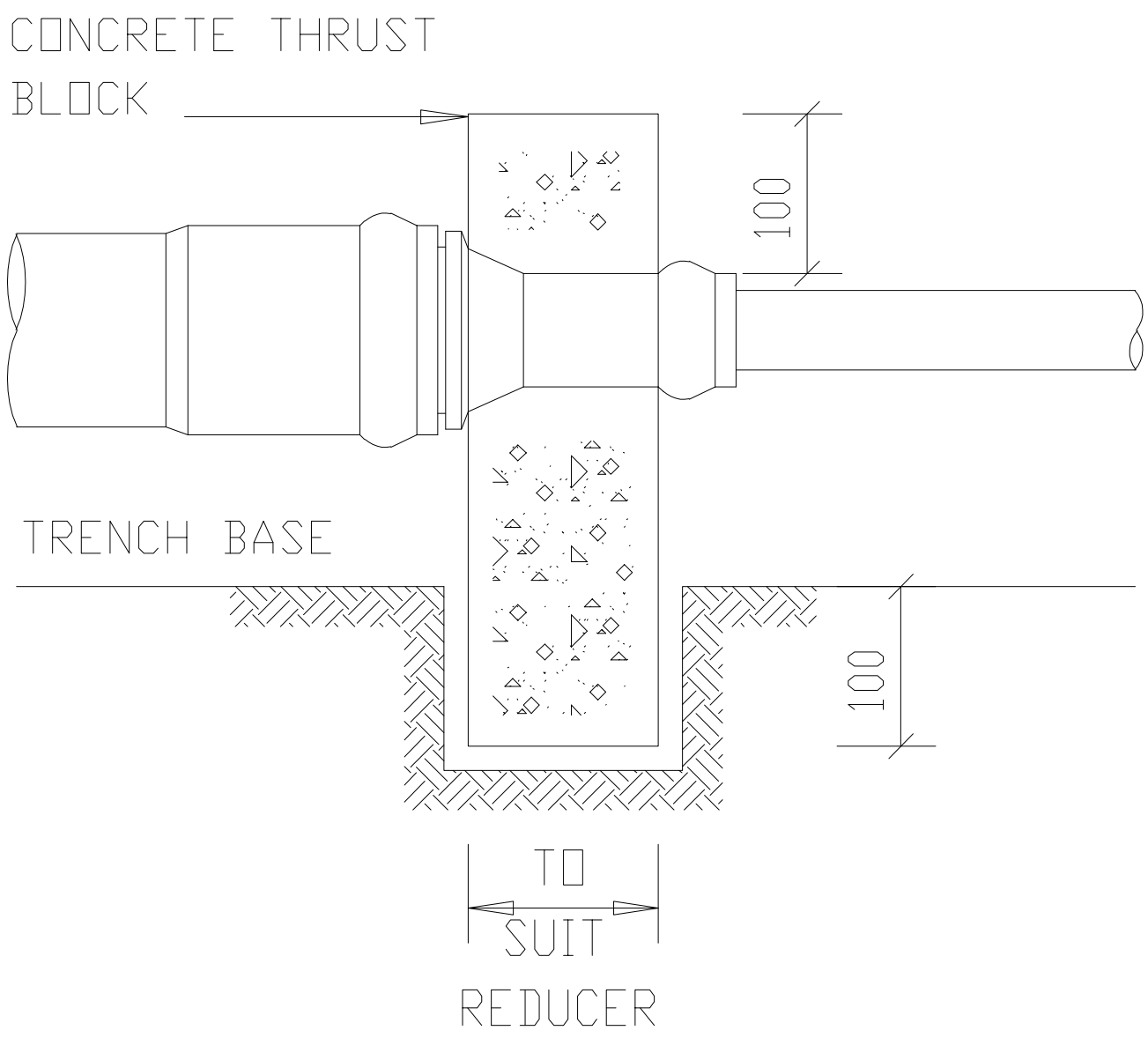
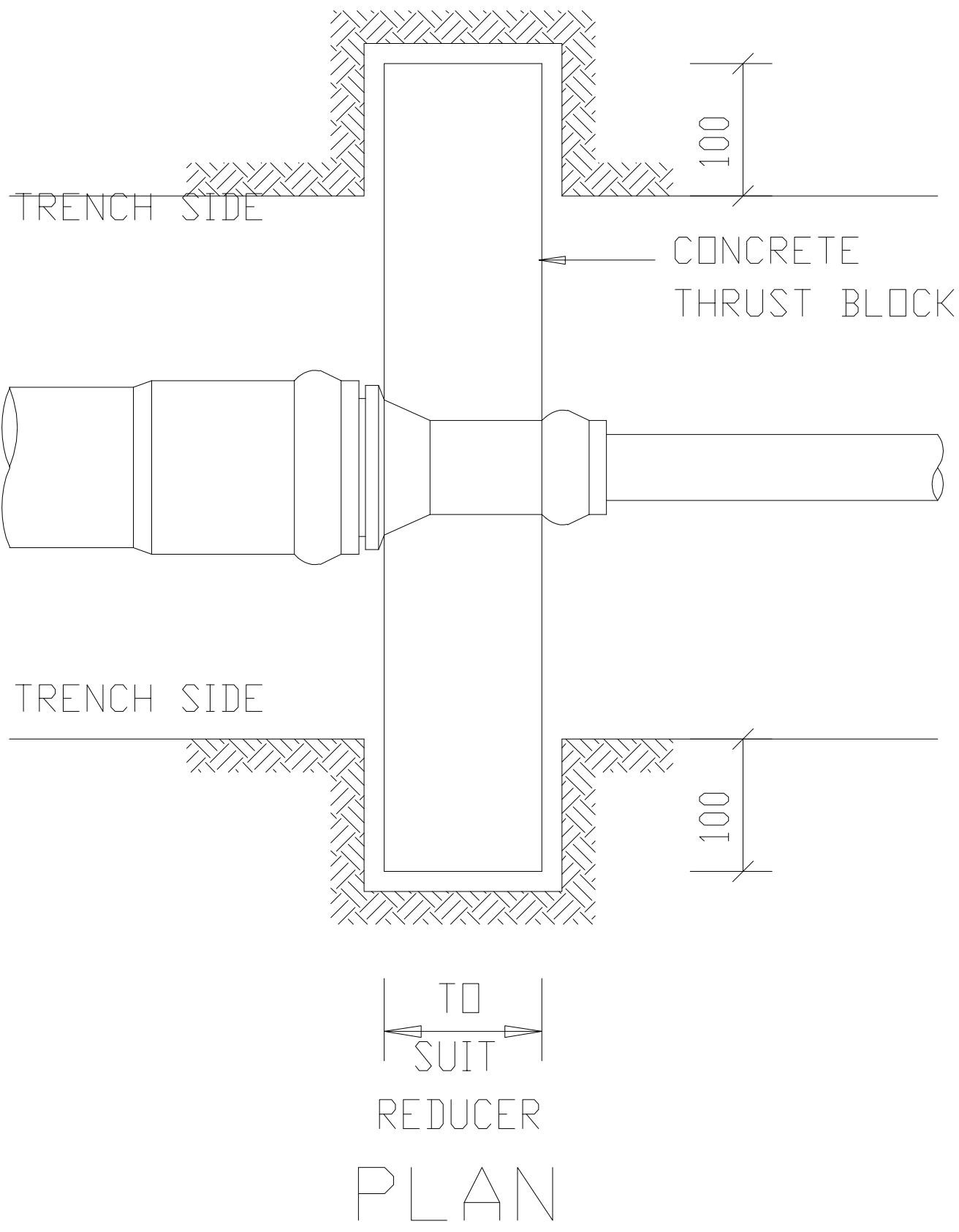
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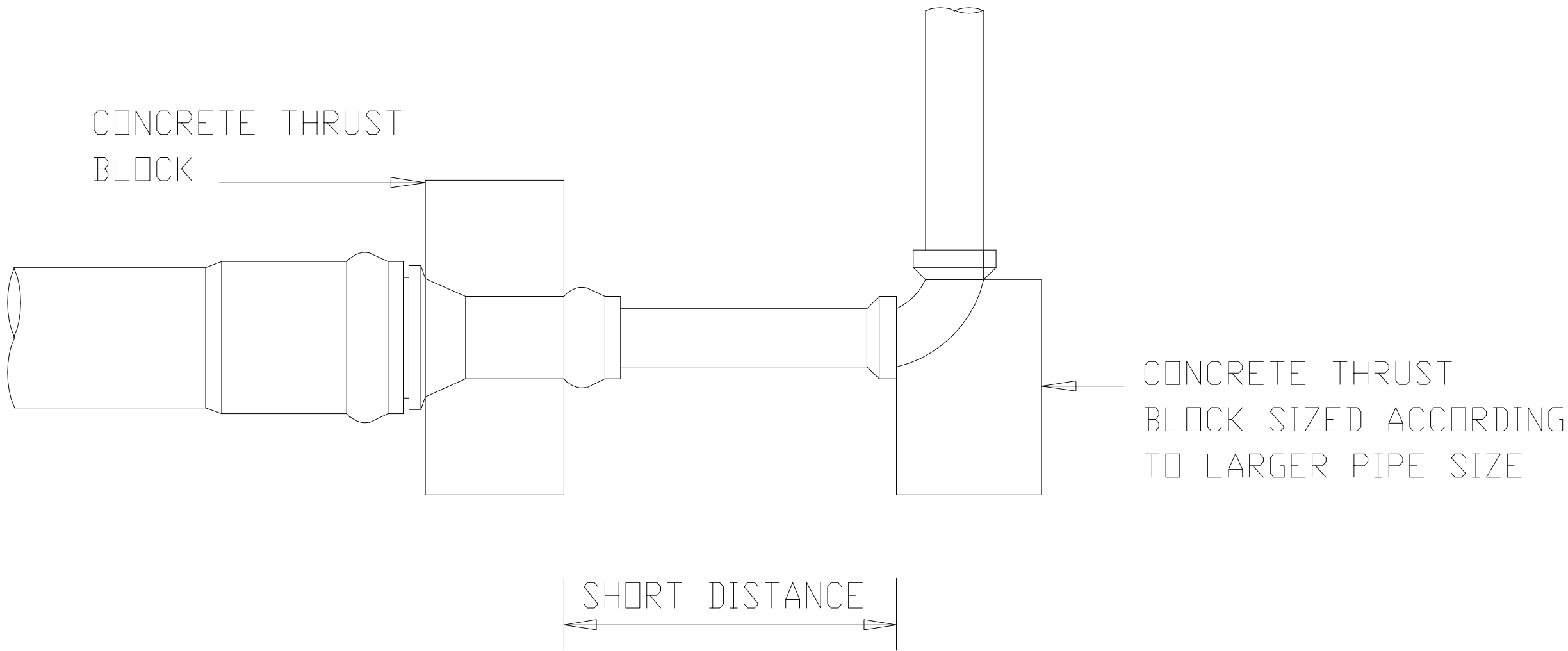
CLASS S (FM = 2,2)

(WITH CEMENT STABILISATION
ONLY WHERE SPECIFIED)

[illegible]



SECTION

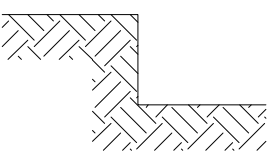


SKETCHPLAN: PIPE REDUCER CLOSE TO SMALL DIA BEND

(SEE NOTE 3)

NOTES:

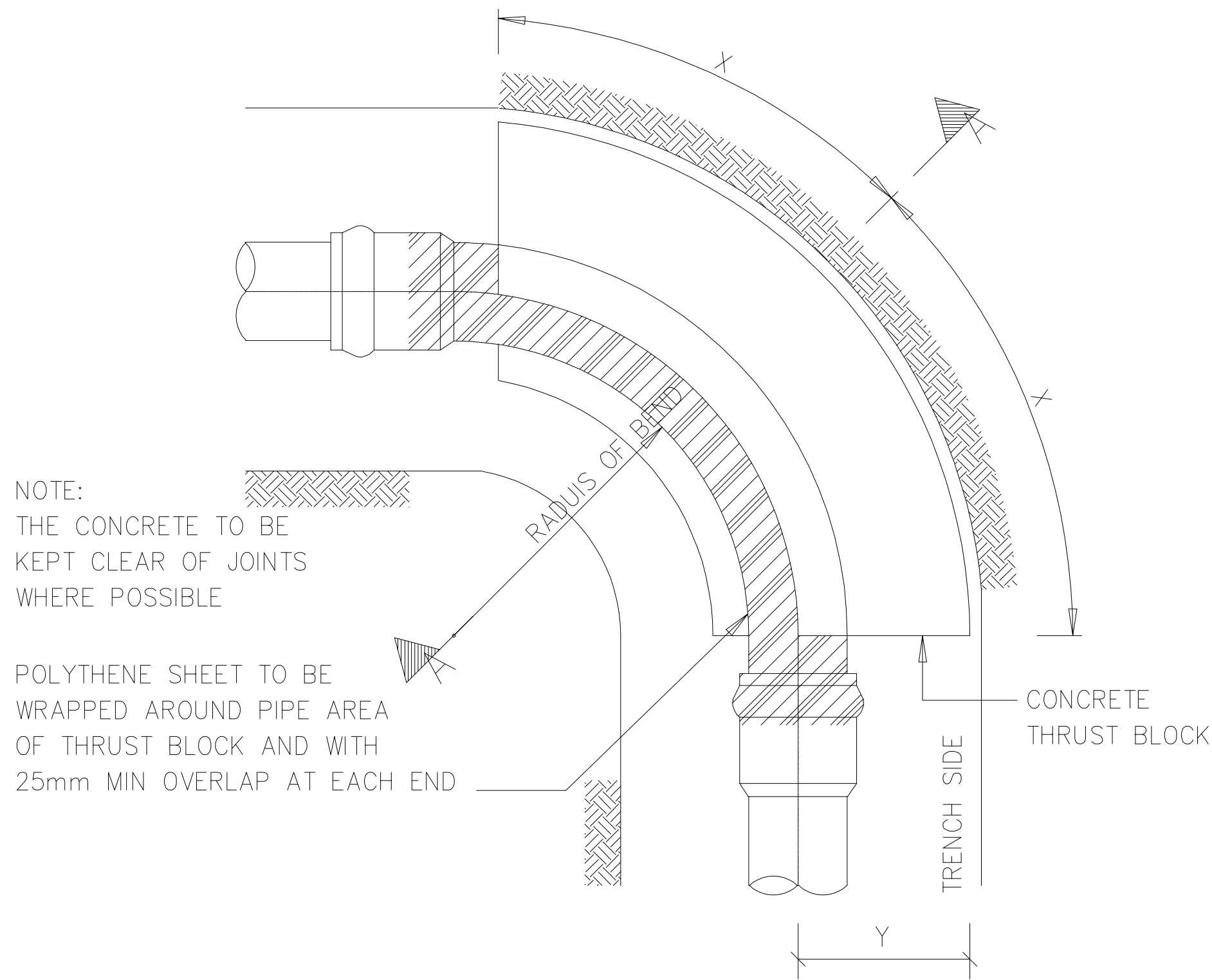
- DRAWINGS APPLIES TO PIPE REDUCERS FOR PIPE SIZES 50 – 315mm ONLY. FOR HORIZONTAL THRUST BLOCKS ON PIPE BENDS OR T-JUNCTIONS REFER TO THE FOLLOWING DRAWING:
MONT-STD-WTR-0006 – Horizontal Thrust Blocks: Bends & Tees
- REDUCTION OF PIPE SIZES LIMITED TO THAT SHOWN IN TABLE BELOW. WHERE A REDUCTION IN PIPE SIZE OUTSIDE THE LIMITS SPECIFIED IS REQUIRED, THEN A THRUST BLOCK EQUIVALENT TO A T-JUNCTION OR END CAP FOR THE LARGER PIPE SIZE MUST BE CONSTRUCTED.
- WHERE THE PIPE REDUCER IS LOCATED IN CLOSE PROXCIMITY TO A BEND OR T-JUNTION ON THE SMALLER PIPE, THEN THE THRUST BLOCK ON THE SMALLER PIPE SHALL BE SIZED ACCORDING TO THE LARGER PIPE SIZE (SEE SKETCH PLAN). ALL AS INSTRUCTED BY ENGINEER.
- ALL CONCRETE TO BE GRADE 20/19 AND CAST AGAINST UNDISTURBED GROUND WHERE SHOWN THIS:



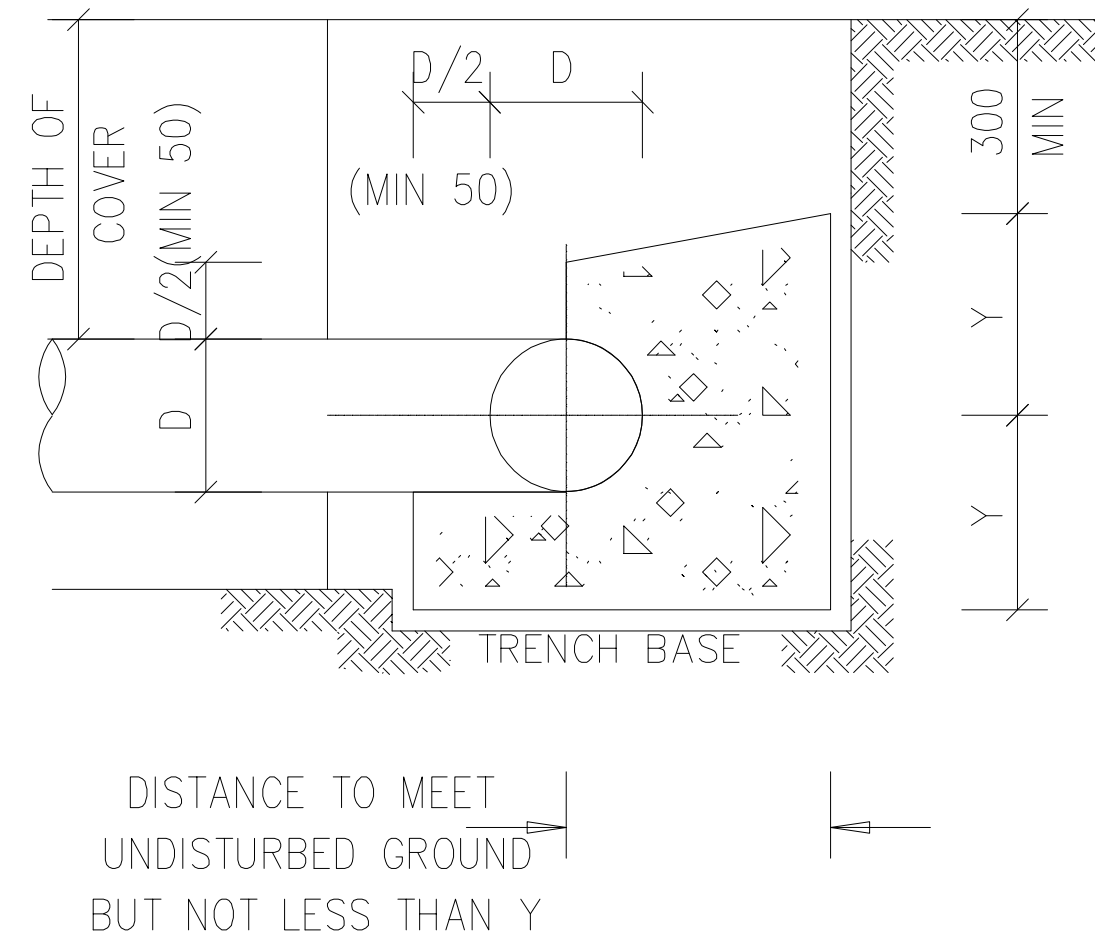
APPLICATION LIMITED TO THE FOLLOWING PIPE SIZE REDUCTIONS

LARGER SIZE (mm)	SMALLER SIZE (mm)
63	50
75	63, 50
90	75, 63
110	90, 75
125	110, 90
140	125, 110
160	140, 125, 110
200	160, 140
250	200
315	250

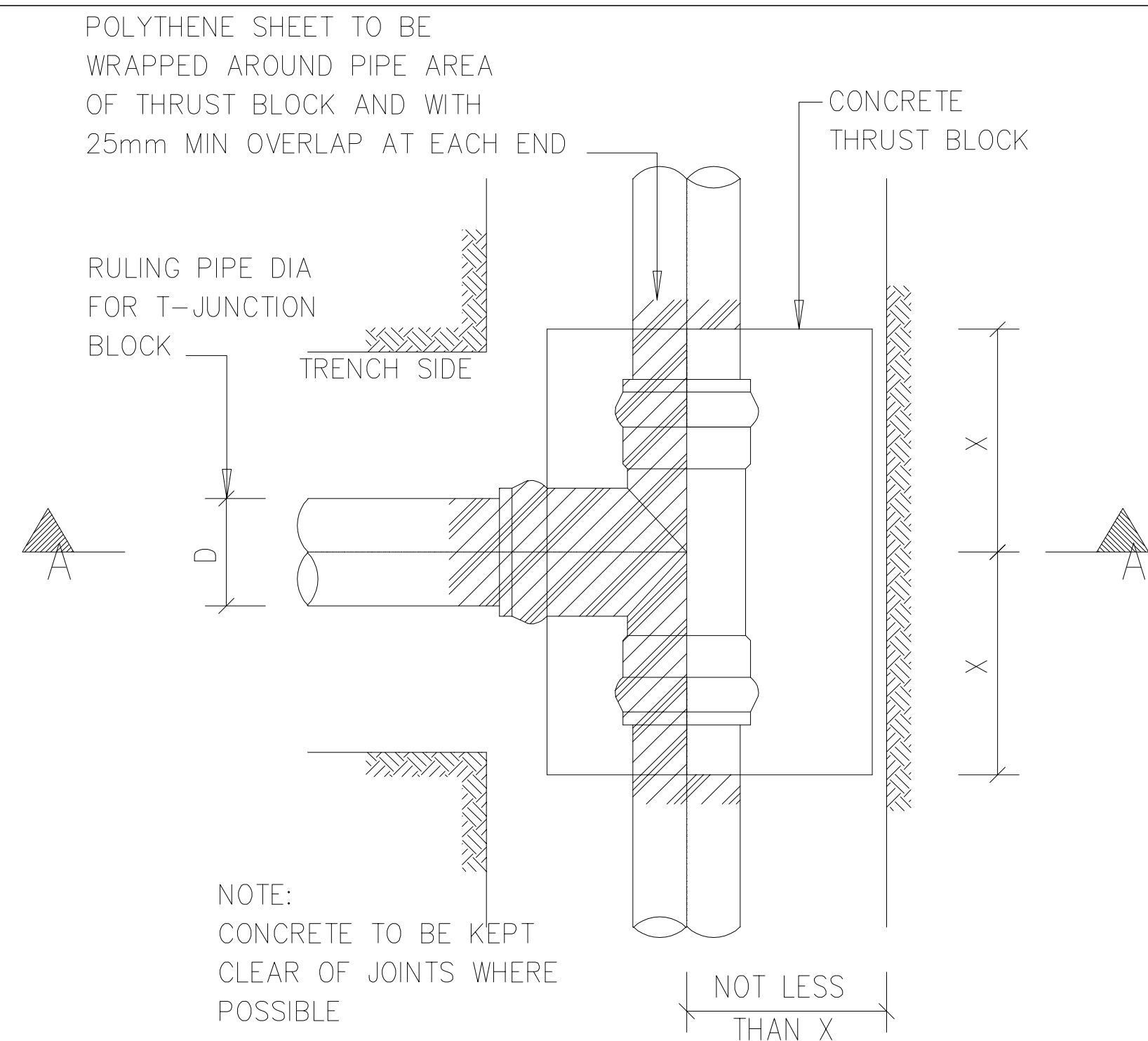
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	67	68	69	70	71	72	73	74	75	76	77	78	79	80	81	82	83	84	85	86	87	88	89	90	91	92	93	94	95	96	97	98	99	100	101	102	103	104	105	106	107	108	109	110	111	112	113	114	115	116	117	118	119	120	121	122	123	124	125	126	127	128	129	130	131	132	133	134	135	136	137	138	139	140	141	142	143	144	145	146	147	148	149	150	151	152	153	154	155	156	157	158	159	160	161	162	163	164	165	166	167	168	169	170	171	172	173	174	175	176	177	178	179	180	181	182	183	184	185	186	187	188	189	190	191	192	193	194	195	196	197	198	199	200	201	202	203	204	205	206	207	208	209	210	211	212	213	214	215	216	217	218	219	220	221	222	223	224	225	226	227	228	229	230	231	232	233	234	235	236	237	238	239	240	241	242	243	244	245	246	247	248	249	250	251	252	253	254	255	256	257	258	259	260	261	262	263	264	265	266	267	268	269	270	271	272	273	274	275	276	277	278	279	280	281	282	283	284	285	286	287	288	289	290	291	292	293	294	295	296	297	298	299	300	301	302	303	304	305	306	307	308	309	310	311	312	313	314	315	316	317	318	319	320	321	322	323	324	325	326	327	328	329	330	331	332	333	334	335	336	337	338	339	340	341	342	343	344	345	346	347	348	349	350	351	352	353	354	355	356	357	358	359	360	361	362	363	364	365	366	367	368	369	370	371	372	373	374	375	376	377	378	379	380	381	382	383	384	385	386	387	388	389	390	391	392	393	394	395	396	397	398	399	400	401	402	403	404	405	406	407	408	409	410	411	412	413	414	415	416	417	418	419	420	421	422	423	424	425	426	427	428	429	430	431	432	433	434	435	436	437	438	439	440	441	442	443	444	445	446	447	448	449	450	451	452	453	454	455	456	457	458	459	460	461	462	463	464	465	466	467	468	469	470	471	472	473	474	475	476	477	478	479	480	481	482	483	484	485	486	487	488	489	490	491	492	493	494	495	496	497	498	499	500	501	502	503	504	505	506	507	508	509	510	511	512	513	514	515	516	517	518	519	520	521	522	523	524	525	526	527	528	529	530	531	532	533	534	535	536	537	538	539	540	541	542	543	544	545	546	547	548	549	550	551	552	553	554	555	556	557	558	559	560	561	562	563	564	565	566	567	568	569	570	571	572	573	574	575	576	577	578	579	580	581	582	583	584	585	586	587	588	589	590	591	592	593	594	595	596	597	598	599	600	601	602	603	604	605	606	607	608	609	610	611	612	613	614	615	616	617	618	619	620	621	622	623	624	625	626	627	628	629	630	631	632	633	634	635	636	637	638	639	640	641	642	643	644	645	646	647	648	649	650	651	652	653	654	655	656	657	658	659	660	661	662	663	664	665	666	667	668	669	670	671	672	673	674	675	676	677	678	679	680	681	682	683	684	685	686	687	688	689	690	691	692	693	694	695	696	697	698	699	700	701	702	703	704	705	706	707	708	709	710	711	712	713	714	715	716	717	718	719	720	721	722	723	724	725	726	727	728	729	730	731	732	733	734	735	736	737	738	739	740	741	742	743	744	745	746	747	748	749	750	751	752	753	754	755	756	757	758	759	760	761	762	763	764	765	766	767	768	769	770	771	772	773	774	775	776	777	778	779	780	781	782	783	784	785	786	787	788	789	790	791	792	793	794	795	796	797	798	799	800	801	802	803	804	805	806	807	808	809	810	811	812	813	814	815	816	817	818	819	820	821	822	823	824	825	826	827	828	829	830	831	832	833	834	835	836	837	838	839	840	841	842	843	844	845	846	847	848	849	850	851	852	853	854	855	856	857	858	859	860	861	862	863	864	865	866	867	868	869	870	871	872	873	874	875	876	877	878	879	880	881	882	883	884	885	886	887	888	889	890	891	892	893	894	895	896	897	898	899	900	901	902	903	904	905	906	907	908	909	910	911	912	913	914	915	916	917	918	919	920	921	922	923	924	925	926	927	928	929	930	931	932	933	934	935	936	937	938	939	940	941	942	943	944	945	946	947	948	949	950	951	952	953	954	955	956	957	958	959	960	961	962	963	964	965	966	967	968	969	970	971	972	973	974	975	976	977	978	979	980	981	982	983	984	985	986	987	988	989	990	991	992	993	994	995	996	997	998	999	1000	1001	1002	1003	1004	1005	1006	1007	1008	1009	1010	1011	1012	1013	1014	1015	1016	1017	1018	1019	1020	1021	1022	1023	1024	1025	1026	1027	1028	1029	1030	1031	1032	1033	1034	1035	1036	1037	1038	1039	1040	1041	1042	1043	1044	1045	1046	1047	1048	1049	1050	1051	1052	1053	1054	1055	1056	1057	1058	1059	1060	1061	1062	1063	1064	1065	1066	1067	1068	1069	1070	1071	1072	1073	1074	1075	1076	1077	1078	1079	1080	1081	1082	1083	1084	1085	1086	1087	1088	1089	1090	1091	1092	1093	1094	1095	1096	1097	1098	1099	1100	1101	1102	1103	1104	1105	1106	1107	1108	1109	1110	1111	1112	1113	1114	1115	1116	1117	1118	1119	1120	1121	1122	1123	1124	1125	1126	1127	1128	1129	1130	1131	1132	1133	1134	1135	1136	1137	1138	1139	1140	1141	1142	1143	1144	1145	1146	1147	1148	1149	1150	1151	1152	1153	1154	1155	1156	1157	1158	1159	1160	1161	1162	1163	1164	1165	1166	1167	1168	1169	1170	1171	1172	1173	1174	1175	1176	1177	1178	1179	1180	1181	1182	1183	1184	1185	1186	1187	1188	1189	1190	1191	1192	1193	1194	1195	1196	1197	1198	1199	1200	1201	1202	1203	1204	1205	1206	1207	1208	1209	1210	1211	1212	1213	1214	1215	1216	1217	1218	1219	1220	1221	12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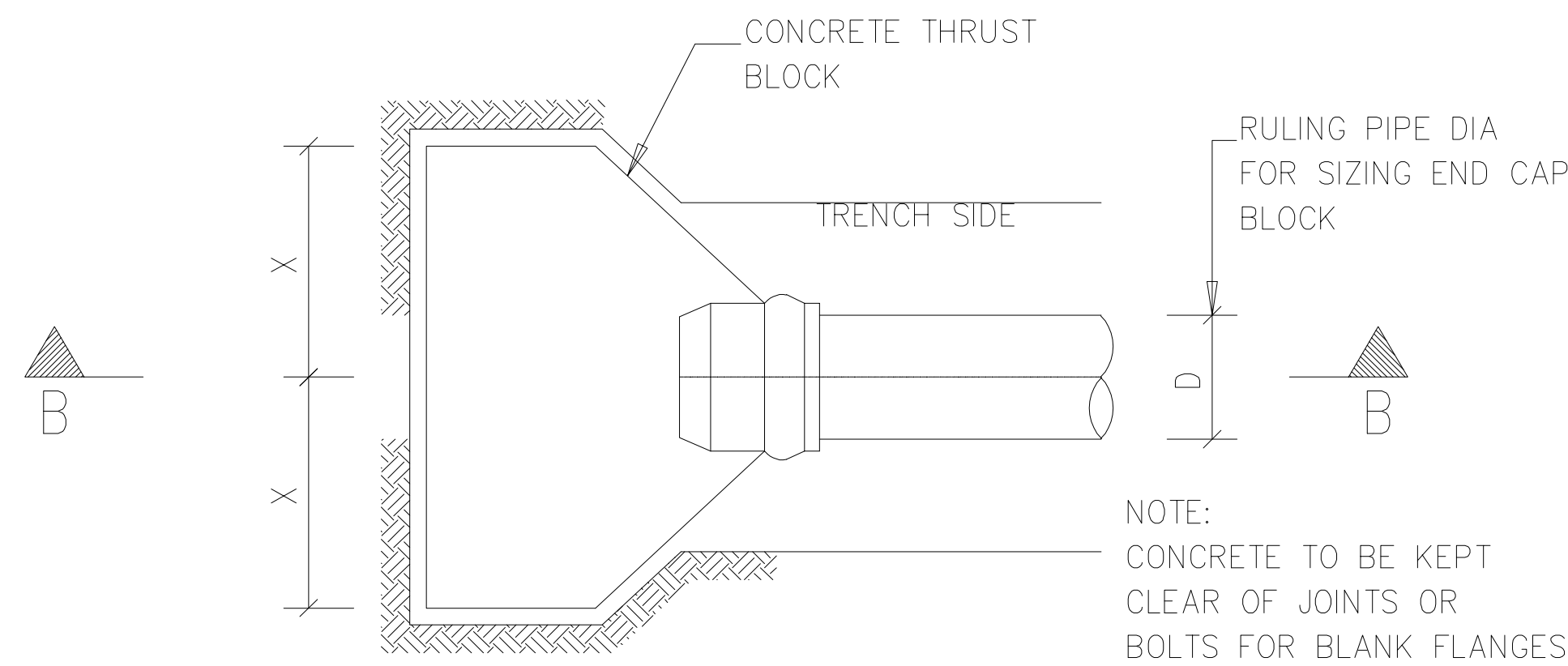
PLAN OF BEND



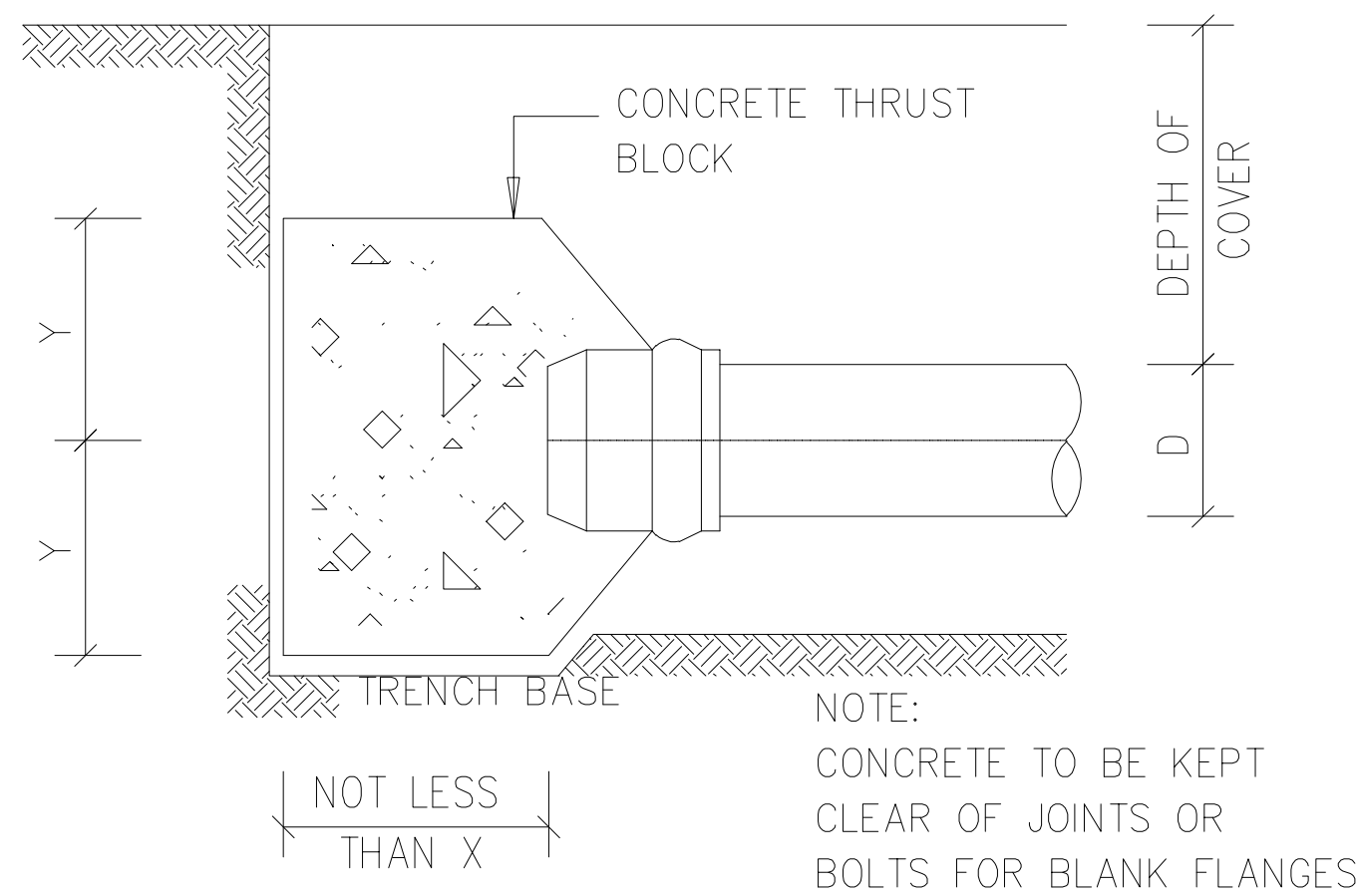
SECTION A—A



PLAN OF T-JUNCTION



PLAN OF END CAP OR BLANK FLANGE



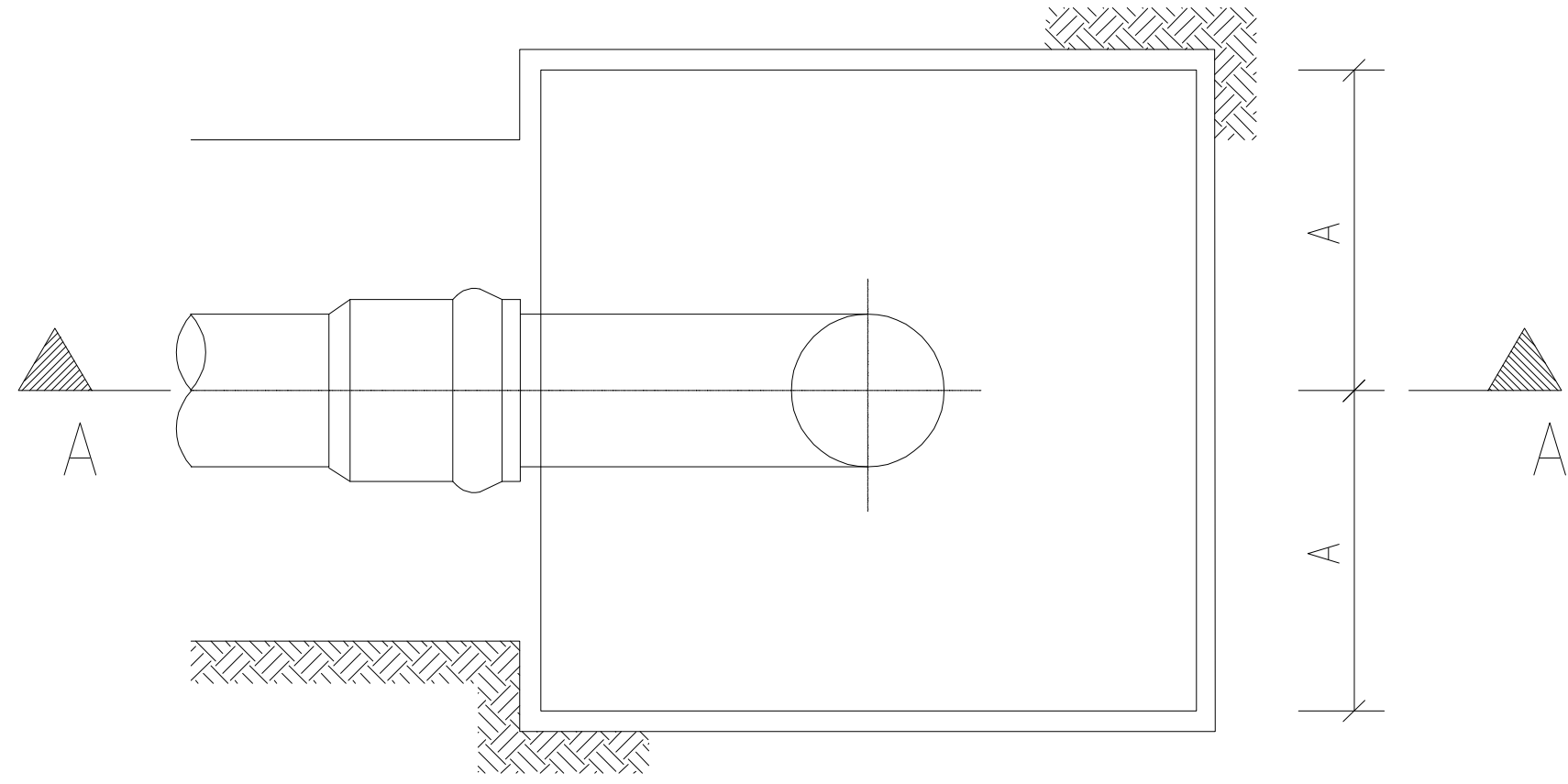
SECTION B—B

NOTES:

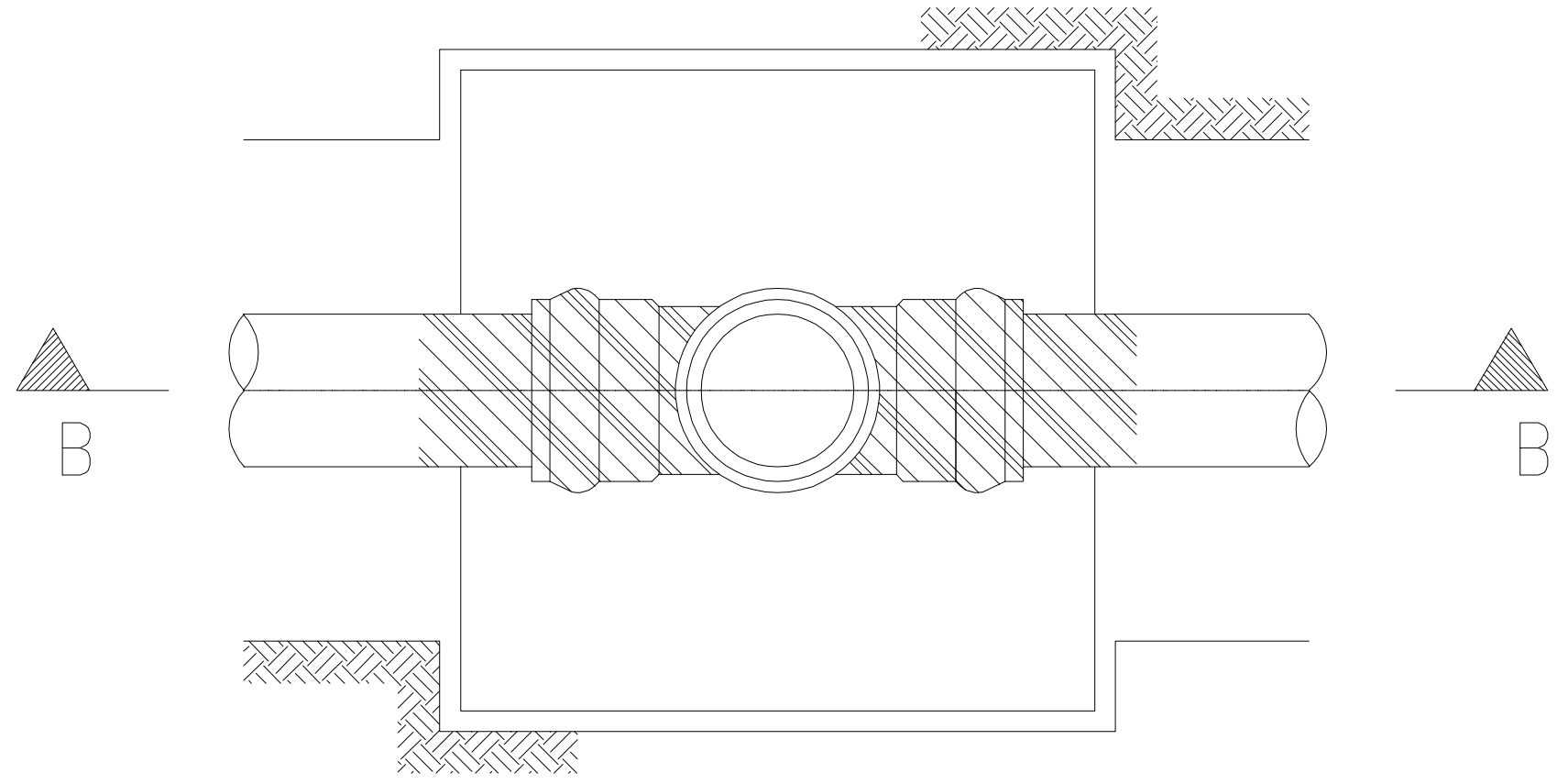
- DRAWINGS APPLIES TO HORIZONTAL THRUST BLOCKS FOR PIPE SIZES 50 – 315mm ONLY.
FOR OTHER DETAILS REFER TO THE FOLLOWING DRAWINGS:
MONT-STD-WTR-0005 – PIPE REDUCERS
MONT-STD-WTR-0007 – VERTICAL THRUST BLOCKS
- MAXIMUM DEPTH OF COVER = 0,8m
- ALL CONCRETE TO BE GRADE 20/19 AND CAST AGAINST UNDISTURBED GROUND WHERE SHOWN THIS:
- THRUST BLOCK DESIGN PARAMETERS:
UNIT WEIGHT OF CONCRETE = 22kN/m}
UNIT WEIGHT OF SOIL = 18kN/m}
COHESIONLESS SOIL: ANGLE OF FRICTION = 30°
BEARING CAPACITY = 70kN/m}
FACTOR OF SAFETY = 1,5

PIPE OD (mm)	ANGLE OF BEND								T-JUNCTION OR END CAP	
	11 1/4 °		22 1/2 °		45°		90°			
	X	Y	X	Y	X	Y	X	Y	X	Y
50	75	75	125	100	150	150	275	175	175	175
63	100	100	150	125	200	175	350	200	225	200
75	125	100	175	150	225	225	400	225	250	250
90	150	125	200	175	275	250	475	275	300	300
110	175	150	225	225	325	300	575	325	375	350
125	200	175	250	250	350	350	650	375	400	400
140	200	200	300	275	400	375	700	400	450	450
160	225	225	325	325	450	425	800	450	500	500
200	275	275	400	375	575	500	1 000	550	675	550
250	350	325	500	450	750	575	1 325	600	950	600
315	425	400	625	550	1 100	600	2 000	600	1 425	600

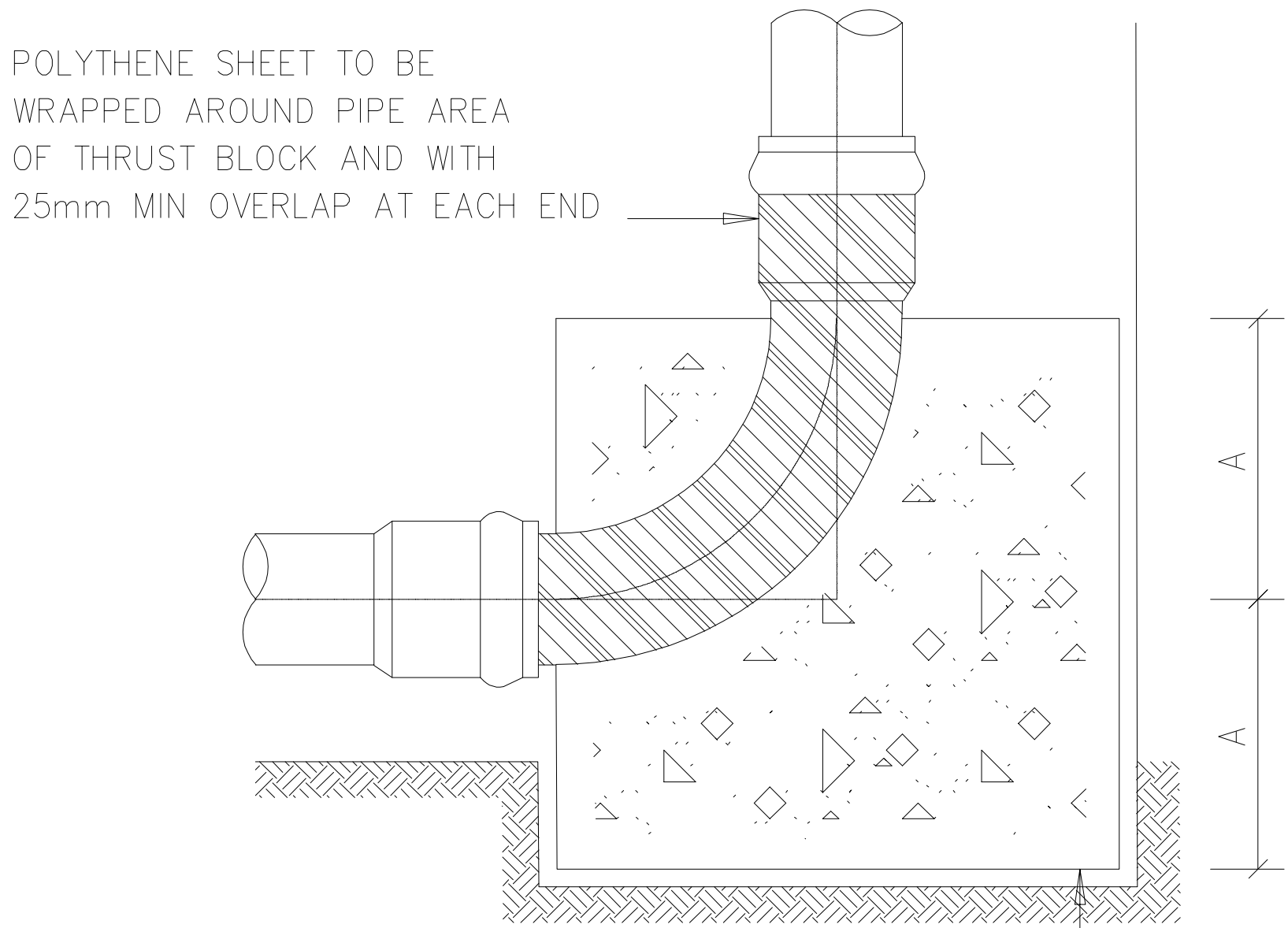
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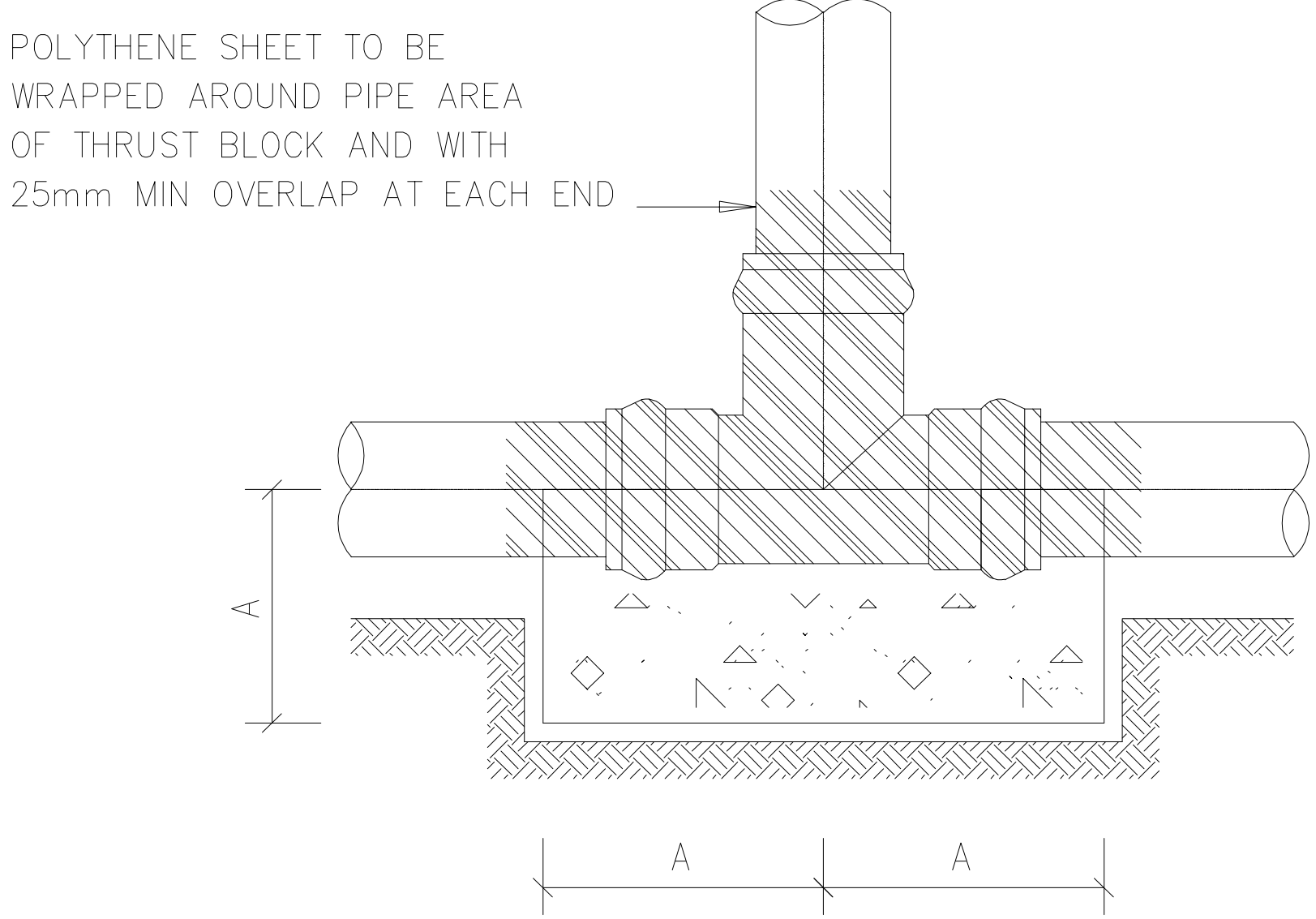
PLAN OF BEND
DOWNWARD THRUST



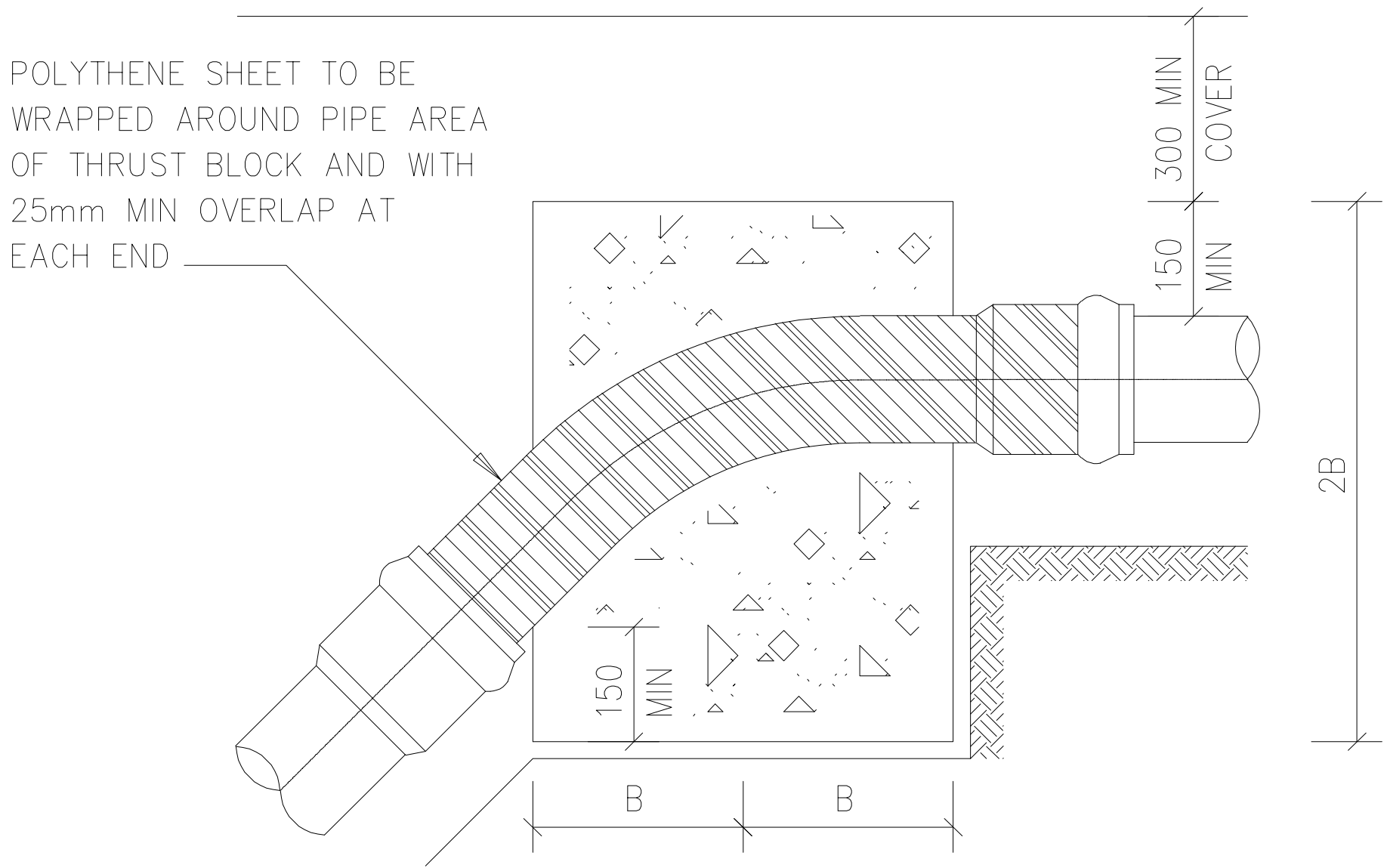
PLAN OF T-JUNCTION
DOWNWARD THRUST BLOCK



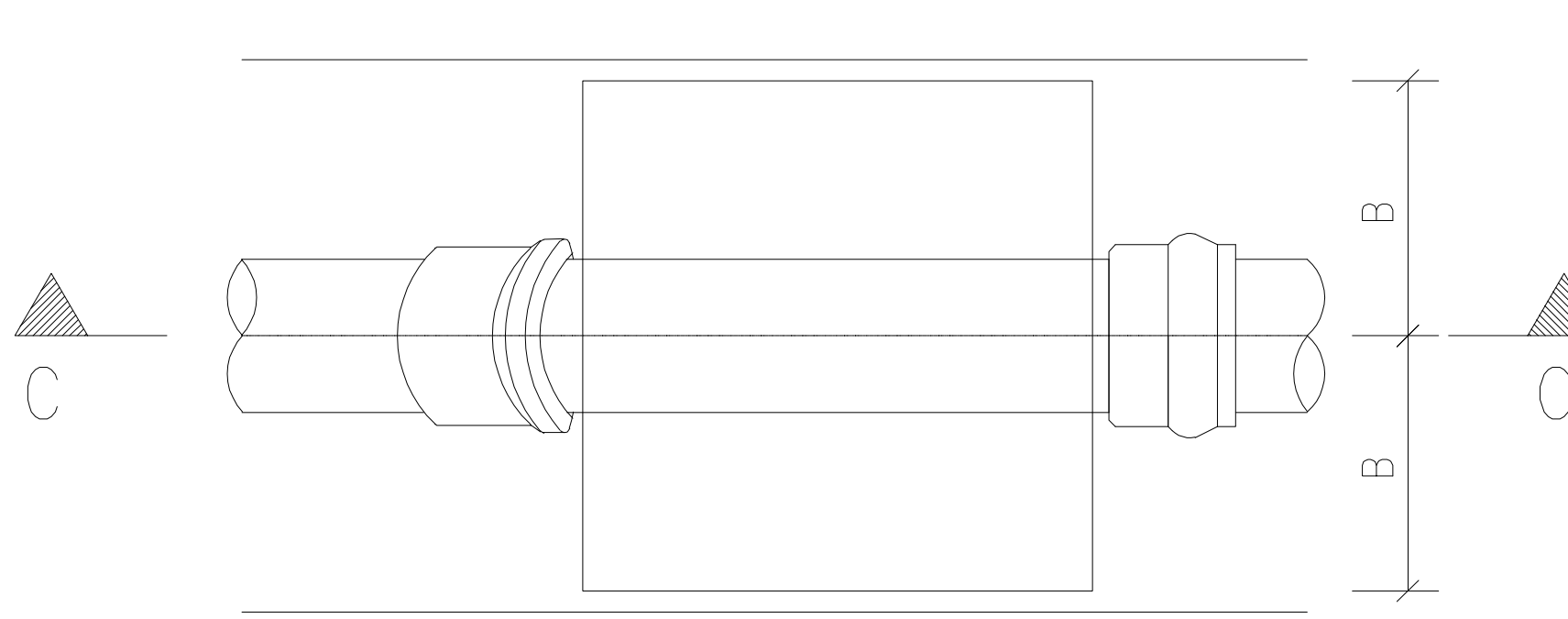
SECTION A-A
BEND



SECTION B-B
T-JUNCTION



SECTION C-C
BEND

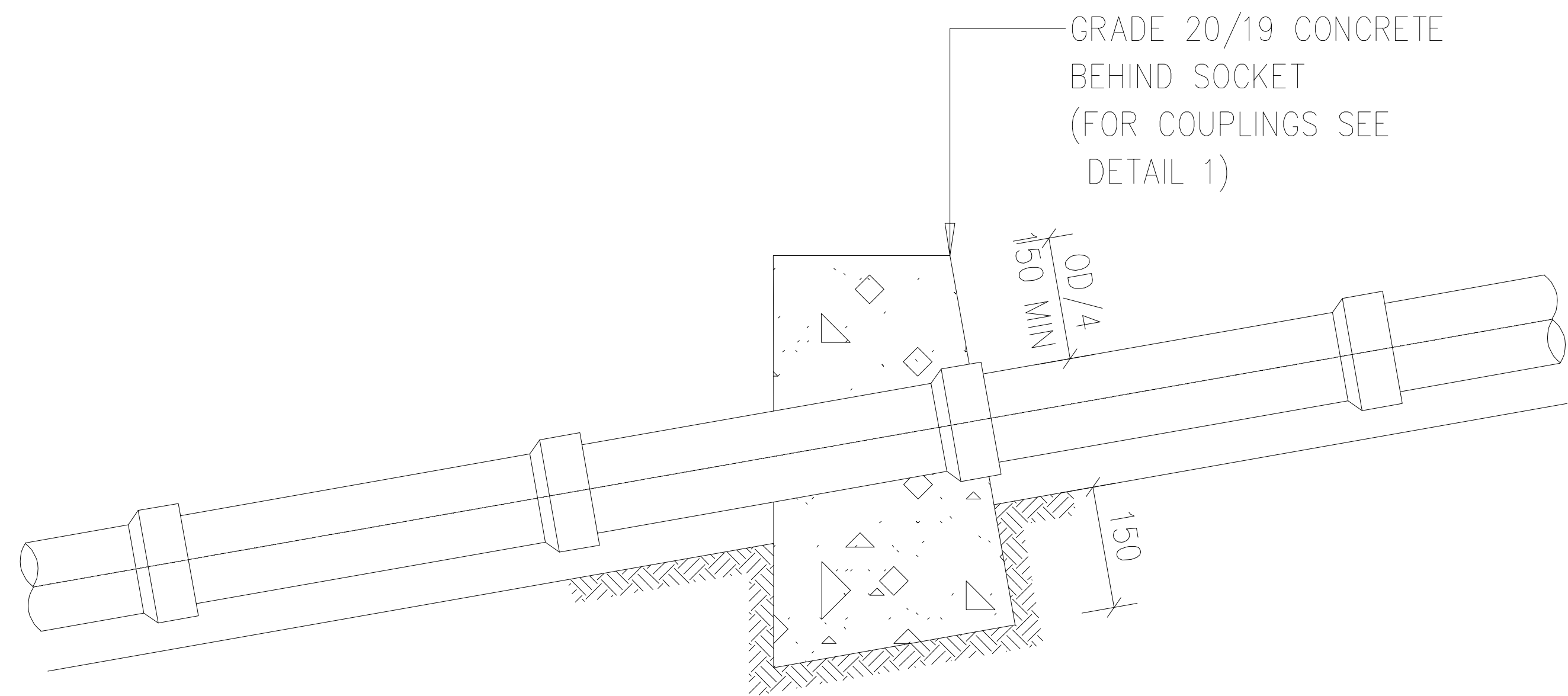


PLAN OF BEND
UPWARD THRUST BLOCK

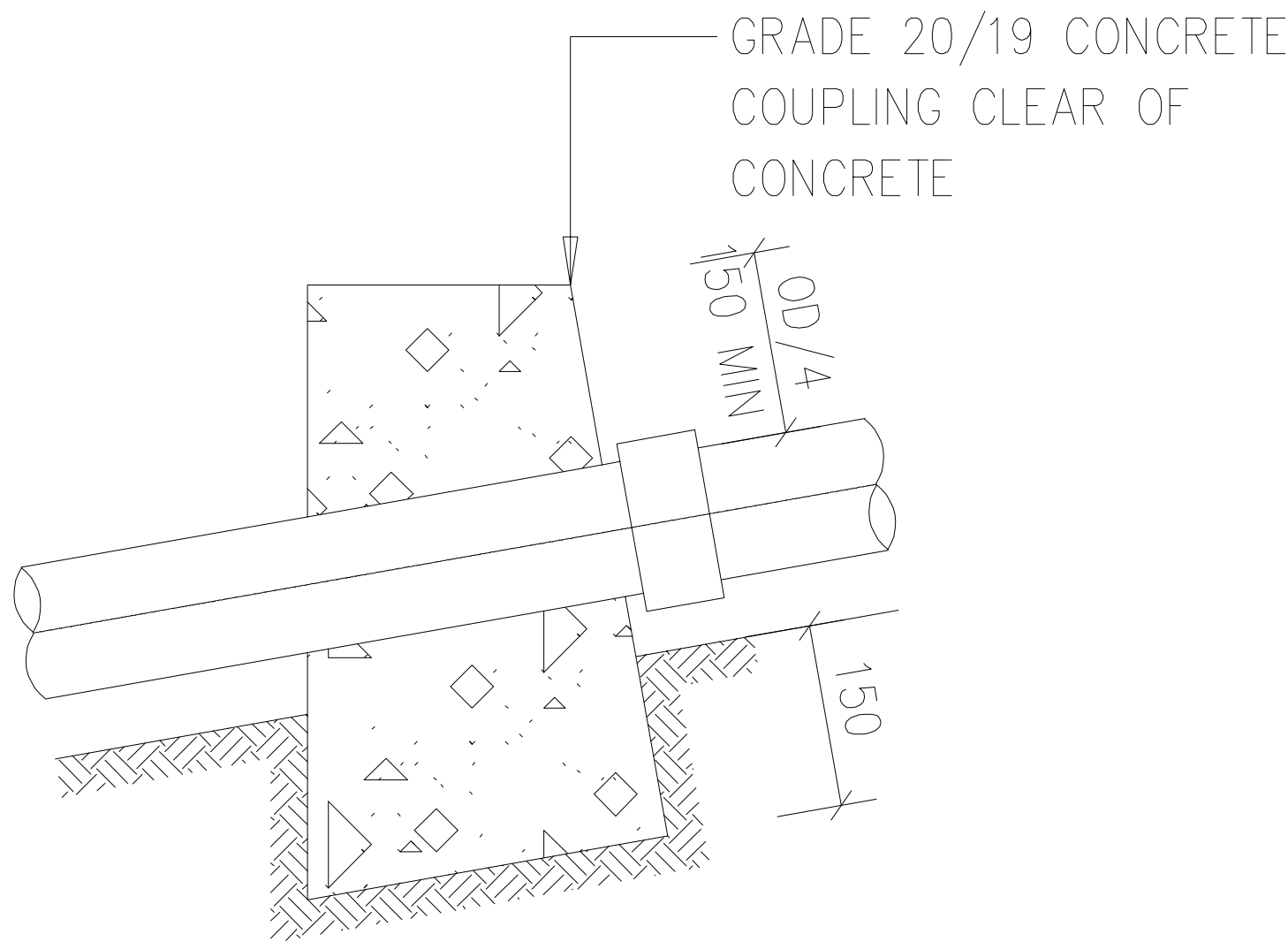
NOTES:

- 1. DRAWINGS APPLIES TO VERTICAL THRUST BLOCKS FOR PIPE SIZES 50 – 315mm ONLY.
FOR OTHER DETAILS REFER TO THE FOLLOWING DRAWINGS
MONT-STD-WTR-0005 – PIPE REDUCERS
MONT-STD-WTR-0006 – HORIZONTAL THRUST BLOCKS
- 2. MAXIMUM DEPTH OF COVER = 0,8m
- 3. ALL CONCRETE TO BE GRADE 20/20 AND CAST AGAINST UNDISTURBED GROUND WHERE SHOWN THIS:
- 5. THRUST BLOCKS DESIGN PARAMETERS:
UNIT WEIGHT OF CONCRETE = 22kN/m³
UNIT WEIGHT OF SOIL = 18kN/m³
COHESIONLESS SOIL: ANGLE OF FRICTION = 30°
BEARING CAPACITY = 70kN/m³
FACTOR OF SAFETY = 1,5

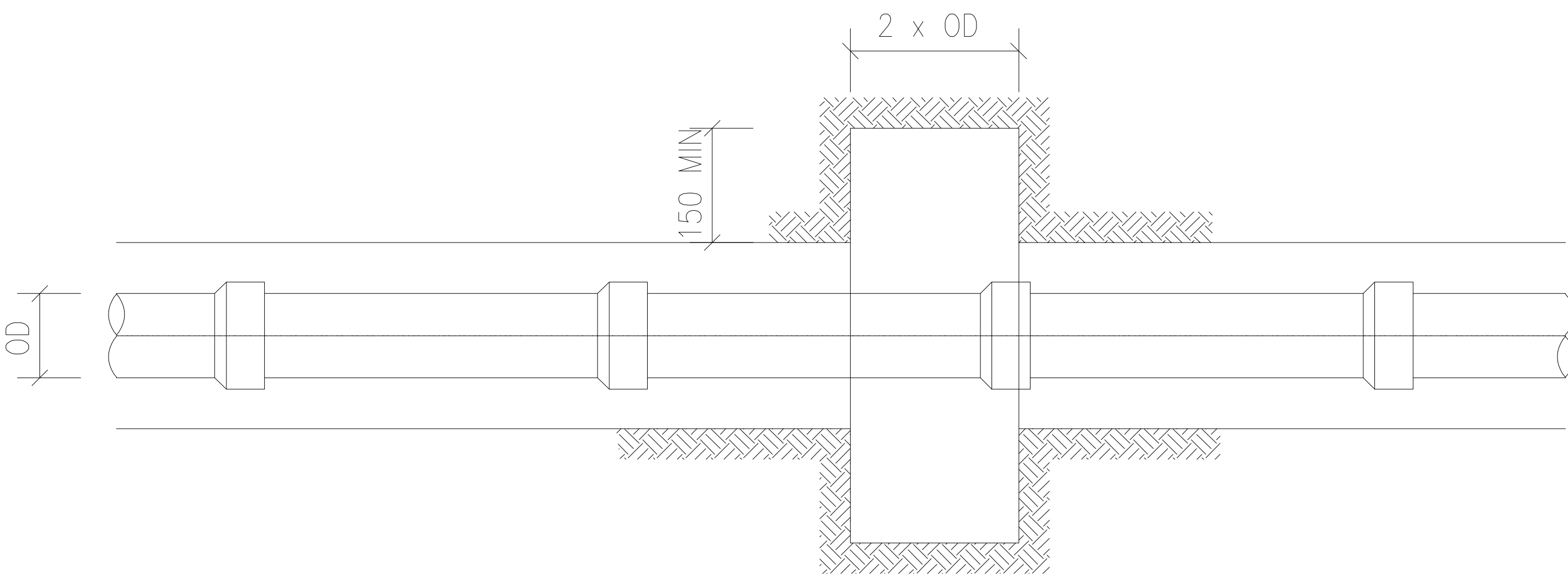
PIPE OD (mm)	DOWNWARD THRUST BLOCK					UPWARD THRUST BLOCK			
	ANGLE OF BEND				T-JUNCTION	ANGLE OF BEND			
	11¼ °	22½ °	45 °	90 °		11¼ °	22½ °	45 °	
	A	A	A	A	A	B	B	B	
50	150	150	150	250	175	250	225	350	
63	150	150	150	275	175	250	300	400	
75	150	150	175	300	200	275	325	425	
90	150	150	200	350	225	300	375	500	
110	150	175	225	400	275	350	425	550	
125	150	200	250	425	300	375	475	600	
140	150	200	275	475	350	400	500	650	
160	175	225	325	500	375	425	550	700	
200	225	300	375	600	475	500	625	800	
250	250	350	475	700	575	575	725	950	
315	325	450	600	800	725	650	850	1 100	



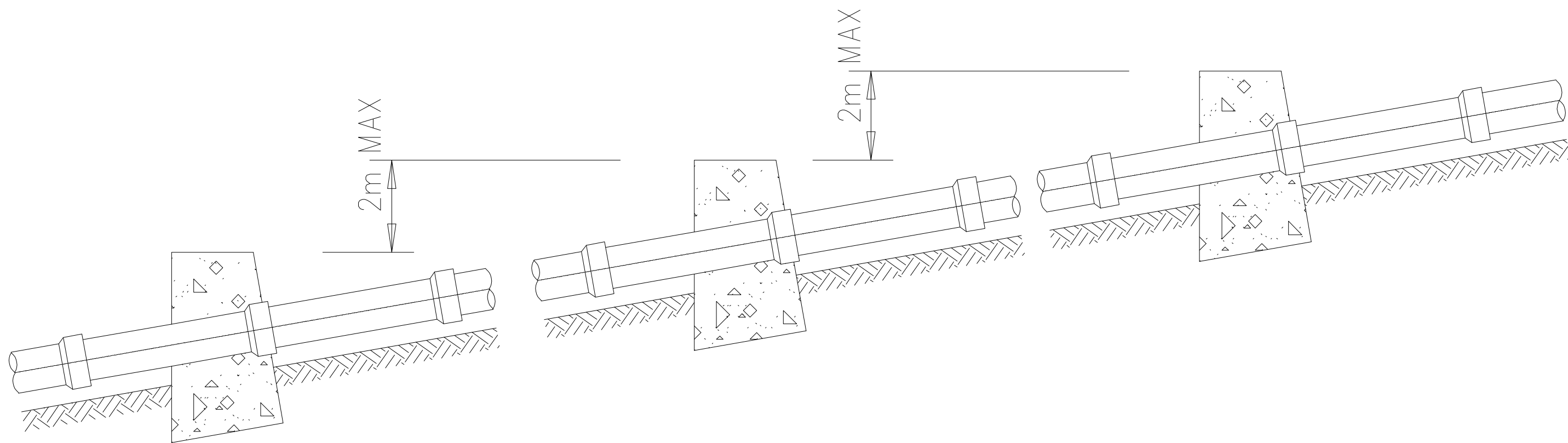
SECTION



DETAIL 1



PLAN



SPACING OF ANCHOR BLOCKS

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DESIGNED BY	SZB RANGANA
CHECKED BY	PXA NDLOVU
DRAWN BY	TA MOSIA
CHECKED BY	TE MUVHANGO

POLOKWANE MUNICIPALITY

PO BOX 111
POLOKWANE
0700

TEL: 015 - 290 2148
FAX: 015 - 290 2207

CITY OF
Polokwane
NATURALLY PROGRESSIVE

mont
consulting engineers

PO BOX 1248
FAUNA PARK
0787

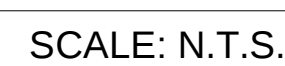
TEL: 015 - 291 4173
FAX: 015 - 291 4218

MONT CONSULTING ENGINEERS

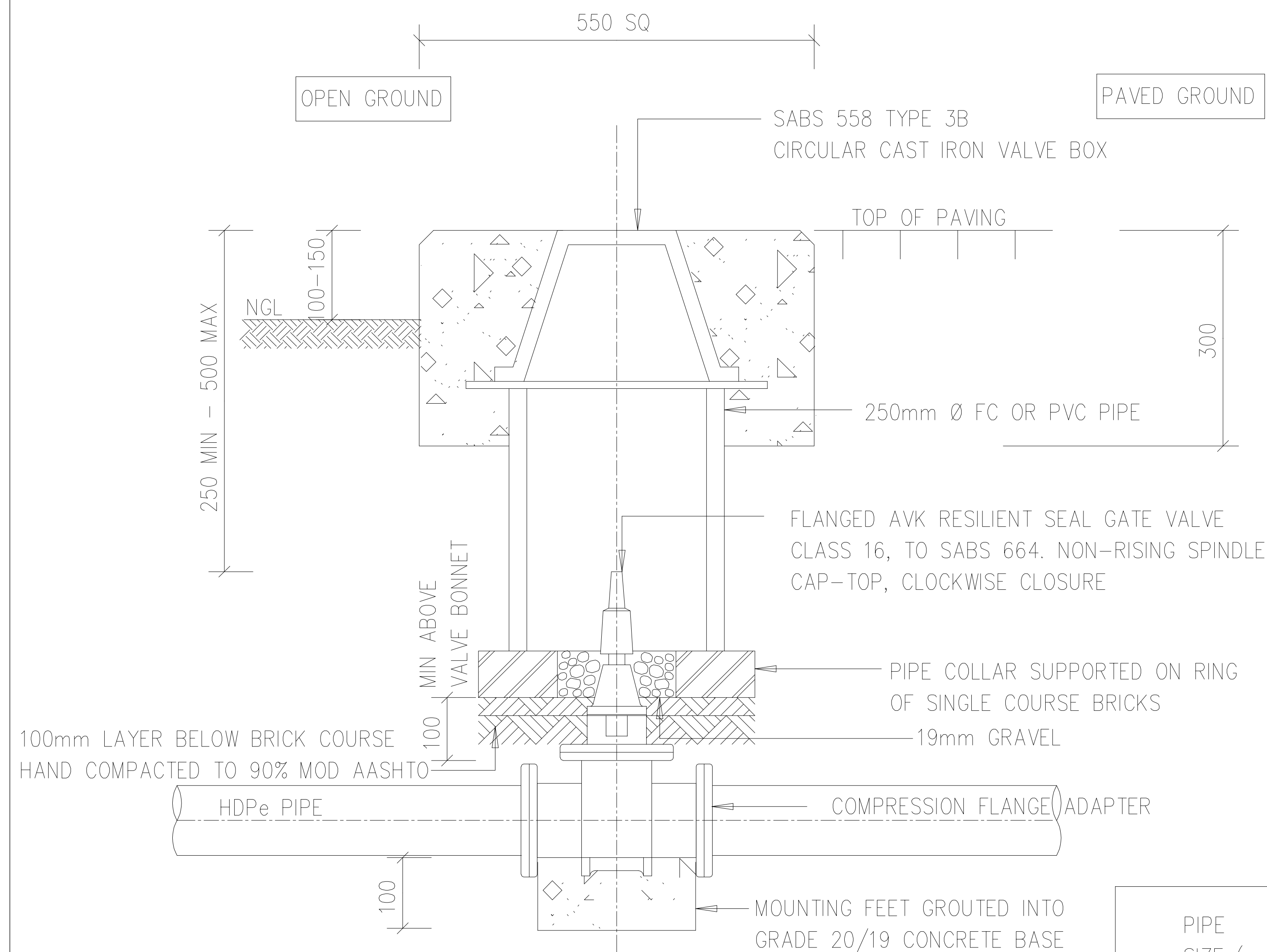
MEMBER OF
CESA

PROJECT CONSTRUCTION OF OLIFANTSPORT REGIONAL WATER SCHEME PHASE 2 (MULTI-YEAR)
BID NO.: PM63/2021
TITLE PIPE ANCHOR BLOCKS ON SLOPES STEEPER THAN 1 TO 10

ISSUED FOR TENDER (not required)
For Tenderers Municipality
For Water Consulting Engineers
DRAWING No. MONT-STYL-WTR-0008
SHEET NO.: 1 OF 1
SCALE AS SHOWN
PAPER SIZE A1
REVISION

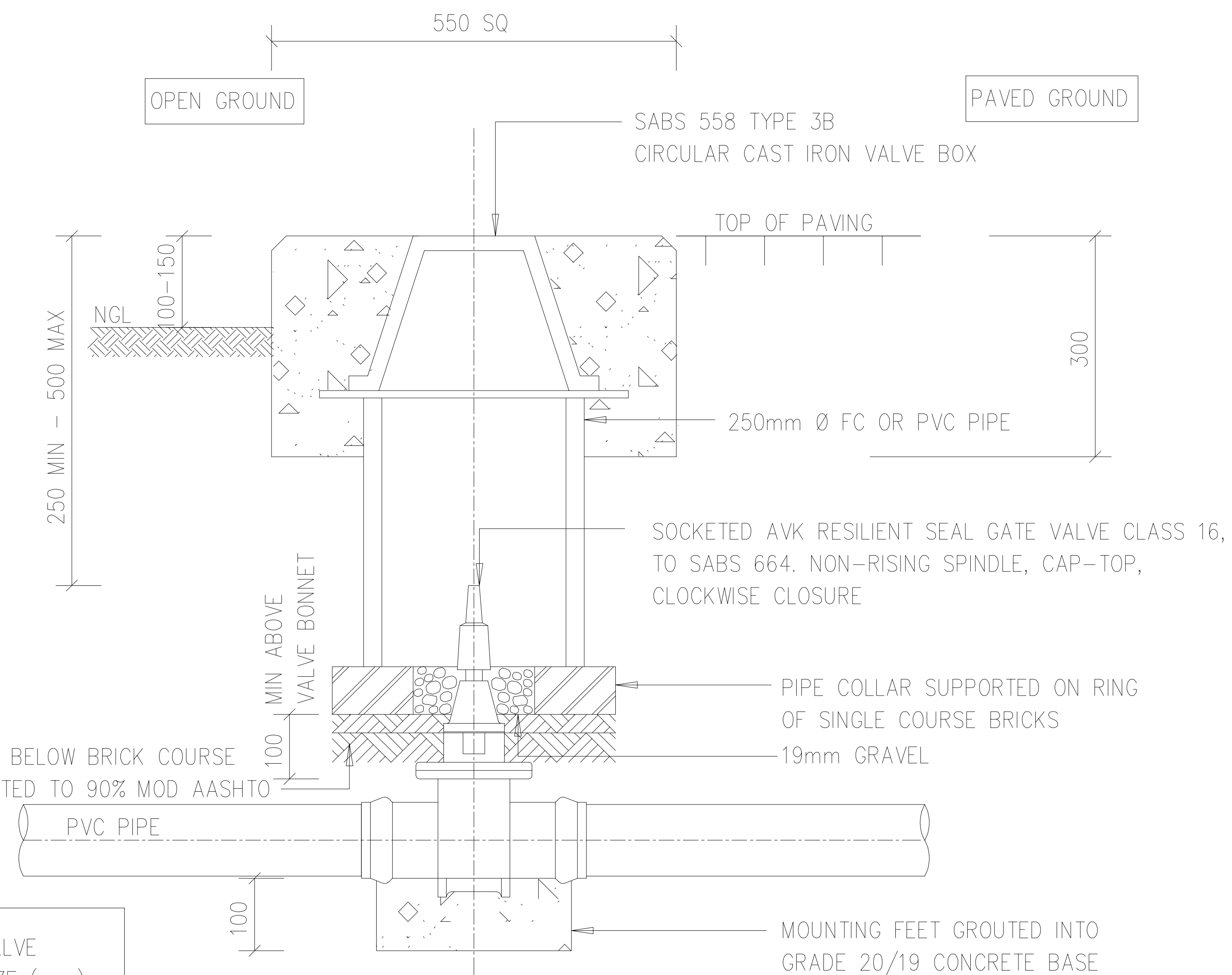


CITY OF
Polokwane
NATURALLY PROGRESSIVE



TYPICAL SECTION HDPe PIPE

PIPE SIZE (mm)	VALVE SIZE (mm)
63 HDPe/uPVC	50
75 or 90 HDPe/uPVC	80
110 uPVC	100
160 uPVC	150
200 uPVC	200



TYPICAL SECTION uPVC PIPE