


<b>TENDER NO. 285Q/2024/25</b>		 <b>CITY OF CAPE TOWN</b> <b>ISIXEKO SASEKAPA</b> <b>STAD KAAPSTAD</b>	
SCM – 509	Approved by Branch Manager: 15/07/2024	Version: 6.4	Page 1 of 286

# CONTRACT DOCUMENT

FOR THE

## UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE

## THE TENDER

**NOTE:**

- The Form of Offer and Acceptance (C1.1) is on **page 39** of this document
- Table 1: Tender Preference Claim Form is on **page 283** of this document

<b>ISSUED BY:</b>  <b>DIRECTOR: ENVIRONMENTAL MANAGEMENT DEPARTMENT SPATIAL PLANNING AND ENVIRONMENT DIRECTORATE CITY OF CAPE TOWN</b> Tower Block, Civic Centre 12 Hertzog Boulevard CAPE TOWN 8001	<b>COMPILED BY:</b>  <b>HHO Consulting Engineers (Pty) Ltd</b> 14 <sup>th</sup> Floor, The Towers South 2 Hertzog Boulevard CAPE TOWN 8001	<b>For official use.</b>
		<b>TENDER SERIAL No.:</b>  <b>SIGNATURES OF CITY OFFICIALS AT TENDER OPENING</b> 1. 2. 3.

SEPTEMBER 2024

<b>NAME OF TENDERING ENTITY</b>	
<b>EMAIL ADDRESS OF TENDERING ENTITY</b>	
<b>FAX NUMBER OF TENDERING ENTITY</b>	
<b>NATURE OF TENDER OFFER</b> (please indicate below)	
<b>Main Offer</b> (see clause C.2.12)	
<b>Alternative Offer</b> (see clause C.2.12)	

**FILE REFERENCE NO:**

CITY OF CAPE TOWN

SPATIAL PLANNING AND ENVIRONMENT: ENVIRONMENTAL MANAGEMENT DEPARTMENT

CONTRACT NO. 285Q/2024/25

UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE

<b>General Tender Information</b>
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TENDER ADVERTISED	:	23 May 2025
ESTIMATED CIDB CONTRACTOR GRADING DESIGNATION	:	7CE or higher
SITE VISIT/CLARIFICATION MEETING	:	10h00 on 6 June 2025 (Not compulsory, but strongly recommended)
VENUE FOR SITE VISIT/CLARIFICATION MEETING	:	False Bay Nature Reserve (Rondevlei Section), No. 1 Fisherman's Walk, Grassy Park.
CLOSING DATE	:	30 June 2025
CLOSING TIME	:	10h00
TENDER BOX & ADDRESS	:	<b>Tender Box 241</b> at the <b>Tender &amp; Quotation Box Office</b> , 2 <sup>nd</sup> Floor (Concourse Level), Civic Centre, 12 Hertzog Boulevard, Cape Town.
	:	The Tender Document (which includes the Form of Offer and Acceptance) completed in all respects, plus any additional supporting documents required, must be submitted in a sealed envelope with the name and address of the tenderer, the tender No. and title, the tender box No. and the closing date indicated on the envelope. The sealed envelope must be inserted into the appropriate official tender box before closing time.
		If the tender offer is too large to fit into the abovementioned box or the box is full, please enquire at the public counter (Tender Distribution Office) for alternative instructions. The onus remains with the tenderer to ensure that the tender is placed in either the original box or as alternatively instructed.

**TENDERERS MUST NOTE THAT WHEREVER THIS DOCUMENT REFERS TO ANY PARTICULAR TRADE MARK, NAME, PATENT, DESIGN, TYPE, SPECIFIC ORIGIN OR PRODUCER, SUCH REFERENCE SHALL BE DEEMED TO BE ACCOMPANIED BY THE WORDS 'OR EQUIVALENT'**

**CITY OF CAPE TOWN**

**SPATIAL PLANNING AND ENVIRONMENT: ENVIRONMENTAL MANAGEMENT DEPARTMENT**

**CONTRACT NO. 285Q/2024/25**

**UPGRADE TO THE ZEEKOEVLIE WEIR IN THE FALSE BAY NATURE RESERVE**

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## **Part T1: Tendering procedures**

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**CITY OF CAPE TOWN**

**SPATIAL PLANNING AND ENVIRONMENT: ENVIRONMENTAL MANAGEMENT DEPARTMENT**

**CONTRACT NO. 285Q/2024/25**

**UPGRADE TO THE ZEEKOEVLIE WEIR IN THE FALSE BAY NATURE RESERVE**

## **T1.1 Tender Notice and Invitation to Tender**

The **CITY OF CAPE TOWN**, SPATIAL PLANNING AND ENVIRONMENT DIRECTORATE, Environmental Management Department, invites tenders for Tender No. **285Q/2024/25: UPGRADE TO THE ZEEKOEVLIE WEIR IN THE FALSE BAY NATURE RESERVE**.

Tenderers must be registered on Supplier Databases as described in the tender conditions.

Tenderers who are not registered on these Supplier Databases are not precluded from submitting tenders, but must however be registered upon being requested to do so in writing and within the period contained in such a request.

It is estimated that tenderers must have a CIDB contractor grading designation of 7CE or higher.

Preferences are offered to tenderers who tender in accordance with the Preferential Procurement Regulations and the City of Cape Town's Supply Chain Management Policy (SCM Policy). Furthermore, in terms of these Regulations and the SCM Policy, tenderers are required to meet the HDI and/or RDP specific goals

The physical address for collection of tender documents is:

**Tender Distribution Office**, 2<sup>nd</sup> Floor (Concourse Level), Civic Centre, 12 Hertzog Boulevard, Cape Town.

Documents may be collected during working hours between 08:30 – 15:00 from **23 May 2025**.

A non-refundable tender fee of R300.00 payable by cash or Electronic Funds Transfer (EFT) in favour of the City of Cape Town, is required on collection of the tender documents.

The Employer's Information Officer who is responsible for overseeing questions in relation to data protection may be contacted at via email [Popia@capetown.gov.za](mailto:Popia@capetown.gov.za). Additional contact details are provided in clause C.1.6.5.6 of the Tender Data.

Queries relating to any issues in these documents may be addressed to Ms Linsy Davids, Email: [linsy.davids@capetown.gov.za](mailto:linsy.davids@capetown.gov.za)

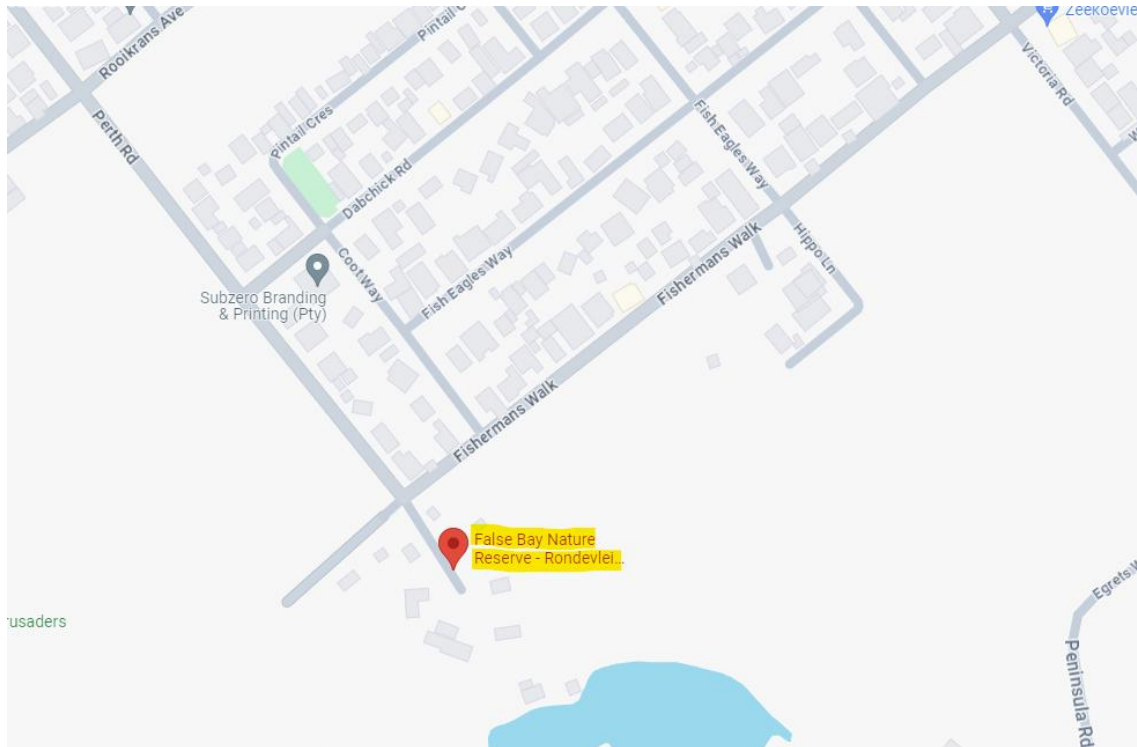
A non-compulsory but strongly recommended site visit/clarification meeting with representatives of the Employer will take place at False Bay Nature Reserve (Rondevlei Section), 1 Fisherman's Walk, Grassy Park (Refer to Locality Plan – Site Visit/Clarification Meeting Venue overleaf) on **6 June 2025** starting at 10:00.

The closing time for receipt of tenders is **10:00** on **30 June 2025**.

Telegraphic, telephonic, telex, facsimile, e-mail and late tenders will not be accepted.

Tenders may only be submitted on the tender documents that have been issued. Printed Bills of Quantities, in the same format (that is, layout, billed items and quantities) as those issued electronically by the Employer upon request, may be submitted as stated in the Tender Data.

Requirements for sealing, addressing, delivery, opening and assessment of tenders are stated in the Tender Data.



**FALSE BAY NATURE RESERVE (RONDEVLEI SECTION), 1 FISHERMAN'S WALK, GRASSY PARK**

**CITY OF CAPE TOWN  
SPATIAL PLANNING AND ENVIRONMENT: ENVIRONMENTAL MANAGEMENT DEPARTMENT  
CONTRACT NO. 285Q/2024/25  
UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE**

**LOCALITY PLAN – SITE VISIT/CLARIFICATION MEETING VENUE**

## T1.2 Tender Data

The conditions of tender are the Standard Conditions of Tender as contained in Annex C of Government Gazette No. 42622 of 8 August 2019, Construction Industry Development Board (CIDB) Standard for Uniformity in Construction Procurement. (see [www.cidb.org.za](http://www.cidb.org.za)) which are reproduced without amendment or alteration for the convenience of tenderers as an Annex to this Tender Data.

The Standard Conditions of Tender make several references to the Tender Data for details that apply specifically to this tender. The Tender Data shall have precedence in the interpretation of any ambiguity or inconsistency between it and the standard conditions of tender. Each item of data given below is cross-referenced to the clause in the Standard Conditions of Tender to which it mainly applies.

**The following variations, amendments and additions to the Standard Conditions of Tender as set out in the Tender Data below shall apply to this tender:**

Clause number	Tender Data
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<b>C.1</b>	<b>General</b>
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C.1.1	<b>Actions</b>
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C.1.1.1	<i>Add the following:</i>
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**The parties agree that this tender, its evaluation and acceptance and any resulting contract shall also be subject to the Employer's Supply Chain Management Policy ('SCM Policy') that was applicable on the date the tender was advertised, save that if the Employer adopts a new SCM Policy which contemplates that any clause therein would apply to the contract emanating from this tender, such clause shall also be applicable to that contract. Please refer to this document contained on the Employer's website.**

**Abuse of the supply chain management system is not permitted and may result in the tender being rejected, cancellation of the contract, restriction of the supplier, and/or the exercise by the Employer of any other rights and remedies available to it as described in the SCM Policy and / or applicable law.**

The Employer is the City of Cape Town ("City" or "CCT"), represented by the Director: ENVIRONMENTAL MANAGEMENT DEPARTMENT: SPATIAL PLANNING AND ENVIRONMENT DIRECTORATE.

C.1.2	<b>Tender Documents</b>
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	<i>Add the following:</i>
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The documents issued by the employer for the purpose of this tender, is described in the **Contents** page preceding **Part T1: Tendering Procedures** of this document.

In addition to the above, the following further documents are part of the tender:

**VOLUME 1:** Drawings (listed in C3.2 Engineering)

**VOLUME 2 :** The General Conditions of Contract for Construction Works, Third Edition, 2015, prepared by the South African Institution of Civil Engineering (SAICE). This publication is available and tenderers must obtain copies at their own cost from the South African Institution of Civil Engineering (SAICE), Private Bag X200, Halfway House 1685, Tel: (011) 805 5947, Fax: (011) 805 5971, e-mail: [civilinfo@saice.org.za](mailto:civilinfo@saice.org.za).

**VOLUME 3 :** The COTO Standard Specifications for Road and Bridge Works for South African Road Authorities prepared by the Committee of Transport Officials. This publication is available and tenderers can view the document at HHO Consulting Engineers, 14<sup>th</sup> Floor, The Towers South, 2 Hertzog Boulevard, Cape Town, Tel 021 425 2870.

The standard forms of contract and the applicable reference standards may also be reviewed, by appointment, at the offices of the Employer's agent during normal office hours.

- C1.2.1 The employer will only issue tender documents through its Tender Distribution Office as described on **T1.1 Tender Notice and Invitation to Tender**. Bidders who obtain documents through any means other than described herein, will not be known to the employer and may thus not receive tender notices and addendums.

It is the responsibility of bidders who obtain documents through any means other than described herein to notify the employer in accordance with C1.4 of these tender conditions that they are participating in the tender. The employer accepts no liability for any tender notices or addendums not reaching any bidders who obtained documents through any means other than described herein.

C1.4 **Communication and employer's agent**

*Delete the first sentence of the clause and replace with the following:*

Verbal or any other form of communication, from the Employer, its employees, agents or advisors during site visits/clarification meetings or at any other time prior to the award of the Contract, will not be regarded as binding on the Employer, unless communicated by the Employer in writing to suppliers by its Director: Supply Chain Management or his nominee.

The Employer's contact details are:

Name: SCM Department

Address: .....City of Cape Town  
.....Civic Centre  
..... 12 Hertzog Boulevard  
.....Cape Town 8001  
Tel: ..... 021 400 0000

E-mail: [SCM.Tenders26@capetown.gov.za](mailto:SCM.Tenders26@capetown.gov.za)

C1.5 **Cancellation and Re-Invitation of Tenders**

*Delete the full stop at the end of C.1.5.1 d) and replace with , or*

*Add the following after C.1.5.1 d):*

- e) the parties are unable to negotiate market related pricing.

C1.6.2 **Competitive negotiation procedure**

*Add the following to C.1.6.2.1:*

A competitive negotiation procedure will not be followed.

C1.6.3 **Proposal procedure using the two-stage system**

*Add the following between C.1.6.3 and C.1.6.3.1:*

A two-stage system will not be followed.

*Add the following after C.1.6.3.2.2*

C1.6.4 **Nomination of Standby Supplier**

Standby Supplier means a bidder, identified at the time of awarding a bid, that will be considered for award should the contract be terminated for any reason whatsoever. In the event that a contract is terminated during the execution thereof, the CCT may consider the award of the contract, or non-award, to the standby supplier in terms of the procedures included its SCM Policy.

C1.6.5 **Objections, complaints, queries and disputes/ Appeals in terms of Section 62 of the Systems Act/ Access to court**

C1.6.5.1 **Disputes, objections, complaints and queries**

In terms of Regulations 49 and 50 of the Local Government: Municipal Finance Management Act, 56 of 2003 – Municipal Supply Chain Management Regulations (Board Notice 868 of 2005):

- a) Persons aggrieved by decisions or actions taken by the City of Cape Town in the implementation of its supply chain management system, may lodge within 14 days of the decision or action, a written objection or complaint or query or dispute against the decision or action.

C.1.6.5.2 **Appeals**

- a) In terms of Section 62 of the Local Government: Municipal Systems Act, 32 of 2000 a person whose rights are affected by a decision taken by the City, may appeal against that decision by giving written notice of the appeal and reasons to the City Manager within 21 days of the date of the notification of the decision.
- b) An appeal must contain the following:
  - i) Must be in writing
  - ii) It must set out the reasons for the appeal
  - iii) It must state in which way the Appellant's rights were affected by the decision;
  - iv) It must state the remedy sought; and
  - v) It must be accompanied with a copy of the notification advising the person of the decision
- c) The relevant City appeal authority must consider the appeal and **may confirm, vary or revoke** the decision that has been appealed, but no such revocation of a decision may detract from any rights that may have accrued as a result of the decision.

C.1.6.5.3 **Right to approach the courts and rights in terms of Promotion of Administrative Justice Act, 3 of 2000 and Promotion of Access to Information Act, 2 of 2000**

The sub- clauses above do not influence any affected person's rights to approach the High Court at any time or its rights in terms of the Promotion of Administrative Justice Act and Promotion of Access to Information Act.

C.1.6.5.4 All requests referring to sub clauses C.1.6.5.1 and C.1.6.5.2 must be submitted in writing to:  
**The City Manager** - C/o the Manager: Legal Compliance Unit, Legal Services Department, Corporate Services Directorate

**Via hand delivery at:** 20<sup>th</sup> Floor, Tower Block, 12 Hertzog Boulevard, Cape Town 8001

**Via post at:** Private Bag X918, Cape Town, 8000

**Via fax at:** 021 400 5963 or 021 400 5830

**Via email at:** [MSA.Appeals@capetown.gov.za](mailto:MSA.Appeals@capetown.gov.za)

C.1.6.5.5 All requests referring to clause C.1.6.5.3 must be submitted in writing to:  
**The City Manager** - C/o the Manager: Access to Information Unit, Corporate Services Directorate

**Via hand delivery at:** 20th Floor, Tower Block, 12 Hertzog Boulevard, Cape Town 8001

**Via post at:** Private Bag X918, Cape Town, 8000

**Via fax at:** 086 202 9982

**Via email at:** [Access2info.Act@capetown.gov.za](mailto:Access2info.Act@capetown.gov.za)

C.1.6.5.6 **The minimum standards regarding accessing and 'processing' of any personal information belonging to another in terms of Protection of Personal Information Act, 2013 (POPIA).**

For purposes of the contract and these Conditions of Tender, the terms "data subject", "Personal Information" and "Processing" shall have the meaning as set out in section 1 of POPIA, and "Process" shall have the corresponding meaning.

The Employer, its employees, representatives and sub-contractors may, from time to time, process the tenderer's and/or its employees', representatives' and/or sub-contractors' personal information, for purposes of, and/or relating to, the tender, the contract and these conditions of tender, for research purposes, and/or as otherwise may be envisaged in the Employer's Privacy Notice and/or in relation to the Employer's Supply Chain Management Policy or as may be otherwise permitted by law. This includes the processing of the latter personal information by the Employer's due diligence assurance provider, professional advisors and the Appeal Authority as applicable. The Employer's justification for the processing of such aforesaid personal information is based on section 11(1)(b) of POPIA, i.e., in terms of which the Employer's processing of the said personal information is necessary to carry out actions for the conclusion and/or performance of the contract, to which the applicable data subject (envisaged in this clause 2.1.6.6 above) is a party.

All requests relating to data protection must be submitted in writing to:

**The City Manager** - C/o the Information Officer, Corporate Services Directorate

**Via hand delivery at:** 20th Floor, Tower Block, 12 Hertzog Boulevard, Cape Town 8001

**Via post at:** Private Bag X918, Cape Town, 8000

**Via fax at:** 086 202 9982

**Via email at:** [Popia@capetown.gov.za](mailto:Popia@capetown.gov.za).

**C.1.6.5.7 Compliance to the City's Appeals Policy.**

In terms of the City's Appeals Policy, a fixed upfront administration fee will be charged. In addition, a surcharge may be imposed for vexatious and frivolous or otherwise manifestly inappropriate tender related appeals.

The current approved administration fee is R300.00 and may be paid at any of the Municipal Offices or at the Civic Centre in Cape Town using the GL Data Capture Receipt attached as annexure 'B' (see Schedule 26) . Alternatively, via EFT into the City's **NEDBANK** Account: **CITY OF CAPE TOWN** and using Reference number: **198158966**. You are required to send proof of payment when lodging your appeal.

The current surcharge for vexatious and frivolous or otherwise manifestly inappropriate tender related appeals will be calculated as  $\frac{1}{2}$  (Administrative cost of the tender appeal) + 0.25%(Appellant's tender price).

Should the payment of the administration fee of R300.00 or the surcharge not be received, such fee or surcharge will be added as a Sundry Tariff to the bidder's municipal account.

In the event where the bidder does not have a Municipal account with the City, the fee or surcharge may be recovered in terms of the City's Credit Control and Debt Collection By-law, 2006 (as amended) and its Credit Control and Debt Collection Policy.

**C.1.7 City of Cape Town Supplier Database Registration**

Tenderers are required to be registered on the CCT Supplier Database as a service provider. Tenderers must register as such upon being requested to do so in writing and within the period contained in such a request, failing which no orders can be raised or payments processed from the resulting contract. In the case of Joint Venture partnerships this requirement will apply individually to each party of the Joint Venture.

Tenderers who wish to register on the City of Cape Town's Supplier Database may collect registration forms from the Supplier Management Unit located within the Supplier Management / Registration Office, 2nd Floor (Concourse Level), Civic Centre, 12 Hertzog Boulevard, Cape Town (Tel 021 400 9242/3/4/5). Registration forms and related information are also available on the City of Cape Town's website [www.capetown.gov.za](http://www.capetown.gov.za) (follow the Supply Chain Management link to Supplier registration).

**C.1.8 National Treasury Web Based Central Supplier Database (CSD) Registration**

Tenderers are required to be registered on the National Treasury Web Based Central Supplier Database (CSD) as a service provider. Tenderers must register as such upon being requested to do so in writing and within the period contained in such a request, failing which no orders can be raised or payments processed from the resulting contract. In the case of Joint Venture partnerships this requirement will apply individually to each party of the Joint Venture.

Tenderers who wish to register on the National Treasury Web Based Central Supplier Database (CSD) may do so via the web address <https://secure.csd.gov.za>.

It is each tenderer's responsibility to keep all the information on the National Treasury Web Based Central Supplier Database (CSD) updated.



## C.2 Tenderer's obligations

### C.2.1 Eligibility

#### C.2.1.1 *Delete the clause and replace with the following:*

Tenderers are obligated to submit a tender offer that complies in all aspects to the conditions as detailed in this tender document. An 'acceptable tender must "COMPLY IN ALL aspect with the tender conditions, specifications, pricing instructions and contract conditions.

#### *Add the following after C.2.1.2:*

#### C.2.1.3 Only those tender submissions from which it can be established that a clear and unambiguous offer has been made to Employer, by whom the offer has been made and what the offer constitutes, will be declared responsive.

#### C.2.1.4 Only those tenders that satisfy the following criteria will be declared responsive:

##### C.2.1.4.1 **Construction Industry Development Board (CIDB) Registration**

Only those tenderers who are registered with the cidb, or capable of being so prior to the evaluation of submissions, in a contractor grading designation equal to or higher than a contractor grading designation determined in accordance with the sum tendered, or a value determined in accordance with Regulation 25 (1B) or 25 (7A) of the Construction Industry Development Regulations, for a CE class of construction work, are eligible to have their tenders evaluated. Tenderers must obtain such active status upon being requested to do so in writing and within the period contained in such a request, failing which their tenders will be declared non-responsive.

Joint Ventures are eligible to submit tenders provided that:

- every member of the joint venture is registered with an active status with the CIDB;
- the lead partner has a contractor grading designation of not lower than one level below the required grading designation in the CE class of construction work; and
- the combined contractor grading designation calculated in accordance with the Construction Industry Development Regulations is equal to or higher than a contractor grading designation determined in accordance with the sum tendered for a CE class of construction work or a value determined in accordance with Regulation 25 (1B) or 25 (7A) of the Construction Industry Development Regulations.

For alpha-numeric associated with the contractor Grading Designations see Annex G attached.

##### C.2.1.4.2 **Compliance with requirements of CCT SCM Policy and procedures**

Only those tenders that are compliant with the requirements below will be declared responsive:

- A completed **Compulsory Enterprise Questionnaire** to be provided (applicable schedule to be completed);
- A completed **Certificate of Authority for Partnerships/ Joint Ventures/ Consortiums** to be provided authorising the tender to be made and the signatory to sign the tender on the partnership /joint venture/consortium's behalf (applicable schedule to be completed);
- A copy of the partnership / joint venture / consortium agreement to be provided;
- A completed **Declaration of Interest – State Employees** to be provided and which does not indicate any non-compliance with the legal requirements relating to state employees (applicable schedule to be completed);
- A completed **Declaration – Conflict of Interest and Declaration of Bidder's past Supply Chain Management Practices** to be provided and which does not indicate any conflict or past practices that renders the tender non-responsive based on the conditions contained thereon (applicable schedules to be completed);
- A completed **Certificate of Independent Bid Determination** to be provided and which does not indicate any non-compliance with the requirements of the schedule (applicable schedule to be completed);
- The tenderer (including any of its directors or members), has not been restricted in terms of abuse of the Supply Chain Management Policy;
- The tenderer's tax matters with SARS are in order, or the tenderer is a foreign supplier that is not required to be registered for tax compliance with SARS;
- The tenderer is not an advisor or consultant contracted with the Employer whose prior or current obligations creates any conflict of interest or unfair advantage;
- The tenderer is not a person, advisor, corporate entity or a director of such corporate entity, involved with the bid specification committee;
- A completed Authorisation for the Deduction of Outstanding Amounts Owed to the City of Cape Town to be provided and which does not indicate any details that renders the tender non-responsive based on the conditions contained thereon (applicable schedules to be completed);
- The tenderer (including any of its directors or members), has not been found guilty of contravening the Competition Act 89 of 1998, as amended from time to time;

- m) The tenderer (including any of its directors or members), has not been found guilty on any other basis listed in the SCM Policy.

#### C.2.1.4.3 Minimum score for functionality

In order to be considered for a contract in terms of this tender, tenderers must achieve the minimum score for functionality as stated below.

The description of the functionality criteria and the maximum possible score for each is shown in the table below. The score achieved for functionality will be the sum of the scores achieved, in the evaluation process, for the individual criteria.

Description of functionality criteria	Maximum possible score
1. Demonstrated experience of the tendering entity with respect to similar relevant projects	25
2. Construction Manager Qualification / Registration	25
3. Demonstrated experience of the Construction Manager in relation to the Scope of Work	25
<b>Maximum possible score for Functionality</b>	<b>75</b>

The minimum score for functionality is **52**. Tenderers that fail to achieve the minimum score for functionality will be declared as non-responsive.

Where the entity tendering is a Joint Venture the tender must be accompanied by a statement describing exactly what aspects of the work will be undertaken by each party to the joint venture (appended to Schedule 3, Part C5.2: Returnable Schedules).

Tenderers shall ensure that all relevant information has been submitted with the tender offer in the prescribed format to ensure optimal scoring of functionality points for each Evaluation Criteria. Failure to provide all information **IN THIS TENDER SUBMISSION** could result in the tenderer not being able to achieve the specified minimum scoring.

A more detailed explanation of the functionality criteria is given below.

The definition of a similar relevant project must contain all the following criteria:

- Works must be similar in nature, which consists of the following:
  - Structural concrete works, both in-situ and precast concrete, executed in/adjacent to a water body, which required temporary works such as cofferdams, dewatering, water diversions etc.
- Contracts may have been executed as the Sub-contractors or Main Contractors.

It must be noted that only specific civil projects matching the Relevant Project criteria will be considered in terms of scoring functionality for tenderer and construction manager.

The following type of projects will not be considered as similar relevant projects:

- Maintenance work
- Structural concrete works which did not include temporary works such as cofferdams, dewatering, water diversions etc.
- Minor stormwater works

#### **EVALUATION CRITERION 1 – Demonstrated experience of the tendering entity with respect to similar relevant projects**

Refer to the table below for a measurement of how points will be awarded against this criterion.

In the case of Joint Ventures each member of the JV will be required to provide information about their relevant experience. Points will be allocated according to their percentage share in the JV agreement.



A detailed list of successfully completed projects must be completed in The Contract: Schedule 10, Schedule of Relevant Work Experience of Tenderer.

<b>1. RELEVANT EXPERIENCE (Maximum 25 Points)</b>		
<b>INDICATOR</b>	<b>POINTS</b>	<b>Evaluation Criteria for Experience of the tendering entity: (number of Similar Relevant Projects successfully completed by the tenderer)</b>
1	0	Zero Similar Relevant Projects
2	10	1 Similar Relevant Project
3	20	2 Similar Relevant Projects
4	25	3 or above Similar Relevant Projects

#### **EVALUATION CRITERION 2 – Construction Manager Qualification/Registration**

The construction manager should be a competent person in the Built Environment as required in terms of the provisions of the National Qualification Framework Act 2000 (Act No.67 of 2000) and in line with the definition of 'Competence'.

In accordance with GCC 4.12.2, a Construction Manager shall be on the Site at all times when work is being performed. "Construction Manager" means a competent person responsible for the full-time management of the physical construction processes and the coordination, administration and management of resources on a construction site.

Refer to the table below for a measurement of how points will be awarded against the qualification criterion.

**Detailed information and a copy/copies of the relevant qualification/registration for the Construction Manager must be submitted and included in The Contract: Schedule 13, Details of Qualifications and Experience: Construction Manager**

<b>2. RELEVANT QUALIFICATION / REGISTRATION (Maximum 25 Points)</b>		
<b>INDICATOR</b>	<b>POINTS</b>	<b>Evaluation Criteria for Relevant Qualification/Registration of the Construction Manager:</b>
1	0	No Qualification / Registration
2	15	3 year National Diploma (Civil Engineering) – NQF6 <b>OR</b> PrCM (SACPCMP)
3	25	BTech / BSc / BEng (Civil Engineering) - NQF 7 or Higher

#### **EVALUATION CRITERION 3 Demonstrated experience of the Construction Manager in relation to the Scope of Work.**

Detailed information on the relevant projects and verifiable contract details for the Construction Manager must be submitted and included in **The Contract: Schedule 13, Details of Qualifications and Experience: Construction Manager** of the Returnable Documents.

Construction Manager must have relevant experience, acted in the role as construction manager and successfully completed Similar Relevant Projects as defined above (please note that current projects will not be included in the evaluation).

If the company has different internal designations for these positions, they are to clarify which designation is equivalent to the required positions stated above. Information provided with alternative designations without the required clarification shall be ruled to be non-responsive.

<b>3. RELEVANT EXPERIENCE OF CONSTRUCTION MANAGER (Maximum 25 Points)</b>		
<b>INDICATOR</b>	<b>POINTS</b>	<b>Evaluation Criteria for demonstrated experience of the Construction Manager in relation to the Scope of Work.</b>
1	0	Zero Similar Relevant Projects successfully completed
2	10	1 Similar Relevant Project successfully completed
3	20	2 Similar Relevant Projects successfully completed
4	25	3 or above Similar Relevant Projects successfully completed

#### C.2.1.4.4 **Non-compulsory clarification meeting**

Tenderers are strongly recommended to attend a non-compulsory clarification meeting at which they may familiarise themselves with aspects of the proposed work, services or supply and pose questions.

Details of the meeting(s) are stated in the General Tender Information.

#### C.2.1.4.5 **Good standing with Bargaining Council**

Only those tenders submitted by tenderers who are in good standing with the **Bargaining Council for the Civil Engineering Industry (BCCEI)** or the **Building Industry Bargaining Council (BIBC)** at the time of the tender award will be declared responsive. Tenderers must attach such proof to the schedule titled **Declaration in Respect of Compliance with Labour Legislation** or obtain such upon being requested to do so in writing and within the period contained in such a request, failing which their tenders will be declared non-responsive.

#### C.2.3 **Check documents**

C.2.3 *Delete the clause and replace with the following:*

The Tenderer should check the tender documents on receipt for completeness, missing or duplicated pages, indistinct figures or writing and any obvious errors. The Tenderer must notify the Employer's agent at once of any such problems identified

#### C.2.7 **Clarification meeting**

*Add the following after the second sentence:*

The arrangements for the site visit/clarification meeting are as stated on the General Tender Information page and in the Responsiveness Criteria (if applicable) .

Tenderers should be represented at the site visit/clarification meeting by a person who is suitably qualified and experienced to comprehend the implications of the work involved.

#### C.2.8 **Seek Clarification**

*Add the following after the first sentence:*

The tenderer warrants that it has:

- inspected the Specifications and read and fully understood the Conditions of Contract.
- read and fully understood the whole text of the Specifications and Price Schedule and thoroughly acquainted itself with the nature of the goods proposed and generally of all matters which may influence the Contract.
- visited the site(s) where delivery of the proposed works will take place, carefully examined existing conditions, the means of access to the site(s), the conditions under which the delivery is to be made, and acquainted itself with any limitations or restrictions that may be imposed by the Municipal or other Authorities in regard to access and transport of materials, plant and equipment to and from the site(s) and made the necessary provisions for any additional costs involved thereby.
- requested the Employer to clarify the requirements contained in the Specifications and Price Schedule, the exact meaning or interpretation of which is not clearly intelligible to the tenderer.
- received any notices to the tender documents which have been issued in accordance with the Employer's SCM Policy.

The Employer will therefore not be liable for the payment of any extra costs resulting from any claim submitted by the tenderer arising from any alleged ambiguity or uncertainty contained in the tender document.

- C.2.11 **Alterations to documents**  
*Delete the first sentence and replace with the following:*  
 Do not make any alterations or additions to the tender documents, except to comply with instructions issued by the employer in writing, or necessary to correct errors made by the tenderer.
- C.2.12 **Alternative tender offers**  
 C.2.12.1 *Add the following to C.2.12.1 at the end of the first sentence:*  
 If a tenderer wishes to submit an alternative tender offer, he shall do so as a separate offer on a separate set of tender documents. The alternative tender offer shall be submitted in a separate sealed envelope on a separate Form of Offer, both clearly marked "Alternative Tender" in order to distinguish it from the main tender offer.
- While it is not necessary to duplicate all parts of the main tender offer, the alternative tender offer shall be supported by the following documents as applicable:
- the schedule that compares the alternative(s) offered with the requirements of the issued tender documents
  - preliminary designs, calculations, drawings and all other pertinent technical information and characteristics must be submitted with the alternative tender offer, in order to enable the Employer to evaluate the efficacy of the alternatives proposed
  - revised Bills of Quantities, or parts thereof, highlighting the changes made, together with a revised Summary, the total of which has been carried to the Form of Offer
  - details of any proposed amendments to the Pricing Assumptions
- .An alternative of the highest ranked acceptable main tender offer that is priced higher than the main tender offer may be recommended for award, provided that the ranking of the alternative tender -offer is higher than the ranking of the next ranked acceptable main tender offer.
- The Employer's costs in confirming the acceptability of the alternative offer will be, *inter alia*, taken into account in considering the alternative offer.
- The Employer will not be bound to consider alternative tenders and shall have sole discretion in this regard.
- In the event that the alternative is accepted, the Contractor shall accept full responsibility that the alternative offer complies in all respects with the Employer's standards and requirements.
- C.2.13 **Submitting a tender offer**  
*Add the following to C.2.13.1 at the end of the first sentence:*
- C.2.13.1 Where the tendering entity is a joint venture it is recommended that the standard CIDB Joint Venture Agreement be used.
- C.2.13.5 *Delete the clause and replace with the following.*
- C.2.13.5 The tender submission details are all described on the General Tender Information page. If it is not possible to submit the original tender and the required copies (see C.2.13.3) in a single envelope, then the tenderer must seal the original and each copy of the tender offer as separate packages marking the packages as "ORIGINAL" and "COPY" in addition to the aforementioned tender submission details.
- Add the following to C.2.13.6:*
- C.2.13.6 A two-envelope procedure will **not** be followed (C.3.5).
- Add the following after C.2.13.9:*
- C.2.13.10 By signing the offer part of C1.1 Form of Offer and Acceptance the tenderer declares that all information provided in the tender submission is true and correct.
- C.2.13.11 The Employer shall not formally issue tender documents in electronic format and shall only issue tender documents in hardcopy. An electronic version of the issued tender documents, or elements thereof, may be made available to the tenderer at the Employer's discretion, upon written request in terms of this clause, subject to the following:
- Electronic copies of the issued tender documents, or parts thereof, will only be provided to tenderers who have been issued with the tender documents as contemplated in C.1.2 in hardcopy.
  - The electronic version shall not be regarded as a substitute for the issued tender documents.
  - The Employer shall not accept tenders submitted in electronic format. Only those tenders that have been completed on the issued hard copy tender document shall be considered, provided

that printed Bills of Quantities, in the same format (that is, layout, billed items and quantities) as those issued electronically by the Employer, may be submitted with the tender as stated in C.2.13.2.

- d) Where Addenda have been issued which amend the Bills of Quantities, then the printed Bills of Quantities shall take these into account. The pages of the issued Bills of Quantities should not be removed from the tender document.
- e) The Employer accepts no responsibility or liability arising from any reliance on or use of the electronic version provided in terms of this clause. Tenderers are alerted to the fact that electronic versions of the tender documents may not reflect any notices or addenda that amend the tender document.
- f) Any non-compliance with these provisions, including effecting any unauthorised alterations to the tender documents as contemplated in C.2.11, shall render the tender non-responsive. The Employer reserves the right to take any action against such tenderer allowed in law including, in circumstances where the tender had already been awarded, the right to cancel the contract.
- g) In requesting the electronic version of the tender documents or parts thereof, the tenderer is deemed to have read, understood and accepted all of the above conditions.

**C.2.15 Closing time**

*Add the following to C.2.15.1 after the first sentence:*

C.2.15.1 The closing time for submission of tender offers is as stated in the Tender Notice and Invitation to Tender.

**C.2.16 Tender offer validity**

*Add the following to C.2.16.1 after the first sentence:*

C.2.16.1 The tender offer validity period is **12 weeks (84 days)**.

C.2.16.2 *Delete the clause and replace with the following:*

Notwithstanding the period stated above, bids shall remain valid for acceptance for a period of twelve (12) months after the expiry of the original validity period, unless the City is notified in writing of anything to the contrary by the bidder. The validity of bids may be further extended by a period of not more than six months subject to mutual agreement and administrative processes and upon approval by the City Manager, unless the required extension is as a result of an appeal process or court ruling.

In circumstances where the validity period of a tender has expired, and the tender has not been awarded, the tender process is considered "completed", despite there being no decision (award or cancellation) made. This anomaly does not fall under any of the listed grounds of cancellation and should be treated as a "non award". A "non award" is supported as a recommendation to the BAC for noting.

**C.2.17 Clarification of tender offer after submission**

*Add the following to C.2.17 at the end of the third sentence:*

A tender will be rejected as non-responsive if the tenderer fails to provide any clarification or supporting documents requested by the Employer within the time for submission stated in the Employer's written request for such clarification or documents.

**C.2.18 Provide other material**

*Delete the following word in C.2.18.1:*

C.2.18.1 notarized

*Add the following to C.2.18.1 at the end of the first paragraph:*

Provide, on written request by the Employer, where the transaction value (tendered amount) inclusive of VAT **exceeds R 10 million:**

- a) audited annual financial statement for the past 3 years, or for the period since establishment if established during the past 3 years, if required by law to prepare annual financial statements for auditing;
- b) a certificate signed by the tenderer certifying that the tenderer has no undisputed commitments for municipal services towards a municipality or other service provider in respect of which payment is overdue for more than 30 days;
- c) particulars of any contracts awarded to the tenderer 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;
- d) a statement indicating whether any portion of the goods or services are expected to be sourced from outside the Republic, and, if so, what portion and whether any portion of payment from the municipality or municipal entity is expected to be transferred out of the Republic.

Each party to a Consortium/Joint Venture shall submit separate certificates/statements in the above regard.

- Add the following after C.2.18.2:*
- C.2.18.3 Tenderers shall fully cooperate with the Employer's external service provider or internal official(s) appointed to perform a due diligence review and risk assessment upon receipt of such written instruction from the Employer.
- Failure to fully cooperate could result in a tender being declared as non-responsive.
- C.2.18.4 **Compliance with Occupational Health and Safety Act, 85 of 1993**  
Tenderers are to note the requirements of the Occupational Health and Safety Act, 85 of 1993 and the Construction Regulations, 2014 issued in terms of Section 43 of the Act. The Tenderer shall be deemed to have read and fully understood the requirements of the above Act and Regulations and to have allowed for all costs in compliance therewith.
- In this regard the Tenderer shall submit with his tender or upon request, appended to Schedule 18: Health and Safety Plan in T2.2 : Returnable Schedules, a draft Health and Safety Plan in respect of the Works in sufficient detail to demonstrate the necessary competencies and resources to perform the construction work all in accordance with the Act, Regulations and Health and Safety Specification in Part C3.5 Management in the Scope of Work.
- C.2.23 **Certificates**  
*Add the following after the first sentence:*  
The tenderer is required to submit the following:
- C.2.23.1 **Evidence of tax compliance**
- Tenderers shall be registered with the South African Revenue Service (SARS) and their tax affairs must be in order and they must be tax compliant subject to the requirements of clause C.2.1.4.2 h). The tenderer must also provide its Tax Compliance Status PIN number on the **Compulsory Enterprise Questionnaire**.
- Before making an award the City must verify the bidder's tax compliance status. Where the recommended bidder is not tax compliant, the bidder should be notified of the non-compliant status and be requested to submit to the City, within 7 working days, written proof from SARS that they have made arrangement to meet their outstanding tax obligations. The proof of tax compliance submitted by the bidder must be verified by the City via CSD or e-Filing. The City should reject a bid submitted by the bidder if such bidder fails to provide proof of tax compliance within the timeframe stated herein.
- Only foreign suppliers who have answered "NO" to all the questions contained in the Questionnaire to Bidding Foreign Suppliers section on the **Details of Tenderer** pages of the tender submission, are not required to register for a tax compliance status with SARS.
- C.2.23.2 **Preference Points for Specific Goals**  
In order to qualify for preference points for HDI and/or Specific Goals, it is the responsibility of the tenderer to submit documentary proof, as either certificates, sworn affidavits or any other requirement prescribed in terms of the B-BBEE Act or any other legislation relevant for the points claimed for that specific goal.
- Tenderers are further referred to the content of the **Preference Schedule** for the full terms and conditions applicable to the awarding of preference points.
- C.2.24 **Deviations and Qualifications**
- Where the tenderer cannot tender in all respects in accordance with the provisions contained in the tender documents, all deviations therefrom shall be clearly and separately listed in the schedule titled **Deviations and Qualifications by Tenderer** in T2.2 Returnable Schedules, or in a tenderer's covering letter expressly referenced in this schedule.
- The tenderer accept that the Employer will examine such deviations in terms of clause C.3.8.2 and shall not be bound to accept any such deviations or qualifications.
- It must be clearly stated by the tenderer whether the sum tendered in the Tender Offer includes for all such deviations or qualifications listed or referred to in the schedule titled **Deviations and Qualifications by Tenderer** or not.

## C.3 The Employer's undertakings

### C.3.2 Issue Addenda

*Delete the first sentence and replace with:*

If necessary, issue addenda in writing that may amend or amplify the tender documents to each tenderer during the period from the date the tender documents are available until one week before the tender closing time stated in the Tender Data. The Employer reserves its rights to issue addenda less than one week before the tender closing time in exceptional circumstances. The issuing of addenda is subject to C1.2.1.

*Add the following to C.3.2 at the end of the paragraph:*

Notwithstanding any requests for confirmation of receipt of Addenda issued, the tenderer shall be deemed to have received such addenda if the employer can show proof of transmission thereof (or a notice in respect thereof) via electronic mail, facsimile or registered post.

### C3.4 Opening of tender submissions

*Delete C.3.4.2 and replace with the following:*

Announce at the meeting held immediately after the opening of tender submissions, at a venue indicated in the tender data, the name of each tenderer whose tender offer is opened and, where possible, the amount of the bid and the preference indicated.

### C.3.8 Test for responsiveness

#### C.3.8.2 *Replace the final sentence of C.3.8.2 with the following:*

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

*Add the following after clause C.3.8.2*

#### C.3.8.3 The Employer reserves the right to accept a tender offer which does not, in the Employer's opinion, materially and/or substantially deviate from the terms, conditions, and specifications of the tender documents.

### C.3.9 Arithmetical errors, omissions and discrepancies

*Add the following after clause C.3.9.4*

#### C.3.9.5 In the event of tendered rates or lump sums being declared by the Employer to be unacceptable to it because they are not priced, either excessively low or high, or not in proper balance with other rates or lump sums, the Tenderer may be required to produce evidence and advance arguments in support of the tendered rates or lump sums objected to. If, after submission of such evidence and any further evidence requested, the Employer is still not satisfied with the tendered rates or lump sums objected to, it may request the tenderer to amend these rates and lump sums along the lines indicated by it.

The Tenderer will then have the option to alter and/or amend the rates and lump sums objected to and such other related amounts as are agreed on by the Employer, but this shall be done without altering the tender offer in accordance with this clause.

Should the Tenderer fail to amend his tender in a manner acceptable to and within the time stated by the Employer, the Employer may declare the tender as non-responsive.

### C.3.10 Clarification of a tender offer

*Delete the clause and replace with the following:*

#### C.3.10 The Employer may, after the closing date, request additional information or clarification from any tenderer, in writing on any matter affecting the evaluation of the tender offer or that could give rise to ambiguity in a contract arising from the tender offer, which written request and related response shall not change or affect their competitive position or the substance of the tenderer's offer. Such request may only be made in writing by the Director: Supply Chain Management using any means as appropriate.

### C.3.11 Evaluation of tender offers

*Add the following after clause C.3.11.1*

#### C.3.11.2 Where the scoring of functionality forms part of a bid process, each member of the Bid Evaluation Committee must individually score functionality. The individual scores must then be interrogated and calibrated if required where there are significant discrepancies. The individual scores must then be added together and averaged to determine the final score.

C.3.11.3 The tender will be evaluated in terms of the requirements of the Preferential Procurement Regulations and SCM Policy as follows:

C.3.11.3.1 The preference point system applicable to this tender is either the 80/20 or 90/10 preference point system and the lowest acceptable tender will be used to determine the applicable preference point system.

Preference points shall be based on the Specific Goal as per below:

**Table B1: Awards above R750 000 and up to R50 mil (VAT Inclusive)**

#	Specific goals allocated points	Preference Points (80/20)  Equal/ below R50 mil	Evidence	Additional Guidance
<i>Persons, or categories of persons, historically disadvantaged- (HDI) by unfair discrimination on the basis of</i>				
1	<b>Gender are women (ownership)*</b>  >75% - 100% women ownership: 5 points >50% - 75% women ownership: 4 points >25% - 50% women ownership: 3 points >0% - 25% women ownership: 2 points 0% women ownership = 0 points	5	<ul style="list-style-type: none"> <li>Company Registration Certification</li> <li>Central Supplier Database report</li> </ul>	<ul style="list-style-type: none"> <li>Issued by the Companies and Intellectual Property Commission</li> <li>Report name: CSD Registration report</li> </ul>
2	<b>Race are black persons (ownership)*</b>  >75% - 100% black ownership: 5 points >50% - 75% black ownership: 4 points >25% - 50% black ownership: 3 points >0% - 25% black ownership: 2 points 0% black ownership = 0 points	5	<ul style="list-style-type: none"> <li>B-BBEE certificate;</li> <li>Company Registration Certification</li> <li>Central Supplier Database report</li> </ul>	<ul style="list-style-type: none"> <li>South African National Accreditation System approved certificate or commissioned sworn affidavit</li> <li>Issued by the Companies and Intellectual Property Commission</li> <li>Report name: CSD Registration report</li> </ul>
3	<b>Disability are disabled persons (ownership)*</b>  WHO disability guideline >2% ownership: 3 points >0% - 2% ownership: 1.5 point 0% ownership = 0 points	3	<ul style="list-style-type: none"> <li>Proof of disability</li> <li>Company Registration Certification</li> </ul>	<ul style="list-style-type: none"> <li>Medical certificate/ South African Revenue Services disability registration</li> <li>Issued by the Companies and Intellectual Property Commission</li> </ul>
<i>Reconstruction and Development Programme (RDP) as published in Government Gazette</i>				
4	<b>Promotion of Micro and Small Enterprises</b> <i>Micro with a turnover up to R20million and Small with a turnover up to R80 million as per National Small Enterprise Act, 1996 (Act No.102 of 1996)</i>  <i>SME partnership, sub-contracting, joint venture or consortiums</i>	7	<ul style="list-style-type: none"> <li>B-BBEE status level of contributor;</li> <li>South African owned enterprises;</li> <li>Financial Statement to determine annual turnover</li> </ul>	<ul style="list-style-type: none"> <li>Specifically in line with the respective sector codes which the company operates,</li> <li>South African National Accreditation System approved certificate or commissioned sworn affidavit</li> <li>Certificate of incorporation or commissioned sworn affidavit</li> <li>Latest financial statements (1 Year)</li> </ul>
	<b>Total points</b>	<b>20</b>		

\*Ownership: main tendering entity

**Table B2: Awards above R50 mil (VAT Inclusive)**

#	Specific goals allocated points	Preference Points (90/10)  Above R50 mil	Evidence	Additional Guidance
	Persons, or categories of persons, historically disadvantaged- (HDI) by unfair discrimination on the basis of			
1	<b>Gender are women (ownership)*</b>  >75% - 100% women ownership: 3 points >50% - 75% women ownership: 2 points >25% - 50% women ownership: 1 point >0% - 25% women ownership: 0.5 point 0% women ownership = 0 points	3	<ul style="list-style-type: none"> <li>Company Registration Certification</li> <li>Central Supplier Database report</li> </ul>	<ul style="list-style-type: none"> <li>Issued by the Companies and Intellectual Property Commission</li> <li>Report name: CSD Registration report</li> </ul>
2	<b>Race are black persons (ownership)*</b>  >75% - 100% black ownership: 3 points >50% - 75% black ownership: 2 points >25% - 50% black ownership: 1 point >0% - 25% black ownership: 0.5 point 0% black ownership = 0 points	3	<ul style="list-style-type: none"> <li>B-BBEE certificate;</li> <li>Company Registration Certification</li> <li>Central Supplier Database report</li> </ul>	<ul style="list-style-type: none"> <li>South African National Accreditation System approved certificate or commissioned sworn affidavit</li> <li>Issued by the Companies and Intellectual Property Commission</li> <li>Report name: CSD Registration report</li> </ul>
3	<b>Disability are disabled persons (ownership)*</b>  WHO disability guideline >2% ownership: 1 points >0% - 2% ownership: 0.5 point 0% ownership = 0 point	1	<ul style="list-style-type: none"> <li>Proof of disability</li> <li>Company Registration Certification</li> </ul>	<ul style="list-style-type: none"> <li>Medical certificate/ South African Revenue Services disability registration</li> <li>Issued by the Companies and Intellectual Property Commission</li> </ul>
	Reconstruction and Development Programme (RDP) as published in Government Gazette			
4	<b>Promotion of Micro and Small Enterprises</b> <i>Micro with a turnover up to R20million and Small with a turnover up to R80 million as per National Small Enterprise Act, 1996 (Act No.102 of 1996)</i>  <i>SME partnership, sub-contracting, joint venture or consortiums</i>	3	<ul style="list-style-type: none"> <li>B-BBEE status level of contributor;</li> <li>South African owned enterprises;</li> <li>Financial Statement to determine annual turnover</li> </ul>	<ul style="list-style-type: none"> <li>Specifically in line with the respective sector codes which the company operates,</li> <li>South African National Accreditation System approved certificate or commissioned sworn affidavit</li> <li>Certificate of incorporation or commissioned sworn affidavit</li> <li>Latest financial statements (1 Year)</li> </ul>
	<b>Total points</b>	<b>10</b>		

\*Ownership: main tendering entity



- C.3.11.3.2 Price, preference and functionality will be scored, as relevant, to two decimal places.
- C.3.11.3.3 Confirm that tenderers are eligible for the preferences claimed in accordance with the provisions of the tender data and reject all claims for preferences where tenderers are not eligible for such preferences.
- Points will be awarded to tenderers who are eligible for preferences in terms of the **Preference Schedule** which is included in C5.2 Returnable Schedules.
- C.3.11.4 **Risk Analysis**  
Notwithstanding compliance with regard to CIDB registration or any other requirements of the tender, the employer will perform a risk analysis in respect of the following:
- reasonableness of the financial offer
  - reasonableness of unit rates and prices
  - the tenderer's ability to fulfil its obligations in terms of the tender document, that is, that the tenderer can demonstrate that he/she/it possesses the necessary professional and technical qualifications, professional and technical competence, financial resources, equipment and other physical facilities, managerial capability, reliability, capacity, experience, reputation, personnel to perform the contract, etc.; the Employer reserves the right to consider a tenderer's existing contracts with the Employer in this regard
  - any other matter relating to the submitted bid, the tendering entity, matters of compliance, verification of submitted information and documents.
- The conclusions drawn from this risk analysis will be used by the Employer in determining the acceptability of the tender offer in terms of C.3.13).
- C.3.13 **Acceptance of tender offer**  
*Delete first sentence of C.3.13 and replace with the following):*  
Accept the tender offer, if in the opinion of the employer, it does not present any material risk and only if the tenderer:
- Delete C.3.13 a) and replace with the following):*
- is not under restrictions, has any principals who are under restrictions, or is not currently a supplier to whom notice has been served for abuse of the supply chain management system, preventing participation in the employer's procurement,
- Add the following below C.3.13 f)*  
If an award cannot be made in terms of anything contained herein, the Employer reserves the right to consider the next ranked tenderer(s).
- C.3.13.1 The Employer reserves the right not to make an award, or revoke an award already made, where the implementation of the contract may result in reputational risk or harm to the City as a result of (inter alia):
- reports of poor governance or unethical behaviour, or both;
  - association with known notorious individuals and family of notorious individuals;
  - poor performance issues, known to the City;
  - negative media reports, including negative social media reports;
  - adverse assurance (e.g. due diligence) report outcomes;
  - where the contractor has been restricted from doing business with the Employer; and
  - circumstances where the relevant vendor has employed, or is directed by, anyone who was previously employed in the service of the state (as defined in clause 1.53 of the SCM Policy), where the person is or was negatively implicated in any SCM irregularity.
- C.3.13.2 The Employer reserves the right to nominate a standby supplier at the time when an award is made and in the event that a contract is terminated during the execution thereof, the CCT may consider the award of the contract, or non-award, to the standby supplier in terms of the procedures included in its SCM Policy.
- C.3.13.3 The Employer shall notify the successful tenderer in writing of the decision of the Employer's Bid Adjudication Committee to award the tender to the successful tenderer. The successful bidder shall, in addition, be advised of the 21-day appeal period, and be notified that no rights accrue to him/her until the bid is formally accepted in writing.

C.3.13.4 The Employer shall, at the same time as notifying the successful tenderer of the Bid Adjudication Committee's decision to award the tender to the successful tenderer, also give written notice to the other tenderers informing them that they have been unsuccessful.

C.3.17 **Provide copies of the contract**

*Add the following after the first sentence:*

The number of paper copies of the signed contract to be provided by the Employer is one.

C.3.18 *Add the following after C.3.18*

C.3.19 **Negotiations with preferred tenderers**

The Employer may negotiate the final terms of a contract with tenderers identified through a competitive tendering process as preferred tenderers provided that such negotiation:

- a) does not allow any preferred tenderer a second or unfair opportunity;
- b) is not to the detriment of any other tenderer; and
- c) does not lead to a higher price than the tender as submitted.

If negotiations fail to result in acceptable contract terms, the City Manager (or his delegated authority) may terminate the negotiations and cancel the tender, or invite the next ranked tenderer for negotiations. The original preferred tenderer should be informed of the reasons for termination of the negotiations. If the decision is to invite the next highest ranked tenderer for negotiations, the failed earlier negotiations may not be reopened by the CCT.

Minutes of any such negotiations shall be kept for record purposes.

The provisions of this clause will be equally applicable to any invitation to negotiate with any other tenderers.

In terms of the SCM Policy, tenders must be cancelled in the event that negotiations fail to achieve a reasonable price with any of the three highest scoring tenderers.

**Annex C**  
(normative)  
**Standard Conditions of Tender**

## **C.1 General**

### **C.1.1 Actions**

**C.1.1.1** The employer and each tenderer submitting a tender offer shall comply with these conditions of tender. In their dealings with each other, they shall discharge their duties and obligations as set out in C.2 and C.3, timeously and with integrity, and behave equitably, honestly and transparently, comply with all legal obligations and not engage in anticompetitive practices.

**C.1.1.2** The employer and the tenderer and all their agents and employees involved in the tender process shall avoid conflicts of interest and where a conflict of interest is perceived or known, declare any such conflict of interest, indicating the nature of such conflict. Tenderers shall declare any potential conflict of interest in their tender submissions. Employees, agents and advisors of the employer shall declare any conflict of interest to whoever is responsible for overseeing the procurement process at the start of any deliberations relating to the procurement process or as soon as they become aware of such conflict and abstain from any decisions where such conflict exists or recuse themselves from the procurement process, as appropriate.

*Note:*

- 1) *A conflict of interest may arise due to a conflict of roles which might provide an incentive for improper acts in some circumstances. A conflict of interest can create an appearance of impropriety that can undermine confidence in the ability of that person to act properly in his or her position even if no improper acts result.*
- 2) *Conflicts of interest in respect of those engaged in the procurement process include direct, indirect or family interests in the tender or outcome of the procurement process and any personal bias, inclination, obligation, allegiance or loyalty which would in any way affect any decisions taken.*

**C.1.1.3** The employer shall not seek and a tenderer shall not submit a tender without having a firm intention and the capacity to proceed with the contract.

### **C.1.2 Tender Documents**

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

### **C.1.3 Interpretation**

**C.1.3.1** The tender data and additional requirements contained in the tender schedules that are included in the returnable documents are deemed to be part of these conditions of tender.

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

**C.1.3.3** For the purposes of these conditions of tender, the following definitions apply:

- a) **conflict of interest** means any situation in which:
  - i) someone in a position of trust has competing professional or personal interests which make it difficult to fulfill his or her [duties impartially](#);
  - ii) an individual or tenderer is in a position to exploit a professional or official capacity in some way for their personal or corporate benefit; or
  - iii) incompatibility or contradictory interests exist between an employee and the tenderer who employs that employee.
- b) **comparative offer** means the price after the factors of a non-firm price and all unconditional discounts it can be utilised to have been taken into consideration;
- c) **corrupt practice** means the offering, giving, receiving or soliciting of anything of value to influence the action of the employer or his staff or agents in the tender process;

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

## **C.1.4 Communication and employer's agent**

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

## **C.1.5 Cancellation and Re-Invitation of Tenders**

**C.1.5.1** An employer may, prior to the award of the tender, cancel a tender if-

- a) due to changed circumstances, there is no longer a need for the engineering and construction works specified in the invitation;
- b) funds are no longer available to cover the total envisaged expenditure; or
- c) no acceptable tenders are received.
- d) there is a material irregularity in the tender process.

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

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

## **C.1.6 Procurement procedures**

### **C.1.6.1 General**

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

### **C.1.6.2 Competitive negotiation procedure**

**C.1.6.2.1** Where the tender data require that the competitive negotiation procedure is to be followed, tenderers shall submit tender offers in response to the proposed contract in the first round of submissions. Notwithstanding the requirements of C.3.4, the employer shall announce only the names of the tenderers who make a submission. The requirements of C.8 relating to the material deviations or qualifications which affect the competitive position of tenderers shall not apply.

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

Notwithstanding the provisions of C.2.17, the employer may request that tenders be clarified, specified and fine-tuned in order to improve a tenderer's competitive position provided that such clarification, specification, fine-tuning or additional information does not alter any fundamental aspects of the offers or impose substantial new requirements which restrict or distort competition or have a discriminatory effect.

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

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

### **C.1.6.3 Proposal procedure using the two stage-system**

#### **C.1.6.3.1 Option 1**

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

#### **C.1.6.3.2 Option 2**

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

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

## **C.2 Tenderer's obligations**

### **C.2.1 Eligibility**

**C.2.1.1** Submit a tender offer only if the tenderer satisfies the criteria stated in the tender data and the tenderer, or any of his principals, is not under any restriction to do business with employer.

**C.2.1.2** Notify the employer of any proposed material change in the capabilities or formation of the tendering entity (or both) or any other criteria which formed part of the qualifying requirements used by the employer as the basis in a prior process to invite the tenderer to submit a tender offer and obtain the employer's written approval to do so prior to the closing time for tenders.

### **C.2.2 Cost of tendering**

**C.2.2.1** Accept that, unless otherwise stated in the tender data, the employer will not compensate the tenderer for any costs incurred in the preparation and submission of a tender offer, including the costs of any testing necessary to demonstrate that aspects of the offer complies with requirements.

**C.2.2.2** The cost of the tender documents charged by the employer shall be limited to the actual cost incurred by the employer for printing the documents. Employers must attempt to make available the tender documents on its website so as not to incur any costs pertaining to the printing of the tender documents.

### **C.2.3 Check documents**

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

### **C.2.4 Confidentiality and copyright of documents**

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

### **C.2.5 Reference documents**

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

### **C.2.6 Acknowledge addenda**

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

### **C.2.7 Clarification meeting**

Attend, where required, a clarification meeting at which 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.

### **C.2.8 Seek clarification**

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

## **C.2.9 Insurance**

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

## **C.2.10 Pricing the tender offer**

**C.2.10.1** Include in the rates, prices, and the tendered total of the prices (if any) all duties, taxes except Value Added Tax (VAT), and other levies payable by the successful tenderer, such duties, taxes and levies being those applicable fourteen (14) days before the closing time stated in the tender data.

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

**C.2.10.3** Provide rates and prices that are fixed for the duration of the contract and not subject to adjustment except as provided for in the conditions of contract identified in the contract data.

**C.2.10.4** State the rates and prices in Rand unless instructed otherwise in the tender data. The conditions of contract identified in the contract data may provide for part payment in other currencies.

## **C.2.11 Alterations to documents**

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

## **C.2.12 Alternative tender offers**

**C.2.12.1** Unless otherwise stated in the tender data, submit alternative tender offers only if a main tender offer, strictly in accordance with all the requirements of the tender documents, is also submitted as well as a schedule that compares the requirements of the tender documents with the alternative requirements that are proposed.

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

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

## **C.2.13 Submitting a tender offer**

**C.2.13.1** Submit one tender offer only, either as a single tendering entity or as a member in a joint venture to provide the whole of the works identified in the contract data and described in the scope of works, unless stated otherwise in the tender data.

**C.2.13.2** Return all returnable documents to the employer after completing them in their entirety, either electronically (if they were issued in electronic format) or by writing legibly in non-erasable ink.

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

**C.2.13.4** Sign the original and all copies of the tender offer where required in terms of the tender data. The employer will hold all authorized signatories liable on behalf of the tenderer. Signatories for 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.

**C.2.13.5** Seal the original and each copy of the tender offer as separate packages marking the packages as "ORIGINAL" and "COPY". Each package shall state on the outside the employer's address and identification details stated in the tender data, as well as the tenderer's name and contact address.

**C.2.13.6** Where a two-envelope system is required in terms of the tender data, place and seal the returnable documents listed in the tender data in an envelope marked “financial proposal” and place the remaining returnable documents in an envelope marked “technical proposal”. Each envelope shall state on the outside the employer's address and identification details stated in the tender data, as well as the tenderer's name and contact address.

**C.2.13.7** Seal the original tender offer and copy packages together in an outer package that states on the outside only the employer's address and identification details as stated in the tender data.

**C.2.13.8** Accept that the employer will not assume any responsibility for the misplacement or premature opening of the tender offer if the outer package is not sealed and marked as stated.

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

## **C.2.14 Information and data to be completed in all respects**

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

## **C.2.15 Closing time**

**C.2.15.1** Ensure that the employer receives the tender offer at the address specified in the tender data not later than the closing time stated in the tender data. Accept that proof of posting shall not be accepted as proof of delivery.

**C.2.15.2** Accept that, if the employer extends the closing time stated in the tender data for any reason, the requirements of these conditions of tender apply equally to the extended deadline.

## **C.2.16 Tender offer validity**

**C.2.16.1** Hold the tender offer(s) valid for acceptance by the employer at any time during the validity period stated in the tender data after the closing time stated in the tender data.

**C.2.16.2** If requested by the employer, consider extending the validity period stated in the tender data for an agreed additional period with or without any conditions attached to such extension.

**C.2.16.3** Accept that a tender submission that has been submitted to the employer may only be withdrawn or substituted by giving the employer's agent written notice before the closing time for tenders that a tender is to be withdrawn or substituted. If the validity period stated in C.2.16 lapses before the employer evaluating tender, the contractor reserves the right to review the price based on Consumer Price Index (CPI).

**C.2.16.4** Where a tender submission is to be substituted, a tenderer must submit a substitute tender in accordance with the requirements of C.2.13 with the packages clearly marked as “SUBSTITUTE”.

## **C.2.17 Clarification of tender offer after submission**

Provide clarification of a tender offer in response to a request to do so from the employer during the evaluation of tender offers. This may include providing a breakdown of rates or prices and correction of arithmetical errors by the adjustment of certain rates or item prices (or both). No change in the competitive position of tenderers or substance of the tender offer is sought, offered, or permitted.

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

## **C.2.18 Provide other material**

**C.2.18.1** Provide, on request by the employer, any other material that has a bearing on the tender offer, the tenderer's commercial position (including notarized joint venture agreements), preferencing arrangements, or samples of materials, considered necessary by the employer for the purpose of a full and fair risk assessment.



Should the tenderer not provide the material, or a satisfactory reason as to why it cannot be provided, by the time for submission stated in the employer's request, the employer may regard the tender offer as non-responsive.

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

## **C.2.19 Inspections, tests and analysis**

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

## **C.2.20 Submit securities, bonds and policies**

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

## **C.2.21 Check final draft**

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

## **C.2.22 Return of other tender documents**

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

## **C.2.23 Certificates**

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

## **C.3 The employer's undertakings**

### **C.3.1 Respond to requests from the tenderer**

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

**C.3.1.2** Consider any request to make a material change in the capabilities or formation of the tendering entity (or both) or any other criteria which formed part of the qualifying requirements used to prequalify a tenderer to submit a tender offer in terms of a previous procurement process and deny any such request if as a consequence:

- a) an individual firm, or a joint venture as a whole, or any individual member of the joint venture fails to meet any of the collective or individual qualifying requirements;
- b) the new partners to a joint venture were not prequalified in the first instance, either as individual firms or as another joint venture; or
- c) in the opinion of the Employer, acceptance of the material change would compromise the outcome of the prequalification process.

### **C.3.2 Issue Addenda**

If necessary, issue addenda that may amend or amplify the tender documents to each tenderer during the period from the date that tender documents are available until three (3) working days before the tender closing time stated in the Tender Data. If, as a result a tenderer applies for an extension to the closing time stated in the Tender Data, the Employer may grant such extension and, shall then notify all tenderers who collected tender documents.

### **C.3.3 Return late tender offers**

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

### **C.3.4 Opening of tender submissions**

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

**C.3.4.2** Announce at the meeting held immediately after the opening of tender submissions, at a venue indicated in the tender data, the name of each tenderer whose tender offer is opened and, where applicable, the total of his prices, number of points claimed for its BBBEE status level and time for completion for the main tender offer only.

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

### **C.3.5 Two-envelope system**

**C.3.5.1** Where stated in the tender data that a two-envelope system is to be followed, open only the technical proposal of valid tenders in the presence of 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.

**C.3.5.2** Evaluate functionality of the technical proposals offered by tenderers, then advise tenderers who remain in contention for the award of the contract of the time and place when the financial proposals will be opened. Open only the financial proposals of tenderers, who score in the functionality evaluation more than the minimum number of points for functionality stated in the tender data, and announce the score obtained for the technical proposals and the total price and any points claimed on BBBEE status level. Return unopened financial proposals to tenderers whose technical proposals failed to achieve the minimum number of points for functionality.

### **C.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.

### **C.3.7 Grounds for rejection and disqualification**

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

### **C.3.8 Test for responsiveness**

**C.3.8.1** Determine, after opening and before detailed evaluation, whether each tender offer properly received:

- a) complies with the requirements of these Conditions of Tender,
- b) has been properly and fully completed and signed, and
- c) is responsive to the other requirements of the tender documents.

**C.3.8.2** A responsive tender is one that conforms to all the terms, conditions, and specifications of the tender documents without material deviation or qualification. A material deviation or qualification is one which, in the Employer's opinion, would:

- a) detrimentally affect the scope, quality, or performance of the works, services or supply identified in the Scope of Work,
- b) significantly change the Employer's or the tenderer's risks and responsibilities under the contract, or
- c) affect the competitive position of other 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.

### **C.3.9 Arithmetical errors, omissions and discrepancies**

**C.3.9.1** Check responsive tenders for discrepancies between amounts in words and amounts in figures. Where there is a discrepancy between the amounts in figures and the amount in words, the amount in words shall govern.

**C.3.9.2** Check the highest ranked tender or tenderer with the highest number of tender evaluation points after the evaluation of tender offers in accordance with C.3.11 for:

- a) the gross misplacement of the decimal point in any unit rate;
- b) omissions made in completing the pricing schedule or bills of quantities; or
- c) arithmetic errors in:
  - (i) line item totals resulting from the product of a unit rate and a quantity in bills of quantities or schedules of prices; or
  - (ii) the summation of the prices.

**C.3.9.3** Notify the tenderer of all errors or omissions that are identified in the tender offer and either confirm the tender offer as tendered or accept the corrected total of prices.

**C.3.9.4** Where the tenderer elects to confirm the tender offer as tendered, correct the errors as follows:

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

### C.3.10 Clarification of a tender offer

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

### C.3.11 Evaluation of tender offers

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

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

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

The activities associated with evaluating tender offers are as follows:

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

#### C.3.11.1 General

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

### C.3.12 Insurance provided by the employer

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

### **C.3.13 Acceptance of tender offer**

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

- a) is not under restrictions, or has principals who are under restrictions, preventing participating in the employer's procurement;
- b) can, as necessary and in relation to the proposed contract, demonstrate that he or she possesses the professional and technical qualifications, professional and technical competence, financial resources, equipment and other physical facilities, managerial capability, reliability, experience and reputation, expertise and the personnel, to perform the contract;
- c) has the legal capacity to enter into the contract;
- d) is not; insolvent, in receivership, under Business Rescue as provided for in chapter 6 of the Companies Act No. 2008, bankrupt or being wound up, has his/her affairs administered by a court or a judicial officer, has suspended his/her business activities or is subject to legal proceedings in respect of any of the foregoing;
- e) complies with the legal requirements, if any, stated in the tender data; and
- f) is able, in the opinion of the employer, to perform the contract free of conflicts of interest.

### **C.3.14 Prepare contract documents**

**C.3.14.1** If necessary, revise documents that shall form part of the contract and that were issued by the employer as part of the tender documents to take account of:

- a) addenda issued during the tender period,
- b) inclusion of some of the returnable documents and
- c) other revisions agreed between the employer and the successful tenderer.

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

### **C.3.15 Complete adjudicator's contract**

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

### **C.3.16 Registration of the award**

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

### **C.3.17 Provide copies of the contracts**

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

### **C.3.18 Provide written reasons for actions taken**

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

## Annex G

(normative)

### Alpha-numerics associated with the Contractor Grading Designations

In terms of Government Gazette 42561, dated 5 July 2019, the tender value range as set out in Table 8 in CIDB Regulation 17 has been amended. Table G1 below reflects the amended values that come into effect on 07 October 2019

**Table G1: Contractor grading designations and associated parameters applicable after 7 October 2019**

Contractor Grading Designation	Tender Value Range designation	Maximum value of contract that a contractor is considered capable of performing (R)
1 (class of construction works)	1	500 000
2 (class of construction works)	2	1 000 000
3 (class of construction works)	3	3 000 000
4 (class of construction works)	4	6 000 000
5 (class of construction works)	5	10 000 000
6 (class of construction works)	6	20 000 000
7 (class of construction works)	7	60 000 000
8 (class of construction works)	8	200 000 000
9 (class of construction works)	9	No Limit

**Table G2: Classes of construction work**

Description	Designation	Definition	Work types	Examples
<b>Civil engineering works</b>	<b>CE</b>	Construction works that are primarily concerned with materials such as steel, concrete, earth and rock and their application in the development, extension, installation, maintenance, removal, renovation, alteration, or dismantling of building and engineering infrastructure	Water, sewerage, roads, railways, harbours and transport, urban development and municipal services	Structures such as a cooling tower, bridge, culvert, dam, grand stand, road, railway, reservoir, runway, swimming pool, silo or tunnel The results of operations such as dredging, earthworks and geotechnical processes. Township services, water treatment and supply, sewerage works, sanitation, soil conservation works, irrigation works, storm-water and drainage works, coastal works, ports, harbours, airports and pipelines.
<b>Electrical engineering works (Infrastructure)</b>	<b>EP</b>	Construction works that are primarily concerned with development, extension, installation, removal, renovation, alteration or dismantling of engineering infrastructure: a) relating to the generation, transmission and distribution of electricity;	Electrical power generation, transmission, control and distribution equipment and systems.	Power generation Street and area lighting Substations and protection systems Township Reticulations Transmission Lines Supervisory control and data acquisition systems
<b>Electrical engineering works (buildings)</b>	<b>EB</b>	Construction works that are primarily concerned with the installation, extension, modification or repair of electrical installations in or on any premises used for the transmission of electricity from a point of control to a point of consumption, including any article forming part of such an installation	All electrical equipment forming an integral and permanent part of buildings and/or structures, including any wiring, cable jointing and laying and electrical overhead line construction	Electrical installations in buildings Electrical reticulations within a plot of land (erf) or building site Standby plant and uninterrupted power supply Verification and certification of electrical installations on premises
<b>General building works</b>	<b>GB</b>	Construction works that: a) are primarily concerned with the development, extension, installation, renewal, renovation, alteration, or dismantling of a permanent shelter for its occupants or contents; or b) cannot be categorized in terms of the definitions provided for civil engineering works, electrical engineering works,	Buildings and ancillary works other than those categorised as being: a) civil engineering works; b) electrical engineering works; c) mechanical engineering works; or d) specialist works.	Buildings for domestic, industrial, institutional or commercial occupancies Car ports Fences other than classified as SS Stores Walls

Description	Designation	Definition	Work types	Examples
<b>Mechanical engineering works</b>	<b>ME</b>	Construction works that are primarily concerned with the development, extension, installation, removal, alteration, renewal of engineering infrastructure for gas transmission and distribution, solid waste disposal, heating, ventilation and cooling, chemical works, metallurgical works, manufacturing, food processing and, materials handling	Machine systems including those relating to the environment of building interiors. a) gas transmission and distribution systems b) pipelines c) solid waste disposal d) materials handling, lifting machinery, heating, ventilation and cooling, pumps, e) continuous process systems f) chemical works, metallurgical works, manufacturing, food processing such as that in concentrator machinery and apparatus, oil and gas wells, smelters, cyanide plants, acid plants, metallurgical machinery, equipment and apparatus, and works necessary for the beneficiation of metals, minerals, rocks, petroleum and organic substances or other chemical processes.	Air-conditioning and mechanical ventilation Boiler installations and steam distribution Central heating Centralised hot water generation Cranes and hoists Dust and sawdust extraction Compressed air, gas and vacuum installations Conveyor and materials handling installations Continuous process systems involving chemical works, metallurgical works, oil and gas wells, acid plants, metallurgical machinery, equipment and apparatus, and works necessary for the beneficiation of metals, minerals, rocks, petroleum and organic substances and other chemical processes Kitchen equipment Laundry equipment Lift installations and escalators Refrigeration and cold rooms Waste handling systems (including compactors)
<b>Specialist works</b>	<b>SB</b>	A subset of construction works identified and defined by the Board that involves specialist capabilities for its execution	The extension, installation, repair, maintenance or renewal, or removal, of asphalt	
	<b>SC</b>		The development, extension, installation, removal, and dismantling, as relevant, associated with building excavations, shaft sinking and lateral earth support	
	<b>SD</b>		The development, extension, installation, repair, renewal, removal, or alteration of corrosion protection systems (cathodic, anodic and electrolytic)	
	<b>SE</b>		Demolition of buildings and engineering infrastructure and blasting	
	<b>SF</b>		The development, extension, installation, renewal, removal, renovation, alteration or dismantling of fire prevention and protection infrastructure (drencher and sprinkler systems and fire installation)	
	<b>SG</b>		The development, extension, installation, renewal, removal, renovation, alteration or dismantling of glazing, curtain walls and shop fronts	
	<b>SH</b>		The development, extension, installation, maintenance, renewal. removal, alteration or dismantling, as relevant, of landscaping, irrigation and horticultural works	
	<b>SI</b>		The development, extension, installation, repair, maintenance, renewal. removal, renovation, alteration or, dismantling of lifts, escalators, travellers and hoisting machinery	
	<b>SJ</b>		The development, installation, removal, or dismantling, as relevant, of piles and other specialized foundations for buildings and structures	



Description	Designation	Definition	Work types	Examples
	SK	A subset of construction works identified and defined by the Board that involves specialist capabilities for its execution	The installation, renewal, removal, alteration or dismantling, as relevant, road markings and signage	
	SL		The development, extension, installation, renewal, removal, renovation, alteration or dismantling of structural steelwork and scaffolding	
	SM		Timber buildings and structures	
	SN		The extension, installation, repair, maintenance, renewal, removal, renovation or alteration, as relevant, of the waterproofing of basements, roofs and walls using specialist systems.	
	SO		The development, extension, installation, renewal, removal, alteration or dismantling or demolition of water installations and soil and waste water drainage associated with buildings (wet services, plumbing)	
	SQ		The development, extension, installation, repair, removal, alteration, dismantling or demolition of precast concrete or steel fencing	

**CONTRACT NO. 285Q/2024/25**



CITY OF CAPE TOWN  
ISIXEKO SASEKAPA  
STAD KAAPSTAD

SCM – 509

Approved by Branch Manager: 15/07/2024

Version: 6.4

Page 35 of 286

## CONTRACT DOCUMENT

FOR THE

## UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE

### THE CONTRACT

**ISSUED BY:**

**DIRECTOR: ENVIRONMENTAL  
MANAGEMENT DEPARTMENT  
SPATIAL PLANNING &  
ENVIRONMENT DIRECTORATE  
CITY OF CAPE TOWN**  
Tower Block, Civic Centre  
12 Hertzog Boulevard  
CAPE TOWN  
8001

**COMPILED BY:**

**HHO Consulting Engineers  
(Pty) Ltd**  
14<sup>th</sup> Floor, The Towers South  
**2 Hertzog Boulevard**  
CAPE TOWN  
8001

**For official use.**

**TENDER SERIAL No.:**

**SIGNATURES OF CITY  
OFFICIALS AT TENDER  
OPENING**

1.

2.

3.

SEPTEMBER 2024

**NAME OF TENDERING  
ENTITY**

**EMAIL ADDRESS OF  
TENDERING ENTITY**

**FAX NUMBER OF  
TENDERING ENTITY**

**NATURE OF TENDER OFFER** (please indicate below)

**Main Offer** (see clause  
C.2.12)

**Alternative Offer** (see  
clause C.2.12)

Part C1: Agreements and Contract Data

	Pages
Memorandum of Agreement.....	37 – 38
C1.1 Form of Offer and Acceptance .....	39 – 42
C1.2 Contract Data (data provided by the Employer) .....	43 – 57
C1.2 Contract Data (provided by contractor) .....	58
C1.3 Form of Performance Guarantee.....	59 – 61
C1.4 Form of Advance Payment Guarantee.....	63 – 65
C1.5 Occupational Health and Safety Agreement .....	67
C1.6 Protection of the Environment Declaration.....	68
C1.7 Insurance Broker’s Warranty .....	69
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## MEMORANDUM OF AGREEMENT

FOR

**UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE**

MADE AND ENTERED INTO BETWEEN

**CITY OF CAPE TOWN METROPOLITAN MUNICIPALITY**

And

CONTRACTOR	
<b>NAME of</b> Company/Close Corporation or Partnership / Joint Venture/ Consortium or Sole Proprietor /Individual (The “Contractor” / “tenderer”)	
<b>TRADING AS</b> (if different from above)	
<b>REGISTRATION NUMBER</b>	
<b>PHYSICAL ADDRESS / CHOSEN DOMICILIUM CITANI ET EXECTUANDI OF THE CONTRACTOR</b>	
<b>AUTHORISED REPRESENTATIVE</b>	
<b>CAPACITY OF AUTHORISED REPRESENTATIVE</b>	

**(HEREINAFTER COLLECTIVELY REFERRED TO AS “THE PARTIES” AND INDIVIDUALLY A “PARTY”)**

## Preamble

**WHEREAS** the City of Cape Town is desirous to award this Tender to the successful Contractor;

**AND WHEREAS** the City of Cape Town will consider and evaluate the offer made by the Tenderer/Contractor;

**AND WHEREAS** the Parties agree that this Contract is subject to the terms and conditions as contained in the final award of the City's Bid Adjudication Committee (BAC);

**AND WHEREAS** the Tenderer/Contractor agrees that the terms and conditions of the award will become binding upon communication of the award made by the BAC, upon the expiration of the prescribed appeal period in terms of Section 62 of the Municipal Systems Act and the furnishing of a duly counter signed contract by the City to the Contractor reflecting the BAC award.

**NOW THEREFORE**, the Parties agree and confirm that the Contract contains the following:

- a) the Form of Offer and Acceptance,
- b) the Contract Specific Data within the Contract Data,
- c) the General Conditions of Contract for Construction Works, Third Edition, 2015,
- d) the Drawings,
- e) the Scope of Work,
- f) the Pricing Data, and
- g) the conditions of tender, the tender data and tender schedules

SIGNED AT \_\_\_\_\_ (PLACE) ON THE \_\_\_\_\_ (DAY) OF \_\_\_\_\_ (MONTH AND YEAR)

\_\_\_\_\_  
For and on behalf of the Contractor  
(Duly Authorised)  
Name and Surname:

\_\_\_\_\_  
Witness 1 Signature  
Name and Surname:

\_\_\_\_\_  
Witness 2 Signature  
Name and Surname:

\_\_\_\_\_  
For and on behalf of the City of Cape Town  
(Duly Authorised)  
Name and Surname:

\_\_\_\_\_  
Witness 1 Signature  
Name and Surname:

\_\_\_\_\_  
Witness 2 Signature

CITY OF CAPE TOWN

SPATIAL PLANNING AND ENVIRONMENT: ENVIRONMENTAL MANAGEMENT DEPARTMENT  
CONTRACT NO. 285Q/2024/25

UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE

## C1.1 Form of Offer and Acceptance

### Offer

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

**CONTRACT NO. 285Q/2024/25: UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE**

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

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

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

Rand .....

..... (in words);

R ..... (in figures)

This offer may be accepted by the employer by signing the acceptance part of this form of offer and acceptance and returning one copy of this document to the tenderer before the end of the period of validity stated in the tender data, whereupon the tenderer becomes the party named as the contractor in the conditions of contract identified in the contract data.

Contractor	
Business Name	
Business Registration	
Tax number (VAT)	
Physical Address	
Signed – who by signature hereto warrants authority	
Name of signatory	
Signed: Date	
Signed: Location	
Signed: Witness	
Name of Witness	

For official use.		
INITIALS OF CITY OFFICIALS AT TENDER OPENING		
1.	2.	3.

## Acceptance

By signing this part of this form of offer and acceptance, the City of Cape Town accepts the tenderer's (now Contractor's) offer. In consideration thereof, the City of Cape Town shall pay the contractor the amount due in accordance with the conditions of contract identified in the contract data. Acceptance of the contractor's offer shall form an agreement between the City of Cape Town and the contractor upon the terms and conditions contained in this document.

The terms of the contract are contained in:

- Part C1: Agreements and contract data (which includes this agreement)
- Part C2: Pricing data
- Part C3: Scope of work
- Part C4: Site information

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

Deviations from and amendments to the documents listed in the tender data and any addenda thereto as listed in the returnable schedules as well as any changes to the terms of the offer agreed by the 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 form of offer and acceptance. No amendments to or deviations from said documents are valid unless contained in this schedule of deviations.

The contractor shall within two weeks after receiving a completed copy of the contract, including the schedule of deviations (if any), contact the City of Cape Town to arrange the delivery of all securities, bonds, guarantees, proof of insurance and any other documents to be provided in terms of the conditions of contract identified in the contract data. Failure to fulfil any of these obligations in accordance with those terms shall constitute a repudiation of the contract.

Notwithstanding anything contained herein, this agreement comes into effect on the date when the contractor and confirms receipt from the City of Cape Town of one complete, signed copy of this contract containing price schedule as awarded by the BAC, including the schedule of deviations (if any).

CITY OF CAPE TOWN	
Business Name	
Business Registration	
Tax number (VAT)	
Physical Address	
Accepted contract sum including tax	
Signed – who by signature hereto warrants authority	
Name of signatory	
Signed: Date	
Signed: Location	
Signed: Witness	
Name of Witness	

# Schedule of Deviations

## Notes:

1. The extent of deviations from the tender documents issued by the employer before the tender closing date is limited to those permitted in terms of the conditions of tender.
2. A tenderer's covering letter shall not be included in the final contract document. Should any matter in such letter, which constitutes a deviation as aforesaid, become the subject of agreements reached during the process of offer and acceptance, the outcome of such agreement shall be recorded here.
3. Any other matter arising from the process of offer and acceptance either as a confirmation, clarification or change to the tender documents and which it is agreed by the Parties becomes an obligation of the contract shall also be recorded here.
4. Any change or addition to the tender documents arising from the above agreements and recorded here, shall also be incorporated into the final draft of the Contract.

1 Subject .....

Details .....

.....

.....

.....

2 Subject .....

Details .....

.....

.....

.....

3 Subject .....

Details .....

.....

.....

.....

4 Subject .....

Details .....

.....

.....

.....

By the duly authorised representatives signing this agreement, the employer and the tenderer agree to and accept the foregoing schedule of deviations as the only deviations from and amendments to the documents listed in the tender data and addenda thereto as listed in the returnable schedules, as well as any confirmation, clarification or changes to the terms of the offer agreed by the tenderer and the employer during this process of offer and acceptance.

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

**ONLY TO BE COMPLETED AT ACCEPTANCE STAGE**



# CONTRACT 285Q/2024/25 – UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE

(TO BE FILLED IN BY THE CONTRACTOR)

## Confirmation of Receipt

The contractor identified in the offer part of the Contract hereby confirms receipt from the City of Cape Town (identified in the acceptance part) of 1 (one) complete, signed copy of the Contract containing price schedule as awarded by the BAC, including the *Schedule of Deviations* (if any) on:

The..... (Day)

Of..... (Month)

20..... (year)

At..... (Place)

For the Supplier: Signature(s) .....

Name(s) .....

Capacity .....

Signature and name of witness:

Signature ..... Name .....

**ONLY TO BE  
COMPLETED AT  
ACCEPTANCE STAGE**

## C1.2 Contract Data

### *Part 1: Contract Data provided by the Employer*

#### **GENERAL CONDITIONS OF CONTRACT**

The following standardised General Conditions of Contract:

#### **General Conditions of Contract for Construction Works, Third Edition, 2015**

prepared by the South African Institution of Civil Engineering (SAICE) shall apply to and form the General Conditions of Contract for this contract. Copies of these conditions of contract are obtainable from the South African Institution of Civil Engineering (SAICE), Private Bag X200, Halfway House 1685, Tel: (011) 805 5947, Fax: (011) 805 5971, e-mail: [civilinfo@saice.org.za](mailto:civilinfo@saice.org.za).

Copies of the General Conditions of Contract are available for inspection and scrutiny at the offices of the Employer.

The Pro-formas bound with the General Conditions of Contract 2015, on pages 96 to 113 shall not apply to this Contract and shall be replaced with the documents bound into this Contract Document.

The General Conditions of Contract make several references to the Contract Data for specific data, which together with these conditions collectively describe the risks, liabilities and obligations of the contracting parties and the procedures for the administration of the Contract. The Contract Data shall have precedence in the interpretation of any ambiguity or inconsistency between it and the general conditions of contract.

The General Conditions of Contract shall be read in conjunction with the variations, amendments and additions set out in the Contract Specific Data below. Each item of data given below is cross-referenced to the clause in the General Conditions of Contract to which it mainly applies.

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

- a) the Form of Offer and Acceptance,
- b) the Contract Specific Data within the Contract Data,
- c) the General Conditions of Contract for Construction Works, Third Edition, 2015,
- d) the Drawings,
- e) the Scope of Work,
- f) the Pricing Data, and
- g) the conditions of tender, the tender data and tender schedules

If an ambiguity or discrepancy is found in the documents, the Employer's Agent shall issue any necessary clarification or instruction.

#### **CONTRACT SPECIFIC DATA**

The following contract specific data, referring to the General Conditions of Contract for Construction Works, Third Edition, 2015, are applicable to this Contract:

#### **Clause 1.1.1.2:**

*Add the following after "Bill of Quantities":*

, also referred to as Bills of Quantities,

#### **Clause 1.1.1.13:**

The Defects Liability Period is **12** months.

**Clause 1.1.1.14:**

The time for achieving Practical Completion is **421 days**, inclusive of the 14 day period referred to in Clause 5.3.2 below, and inclusive of non-working days referred to in Clause 5.8.1 below, but exclusive of special non-working days (Clause 5.8.1).

**Clause 1.1.1.15:**

The **Employer** is the CITY OF CAPE TOWN, represented by the Director : ENVIRONMENTAL MANAGEMENT DEPARTMENT: SPATIAL PLANNING & ENVIRONMENT DIRECTORATE and/or such other person or persons duly authorised thereto by the Employer in writing.

The name of the Employer is: CITY OF CAPE TOWN  
SPATIAL PLANNING & ENVIRONMENT DIRECTORATE

and is referred to in the Contract documents by the terms "Employer", "City of Cape Town" or "Council" as the context provides.

**Clause 1.1.1.16:**

The **Employer's Agent**, referred to in the Contract documents, is the firm of HHO Consulting Engineers (Pty) Ltd acting through a director, an associate or an official authorised thereto in writing.

The name of the Employer's Agent is: HHO Consulting Engineers (Pty) Ltd or their successors duly appointed by the Employer

**Clause 1.1.1.26:**

The Pricing Strategy is a Re-measurement Contract.

*Add the following Clauses after Clause 1.1.1.34:*

- 1.1.1.35 **"Drawings"** means all drawings, calculations and technical information forming part of the Contract Documents and any modifications thereof or additions thereto from time to time approved in writing by the Employer's Agent or delivered to the Contractor by the Employer's Agent.
- 1.1.1.36 **"Letter of Notification"** means the letters of formal notification, signed by the Employer, of the decision of the Supply Chain Management Bid Adjudication Committee sent to all tenderers. The notification of the decision does not form part of the Employer's Acceptance of the successful tenderer's Offer and no rights shall accrue.
- 1.1.1.37 **"Intellectual Property"** means any and all intellectual property rights of any nature anywhere in the world whether registered, registerable or otherwise, including patents, trademarks, registered designs and domain names, applications for any of the foregoing, trade or business names, copyright and rights in the nature of copyright, design rights, rights in databases, know-how, trade secrets and any other intellectual property rights which subsist in computer software, computer programs, websites, documents, information, techniques, business methods, drawings, logos, instruction manuals, lists and procedures and particulars of customers, marketing methods and procedures and advertising literature, including the "look and feel" of any websites

**Clause 1.2.1.2:**

The address of the Employer is:

Physical address: 7<sup>th</sup> Floor, Good Hope Sub-council Building  
44 Wale Street  
Cape Town  
8001

Postal address: P O Box 298  
Cape Town  
8001

E-mail address: Lorraine.Gerrans@capetown.gov.za

**Clause 1.2.1.2:**

The address of the Employer's Agent is:

Physical address: 14<sup>th</sup> Floor, The Towers South  
2 Hertzog Boulevard  
Cape Town  
8001

Postal address: P O Box 6503  
Roggebaai  
8012

E-mail address: [gustav@hho.co.za](mailto:gustav@hho.co.za)

**Clause 1.3:**

*Delete Clause 1.3.5 in its entirety and replace with the following:*

**1.3.5 Intellectual Property**

1.3.5.1 The Contractor acknowledges that it shall not acquire any right, title or interest in or to the Intellectual Property of the Employer.

1.3.5.2 The Contractor hereby assigns to the Employer, all Intellectual Property created, developed or otherwise brought into existence by it for the purposes of the contract, unless the Parties expressly agree otherwise in writing.

1.3.5.3 The Contractor shall be deemed to have given the Employer a non-terminable, transferable, non-exclusive, royalty-free licence to copy, use and communicate the Contractor's documents, including making and using modifications of such documents for further work required to the Works.

1.3.5.4 The Contractor shall, and warrants that it shall:

1.3.5.4.1 not be entitled to use the Employer's Intellectual Property for any purpose other than as contemplated in this contract;

1.3.5.4.2 not modify, add to, change or alter the Employer's Intellectual Property, or any information or data related thereto, nor may the Contractor produce any product as a result of, including and/or arising from any such information, data and Intellectual Property, and in the event that it does produce any such product, the product shall be, and be deemed in law to be, owned by the Employer;

1.3.5.4.3 not apply for or obtain registration of any domain name, trademark or design which is similar to any Intellectual Property of the Employer;

1.3.5.4.4 comply with all reasonable directions or instructions given to it by the Employer in relation to the form and manner of use of the Employer Intellectual Property, including without limitation, any brand guidelines which the Employer may provide to the contractor from time to time;

1.3.5.4.5 procure that its employees, directors, members and contractors comply strictly with the provisions of clauses 1.3.5.4.1 to 1.3.5.4.3 above;

unless the Employer expressly agrees thereto in writing after obtaining due internal authority.

1.3.5.5 The Contractor represents and warrants to the Employer that, in providing goods, services or both, as the case may be, for the duration of the contract, it will not infringe or make unauthorised use of the Intellectual Property rights of any third party and hereby indemnifies the Employer from any claims, liability, loss, damages, costs, and expenses arising from the infringement or unauthorised use by the contractor of any third party's Intellectual Property rights.

1.3.5.6 In the event that the contract is cancelled, terminated, ended or is declared void, any and all of the Employer's Intellectual Property, and any and all information and data related thereto, shall be immediately handed over to the Employer by the contractor and no copies thereof shall be retained by the contractor unless the Employer expressly and in writing, after obtaining due internal authority, agrees otherwise.

*Add the following Clause after Clause 1.3.6:*

- 1.3.7 The parties agree that this contract shall also be subject to the Employer's Supply Chain Management Policy ('SCM Policy') that was applicable on the date the bid was advertised, **save that if the Employer adopts a new SCM Policy which contemplates that any clause therein would apply to the contract emanating from this tender, such clause shall also be applicable to that contract.** Please refer to this document contained on the CCT's website.
- 1.3.8 Abuse of the supply chain management system is not permitted and may result in cancellation of the contract, restriction of the supplier, and/or the exercise by the Employer of any other rights and remedies available to it as described in the SCM Policy.
- 1.3.9 Protection of Personal Information Act of 2013**
- 1.3.9.a By submitting a tender to the Employer, (and by concluding any ensuing related agreement with the City of Cape Town, if applicable), the Contractor thereby acknowledges and unconditionally agrees:
- 1.3.9.b that the Contractor has been informed of the purpose of the collection and processing of its personal information as defined in the Protection of Personal Information Act of 2013 ("POPIA"), which, for the avoidance of doubt is for, and in relation to, the tender process and the negotiation, conclusion, performance and enforcement of the ensuing agreement, if applicable, as well as for the Employer's reporting purposes;
- 1.3.9.c to the collection and processing of the Contractor's personal information by the Employer and agrees to make available to the Employer, all information reasonably required by the Employer for the above purposes;
- 1.3.9.d that the personal information the Employer collects from the Contractor or about the Contractor may be further processed for other activities and/or purposes which are lawful, reasonable, relevant and not excessive in relation to the purposes set out above, for which it was originally collected;
- 1.3.9.e that, the Contractor indemnifies the Employer and its officials, employees, and directors and undertakes to keep the Employer and its officials, employees, and directors indemnified in respect of any claim, loss, demands, liability, costs and expenses of whatsoever nature which may be made against the Employer (including the costs incurred in defending or contesting any such claim) in relation to the Contractor or the Contractor's employees', representatives' and/or sub-Suppliers' non-compliance with POPIA and/or the Employer's failure to obtain the Contractor's consent or to notify the Contractor of the reason for the processing of the Contractor's personal information;
- 1.3.9.f to the disclosure of the Contractor's personal information by the Employer to any third party, where the Employer has a legal or contractual obligation to disclose such personal information to the third party (or a legitimate interest exists therein);
- 1.3.9.g that, under POPIA, the Contractor may request to access, confirm, request the correction, destruction, or deletion of, or request a description of, personal information held by the Employer in relation to you, subject to applicable law; and
- 1.3.9.h that under POPIA, subject to applicable law, the Contractor also has the right to be notified of a personal information breach and the right to object to, or restrict, the Employer's processing of its personal information.
- 1.3.9.i All requests relating to data protection must be submitted in writing to:  
**The City Manager - C/o the Information Officer, Corporate Services Directorate**  
**Via hand delivery at:** 20th Floor, Tower Block, 12 Hertzog Boulevard, Cape Town 8001  
**Via post at:** Private Bag X918, Cape Town, 8000  
**Via fax at:** 086 202 9982  
**Via email at:** [Popia@capetown.gov.za](mailto:Popia@capetown.gov.za).
- 1.3.10 As required by section 116(2)(b) of the Local Government: Municipal Financial Management Act 56 of 2003, the CCT shall monitor the performance of the Supplier on at least a monthly basis, and the Supplier agrees to provide the CCT with its full cooperation in this regard.

### **Clause 3.1**

Delete clause

### **Clause 3.2.2**

*Add the following at the end of the clause:*

If, in exercising any discretion, the result of such decision would be to utilise the contingency allowance, increase the contract value or granting of time for practical completion, the Employer's Agent must obtain approval from the Employer that such funding or time is available and granted by the Employer to be awarded prior to finalising such a decision.

### **Clause 3.2.3:**

The Employer's Agent shall obtain the specific approval of the Employer before executing any of his functions or duties according to the following Clauses of the General Conditions of Contract or Contract Data:

- a) Clause 3.3.1 Nomination of Employer's Agent's Representative
- b) Clause 3.3.4 Employer's Agent's authority to delegate
- c) Clause 5.8.1 Non-working times
- d) Clause 5.11.2 Suspension of the Works
- e) Clause 5.12.4 Acceleration instead of extension of time
- f) Clause 6 All actions in terms of the clause subject to 3.2.2 of Contract Data.
- h) Clause 6.10.10 Advance payment, for items not listed in the Advance Payment Schedule.
- i) Clause 10.1.5 All actions in terms of the clause subject to 3.2.2 of Contract Data.

### **Clause 3.3.2.2.3:**

*Delete the words "oral or" from the clause*

### **Clause 3.3.2.2.4:**

*Delete the words "oral or" from the clause*

### **Clause 4.1:**

*Add the following Clause after Clause 4.1.2:*

- 4.1.3 Where the Contract is based on an alternative tender offer submitted by the Tenderer/Contractor, he shall, notwithstanding acceptance of the offer by the Employer, be liable for any deficiency in the alternatives proposed, for any costs in ensuring that the alternatives meet the Employer's standards and requirements, and for any loss or damage arising out of such error or deficiency.

### **Clause 5.3.1:**

The documentation required before commencement with Works execution is:

- a) Approved Health and Safety Plan (Refer to applicable clause in the Health and Safety Specification in Part C3.5 in the Scope Work)
- b) Initial programme (Refer to Clause 5.6)
- c) Security (Refer to Clause 6.2)
- d) Evidence of Insurance (Refer to Clause 8.6)
- e) Occupational Health and Safety Agreement (Part C1.5 in Agreements and Contract Data)
- f) Letter of good standing from the Compensation Commissioner, or a licensed compensation insurer (Refer to Clause 4.3)
- g) Protection of the Environment Declaration (Part C1.6 in Agreements and Contract Data)
- h) Proof of Registration / Letter of Good Standing with the Bargaining Council for the Civil Engineering Industry (BCCEI)
- i) OHS Construction Work Permit from the Department of Labour
- j) Wayleaves and relevant local authority permits to work
- k) Environmental method statements as detailed in the Environmental Management Specification

*Add the following to Clause 5.3.1:*

Such instruction shall, where applicable, also be subject to the issuing, by the Provincial Director of the Department of Labour, of a construction work permit to perform the intended construction work in terms of Clause 5.3.4 below.

**Clause 5.3.2:**

The time to submit the documentation required before commencement with Works execution is within **14** days.

**Clause 5.3.3:**

*Add the following to Clause 5.3.3:*

Notwithstanding the above, where a construction work permit from the Provincial Director of the Department of Labour is required, commencement of the Works shall not be deemed to take place until such construction work permit has been issued by the Provincial Director.

**Clause 5.3.4:**

*Add the following Clause after Clause 5.3.3:*

**5.3.4 Application for Construction Work Permit**

Where the Employer is required to apply to the Provincial Director of the Department of Labour for a construction work permit to perform the intended construction work, the employer shall do so as soon as possible after the appointment of the contractor has been finalised and the contractor has been appointed as principal contractor in terms of Regulation 5(1)(k) of the Construction Regulations (2014) and upon receipt of relevant documents as stated in clause 5.3.1.

Should the issuing of a construction work permit delay the Employer's Agent's instruction to commence executing the Works and this in turn causes a delay to Practical Completion by more than 60 days, then the Contractor shall be entitled to make a claim in accordance with Clause 10.1. Should, however, the issuing of a construction work permit be delayed by the submission of an unacceptable draft Health and Safety Plan, in the opinion of either the Employer's Health and Safety Agent, or the Provincial Director of the Department of Labour, no claim for an extension of time will be entertained.

**Clause 5.4.2:**

Access to and possession of the Site shall not be exclusive to the Contractor insofar as the provisions of Clause 4.8 apply, and where ongoing use by the general public is required.

*Add the following Clause after Clause 5.4.3:*

**5.4.4 The Contractor shall bear all costs and charges for special and temporary rights of way required by it in connection with access to the Site.**

**Clause 5.6.2.3:**

*Insert the following after "...approvals,":*

... permits,

**Clause 5.8.1:**

The non-working days are Sundays.

The special non-working days are:

- a) All gazetted public holidays.
- b) Year-end break(s) not exceeding 15 working days in duration.

**Clause 5.12.2.2:**

*Add the following to Clause 5.12.2.2:*

No extension of time will be granted in respect of any delays attributed to normal climatic conditions. Normal climatic conditions shall be deemed to include normal rainfall and associated wet conditions and materials, strong winds and extremes of temperature. However, in the event that delays to critical activities exceed the number of working days listed below for each month, then abnormal climatic conditions shall be deemed to exist, and an extension of time may be claimed in accordance with the provisions of Clause 5.12.

The number of days quoted below shall be regarded as a fair estimate of the delays to be anticipated and allowed for under normal climatic conditions where inclement weather prevents or disrupts critical work.

January	2 days
February	2 days
March	2 days
April	2 days
May	2 days
June	4 days
July	4 days
August	4 days
September	4 days
October	2 days
November	2 days
December	2 days

Claims for delays for abnormal climatic conditions shall be accompanied by substantiating facts and evidence, which shall be submitted timeously as each day or half-day delay is experienced.

It shall be further noted that where the critical path is not affected, no extension of time for abnormal climatic conditions or for any other reason will be entertained.

**Clause 5.13.1:**

The penalty for failing to complete the Works is **R5 000** per day.

*Insert the following after “actual date of Practical Completion”:*

... or, in the case of termination by the Employer in terms of Clause 9.2.1, the actual date of termination,

**Clause 5.16.3:**

The latent defects period is **10** years.

**Clause 6.2.1:**

The security to be provided by the Contractor shall be a performance guarantee of **7%** of the Contract Sum. The performance guarantee shall contain the precise wording of the document included in Part C1.3 of the Contract Data: **Form of Performance Guarantee**, and it shall be issued by a financial institution approved by the Employer at the date when the guarantee is issued. The list of approved financial institutions current at the date of tender is attached to the **Form of Performance Guarantee**.

**Clause 6.2.2:**

*Delete Clause 6.2.2 in its entirety.*

**Clause 6.2.3:**

*Delete Clause 6.2.3 in its entirety and replace with the following:*

The Contractor shall ensure that the performance guarantee remains valid and enforceable until the Certificate of Completion of the Works is issued.

**Clause 6.5.1.2.3:**

The percentage allowance to cover overhead charges is **10%**

**Clause 6.8.2:**

*Add the following to Clause 6.8.2:*

The Contract Price shall be subject to contract price adjustment in accordance with Clause 6.8 of the General Conditions of Contract.

If special materials are specified in Part 2 of the Contract Data then the provisions of Clause 6.8.3 of the General Conditions of Contract shall apply to such special materials.



Where applicable, in terms of the foregoing, the value of the certificates issued shall be adjusted in accordance with the Contract Price Adjustment Schedule with the following values for "Concrete works" and/or "Roads and earthworks":

The value of "x" is 0,10.

The values of the coefficients for "Concrete works" are:

a = 0,25                      b = 0,15                      c = 0,55                      d = 0,05

The values of the coefficients for "Roads and earthworks" are:

a = 0,21                      b = 0,27                      c = 0,42                      d = 0,10

The base month is one month prior to the month in which the tender closed

Furthermore, the Contract Price Adjustment Schedule shall be amended as follows:

"L" is the "Labour Index" and shall be the Consumer Price Index (CPI) for "All items (CPI Headline)", as published in the Statistical News Release, P0141: Table A – Consumer Price Index: Main Indices of Statistics South Africa.

"P" is the "Plant Index" and shall be the Construction Materials Price Index for "Plant and Equipment" as published in the Statistical News Release P0151.1, Table 4 – Mining and construction plant and equipment price index of Statistics South Africa.

"M" is the "Materials Index" and shall be the Construction Materials Price Index for "Civil Engineering material – structures (excluding bitumen)" for Concrete Works and "Civil Engineering material – roads, general (**excluding bitumen**)" for Roads and Earthworks, as published in the Statistical News Release P0151.1, Table 6 – Civil engineering material price indices of Statistics South Africa.

"F" is the "Fuel Index" and shall be the Producer Price Index (PPI) for "Coal and Petroleum Products - Diesel", as published in the Statistical News Release P0142.1: Table 1 –PPI for final manufactured goods of Statistics South Africa.

The amount "Ac" shall be sub-divided into  $Ac_1$  and  $Ac_2$ , as appropriate, and each of these shall be multiplied by its Contract Price Adjustment Factor (CPAF), with the resultant amounts added together to produce the adjustment as envisaged in the CPA Schedule:

where

$Ac_1$  is the proportion of Ac applicable to "Concrete works", and  
 $Ac_2$  is the proportion of Ac applicable to "Roads and earthworks"

and where

$Ac_1 = T_1 - S_1 - D_1 - E_1 - G_1 - Ap_1$ , and  
 $Ac_2 = T_2 - S_2 - D_2 - E_2 - G_2 - Ap_2$

in which formulae the values associated with the symbols  $T_1$  and  $T_2$ ....  $Ap_1$  and  $Ap_2$  shall be applicable to the proportions of T ..... Ap in "Concrete works" and "Roads and earthworks", respectively.

Furthermore, the value of the General Items shall be proportional to the value of work done and materials on Site in  $T_1$  and  $T_2$  respectively.

### Clause 6.8.3: Variation in the cost of special materials

Price adjustment for variations in the cost of special materials is provided for in the Special Materials Schedule at the end of this Part 1: Contract Data provided by the Employer.

### Clause 4.2 of the Contract Price Adjustment Schedule

*Delete the words "by the Contractor" that appear after ".... entered in the Contract Data"*

### Clause 6.8.4:

*Add the following to Clause 6.8.4:*

Notwithstanding the above, in the event that a public holiday is proclaimed after 28 days before the closing date for tenders, no costs other than those that can be claimed under Clause 5.12.3 shall be added to the contract price.

*Add the following after Clause 6.8.4:*

6.8.5. If price adjustment for variations in the cost of plant and materials imported from outside of South Africa is provided for in the contract data, such adjustment shall be based on the information contained on the schedule titled **"Price Basis for Imported Resources"** and as below. For the purposes of this clause the Rand value of imported Plant and Materials inserted on the schedule titled **"Price Basis for Imported Resources"** (column (F)) shall be the value in foreign currency (column (A)) converted to South African Rand (column (C)) by using the closing spot selling rate quoted by **Employer's** main banker, NEDBANK, on the Base Date (seven calendar days before tender closing date) rounded to the second decimal place (column (B)), to which shall be added any Customs Surcharge and Customs Duty applicable at that date (columns (D) and (E)).

6.8.5.1 Adjustment for variations in rates of exchange:

- (a) The value in foreign currency inserted in column (A) shall be subject to clause (h) below when recalculating the Rand value.
- (b) The rate of exchange inserted in column (B) shall be the closing spot selling rate quoted by **Employer's** main banker, NEDBANK, on the Base Date, rounded to the second decimal place, subject to sub-paragraph (c) below.
- (c) If the rate of exchange inserted by the Tenderer differs from the NEDBANK rate referred to above, then the NEDBANK rate shall apply and the Rand value in columns (C) and (F) shall be recalculated accordingly, without altering the price in the Schedules of Quantities for the relevant items.
- (d) If a tender from a supplier or sub-contractor provides for variations in rates of exchange, the Contractor may **only** claim for variations in rates of exchange if he binds the supplier or sub-contractor to the same provision to take out forward cover as described in sub-paragraph (e) below.
- (e) The Contractor (or supplier or sub-contractor) shall within five working days from the date of placing a firm order on an overseas supplier, cover or recover forward by way of a contract with a bank which is an authorised foreign exchange dealer, the foreign exchange component of the cost of any imported Plant and Materials inserted by the Tenderer on the schedule titled **"Price Basis for Imported Resources"**.
- (f) When the Contractor (or supplier or sub-contractor) so obtains forward cover, the Contractor shall immediately notify the Employer of the rate obtained and furnish the Employer with a copy of the foreign exchange contract note.
- (g) Based on the evidence provided in sub-paragraph (f) above, the value in Rand inserted in column (C) on the schedule titled **"Price Basis for Imported Resources"** shall be recalculated using the forward cover rate obtained, and any increase or decrease in the Rand value defined in this clause shall be adjusted accordingly, subject to sub-paragraph (h) below. Failure to provide such evidence shall result in no such recalculation shall be considered by the Employer.
- (h) The adjustments shall be calculated upon the value in foreign currency in the Contractor's (or supplier's or sub-contractor's) **forward cover contract**, provided that, should this value exceed the value in foreign currency inserted in column (A) of the schedule titled **"Price Basis for Imported Resources"**, then the value in column (A) shall be used.

6.8.5.2 Adjustment for variations in customs surcharge and customs duty

- (a) Any increase or decrease in the Rand value between the amounts of Customs Surcharge and Customs Duty inserted on the schedule titled **"Price Basis for Imported Resources"** and those amounts actually paid to the Customs and Excise Authorities, which are due to changes in the percentage rates applicable or to the foreign exchange rate used by the authorities, shall be adjusted accordingly.
- (b) The Tenderer shall state the Customs Duty Tariff Reference applicable to each item and the Contractor shall advise the Employer's Agent of any changes which occur.

6.8.5.3 Adjustment for variation in labour and material Costs

If the prices for imported Plant and Materials are not fixed, the Contractor shall in his Tender specify the formula for calculating Contract Price Adjustments normally used in the country of manufacture and the indices and relative proportions of labour and material on which his Tender prices are based. Evidence of the indices applicable shall be provided with each claim. The indices applicable 42 days before contractual dispatch date from the factory will be used for the purposes of Contract Price Adjustment.

Failure to specify a formula in the Tender shall mean that the prices are fixed or shall be deemed to be fixed.

**Clause 6.10.1.5:**

*Delete Clause 6.10.1.5 in its entirety and replace with the following:*

6.10.1.5 The value of Plant and materials:

6.10.1.5.1 up to a percentage limit of **80%** for the Plant and materials referred to in Clause 6.9.1.1 brought on to the Site but not yet built into the Permanent Works;

Provided that the Contractor has produced documentary evidence of ownership of such Plant and/or materials and has delivered to the Employer an indemnity, approved in writing by the Employer, against any claim to or in respect of such Plant and/or materials by reason of the Contractor's sequestration or liquidation, or of any defect in the Contractor's title to the Plant and/or materials;

6.10.1.5.2 which have been manufactured and are stored at places other than the Site, in respect of which the Employer has indicated, on the Advance Payment Schedule, that advance payment will be permitted;

6.10.1.5.3 for which a deposit with order is required from the Contractor by a manufacturer/supplier, only in respect of which the Employer has indicated, on the Advance Payment Schedule, that advance payment will be permitted;

The terms and conditions for advance payment are set out in Clause 6.10.10 and in the Advance Payment Schedule at the end of this Part 1: Contract Data provided by the Employer.

**Clause 6.10.1.7:**

*Add the following after the words "Clause 5.13":*

or any other fines or penalties that become due under the Contract.

**Clause 6.10.3:**

*Add the following to Clause 6.10.3:*

Notwithstanding the provision of a performance guarantee in terms of Clause 6.2.1, interim payments to the Contractor shall be subject to a retention by the Employer of an amount of **5%** of the said amounts due to the Contractor, with no limit. A guarantee in lieu of retention is not permitted.

**Clause 6.10.4:**

*Add the following to the last sentence of Clause 6.10.4:*

..., dated as at the date of delivery of the Contractor's statement to the Employer's Agent.

*Add the following to Clause 6.10.4:*

Notwithstanding the above, the Employer's Agent shall be empowered to withhold the delivery of the payment certificate until the Contractor has complied with his obligations to report in terms of Clause 4.10.2 and as described in the Scope of Work.

The Contractor may submit a fully motivated application regarding more frequent payment to the Employer's Agent to be submitted to the Employer for consideration. Requests for more frequent payments will be considered at the sole discretion of the Employer and is not a right in terms of this contract.

**Clause 6.10.10:**

*Add the following Clause after Clause 6.10.9:*

**6.10.10 Advance payment**

Subject to Clauses 6.10.1.5.2 and 6.10.1.5.3, and the Advance Payment Schedule, the Employer shall make an advance payment for Plant and materials stored at places other than the Site, or in respect of which a deposit with order is required, only once the Contractor has submitted an advance payment guarantee in accordance with this Clause, the authenticity of which has been verified by the City's Treasury Department..

Unless and until the Employer receives this guarantee, the following paragraphs shall not apply.

The Employer's Agent shall issue an Interim Payment Certificate for, or including, advance payment after receiving a statement under Clause 6.10.1 and after the Employer has received a guarantee in an amount equal to the advance payment requested. This guarantee shall be issued by a financial institution approved by the Employer, as listed in the Annexure in Part C1.3 of the Contract Data, and shall be in the form of and shall contain the precise wording of the document included in Part C1.4: **Form of Advance Payment Guarantee** and shall come into force, be administered and expire in terms thereof.

The Employer shall return the guarantee to the Contractor within 14 days after the expiry date.

The provision of the Advanced Payment Guarantee shall be at the Contractor's cost.

The term "deposit" or "deposit with order" used in the context of this Clause and elsewhere by reference to this Clause, means a sum payable by the Contractor to a manufacturer/supplier prior to the manufacture of an item of Plant or material, required at the time of placing an order, the balance of the value of the item being payable later.

**Clause 8.6.1.1.2:**

The value of Plant and materials supplied by the Employer to be included in the insurance sum is **R 0.00 (Nil)**.

**Clause 8.6.1.1.3:**

The amount to cover professional fees for repairing damage and loss to be included in the insurance sum is **R0.00 (Nil)**.

**Clause 8.6.1.3:**

The limit of indemnity for liability insurance is R20 000 000.00 for any single claim – the number of claims to be unlimited during the construction and defects liability periods.

**Clause 8.6.1.5:**

In addition to the insurances required in terms of General Conditions of Contract Clauses 8.6.1.1 to 8.6.1.4 the following insurance is also required:

- a) Insurance of Construction Equipment (including tools, offices and other temporary structures and contents) and other things (except those intended for incorporation into the Works) brought onto the site for a sum sufficient to provide for their replacement.
- b) Insurance in terms of the provisions of the Compensation for Occupational Injuries and Diseases Act, 130 of 1993.
- c) Motor Vehicle Liability Insurance comprising (as a minimum) "Balance of Third Party" Risks including Passenger Liability Indemnity.
- d) Where the contract involves manufacturing and/or fabrication of the works or part thereof at premises other than the Site, the Contractor shall satisfy the Employer that all materials and equipment for incorporation in the works are adequately insured during manufacture and/or fabrication. In the event of the Employer having an insurable interest in such works during manufacture or fabrication then such interest shall be noted by endorsement to the Contractor's Policies of Insurance.

**Clause 8.6.5:**

*Delete the following from Clause 8.6.5:*

"and the terms thereof shall be subject to the approval of the Employer's Agent, which approval shall not be unreasonably withheld."

**Clause 8.6.6:**

*Replace clause 8.6.6 with the following:*

The Contractor shall provide evidence in the form stated in the contract data to the Employer's Agent that the required insurances are effected and that all premiums thereunder have been paid.

**Clause 9.1:**

*In Clause 9.1.6 replace "and 9.1.3" with:*

, 9.1.3 and 9.1.7

*Add the following Clause after Clause 9.1.6:*

**9.1.7 Death of Sole Proprietor/Member**

Upon the death of the Contractor who was a Sole Proprietor, or a sole member of a Close Corporation, the Contract will terminate forthwith. The Employer shall pay to the Contractor's estate any money which it considers due under the Contract in terms of Clause 9.1.5, in full and final settlement thereof.

**9.1.8 Material Irregularity during procurement process**

The Employer may terminate the contract if a material irregularity vitiates the procurement process leading to the conclusion of the contract, rendering the procurement process and the conclusion of the resulting contract unfair, inequitable, non-transparent, uncompetitive or not cost-effective, provided the Employer follows the processes as described in its SCM Policy.

**9.1.9 Reputational risk or harm to the Employer\**

The Employer, without prejudice to any other remedy for breach of contract, by written notice of default sent to the supplier, may terminate the contract if the implementation of the contract may result in reputational risk or harm to the City as a result of (inter alia):

- 9.1.9.1 reports of poor governance and/or unethical behaviour;
- 9.1.9.2 association with known notorious individuals and family of notorious individuals;
- 9.1.9.3 poor performance issues, known to the Employer;
- 9.1.9.4 negative social media reports;
- 9.1.9.5 adverse assurance (e.g. due diligence) report outcomes;
- 9.1.6.6 where the contractor has been restricted from doing business with the Employer; or
- 9.1.9.7 circumstances where the relevant vendor has employed, or is directed by, anyone who was previously employed in the service of the state (as defined in clause 1.53), where the person is or was negatively implicated in any SCM irregularity.

*Add the following Clause after Clause 9.2.3:*

**9.2.4 Employer's Elections in case of Insolvency**

In addition to anything else contained in this contract, the Employer may make either of the following elections to ensure its rights are protected and any negative impact on service delivery is mitigated:

- 9.2.4.1 At any time, terminate the Contract by giving written notice to the Supplier; or
- 9.2.4.2 accept a contractor's proposal (via the trustee / liquidator) to render delivery utilising the appropriate contractual mechanisms or takes steps to ensure its rights are protected and any negative impact on service delivery is mitigated.

**Clause 10.5.3:**

The number of ad-hoc Adjudication Board Members to be appointed is 1(one).

**ADDITIONAL CONDITIONS OF CONTRACT**

*Add the following Clause after Clause 10:*

Clause 11 Details to be confidential

The Contractor shall treat the details of the Works comprised in this Contract as private and confidential (save in so far as may be necessary for the purposes hereof) and shall not publish or disclose the same or any particulars thereof in any trade or technical paper elsewhere without the prior written consent of the Employer's Agent.

SPECIAL MATERIALS SCHEDULE		
Each material dealt with as a special material in terms of Clause 4.1 of the Contract Price Adjustment Schedule of the General Conditions of Contract is stated in the list below. The provisions of Clause 6.8.3 of the General Conditions of Contract shall apply to such special materials. The base prices for the special materials (current at the time of tender) shall be as stated in the schedule below, or where required, shall be furnished by the tenderer/contractor. Only those materials listed by the Employer below shall be considered as special materials.		
Special Material	Unit	Base Price
Structural steel	t	The STATS SA Construction Material Price Indices, statistical release P0151.1 Table 3 applicable reinforcing and structural steel basic products index value, current at the time of tender closing, will be used as the base prices for determining the adjustment in steel prices.
Steel reinforcing bars	t	
<b>Conditions:</b> 1) When called upon to do so, the contractor shall substantiate the prices to be used to determine the adjustment in respect of the special materials listed above with acceptable documentary evidence. 2) In the case of bituminous products, the Employer has provided, in the schedule above, a base rate for bitumen upon which the tendered rates will be deemed to be based, and which will be used for determining the adjustment in the price of such bituminous products. 3) Where an adjustment for the variation in the price of bituminous products is claimed, the claim must be substantiated by a declaration from the manufacturer, confirming the source of bitumen used in such bituminous products at the time in question. 4) Where the source of bitumen (the refinery) is located in the Western Cape Province, or where bitumen sourced from abroad is landed at a port in the Western Cape, the cost of transporting such bitumen within the boundaries of the Western Cape shall be included in the rate for bituminous products. Extra-over rates to cover the cost of transporting bitumen from beyond the borders of the Western Cape have been measured separately in the Bill of Quantities. 5) Where imported bitumen used in bituminous products is landed at a port beyond the borders of the Western Cape, the importers must clearly state whether or not their price is inclusive of transport to the Western Cape, which will determine whether extra-over transport costs are applicable, or not. The price of the imported bitumen itself must be expressed as a landed price in ZAR.		

ADVANCE PAYMENT SCHEDULE	
<p>This Advance Payment Schedule is to be read in conjunction with Clauses 6.10.1.5.2, 6.10.1.5.3 and 6.10.10 in the Contract Specific Data. The purpose of this schedule is to itemise specific Plant and materials not yet brought on to the Site for building into the Permanent Works and for which the Employer is prepared to make advance payments to the Contractor, subject to the conditions below.</p> <p>The items of Plant and materials which have been identified by the Employer as being suitable for advance payment in terms of the Contract are listed in the table below. Should an item or items be added to the list at tender stage by a tenderer, such item(s) will not be binding on the Employer.</p>	
<b>Plant and materials which have been manufactured and are stored at places other than the Site:</b>	<b>Plant and materials yet to be manufactured and for which a deposit with order is required from the Contractor by a manufacturer/supplier, and which may be stored at places other than the Site after manufacture:</b>
None	None
<b>Conditions:</b> <ol style="list-style-type: none"> <li>1) The Contractor can only rely on advance payment being permitted by the Employer in respect of the Plant and materials listed in the table above. The Employer may, however, permit advance payment for other Plant and materials in exceptional circumstances and at its sole discretion, during the course of the Contract, and upon reasonable request from the Contractor.</li> <li>2) Advance payment for the purposes of deposits will only be provided up to a limit of 20% of the value of any one item being claimed.</li> <li>3) The Contractor shall provide the Employer with documentary evidence of the terms and conditions for which a deposit with order is required by a manufacturer/supplier, together with the advance payment guarantee.</li> <li>4) The Contractor will also be permitted to obtain advance payment for the balance of the value of the Plant and materials in respect of which he has paid a deposit, for an item which after manufacture is stored at a place other than the Site. The Contractor shall, in respect of such payment, provide an advance payment guarantee, either for such balance or, if the advance payment guarantee in respect of the deposit is to be returned by the Employer upon request, for the whole value of the item.</li> </ol>	



CITY OF CAPE TOWN

SPATIAL PLANNING AND ENVIRONMENT: ENVIRONMENTAL MANAGEMENT DEPARTMENT

CONTRACT NO. 285Q/2024/25

UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE

## C1.2 Contract Data (continued)

### *Part 2: Data provided by the Contractor*

The name of the Contractor is .....

The address of the Contractor is

Physical : ..... Postal : .....  
Address ..... Address .....

.....

.....

.....

.....

Telephone : ..... Fax: .....

email : .....

#### CONTRACTOR'S ANNUAL HOLIDAY PERIODS DURING CONSTRUCTION PERIOD

Year 1 contractor's annual holiday period	Start date		End date

CITY OF CAPE TOWN

SPATIAL PLANNING AND ENVIRONMENT: ENVIRONMENTAL MANAGEMENT DEPARTMENT

CONTRACT NO. 285Q/2024/25

UPGRADE TO THE ZEEKOEVLAI WEIR IN THE FALSE BAY NATURE RESERVE

## C1.3 Form of Performance Guarantee

### PERFORMANCE GUARANTEE

For use with the Conditions of Contract as described in C1.2: Contract Data Part 1: Contract Data provided by the Employer

#### GUARANTOR DETAILS AND DEFINITIONS

"Guarantor" means: .....

"Physical address: .....

"Employer" means: The City of Cape Town, SPATIAL PLANNING AND ENVIRONMENT DIRECTORATE.

"Contractor" means: .....

"Employer's Agent" means: .....

"Works" means: 285Q/2024/25 Upgrade to the Zeekoevlei Weir in the False Bay Nature Reserve.....

"Site" means: The site as defined in the Contract Data.

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

"Contract Sum" means: The accepted amount inclusive of tax of R.....

Amount in words: .....

"Guaranteed Sum" means: The maximum aggregate amount of R.....

Amount in words: .....

"Expiry Date" means: The date of issue by the Employer's Agent of the Certificate of Completion of the Works.

#### CONTRACT DETAILS

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

#### PERFORMANCE GUARANTEE

1. The Guarantor's liability shall be limited to the amount of the Guaranteed Sum.
2. The Guarantor's period of liability shall be from and including the date of issue of this Performance Guarantee and up to and including the Expiry Date or the date of payment in full of the Guaranteed Sum, whichever occurs first. The Employer's Agent and/or the Employer shall advise the Guarantor in writing of the date on which the Certificate of Completion 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 suretyship;
  - 3.2 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 issued by the Employer to the Contractor stating that payment of a sum certified by the Employer's Agent 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 with a copy to the Contractor stating that a period of seven (7) days has elapsed since the first written demand in terms of 4.1 and the sum certified has still not been paid;
  - 4.3 A copy of the aforesaid payment certificate which entitles the Employer to receive payment in terms of the Contract of the sum certified 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 calling up this Performance Guarantee, such demand stating that:
  - 5.1 the Contract has been terminated due to the Contractor's default and that 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. Where the Guarantor has made payment in terms of 5, the Employer shall upon the date of issue of the Final Payment Certificate submit an expense account to the Guarantor showing how all monies received in terms of this Performance Guarantee have been expended and shall refund to the Guarantor any resulting surplus. All monies refunded to the Guarantor in terms of this Performance Guarantee shall bear interest at the prime overdraft rate of the Employer's bank compounded monthly and calculated from the date payment was made by the Guarantor to the Employer until the date of refund.
8. 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.
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 this Performance Guarantee on account of any conduct alleged to be prejudicial to the Guarantor.
10. The Guarantor chooses the physical 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 no 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 Courts 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.

Signed at .....

Date .....

Guarantor's signatory (1) .....

Capacity .....

Guarantor's signatory (2) .....

Capacity .....

Witness signatory (1) .....

Witness signatory (2) .....

## **ANNEXURE**

### **LIST OF APPROVED FINANCIAL INSTITUTIONS**

The following financial institutions are currently (as at 28 February 2023) approved for issue of contract guarantees to the City:

#### **National Banks:**

ABSA Bank Limited  
FirstRand Bank Limited  
Investec Bank Limited  
Nedbank Limited.  
Standard Bank of SA Limited

#### **International Banks (with branches in South Africa):**

Barclays Bank PLC.  
CitibankNA  
Credit Agricole Corporate and Investment Bank  
HSBC Bank PLC  
JP Morgan Chase Bank  
Societe Generale  
Standard Chartered Bank

#### **Insurance companies:**

American International Group Inc (AIG)  
Bryte Insurance Company Limited  
Coface SA  
Compass Insurance Company Limited  
Credit Guarantee Insurance Corporation of Africa  
Guardrisk Insurance Company Limited  
Hollard Insurance Company Limited  
Infiniti Insurance Limited  
Lombard Insurance Company Limited  
Mutal and Federal Risk Financing Limited  
New National Assurance Company Limited  
PSG Konsult Ltd (previously Absa Insurance)  
Regent Insurance Company Limited  
Renasa Insurance  
Santam Limited

C1.4 Form of Advance Payment Guarantee

ADVANCE PAYMENT GUARANTEE

For use with the Conditions of Contract as described in C1.2: Contract Data Part 1: Contract Data provided by the Employer

GUARANTOR DETAILS AND DEFINITIONS

"Guarantor" means: .....  
"Physical address: .....  
"Employer" means: The City of Cape Town, SPATIAL PLANNING AND ENVIRONMENT DIRECTORATE.  
"Contractor" means: .....  
"Employer's Agent" means: .....  
"Works" means: 285Q/2024/25 Upgrade to the Zeekoevlei Weir in the False Bay Nature Reserve.....  
"Site" means: The site as defined in the Contract Data.

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

"Plant and materials" means: The Plant and materials stored at places other than the Site, or in respect of which an advance payment prior to manufacture is required, which the Employer has agreed may be subject to advance payment, such Plant and materials being listed in the Schedule of Plant and materials.

"Schedule of Plant and materials" means: A list of Plant and materials which shows the value thereof to be included in the Guaranteed Advance Payment Sum.

"Guaranteed Advance Payment Sum" means: The maximum aggregate amount of R.....  
Amount in words: .....

"Expiry Date" means: The date of the payment certificate wherein the Plant and materials have been certified by the Employer's Agent as having been built into the Permanent Works.

CONTRACT DETAILS

Employer's Agent issues: Interim Payment Certificates and Final Payment Certificate.

ADVANCE PAYMENT GUARANTEE

- 1. The Guarantor's liability shall be limited to the amount of the Guaranteed Advance Payment Sum.
- 2. The Guarantor's period of liability shall be from and including the date of issue of this Advance Payment Guarantee and up to and including the Expiry Date or the date of payment in full of the Guaranteed Advanced Payment Sum, whichever occurs first.

3. The Guarantor hereby acknowledges that:
  - 3.1 any reference in this Advance Payment 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 suretyship;
  - 3.2 its obligation under this Advance Payment 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 issued by the Employer to the Contractor stating that payment of a sum certified by the Employer's Agent 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 with a copy to the Contractor stating that a period of seven (7) calendar days has elapsed since the first written demand in terms of 4.1 and the sum certified has still not been paid;
  - 4.3 A copy of the aforesaid payment certificate which entitles the Employer to receive payment in terms of the Contract of the sum certified in 4.
5. Subject to the Guarantor's maximum liability referred to in 1, the Guarantor undertakes to pay to the Employer the Guaranteed Advance Payment 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 calling up this Advance Payment Guarantee, such demand stating that:
  - 5.1 the Contract has been terminated due to the Contractor's default and that this Advance Payment 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 Advance Payment 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.
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 this Advance Payment Guarantee on account of any conduct alleged to be prejudicial to the Guarantor.
10. The Guarantor chooses the physical address as stated above for the service of all notices for all purposes in connection herewith.
11. This Advance Payment Guarantee is neither negotiable nor transferable and shall expire in terms of 2, where after no claims will be considered by the Guarantor. The original of this Guarantee shall be returned to the Guarantor after it has expired.
12. This Advance Payment 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 Courts 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.

Signed at .....

Date .....

Guarantor's signatory (1) .....

Capacity .....

Guarantor's signatory (2) .....

Capacity .....

Witness signatory (1) .....

Witness signatory (2) .....

.



## Schedule of Plant and materials

For use with Advance Payment Guarantees on contracts using the General Conditions of Contract for Construction Works, Third Edition, 2015.

Employer                      The City of Cape Town, SPATIAL PLANNING AND ENVIRONMENT DIRECTORATE

Contractor                      .....

Works                      285Q/2024/25 Upgrade to the Zeekoevlei Weir in the False Bay Nature Reserve .....

Payment Certificate No.       .....

Advance payment is requested in respect of the following items of Plant and materials, which have been manufactured and are stored at places other than the Site, or in respect of which a deposit with order is required from the Contractor by a manufacturer/supplier:

Bill of Quantities item no.	Description of Plant and materials	Deposit with order required (Y/N)	Place of storage (or manufacture, if deposit with order is required)	Unit	Quantity	Unit price R       c	Total Price R       c
<b>Total Value of Plant and materials to be included in Guaranteed Advance Payment Sum</b>							R

Signed at ..... on the ..... day of ..... 20.....

.....  
for the Contractor

.....  
As witness

.....  
Approved by Employer's Agent

**Contract**

66

**Part C1: Agreements and Contract Data**  
**Contract No. 285Q/2024/25**

**C1.4**  
**Form of Advance Payment Guarantee**

CITY OF CAPE TOWN

SPATIAL PLANNING AND ENVIRONMENT: ENVIRONMENTAL MANAGEMENT DEPARTMENT

CONTRACT NO. 285Q/2024/25

UPGRADE TO THE ZEEKOEVLIE WEIR IN THE FALSE BAY NATURE RESERVE

## C1.5 Occupational Health and Safety Agreement

### AGREEMENT MADE AND ENTERED INTO BETWEEN THE CITY OF CAPE TOWN (HEREINAFTER CALLED THE "EMPLOYER") AND

..... ,  
(Contractor/Mandatory/Company/CC Name)

**IN TERMS OF SECTION 37(2) OF THE OCCUPATIONAL HEALTH AND SAFETY ACT, 85 OF 1993 AS AMENDED.**

I, ....., representing

....., as an employer  
in its own right, do hereby undertake to ensure, as far as is reasonably practicable, that all work will be performed, and all equipment, machinery or plant used in such a manner as to comply with the provisions of the Occupational Health and Safety Act (OHSA) and the Regulations promulgated thereunder.

I furthermore confirm that I am/we are registered with the Compensation Commissioner and that all registration and assessment monies due to the Compensation Commissioner have been fully paid or that I/We are insured with an approved licensed compensation insurer.

COID ACT Registration Number: .....

OR Compensation Insurer: ..... Policy No.: .....

I undertake to appoint, where required, suitable competent persons, in writing, in terms of the requirements of OHSA and the Regulations and to charge him/them with the duty of ensuring that the provisions of OHSA and Regulations as well as the Council's Special Conditions of Contract, Way Leave, Lock-Out and Work Permit Procedures are adhered to as far as reasonably practicable.

I further undertake to ensure that any subcontractors employed by me will enter into an occupational health and safety agreement separately, and that such subcontractors comply with the conditions set.

I hereby declare that I have read and understand the Occupational Health and Safety Specifications contained in this tender and undertake to comply therewith at all times.

I hereby also undertake to comply with the Occupational Health and Safety Specification and Plan submitted and approved in terms thereof.

Signed at ..... on the ..... day of ..... 20....

\_\_\_\_\_  
**Witness**

\_\_\_\_\_  
**Mandatory**

Signed at ..... on the ..... day of ..... 20 ....

\_\_\_\_\_  
Witness

\_\_\_\_\_  
for and on behalf of  
City of Cape Town

CITY OF CAPE TOWN

SPATIAL PLANNING AND ENVIRONMENT: ENVIRONMENTAL MANAGEMENT DEPARTMENT

CONTRACT NO. 285Q/2024/25

UPGRADE TO THE ZEEKOEVLIE WEIR IN THE FALSE BAY NATURE RESERVE

## C1.6 Protection of the Environment Declaration

### PROTECTION OF THE ENVIRONMENT DECLARATION

The Contractor will not be given right of access to the Site until this form has been signed

CONTRACT NO.: 285Q/2024/25

CONTRACT TITLE: UPGRADE TO THE ZEEKOEVLIE WEIR IN THE FALSE BAY NATURE RESERVE

I/ we,.....{Contractor} record as follows:

1. I/ we, the undersigned, do hereby declare that I/ we am/ are aware of the increasing requirement by society that construction activities shall be carried out with due regard to their impact on the environment.
2. In view of this requirement of society and a corresponding requirement by the Employer with regard to this Contract, I/ we will, in addition to complying with the letter of the terms of the Contract dealing with protection of the environment, also take into consideration the spirit of such requirements and will, in selecting appropriate employees, plant, materials and methods of construction, in-so-far as I/ we have the choice, include in the analysis not only the technical and economic (both financial and with regard to time) aspects but also the impact on the environment of the options. In this regard, I/ we recognise and accept the need to abide by the "precautionary principle" which aims to ensure the protection of the environment by the adoption of the most environmentally sensitive construction approach in the face of uncertainty with regard to the environmental implications of construction.
3. I/ we declare that I/ we have read and understood the contents of the Environmental Management Programme (which is comprised of the Environmental Management Specification and its Annexures) for this Contract, and that I/ we understand my/our responsibilities in terms of enforcing and implementing the Environmental Management Programme. I/ we also declare that I/ we have made appropriate provision in my/ our pricing of the Bills of Quantities items for the Environmental Management Programme.
4. I/ we acknowledge and accept the right of the Employer to deduct, should he so wish, from any amounts due to me/ us, such amounts (hereinafter referred to as fines) as the Employer's Agent shall certify as being warranted in view of my/ our failure to comply with the terms of the Contract dealing with protection of the environment, subject to the following:
  - 4.1 The Employer's Agent, in determining the amount of such fine, shall take into account, *inter alia*, the nature of the offence, the seriousness of its impact on the environment, the degree of prior compliance/non-compliance, the extent of the Contractor's overall compliance with environmental protection requirements and, in particular, the extent to which he considers it necessary to impose a sanction in order to eliminate/reduce future occurrences
  - 4.2 The Employer's Agent shall, with respect to any fine imposed, provide me/ us with a written statement giving details of the offence, the facts on which the Employer's Agent has based his assessment and the terms of the Contract (by reference to the specific clause) which has been contravened.

Signed ..... Date.....  
CONTRACTOR

CITY OF CAPE TOWN

SPATIAL PLANNING AND ENVIRONMENT: ENVIRONMENTAL MANAGEMENT DEPARTMENT

CONTRACT NO. 285Q/2024/25

UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE

## C1.7 Insurance Broker's Warranty

Pro Forma



*Letterhead of Contractor's Insurance Broker*

Date \_\_\_\_\_

CITY OF CAPE TOWN  
City Manager  
Civic Centre  
12 Hertzog Boulevard  
Cape Town  
8000

Dear Sir

**CONTRACT NO.:** 285Q/2024/25

**CONTRACT TITLE:** UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE

**NAME OF CONTRACTOR:** \_\_\_\_\_

I, the undersigned, do hereby confirm and warrant that all the insurances required in terms of the abovementioned contract have been issued and/or in the case of blanket/umbrella policies, have been endorsed to reflect the interests of the CITY OF CAPE TOWN with regard to the abovementioned contract, and that all the insurances and endorsements, etc., are all in accordance with the requirements of the contract.

I furthermore confirm that all premiums in the above regard have been paid.

Yours faithfully

Signed: \_\_\_\_\_

For: \_\_\_\_\_

CITY OF CAPE TOWN

SPATIAL PLANNING AND ENVIRONMENT: ENVIRONMENTAL MANAGEMENT DEPARTMENT

CONTRACT NO. 285Q/2024/25

UPGRADE TO THE ZEEKOEVLIE WEIR IN THE FALSE BAY NATURE RESERVE

## C1.8 Contract of Temporary Employment as Community Liaison Officer

Construction Contract No.: .....

PROJECT .....

AGREEMENT made between the CONTRACTOR .....  
and the Community Liaison Officer....., hereafter  
referred to as the CLO, for the appointment and employment of a CLO for the duration of the work in respect of the  
above named construction contract.

### 1. THE PARTIES HAVE AGREED THAT

The CLO will be employed by the CONTRACTOR on a temporary basis for the duration of the work from the date of signing this agreement to the date of practical completion as defined in the Contract, subject to all the conditions set out below.

### 2. THE DUTIES OF THE COMMUNITY LIAISON OFFICER SHALL BE:

1. to keep the community informed on the progress of the project;
2. to keep the Contractor informed on relevant Community affairs and possible grievances;
3. to manage the recruitment of workers from the Sub-Council Job-Seekers Database;
4. to assist the Contractor's supervisory staff in the management of the workers.

### 3. THE FOLLOWING CONDITIONS OF EMPLOYMENT SHALL APPLY:

The Conditions of Temporary Employment as applicable on this Contract for the workers recruited from the Community shall apply equally to the CLO, except that the rate of remuneration shall be R..... per working day. These conditions that apply are listed below as they appear in the Contract of Temporary Employment:

- 3.1 If required to work on a statutory public holiday or Sunday the payment will be double the amount stated in the previous paragraph.
- 3.2 Maximum hours of work:
  - (i) 9¼ hours per day
  - (ii) 45 hours per week;
  - (iii) 5 days per week;
  - (iv) 5 hours without an interval, whereupon there shall be an interval of at least 30 minutes;
  - (v) A spread-over period of 12 hours.
- 3.3 The CLO shall be entitled to payment where he is prevented from working by reasons which are within the control of the Contractor.
- 3.4 On days when it is raining the Contractor may, before 9 a.m., decide not to open the site and there will be no pay.

If the Contractor closes the site between 9 a.m. and 1 p.m., the CLO will be paid half the daily wage.

If the site works later than 1 p.m., the CLO will be paid the full daily wage.

- 3.5 Workers and the CLO will not be permitted to work under conditions of:
- (i) undisciplined or unruly behaviour;
  - (ii) insubordination to Team Leader, Supervisors or Management;
  - (iii) abuse of intoxicating substances;
  - (iv) criminal actions by the employee;
  - (v) strike action or political stayaways.
- 3.6 Workers, including the CLO, may be dismissed after two official written warnings for the following behaviour:
- (i) undisciplined or unruly behaviour;
  - (ii) insubordination to Team Leader, Supervisors or Management;
  - (iii) abuse of intoxicating substances;
  - (iv) wilful or negligent damage to or loss of machines or equipment.
- The Contractor shall ensure that he has statements from at least two witnesses concerning any of the above situations.  
The Contractor shall inform the CLO within 24 hours of any warning issued to workers employed from the Job-Seekers Database.
- 3.7 The CLO will be paid on a Friday afternoon every two weeks, one week in arrears.
- 3.8 The CLO shall be given a statement with each payment on which is recorded:
- (i) the name of the Contractor;
  - (ii) the CLO's name;
  - (iii) the number of days worked by the CLO;
  - (iv) the rate per day;
  - (v) the details of any deductions made;
  - (vi) the actual amount paid to the CLO.
- 3.9 No deduction shall be made from the remuneration except where the CLO consents in writing or unless the Contractor is permitted or required to do so by law or the order of any competent court.
- 3.10 The CLO shall be supplied free of charge with all health and safety equipment required by the Occupation Health and Safety Act. The equipment shall remain the property of the Contractor.
- 3.11 The Contractor must give the CLO at least one week's notice of the termination of the Contract of Temporary Employment. If this is not done, the CLO must be paid earnings for five days. This condition does not apply if the CLO is dismissed.
- 3.12 At the end of the period of temporary employment, the Contractor shall provide a Certificate of Service recording the Contractor's name, the CLO's name and address, the period of service, the type of work on which the CLO was engaged and the rate of remuneration on termination.

#### 4. **TERMINATION OF AGREEMENT**

- 4.1 If the CLO can no longer perform and execute his/her duties as detailed in this agreement, this agreement will be terminated without prejudice to any rights under this agreement.

#### 5. **THE CONDITIONS OF THIS AGREEMENT**

- 5.1 The parties expressly declare that this agreement contains all the conditions negotiated between them, and no condition or stipulation not contained herein shall be binding upon the parties.

#### 6. **THUS AGREED AND SIGNED BY THE PARTIES:**

Contractor: .....

Community Liaison officer: .....

Date: .....

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## Part C2: Pricing Data

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	Pages
C2.1 Pricing Assumptions.....	73 – 74
C2.2 Bills of Quantities.....	75 – 139

## C2.1 Pricing Assumptions

Pricing Assumptions mean the criteria as set out below, read together with all Parts of this contract document, which it will be assumed in the contract, that the tenderer has taken into account when developing his prices.

1. The method of measurement published by the Committee of Transport Officials (COTO) is applicable, subject to variations and amendments.
2. Descriptions in the Bills of Quantities are abbreviated and comply generally with those in the Standardised Specifications. 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 Schedule, the requirements of the Standardised Specification or Scope of Work, as applicable, shall prevail.
3. The measurement and payment clauses in a specification in which further information regarding the scheduled items is given, are referenced under "Item" (pay items) in the Bills of Quantities. The referenced clauses 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 are identified by the digits which follow COTO.
4. Unless otherwise stated, items are measured net in accordance with the drawings, and no allowance is made for waste.
5. The quantities set out in the Bills of Quantities are the estimated quantities of the Contract Works, but the Contractor will be required to undertake whatever quantities may be directed by the Employer's Agent from time to time. The Contract Price for the completed contract shall be computed from the actual quantities of work done, valued at the relevant unit rates and prices.
6. The prices and rates to be inserted in the Bills of Quantities are to be the full inclusive prices 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 tender 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.
7. A price or rate should be entered against each item in the Bills of Quantities, whether the quantities are stated or not. **An item against which no rate is/are entered, or if anything other than a rate or a nil rate (for example, a zero, a dash or the word "included" or abbreviations thereof) is entered against an item, it will also be regarded as a nil rate having been entered against that item, i.e. that there is no charge for that item.** The Tenderer may be requested to clarify nil rates, or items regarded as having nil rates; and the Employer may also perform a risk analysis with regard to the reasonableness of such rates.
8. Except where rates only are required, insert all amounts to be included in the total tendered price in the "Amount" column and show the corresponding total tendered price.



9. The units of measurement described in the Bills of Quantities are metric units. Abbreviations which may be used in these Bills of Quantities are as follows:

mm	=	millimetre	h	=	hour
m	=	metre	kg	=	kilogram
km	=	kilometre	t	=	ton (1000 kg)
m <sup>2</sup>	=	square metre	No.	=	number
m <sup>2</sup> .pass	=	square metre-pass	sum	=	lump sum
ha	=	hectare	MN	=	meganewton
m <sup>3</sup>	=	cubic metre	MN.m	=	meganewton-metre
m <sup>3</sup> .km	=	cubic metre-kilometre	P C sum	=	Prime Cost sum
l	=	litre	Prov sum	=	Provisional sum
kl	=	kilolitre	%	=	per cent
MPa	=	megapascal	kW	=	kilowatt

10. Where fractions of a cent occur in calculations of prices and amounts, they shall be rounded up/down to the nearest whole cent.
11. The Tenderer is referred to C.2.24 in Part T1.2 Tender Data regarding the pricing of Deviations and/or Qualifications.
11. Clause C.2.13.11 c) in Part T1.2 Tender Data shall be applicable to the submission of Bills of Quantities which have been priced electronically, and which the Tenderer wishes to submit as a printed version with his/her tender in the place of handwritten priced Bills of Quantities.

If there is found to be any variance between the printed version and the original issued document, the original shall stand. However, where Addenda have been issued which amend the Bills of Quantities, then the printed Bills of Quantities shall take these into account.

The pages of the issued Bills of Quantities should not be removed from the tender document.

12. Tenderers are referred to Clause 8 Measurement and Payment in the Environmental Management (EM) Specification in Part C3.5 in the Scope of Work for the basic principles of measurement and pricing of the EM Specification.
13. All descriptions or clauses where trade names or proprietary products are specified, are deemed to include the phrase "or equal approved"
14. Tenderers are referred to Clause 6.8.2 in Part C1.2 Contract Data regarding contract price adjustment.

The following bills in Part C2.2 Bills of Quantities are deemed applicable to the following categories for the purposes of Contract Price Adjustment:

NO.	BILL	CATEGORY SPLIT (%)	
		Roads and earthworks	Concrete works
1.	GENERAL ITEMS	20	80
2.	ZEEKOEVLIE WEIR STRUCTURES	10	90
3.	ZEEKOE RIVER FISHWAY	60	40
4.	TEMPORARY ACCESS ROADS CONSTRUCTION	100	0
5.	ENGINEER'S MATERIAL TESTING	20	80

## C2.2 Bills of Quantities

Bid specifications may not make any reference to any particular trade mark, name, patent, design, type, specific origin or producer, unless there is no other sufficiently precise or intelligible way of describing the characteristics of the work, in which case such reference must be accompanied by the words "or equivalent".

**CONTRACTORS MUST NOTE THAT WHEREVER THIS DOCUMENT REFERS TO ANY PARTICULAR TRADE MARK, NAME, PATENT, DESIGN, TYPE, SPECIFIC ORIGIN OR PRODUCER, SUCH REFERENCE SHALL BE DEEMED TO BE ACCOMPANIED BY THE WORDS 'OR EQUIVALENT'**

CONTENTS	PAGES
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BILL NO. 2 ZEEKOEVLEI WEIR STRUCTURES	83 - 110
BILL NO. 3 ZEEKOE RIVER FISHWAY	111 - 130
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**CITY OF CAPE TOWN**  
**DIRECTORATE: SPATIAL PLANNING & ENVIRONMENT, URBAN DEVELOPMENT IMPLEMENTATION**  
**CONTRACT NO. 285Q/2024/25**  
**UPGRADE TO THE ZEEKOEVLIE WEIR IN THE FALSE BAY NATURE RESERVE**

**SCHEDULE 1: GENERAL ITEMS**

**SECTION C1.2**

Item	Description	Unit	Quantity	Rate	Amount
<b>C1.2</b>	<b>GENERAL REQUIREMENTS AND PROVISIONS</b>				
<b>C1.2.1</b>	<b>Environmental Management:</b>				
C1.2.1.1	Monitoring of compliance with and reporting on the EMP	month	13.00		
C1.2.1.2	Dedicated environmental officer (if specified in the Contract Documentation)	month	13.00		
<b>C1.2.4</b>	<b>Stakeholder liaison</b>	month	13.00		
<b>C1.2.5</b>	<b>Safety:</b>				
C1.2.5.1	Health and safety plan	lump sum	1.00		
C1.2.5.2	Implementation of health and safety plan	month	13.00		
<b>C1.2.8</b>	<b>Dayworks:</b>				
C1.2.8.1	Personnel:				
	(a) Unskilled labourer	h	400.00		
	(b) Semi-skilled labourer	h	100.00		
	(c) Skilled labourer	h	50.00		
	(d) Gang leader	h	50.00		
	(e) Foreman	h	20.00		
	(f) Skilled Artisan	h	20.00		
C1.2.8.2	Construction equipment (specify size and / or model number):				
	(a) Motor grader	h	20.00		
	(b) Vibratory roller	h	20.00		
	(c) Pneumatic roller	h	20.00		
	(d) Front end loader	h	20.00		
	(e) Tractor loader backhoe	h	20.00		
	(f) Excavator	h	20.00		
	(g) Compressor	h	20.00		
C1.2.8.3	Vehicles (specify size):				
	(a) Light delivery vehicle	km	250.00		
	(b) Flatbed truck	km	250.00		
	(c) Dump truck	km	250.00		
C1.2.8.4	Materials:				
	(a) Procurement of materials	prov sum	1.00	300 000.00	300 000.00
<b>Total Carried Forward</b>					

SCHEDULE 1: GENERAL ITEMS

SECTION C1.2

Item	Description	Unit	Quantity	Rate	Amount
Brought Forward					
	(b) Contractor's handling costs, profit and all other charges in respect of item C1.2.8.4(a)	%	300 000.00		
Total Carried Forward To Summary					

**SCHEDULE 1: GENERAL ITEMS**

SECTION C1.3

Item	Description	Unit	Quantity	Rate	Amount
<b>C1.3</b>	<b>CONTRACTOR'S SITE ESTABLISHMENT AND GENERAL OBLIGATIONS</b>				
<b>C1.3.1</b>	<b>The Contractor's general obligations:</b>				
C1.3.1.1	Fixed obligations	lump sum	1.00		
C1.3.1.2	Value-related obligations	lump sum	1.00		
PC1.3.1.3	Time-related obligations				
	(a) For "Start-up period"	month	2.00		
	(b) For "Construction period"	month	13.00		
<b>C1.3.2</b>	<b>Contract sign boards</b>	m <sup>2</sup>	25.00		
<b>PC1.3.3</b>	<b>Community Liaison Officer (CLO)</b>				
	(a) Remuneration of 1 CLO	PC Sum	1.00	180 000.00	180 000.00
	(b) Handling costs and profit in respect of subitem PC1.3.3 (a)	%	180 000.00		
<b>Total Carried Forward To Summary</b>					

**CITY OF CAPE TOWN**  
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**UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE**

**SCHEDULE 1: GENERAL ITEMS**

**SECTION C1.4**

Item	Description	Unit	Quantity	Rate	Amount
<b>C1.4</b>	<b>FACILITIES FOR THE ENGINEER</b>				
C1.4.1	Site accommodation:				
C1.4.1.1	Offices and conference room	m²	36.00		
C1.4.1.6	Car ports	No	1.00		
C1.4.1.7	Ablution unit (equipped as specified)	No	1.00		
<b>C1.4.2</b>	<b>Items measured by area:</b>				
C1.4.2.6	Roller blinds, opaque type	m²	2.00		
C1.4.2.8	Notice boards	m²	3.00		
C1.4.2.9	White boards	m²	3.00		
<b>C1.4.3</b>	<b>Items measured by number:</b>				
C1.4.3.1	Office swivel chair	No	1.00		
C1.4.3.2	Office chair	No	1.00		
C1.4.3.3	Draughtsman's stool	No	1.00		
C1.4.3.6	Typist desk (L-shaped)	No	1.00		
C1.4.3.7	Drawing table	No	1.00		
C1.4.3.9	Bookcase	No	1.00		
C1.4.3.10	Filing cabinet	No	1.00		
C1.4.3.13	220 / 250 volt power outlet plug point	No	1.00		
C1.4.3.16	Single 1 500 mm, 22 watt LED tube ceiling light	No	1.00		
C1.4.3.23	Fire extinguisher 9,0 kg, dry powder type	No	1.00		
C1.4.3.24	Air-conditioning unit	No	1.00		
C1.4.3.27	Waste paper basket	No	1.00		
C1.4.3.28	UPS / Voltage stabiliser	No	1.00		
C1.4.3.29	A3 / A4 colour printer, copier, scanner	No	1.00		
C1.4.3.31	Rain gauge	No	1.00		
C1.4.3.32	Minimum / maximum atmospheric temperature gauge	No	1.00		
C1.4.3.33	Digital thermometer	No	1.00		
C1.4.3.35	3,0 m aluminium straight edge complete with two measuring wedges	No	1.00		
C1.4.3.36	Measuring wheel	No	1.00		
C1.4.3.37	First aid kit	No	1.00		
<b>Total Carried Forward</b>					

**SCHEDULE 1: GENERAL ITEMS**

SECTION C1.4

Item	Description	Unit	Quantity	Rate	Amount
<b>Brought Forward</b>					
<b>C1.4.4</b>	<b>Prime cost items:</b>				
C1.4.4.5	The provision of internet connectivity and WiFi data for Engineer's site staff	PC sum	1.00	20 000.00	20 000.00
C1.4.4.6	Handling costs and profit in respect of item C1.4.4.5	%	20 000.00		
C1.4.4.7	The provision of paper and ink for a combination colour printer / copier / scanner	PC sum	1.00	10 000.00	10 000.00
C1.4.4.8	Handling costs and profit in respect of item C1.4.4.7	%	10 000.00		
<b>C1.4.5</b>	<b>Services at site offices, laboratories and site accommodation:</b>				
C1.4.5.1	Fixed costs	lump sum	1.00		
C1.4.5.2	Running costs	month	13.00		
C1.4.8	Site security measures for the Engineer's facilities				
C1.4.8.1	Supply and installation of all required security measures at the Engineer's site offices and laboratories	lump sum	1.00		
C1.4.8.2	Provision of security guards / watchmen and an armed response service at the Engineer's site offices and laboratories	month	13.00		
<b>Total Carried Forward To Summary</b>					

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**SCHEDULE 1: GENERAL ITEMS**

**SECTION C1.5**

Item	Description	Unit	Quantity	Rate	Amount
<b>C1.5</b>	<b>ACCOMMODATION OF TRAFFIC</b>				
<b>C1.5.1</b>	<b>Accommodation of pedestrian and non-motorised traffic:</b>				
C.1.5.1.1	Accommodation of pedestrian and non-motorised traffic	month	13.00		
<b>C1.5.2</b>	<b>Accommodation of vehicular traffic</b>	month	13.00		
<b>C1.5.7</b>	<b>Temporary traffic control facilities:</b>				
C1.5.7.1	Delineators including mounting bases and ballast:				
	(a) Single sided, reversible left or right (size indicated)	No	100.00		
	(b) Double sided, reversible left or right (size indicated)	No	200.00		
C1.5.7.2	Traffic cones, minimum height 750 mm	No	20.00		
C1.5.7.3	Flagmen	man-shift	300.00		
C1.5.7.4	Traffic controllers	man-shift	150.00		
C1.5.7.5	Provision of illuminated traffic signs:				
	(a) Sign mounted flashing amber lights (2 lights with the specified power supply) mounted on a backing board which is:				
	(i) 900 mm wide x 150 mm high	No	1.00		
	(ii) 1 200 mm wide x 200 mm high	No	1.00		
C1.5.7.6	Maintenance of illuminated traffic signs:				
	(a) Sign mounted flashing amber lights (a pair of two lights mounted on a separate backing board)	month	3.00		
<b>C1.5.8</b>	<b>Traffic safety officer</b>	man-month	13.00		
<b>C1.5.9</b>	<b>Traffic safety vehicle</b>	month	13.00		
<b>C1.5.11</b>	<b>Provision of safety equipment for visitors</b>				
C1.5.11.1	Provision of reflective safety vests for visitors	No	240.00		
C1.5.11.2	Provision of hard hats for visitors	No	240.00		
<b>C1.5.12</b>	<b>Additional traffic accommodation facilities ordered by the Engineer:</b>				
C1.5.12.1	Provision of additional traffic accommodation facilities	prov sum	1.00	300 000.00	300 000.00
C1.5.12.2	Handling cost, profit and all other charges in respect of item C1.5.12.1	%	300 000.00		
<b>Total Carried Forward To Summary</b>					



SCHEDULE 1: GENERAL ITEMS

SUMMARY OF SECTIONS		
Section	Description	Amount
C1.2	C1.2: GENERAL REQUIREMENTS AND PROVISIONS	.....
C1.3	C1.3: CONTRACTOR'S SITE ESTABLISHMENT AND GENERAL OBLIGATIONS	.....
C1.4	C1.4: FACILITIES FOR THE ENGINEER	.....
C1.5	C1.5: ACCOMMODATION OF TRAFFIC	.....
Total Carried Forward To Summary Of Schedules		.....

**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

SECTION C1.6

Item	Description	Unit	Quantity	Rate	Amount
<b>C1.6</b>	<b>CLEARING AND GRUBBING</b>				
<b>C1.6.1</b>	<b>Clearing:</b>				
C1.6.1.1	Clearing with machines and some hand labour where necessary	ha	0.40		
C1.6.1.3	Clearing for new fence lines (over a width of 2,0 m)	km	0.20		
<b>C1.6.2</b>	<b>Grubbing:</b>				
C1.6.2.1	Grubbing with machines and some hand labour where necessary	ha	0.40		
C1.6.2.3	Grubbing by hand for new fence lines (over a width of 2,0 m)	km	0.20		
<b>C1.6.3</b>	<b>Removal and grubbing of large trees and tree stumps:</b>				
C1.6.3.1	Girth equal to or exceeding 1,0 m up to and including 2,0 m	No	5.00		
C1.6.4	Removal of buildings and structures:				
C1.6.4.1	Removal of 1.5 wide, 14m long, structural timber pedestrian bridge inclusive of all connections	lump sum	1.0		
<b>C1.6.5</b>	<b>Spreading organic matter and covering with soil</b>	m³	135.00		
<b>C1.6.6</b>	<b>Mulching selected organic matter</b>	m³	135.00		
<b>C1.6.7</b>	<b>Re-clearing of previously cleared areas</b>	ha	0.30		
<b>C1.6.9</b>	<b>Conservation of topsoil:</b>				
C1.6.9.1	Stockpiling topsoil	m³	150.00		
C1.6.9.2	Windrowing topsoil	m³	150.00		
<b>Total Carried Forward To Summary</b>					

**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

SECTION C1.7

Item	Description	Unit	Quantity	Rate	Amount
<b>C1.7</b>	<b>LOADING AND HAULING</b>				
<b>C1.7.1</b>	<b>Loading:</b>				
C1.7.1.1	Loading from stockpile using machines and some hand labour where necessary	m³	2 100.00		
C1.7.1.2	Loading from heaps or windrows using machines and some hand labour where necessary	m³	150.00		
<b>C1.7.2</b>	<b>Hauling:</b>				
C1.7.2.1	Hauling material for use in the Works and off-loading it on the site of the Works:				
	(a) Soil, gravel, crushed stone and pavement layer material	m³-km	5 400.00		
	(b) Boulders and hard material	m³-km	500.00		
C1.7.2.2	Hauling material to spoil and off-loading it at a designated spoil area:				
	(a) Cleared and grubbed material (organic matter and all other unsuitable or waste material)	m³-km	2 800.00		
	(b) Soil and gravel material	m³-km	21 500.00		
	(c) Boulders and hard material	m³-km	900.00		
<b>Total Carried Forward To Summary</b>					

SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES

SECTION C3.2

Item	Description	Unit	Quantity	Rate	Amount
C3.2	CULVERTS				
C3.2.5	Rectangular culverts with prefabricated elements:				
C3.2.5.1	Prefabricated portal culverts; wall and roof combination (3600x2100 Class 75S road application rectangular portal stormwater culvert to SANS 986)	No	20.00		
C3.2.16	Brickwork (engineering bricks):				
C3.2.16.4	280mm thick in gatehouse walls	m²	100.00		
C3.2.17	Plaster to gatehouse walls	m²	50.00		
Total Carried Forward To Summary					

SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES

SECTION C4.1

Item	Description	Unit	Quantity	Rate	Amount
C4.1	BORROW MATERIALS				
C4.1.10	Compacting the floor of the stockpile sites	m³	600.00		
C4.1.12	Stockpiling the material				
C4.1.12.2	Material directly from the excavation	m³	4 500.00		
Total Carried Forward To Summary					

**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

SECTION C4.2

Item	Description	Unit	Quantity	Rate	Amount
<b>C4.2</b>	<b>CUT MATERIALS</b>				
<b>C4.2.5</b>	<b>Excavating of materials in designated excavations, material obtained from:</b>				
C4.2.5.1	Soft excavation	m <sup>3</sup>	4 500.00		
C4.2.5.4	Hard excavation (other than by blasting)	m <sup>3</sup>	350.00		
<b>C4.2.7</b>	<b>Removal of unsuitable stable cut material to spoil:</b>				
C4.2.7.1	In layer thicknesses of 200 mm and less	m <sup>3</sup>	450.00		
C4.2.7.2	In layer thicknesses exceeding 200 mm	m <sup>3</sup>	50.00		
<b>C4.2.9</b>	<b>Excavate material to spoil in sites designated by the Contractor, material obtained from:</b>				
C4.2.9.1	Soft excavation, overburden and unsuitable material	m <sup>3</sup>	250.00		
<b>C4.2.11</b>	<b>Breaking down oversize material</b>	m <sup>3</sup>	150.00		
<b>C4.2.12</b>	<b>Finishing the side slopes</b>				
C4.2.12.2	Designated excavations	m <sup>2</sup>	100.00		
<b>Total Carried Forward To Summary</b>					

SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES

SECTION C4.4					
Item	Description	Unit	Quantity	Rate	Amount
C4.4	COMMERCIAL MATERIALS				
C4.4.2	Commercial materials identified by the Contractor from commercial, private or other non-commercial suppliers:				
C4.4.2.1	Pavement layer material:				
	(g) Type G7 gravel material	m³	210.00		
	(l) Type G9 gravel material (to replace unsuitable roadbed material)	m³	30.00		
	(q) Natural or crushed gravel material for the wearing course of an unsealed road	m³	155.00		
Total Carried Forward To Summary					

SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES

SECTION C5.1

Item	Description	Unit	Quantity	Rate	Amount
C5.1	<b>ROADBED</b>				
C5.1.1	<b>Roadbed construction and compaction:</b>				
C5.1.1.1	Compaction of in-situ material to 90 % of MDD	m³	160.00		
C51.1.3	Compaction of imported material to 90 % of MDD	m³	30.00		
C5.1.4	<b>Removal of unsuitable material to spoil:</b>				
C5.1.4.1	In layer thicknesses of 200 mm and less:				
	(a) Stable material	m³	30.00		
Total Carried Forward To Summary					



SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES

SECTION C5.2

Item	Description	Unit	Quantity	Rate	Amount
C5.2	FILL				
C5.2.2	Fill construction:				
C5.2.2.1	Normal fill material in compacted layer thicknesses of 200 mm and less	m³	600.00		
C5.2.11	Finishing-off fill slopes, medians and interchange areas:				
C5.2.11.1	Fill slopes	m²	1 200.00		
Total Carried Forward To Summary					

SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES

SECTION C5.3					
Item	Description	Unit	Quantity	Rate	Amount
C5.3	ROAD PAVEMENT LAYERS				
C5.3.1	Compiling and implementing M&U plans for the construction of all the pavement layers				
	(a) Gravel wearing course	No	1.00		
	(b) G7 selected	No	1.00		
	(c) In situ subgrade (min. G9 quality)	No	1.00		
C5.3.2	Construction of pavement layers:				
C5.3.2.1	Construction of layers using conventional construction methods:				
	(a) Selected subgrade layer, G7 (200mm) compacted to 93 % of MDD	m³	150.00		
	(g) Gravel wearing course layer (150mm) compacted to 95 % of MDD	m³	170.00		
Total Carried Forward To Summary					

SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES

SECTION C11.2

Item	Description	Unit	Quantity	Rate	Amount
C11.2	NON-STRUCTURAL GABIONS				
C11.2.1	Foundation trench excavation:				
C11.2.1.1	Excavating all material situated within the following depth ranges below the surface level:				
	(a) 0 m to 1,5 m	m³	40.00		
	(b) Exceeding 1,5 m and up to 3,0 m	m³	10.00		
C11.2.1.2	Extra over sub-item C11.2.1.1 for excavation in hard material, irrespective of depth	m³	2.00		
C11.2.2	Surface preparation for bedding the gabion boxes and mattresses	m²	40.00		
C11.2.3	Gabion boxes and mattresses:				
C11.2.3.2	PVC coated gabion boxes (2mx1mx1m), min 3mm galvanised wire mesh, Polimac coated or equivalent	m³	45.00		
C11.2.4	Geotextile (Kaytech A8 or equivalent), min 50kn/m tensile strength, min 9kN puncture strength	m²	85.00		
Total Carried Forward To Summary					

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**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

**SECTION C11.5**

Item	Description	Unit	Quantity	Rate	Amount
<b>C11.5</b>	<b>FENCING</b>				
<b>C11.5.1</b>	<b>Supply and erect new fencing material for new fences and for supplementing material in existing fences which are being repaired or removed:</b>				
PC11.5.1.12	Galvanised welded mesh with powder coating, 2.4m height, 3m length sections including posts, finishes as per dwg HHO-220102-750-3201	m	200.00		
PC11.5.1.13	Stile v-shape welded mesh fence panels, 2.4m height, including posts, finishes as per dwg HHO-220102-750-3201	m	6.60		
PC11.5.1.14	In-situ concrete, grade 30MPa/20mm, for fencing post foundations	m³	14.00		
<b>C11.5.2</b>	<b>New gates</b>				
C11.5.2.1	Welded mesh double leaf vehicle gate, 2.4m height x 3.850m wide as per dwg HHO-220102-750-3201	No	2.00		
C11.5.2.2	Welded mesh double leaf vehicle gate, 2.4m height x 3.850m wide, with pedestrian gate, 2.4m height x 1m wide as per dwg HHO-220102-750-3201	No	1.00		
<b>11.5.3</b>	<b>Moving existing fence and gates:</b>				
11.5.3.1	Fences:				
	(e) Game fences (diamond mesh with gum pole timber/concrete posts)	km	0.03		
<b>C11.5.4</b>	<b>Dismantling existing fences and gates:</b>				
C11.5.4.1	Fences:				
	(e) Game fences (diamond mesh with gum pole timber/concrete posts)	km	0.20		
C11.5.4.2	Gates (3.5m x 2.4m height, welded mesh double leaf vehicle gate)	No	1.00		
<b>C11.5.5</b>	<b>Providing temporary fences and gates:</b>				
C11.5.5.4	Game fences, 2.4m height, 150mm diam. timber posts at 2m spacing, as per existing	km	0.27		
C11.5.5.5	Temporary gates (3.5m x 2.4m height)	No	1.00		
<b>C11.5.8</b>	<b>Posts fixed horizontally to the bottom of wire mesh for the closing of openings under fences:</b>				
C11.5.8.1	Timber posts (150mm diam.)	m	285.00		
<b>C11.5.9</b>	<b>Repairing existing fences (game fencing - diamond mesh)</b>				
C11.5.10	Disposal of existing fencing materials:				
C11.5.10.1	Game fences (Diamond mesh, 2.4m height)	km	0.20		
<b>Total Carried Forward</b>					

SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES

SECTION C11.5

Item	Description	Unit	Quantity	Rate	Amount
Brought Forward					
C11.5.10.6	Gates (3.5m x 2.4m height)	No	1.00		
Total Carried Forward To Summary					

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**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

**C13.1: FOUNDATIONS**

Item	Description	Unit	Quantity	Rate	Amount
<b>C13.1</b>	<b>FOUNDATION</b>				
<b>C13.1.1</b>	<b>Provision of designs and drawings of temporary works by an ECSA-registered Professional Engineer or Technologist or Geotechnical Engineer to:</b>				
	(i) Zeekoevlei gate house, fishladder & linking fishway	lump sum	1.00		
	(ii) Zeekoevlei sluice channel & maintenance vehicle access ramps	lump sum	1.00		
	(iii) Zeekoevlei vehicular access culvert	lump sum	1.00		
	(iv) Zeekoevlei fire truck access ramp	lump sum	1.00		
<b>C13.1.3</b>	<b>Excavation:</b>				
C13.1.3.1	Excavating soft material situated within the following successive depth ranges:				
	(a) 0m up to 1,5m	m³	800.00		
	(b) > 1,5m and < 3,0m	m³	50.00		
C13.1.3.2	Extra over subitem C13.1.3.1 for excavation in hard material irrespective of depth	m³	80.00		
C13.1.3.5	Extra over subitem C13.1.3.1 for excavation in restricted areas	m³	800.00		
C13.1.4.3	Extra over item C13.1.3.1 for additional excavation required by the Engineer after excavation is complete	m³	1 000.0		
<b>C13.1.6</b>	<b>Access and drainage:</b>				
C13.1.6.1	Access				
	(i) Zeekoevlei gate house, fishladder & linking fishway	lump sum	1.00		
	(ii) Zeekoevlei sluice channel & maintenance vehicle access ramp	lump sum	1.00		
	(iii) Zeekoevlei vehicular access culvert	lump sum	1.00		
	(iv) Zeekoevlei fire truck access ramp	lump sum	1.00		
C13.1.6.2	Drainage				
	(i) Zeekoevlei gate house, fishladder & linking fishway	lump sum	1.00		
	(ii) Zeekoevlei sluice channel & maintenance vehicle access ramp	lump sum	1.00		
	(iii) Zeekoevlei vehicular access culvert	lump sum	1.00		
	(iv) Zeekoevlei fire truck access ramp	lump sum	1.00		
<b>C13.1.7</b>	<b>Backfill to excavations utilising:</b>				
C13.1.7.1	Material from excavation	m³	300.00		
<b>Total Carried Forward</b>					

**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

C13.1: FOUNDATIONS

Item	Description	Unit	Quantity	Rate	Amount
<b>Brought Forward</b>					
C13.1.7.3	Soil cement	m³	250.00		
<b>C13.1.9</b>	<b>Fill within a restricted area (extra over item C5.2.2)</b>	m³	15.00		
<b>C13.1.14</b>	<b>Foundation fill consisting of:</b>				
C13.1.14.1	Rock fill	m³	500.0		
C13.1.14.2	Crushed-stone fill	m³	500.0		
C13.1.14.4	Mass concrete (Class C15/20-20)	m³	50.00		
C13.1.14.5	Concrete blinding (75mm thk, C15/20-20)	m³	150.00		
<b>C13.1.21</b>	<b>Foundation lining:</b>				
	(a) Foundation lining (polyethylene sheet, minimum 250microns thick)	m²	50.00		
	(b) Foundation lining (needle punched & non-woven, Grade 1 geotextile) below concrete blinding	m²	1 800.0		
<b>C13.1.23</b>	<b>Lateral support for excavations:</b>				
C13.1.23.1	Excavation or fill at:				
	(a) 0m to 2,5m depth				
	(i) Zeekoevlei fishladder	m²	60.00		
	(ii) Zeekoevlei sluice channel	m²	60.00		
	(iii) Zeekoevlei maintenance vehicle access ramp	m²	40.00		
	(iv) Zeekoevlei linking fishway	m²	40.00		
	(v) Zeekoevlei vehicular access culvert	m²	60.00		
	(vi) Zeekoevlei fire truck access ramp	m²	20.00		
<b>Total Carried Forward To Summary</b>					

**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

C13.2: FALSEWORK, FORMWORK AND CONCRETE FINISH

Item	Description	Unit	Quantity	Rate	Amount
<b>C13.2</b>	<b>FALSEWORK, FORMWORK AND CONCRETE FINISH</b>				
<b>C13.2.2</b>	<b>Vertical formwork to provide:</b>				
C13.2.2.1	F1 surface finish to fill/non-exposed faces to:				
	(i) Zeekoevlei gate house				
	(a) Foundations	m <sup>2</sup>	20.00		
	(b) Wall	m <sup>2</sup>	80.00		
	(ii) Zeekoevlei fishladder	m <sup>2</sup>	30.00		
	(iii) Zeekoevlei sluice channel				
	(a) Foundations and ground slabs	m <sup>2</sup>	70.00		
	(b) Wall	m <sup>2</sup>	250.00		
	(iv) Zeekoevlei maintenance vehicle access ramp				
	(a) Foundations	m <sup>2</sup>	20.00		
	(b) Wall	m <sup>2</sup>	100.00		
	(v) Zeekoevlei linking fishway	m <sup>2</sup>	350.00		
	(vi) Zeekoevlei vehicular access culvert abutment/wing/retaining walls				
	(a) Foundations	m <sup>2</sup>	10.00		
	(b) Wall	m <sup>2</sup>	80.00		
	(vii) Rondevlei canal outlet				
	(a) Wall	m <sup>2</sup>	75.00		
	(b) Foundations and ground slabs	m <sup>2</sup>	25.00		
C13.2.2.2	F3 surface finish to exposed/non-fill faces to:				
	(i) Zeekoevlei gate house				
	(a) Flat slab and beam faces	m <sup>2</sup>	20.00		
	(b) Flat wall faces	m <sup>2</sup>	80.00		
	(c) Flat column faces	m <sup>2</sup>	35.00		
	(d) Curved wall faces	m <sup>2</sup>	5.00		
	(e) Curved column faces	m <sup>2</sup>	30.00		
	(ii) Zeekoevlei fishladder walls	m <sup>2</sup>	80.00		
	(iii) Zeekoevlei sluice channel wall	m <sup>2</sup>	250.00		
	(iv) Zeekoevlei maintenance vehicle access ramp walls	m <sup>2</sup>	100.00		
<b>Total Carried Forward</b>					



**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

C13.2: FALSEWORK, FORMWORK AND CONCRETE FINISH

Item	Description	Unit	Quantity	Rate	Amount
<b>Brought Forward</b>					
	(vi) Zeekoevlei vehicular access culvert abutment / retaining / wing walls	m²	80.00		
	(vii) Rondevlei canal outlet walls	m²	80.00		
C13.2.3	Horizontal formwork to provide:				
C13.2.3.1	F1 surface finish to:				
	(i) Zeekoevlei gate house				
	(a) Roof slab	m²	40.00		
	(b) Floor slab	m²	35.00		
C13.2.10	<b>Provision of designs and drawings of falsework and formwork by an ECSA registered Professional Engineer or Technologist for all structures within the following divisions:</b>				
	(i) Zeekoevlei gate house	lump sum	1.00		
	(ii) Zeekoevlei fishladder	lump sum	1.00		
	(iii) Zeekoevlei sluice channel	lump sum	1.00		
	(iv) Zeekoevlei maintenance vehicle access ramp	lump sum	1.00		
	(v) Zeekoevlei linking fishway	lump sum	1.00		
	(vi) Zeekoevlei vehicular access culvert	lump sum	1.00		
	(v) Rondevlei canal outlet	lump sum	1.00		
<b>Total Carried Forward To Summary</b>					

**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

**C13.3: STEEL REINFORCEMENT**

Item	Description	Unit	Quantity	Rate	Amount
<b>C13.3</b>	<b>STEEL REINFORCEMENT</b>				
<b>C13.3.1</b>	<b>Reinforcement for:</b>				
C13.3.1.1	Zeekoevlei gate house				
	(a) Mild-steel bars	t	1.00		
	(b) High-yield-stress-steel bars (450MPa)	t	12.00		
C13.3.1.2	Zeekoevlei fishladder				
	(a) Mild-steel bars	t	1.00		
	(b) High-yield-stress-steel bars (450MPa)	t	5.00		
C13.3.1.3	Zeekoevlei sluice channel				
	(a) Mild-steel bars	t	3.00		
	(b) High-yield-stress-steel bars (450MPa)	t	30.00		
C13.3.1.4	Zeekoevlei maintenance vehicle access ramp				
	(a) Mild-steel bars	t	1.00		
	(b) High-yield-stress-steel bars (450MPa)	t	10.00		
C13.3.1.5	Zeekoevlei linking fishway				
	(a) Mild-steel bars	t	1.00		
	(b) High-yield-stress-steel bars (450MPa)	t	10.00		
C13.3.1.6	Zeekoevlei vehicular access culvert				
	(a) Mild-steel bars	t	2.00		
	(b) High-yield-stress-steel bars (450MPa)	t	20.00		
C13.3.1.7	Zeekoevlei fire truck access ramp				
	(a) Mild-steel bars	t	0.50		
	(b) High-yield-stress-steel bars (450MPa)	t	5.00		
C13.3.1.8	Rondevlei canal outlet				
	(a) Mild-steel bars	t	0.80		
	(b) High-yield-stress-steel bars (450MPa)	t	8.00		
C13.3.4	<b>Extra-over item C13.3.1 (a), (b), etc. for galvanising of reinforcement</b>	t	60.00		
<b>Total Carried Forward To Summary</b>					

**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

C13.4: CONCRETE

Item	Description	Unit	Quantity	Rate	Amount
<b>C13.4</b>	<b>CONCRETE</b>				
<b>C13.4.1</b>	<b>Cast in situ concrete:</b>				
C13.4.1.2	Durable concrete (class D):				
	(a) Zeekoevlei gatehouse foundation, suspended slabs & columns, D28/35-XS3A(50)-20	m³	60.00		
	(b) Zeekoevlei fishladder, D28/35-XS3A(50)-20	m³	35.00		
	(c) Zeekoevlei sluice channel surface bed & retaining walls, D40/50-XS3A(100)-20				
	(i) Retaining walls and footings	m³	130.00		
	(ii) Surface beds	m³	160.00		
	(d) Zeekoevlei maintenance vehicle access ramp and retaining walls, D40/50-XS3A(100)-20				
	(i) Retaining wall and footings	m³	45.00		
	(ii) Surface beds (ramp & embankment)	m³	50.00		
	(e) Zeekoevlei linking fishway, D40/50-XS3A(100)-20				
	(i) Channel (wall & footings)	m³	80.00		
	(ii) Vehicle crossing (suspended slab and approach slabs)	m³	3.00		
	(f) Zeekoevlei vehicular access culvert, D40/50-XS3A(100)-20				
	(i) Abutment walls/wing walls/retaining walls and footings	m³	50.00		
	(ii) Surface beds (incl upstream drop-off wall & hippo spike area local slab thickening)	m³	100.00		
	(iii) In-situ slab above precast culverts	m³	20.00		
	(g) Zeekoevlei fire truck access ramp, D40/50-XS3A(100)-20				
	(i) Surface beds (ramps, embankments)	m³	40.00		
	(h) Rondevlei canal outlet, D40/50-XS3A(100)-20				
	(i) Canal bed and walls, downstream drop-off wall, and embankment surface bed	m³	70.00		
<b>C13.4.3</b>	<b>Extra over item C13.4.1 for the protection of concrete from adverse environmental conditions, if required:</b>				
C13.4.3.2	Durable concrete (class D):				
	(a) Zeekoevlei gatehouse foundation, suspended slabs & columns, D28/35-XS3A(50)-20	m³	60.00		
<b>Total Carried Forward</b>					

**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

C13.4: CONCRETE

Item	Description	Unit	Quantity	Rate	Amount
<b>Brought Forward</b>					
	(b) Zeekoevlei fishladder, D28/35-XS3A(50)-20	m <sup>3</sup>	35.00		
	(c) Zeekoevlei sluice channel surface bed & retaining walls, D40/50-XS3A(100)-20				
	(i) Retaining walls and footings	m <sup>3</sup>	130.00		
	(ii) Surface beds	m <sup>3</sup>	160.00		
	(d) Zeekoevlei maintenance vehicle access ramp and retaining walls, D40/50-XS3A(100)-20				
	(i) Retaining wall and footings	m <sup>3</sup>	45.00		
	(ii) Surface beds (ramp & embankment )	m <sup>3</sup>	50.00		
	(e) Zeekoevlei linking fishway, D40/50-XS3A(100)-20				
	(i) Channel (wall and footings)	m <sup>3</sup>	80.00		
	(ii) Vehicle crossing (suspended slab and approach slabs)	m <sup>3</sup>	3.00		
	(f) Zeekoevlei vehicular access culvert, D40/50-XS3A(100)-20				
	(i) Abutment walls/wing walls/retaining walls and footings	m <sup>3</sup>	50.00		
	(ii) Surface beds (incl upstream drop-off wall & hippo spike area local slab thickening)	m <sup>3</sup>	100.00		
	(iii) In-situ slab above precast culverts	m <sup>3</sup>	20.00		
	(g) Zeekoevlei fire truck access ramp, D40/50-XS3A(100)-20				
	(i) Surface beds (ramps, embankments)	m <sup>3</sup>	40.00		
	(h) Rondevlei canal outlet, D40/50-XS3A(100)-20				
	(i) Canal bed and walls, downstream drop-off wall, and embankment surface bed	m <sup>3</sup>	70.00		
<b>C13.4.5</b>	<b>Curing and surface protection of cast in situ concrete, as and where specifically required:</b>				
C13.4.5.1	Zeekoevlei gatehouse foundation, slabs & columns	m <sup>2</sup>	200.00		
C13.4.5.2	Zeekoevlei fishladder	m <sup>2</sup>	150.00		
C13.4.5.3	Zeekoevlei sluice channel surface bed & retaining walls	m <sup>2</sup>	1 500.00		
C13.4.5.4	Zeekoevlei maintenance vehicle access ramp and retaining walls	m <sup>2</sup>	400.00		
C13.4.5.5	Zeekoevlei linking fishway	m <sup>2</sup>	450.00		
C13.4.5.6	Zeekoevlei vehicular access culvert surface beds, slabs, walls and footings	m <sup>2</sup>	450.00		
<b>Total Carried Forward</b>					

**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

C13.4: CONCRETE

Item	Description	Unit	Quantity	Rate	Amount
<b>Brought Forward</b>					
C13.4.5.7	Zeekoevlei fire truck access ramp surface beds	m <sup>2</sup>	200.00		
C13.4.5.8	Rondevlei canal outlet	m <sup>2</sup>	450.00		
<b>PC13.4.9</b>	<b>Manufacturing precast concrete members:</b>				
C13.4.9.1	Zeekoevlei structures:				
	(a) Fishladder drop-in baffle block, approx. 300kg, for exposed marine conditions, steel fibre reinforced, top finish using architectural formliner, in accordance with dwg -312-1101	No	24.00		
	(b) Sluice channel concrete drain unit, approx. 480kg, for exposed marine conditions, steel fibre reinforced, in accordance with drawing -313-2001	No	36.00		
	(c) Sluice channel concrete fish refuge box unit, approx. 620kg, for exposed marine conditions, fibre-reinforced, in accordance with dwg -313-1101	No	14.00		
<b>C13.4.11</b>	<b>Transporting and erecting precast concrete members:</b>				
C13.4.11.1	Zeekoevlei structures:				
	(a) Fishladder triangular drop-in baffle block, approx. 300kg, for exposed marine conditions, steel fibre reinforced, top finish using architectural formliner, in accordance with dwg -312-1101	No	24.00		
	(b) Sluice channel concrete drain unit, 1400x800x350, approx. 480kg, for exposed marine conditions, steel fibre reinforced, in accordance with drawing -313-2001	No	36.00		
	(c) Sluice channel concrete fish refuge box unit, 1200x800x600, approx. 620kg, for exposed marine conditions, steel fibre-reinforced, in accordance with dwg -313-1101	No	14.00		
<b>PC13.4.13</b>	<b>Complete demolition and disposal of existing structural concrete or masonry elements or parts existing structures:</b>				
C13.4.13.1	Zeekoevlei structures				
	(a) Existing reinforced concrete or masonry miscellaneous structures	m <sup>3</sup>	10.00		
	(b) Existing reinforced concrete surface bed	m <sup>3</sup>	57.00		
<b>PC13.4.14</b>	<b>Controlled demolition of concrete from structural elements:</b>				
C13.4.14.1	Zeekoevlei structures				
	(a) Existing reinforced concrete structures	m <sup>3</sup>	10.00		
<b>Total Carried Forward To Summary</b>					

**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

C13.7: JOINTS

Item	Description	Unit	Quantity	Rate	Amount
<b>C13.7</b>	<b>JOINTS</b>				
<b>C13.7.2</b>	<b>Filled joints:</b>				
C13.7.2.1	10mm closed cell polyurethane foam joint former with optional 3.2mm high density fibreboard backing				
	(a) Zeekoevlei fishladder	m <sup>2</sup>	5.00		
	(b) Zeekoevlei sluice channel	m <sup>2</sup>	20.00		
	(c) Zeekoevlei access ramps	m <sup>2</sup>	30.00		
	(d) Zeekoevlei linking fishway	m <sup>2</sup>	20.00		
	(e) Zeekoevlei vehicular access culvert	m <sup>2</sup>	20.00		
	(f) Rondevlei canal outlet	m <sup>2</sup>	20.00		
<b>C13.7.3</b>	<b>Unfilled joints:</b>				
PC13.7.3.1	Saw cut expansion joint, 50mm deep, to 200mm thick concrete surface bed slab				
	(a) Zeekoevlei sluice channel	m	100.00		
	(b) Zeekoevlei access ramps	m	40.00		
	(d) Rondevlei canal outlet	m	30.00		
C13.7.3.2	50mm deep crack-control chamfered recess in walls on both faces				
	(a) Zeekoevlei fishladder	m	120.00		
	(b) Zeekoevlei sluice channel	m	35.00		
	(c) Zeekoevlei access ramps	m	120.00		
	(d) Zeekoevlei linking fishway	m	25.00		
	(e) Zeekoevlei vehicular access culvert	m	30.00		
	(f) Rondevlei canal outlet	m	20.00		
<b>C13.7.4</b>	<b>Sealing joints with:</b>				
C13.7.4.1	Sealant (Silicon sealant & backing chord, 10mm wide)				
	(a) Zeekoevlei fishladder	m	120.00		
	(b) Zeekoevlei sluice channel	m	35.00		
	(c) Zeekoevlei access ramps	m	120.00		
	(d) Zeekoevlei linking fishway	m	25.00		
	(e) Zeekoevlei vehicular access culvert	m	30.00		
	(f) Rondevlei canal outlet	m <sup>2</sup>	20.00		
<b>Total Carried Forward</b>					

SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES

C13.7: JOINTS

Item	Description	Unit	Quantity	Rate	Amount
Brought Forward					
C13.7.4.2	Waterstop (Internally placed 200mm wide PVC waterstop, ribbed with centre bulb)				
	(a) Zeekoevlei fishladder	m	45.00		
	(b) Zeekoevlei linking fishway	m	20.00		
Total Carried Forward To Summary					

**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

C13.8: ANCILLARY STRUCTURAL ELEMENTS

Item	Description	Unit	Quantity	Rate	Amount
<b>C13.8</b>	<b>ANCILLARY STRUCTURAL ELEMENTS</b>				
<b>C13.8.4</b>	<b>Concrete pedestrian railings</b>				
	Polycrrete railing (post & rail), 1.075m high, 50 posts/8.2m, for exposed conditions, inclusive of support coping, in accordance with dwg -318-1102	m	50.00		
<b>C13.8.10</b>	<b>Drainage pipes and weep holes:</b>				
C13.8.10.2	Weep holes:				
	uPVC 75mm diameter, length to suit element width 50mm protrusion , to include steel wire barrier:				
	(i) Zeekoevlei sluice channel retaining wall	No	77.00		
	(ii) Zeekoevlei access ramp retaining wall	No	70.00		
	(iii) Zeekoevlei vehicular access culvert retaining wall	No	22.00		
<b>C13.8.12</b>	<b>Synthetic-fibre filter fabric: needle punched &amp; non-woven, grade 1</b>				
C13.8.12.1	Zeekoevlei sluice channel retaining wall	m²	285.00		
C13.8.12.2	Zeekoevlei access ramp retaining wall	m²	190.00		
C13.8.12.3	Zeekoevlei vehicular access culvert retaining wall	m²	44.00		
<b>C13.8.15</b>	<b>Drainage strips</b>				
C13.8.15.1	200mm wide, double cuspatd, PVC, as per drainage detail to sluice channel retaining wall	m	180.00		
C13.8.15.2	200mm wide, double cuspatd, PVC, as per drainage detail to access ramp retaining wall	m	135.00		
C13.8.15.2	200mm wide, double cuspatd, PVC, as per drainage detail to vehicular acces culvert	m	44.00		
<b>C13.8.16</b>	<b>Perforated drainage pipes:</b>				
C13.8.16.1	65mm diameter uPVC pipe wrapped in geotextile, needle punched & non-woven, grade 1, as per drainage details, to sluice channel retaining wall	m	90.00		
C13.8.16.2	65mm diameter uPVC pipe wrapped in geotextile, needle punched & non-woven, grade 1, as per drainage details, to access ramp retaining wall	m	70.00		
C13.8.16.2	65mm diameter uPVC pipe wrapped in geotextile, needle punched & non-woven, grade 1, as per drainage details, to vehicular acces culvert	m	22.00		
<b>PC13.8.18</b>	<b>Hinged glass-fibre reinforced drain gratings for sluice channel low-flow drain:</b>				
<b>Total Carried Forward</b>					



**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

C13.8: ANCILLARY STRUCTURAL ELEMENTS

Item	Description	Unit	Quantity	Rate	Amount
<b>Brought Forward</b>					
PC13.8.18.1	Moulded glass-fibre reinforced vinyl ester polymer grating panel, 726x1146x38mm, 38mm square mesh pattern, inclusive of M8 stainless steel eyebolt hinge connection detail as shown on drawing	No	30.00		
PC13.8.18.2	Moulded glass-fibre reinforced vinyl ester polymer grating panel, 726x1336x38mm, 38mm square mesh pattern, inclusive of M8 stainless steel eyebolt hinge connection detail as shown on drawing	No	80.00		
PC13.8.18.3	Poltruded glass-fibre reinforced vinyl ester polymer grating panel, 726x1155x38mm overall, with 38mm x 150mm rectangular mesh pattern, inclusive of M8 stainless steel eyebolt hinge connection detail as shown on drawing	No	8.00		
PC13.8.19	Installation of hinged glass-fibre reinforced grating panel onto precast concrete sluice channel low-flow drain units using chemical anchors	No	50.00		
PC13.8.20	Supply and installation of steel plate security door with frame and lintel, opens outwards, 6mm thick outer plate with protective weather and fire coatings, 8 No. 40mm locking bolts	No	2.00		
PC13.8.21	Supply and installation of 1000mm wide x 1050mm high channel gate as per dwg HHO--220102-710-2801	No	4.00		
<b>PC13.8.22</b>	<b>Movement dowels for expansion or contraction joints:</b>				
PC13.8.22.1	Supply and installation of 25mm dia. Grade 304 stainless steel movement dowel bar for expansion joints, 400mm long, inclusive of 200mm bond-breaker sleeve as per drawing	No	300.00		
PC13.8.22.2	Supply and installation of R20 galvanised mild steel movement dowel bar for contraction joints, 500mm long, inclusive of 300mm bond-breaker sleeve as per drawing	No	500.00		
<b>PC13.8.23</b>	<b>Fish ladder drainage tubes:</b>				
PC13.8.23.1	Supply and installation of 200mm dia. UV-stabilised PVC drainage tube, 300mm long, cast into fishladder box, in accordance with dwg -312-1101	No	50.00		
PC13.8.23.2	Supply of 200mm dia. UV-stabilised PVC drainage tube end cap	No	20.00		
<b>Total Carried Forward To Summary</b>					

SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES

SECTION C13.11

Item	Description	Unit	Quantity	Rate	Amount
C13.11	STRUCTURAL STEELWORK FOR MAJOR STRUCTURES				
C13.11.1	Supply, fabrication and erection of steelwork  (a) Hippo spikes: Located at vehicular access culvert surface bed, 152 x 152 x 37 H-section, galvanised, for casting into concrete ground beam - Refer to drawing HHO-220102-318-2001	t	4.50		
Total Carried Forward To Summary					

SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES

SECTION C14.5

Item	Description	Unit	Quantity	Rate	Amount
C14.5	ANCHORING OF REINFORCEMENT, GROUTING AND CRACK INJECTION				
C14.5.1	Anchoring of reinforcing steel:				
C14.5.1.1	Y16 diameter, 1.3m long, 0.3m deep, into existing concrete with epoxy anchor	m	100.00		
Total Carried Forward To Summary					

SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES

C14.7: PROTECTIVE COATINGS AND TREATMENTS FOR CONCRETE

Item	Description	Unit	Quantity	Rate	Amount
C14.7	PROTECTIVE COATINGS AND TREATMENTS FOR CONCRETE				
C14.7.2	Application of protective coatings and treatments to plastered masonry curtain walls on gatehouse (100micron dry film thickness, UV-resistant, weather-resistant, antifungal acrylic paint, inclusive of primer coat as per manufacturer's recommendation)	m²	90.0		
Total Carried Forward To Summary					

**SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES**

SUMMARY OF SECTIONS

Section	Description	Amount
C1.6	C1.6: CLEARING AND GRUBBING	.....
C1.7	C1.7: LOADING AND HAULING	.....
C3.2	C3.2: CULVERTS	.....
C4.1	C4.1 BORROW MATERIALS	.....
C4.2	C4.2: CUT MATERIALS	.....
C4.4	C4.4: COMMERCIAL MATERIALS	.....
C5.1	C5.1: ROADBED	.....
C5.2	C5.2: FILL	.....
C5.3	C5.3: ROAD PAVEMENT LAYERS	.....
C11.2	C11.2: NON-STRUCTURAL GABIONS	.....
C11.5	C11.5: FENCING	.....
C13.1	C13.1: FOUNDATIONS	.....
C13.2	C13.2: FALSEWORK, FORMWORK AND CONCRETE FINISH	.....
C13.3	C13.3: STEEL REINFORCEMENT	.....
C13.4	C13.4: CONCRETE	.....
C13.7	C13.7: JOINTS	.....
C13.8	C13.8: ANCILLARY STRUCTURAL ELEMENTS	.....
C13.11	C13.11: STRUCTURAL STEELWORK FOR MAJOR STRUCTURES	.....
C14.5	C14.5: ANCHORING OF REINFORCEMENT, GROUTING AND CRACK INJECTION	.....
C14.7	C14.7: PROTECTIVE COATINGS AND TREATMENTS FOR CONCRETE	.....
Total Carried Forward To Summary Of Schedules		.....
		.....

**SCHEDULE 3: ZEEKOE RIVER FISHWAY**

SECTION C1.6

Item	Description	Unit	Quantity	Rate	Amount
<b>C1.6</b>	<b>CLEARING AND GRUBBING</b>				
<b>C1.6.1</b>	<b>Clearing:</b>				
C1.6.1.1	Clearing with machines and some hand labour where necessary	ha	0.17		
C1.6.1.3	Clearing for new fence lines (over a width of 2,0 m)	km	0.10		
<b>C1.6.2</b>	<b>Grubbing:</b>				
C1.6.2.1	Grubbing with machines and some hand labour where necessary	ha	0.17		
C1.6.2.3	Grubbing by hand for new fence lines (over a width of 2,0 m)	km	0.10		
<b>C1.6.3</b>	<b>Removal and grubbing of large trees and tree stumps:</b>				
C1.6.3.1	Girth equal to or exceeding 1,0 m up to and including 2,0 m	No	5.00		
<b>C1.6.5</b>	<b>Spreading organic matter and covering with soil</b>	m³	120.00		
<b>C1.6.6</b>	<b>Mulching selected organic matter</b>	m³	120.00		
<b>C1.6.7</b>	<b>Re-clearing of previously cleared areas</b>	ha	0.17		
<b>C1.6.9</b>	<b>Conservation of topsoil:</b>				
C1.6.9.1	Stockpiling topsoil	m³	120.00		
C1.6.9.2	Windrowing topsoil	m³	120.00		
<b>Total Carried Forward To Summary</b>					

**SCHEDULE 3: ZEEKOE RIVER FISHWAY**

SECTION C1.7

Item	Description	Unit	Quantity	Rate	Amount
<b>C1.7</b>	<b>LOADING AND HAULING</b>				
<b>C1.7.1</b>	<b>Loading:</b>				
C1.7.1.1	Loading from stockpile using machines and some hand labour where necessary	m³	1 600.00		
C1.7.1.2	Loading from heaps or windrows using machines and some hand labour where necessary	m³	120.00		
<b>C1.7.2</b>	<b>Hauling:</b>				
C1.7.2.1	Hauling material for use in the Works and off-loading it on the site of the Works:				
	(a) Soil, gravel, crushed stone and pavement layer material	m³-km	3 000.00		
	(b) Boulders and hard material	m³-km	200.00		
C1.7.2.2	Hauling material to spoil and off-loading it at a designated spoil area:				
	(a) Cleared and grubbed material (organic matter and all other unsuitable or waste material)	m³-km	1 800.00		
	(b) Soil and gravel material	m³-km	8 550.00		
	(c) Boulders and hard material	m³-km	420.00		
<b>Total Carried Forward To Summary</b>					

SCHEDULE 3: ZEEKOE RIVER FISHWAY

SECTION C4.1

Item	Description	Unit	Quantity	Rate	Amount
C4.1	BORROW MATERIALS				
C4.1.10	Compacting the floor of the stockpile sites	m³	150.00		
C4.1.12	Stockpiling the material				
C4.1.12.2	Material directly from the excavation	m³	2 000.00		
Total Carried Forward To Summary					



**SCHEDULE 3: ZEEKOE RIVER FISHWAY**

SECTION C4.2

Item	Description	Unit	Quantity	Rate	Amount
<b>C4.2</b>	<b>CUT MATERIALS</b>				
<b>C4.2.5</b>	<b>Excavating of materials in designated excavations, material obtained from:</b>				
C4.2.5.1	Soft excavation	m <sup>3</sup>	2 000.00		
C4.2.5.4	Hard excavation (other than by blasting)	m <sup>3</sup>	200.00		
<b>C4.2.7</b>	<b>Removal of unsuitable stable cut material to spoil:</b>				
C4.2.7.1	In layer thicknesses of 200 mm and less	m <sup>3</sup>	200.00		
C4.2.7.2	In layer thicknesses exceeding 200 mm	m <sup>3</sup>	100.00		
<b>C4.2.9</b>	<b>Excavate material to spoil in sites designated by the Contractor, material obtained from:</b>				
C4.2.9.1	Soft excavation, overburden and unsuitable material	m <sup>3</sup>	300.00		
<b>C4.2.11</b>	<b>Breaking down oversize material</b>	m <sup>3</sup>	50.00		
<b>C4.2.12</b>	<b>Finishing the side slopes</b>				
C4.2.12.2	Designated excavations	m <sup>2</sup>	350.00		
<b>Total Carried Forward To Summary</b>					

**SCHEDULE 3: ZEEKOE RIVER FISHWAY**

SECTION C4.4

Item	Description	Unit	Quantity	Rate	Amount
<b>C4.4</b>	<b>COMMERCIAL MATERIALS</b>				
<b>C4.4.2</b>	<b>Commercial materials identified by the Contractor from commercial, private or other non-commercial suppliers:</b>				
C4.4.2.1	Pavement layer material:				
	(e) Type G5B gravel material	m³	25.00		
	(g) Type G7 gravel material	m³	55.00		
	(l) Type G9 gravel material (to replace unsuitable roadbed material)	m³	10.00		
	(q) Natural or crushed gravel material for the wearing course of an unsealed road	m³	25.00		
<b>Total Carried Forward To Summary</b>					

SCHEDULE 3: ZEEKOE RIVER FISHWAY

SECTION C5.1

Item	Description	Unit	Quantity	Rate	Amount
C5.1	ROADBED				
C5.1.1	Roadbed construction and compaction:				
C5.1.1.1	Compaction of in-situ material to 90 % of MDD	m³	50.00		
C5.1.1.3	Compaction of imported material to 90% of MDD	m³	10.00		
C5.1.4	Removal of unsuitable material to spoil:				
C5.1.4.1	In layer thicknesses of 200 mm and less:				
	(a) Stable material	m³	10.00		
Total Carried Forward To Summary					

SCHEDULE 3: ZEEKOE RIVER FISHWAY

SECTION C5.2

Item	Description	Unit	Quantity	Rate	Amount
C5.2	FILL				
C5.2.2	Fill construction:				
C5.2.2.3	Sand fill material in compacted layer thicknesses of 400 mm and less, compacted to 100 % of MDD	m³	1 000.00		
C5.2.11	Finishing-off fill slopes, medians and interchange areas:				
C5.2.11.1	Fill slopes	m²	1 000.00		
Total Carried Forward To Summary					

**SCHEDULE 3: ZEEKOE RIVER FISHWAY**

**C5.3 ROAD PAVEMENT LAYERS**

Item	Description	Unit	Quantity	Rate	Amount
<b>C5.3</b>	<b>ROAD PAVEMENT LAYERS</b>				
<b>C5.3.1</b>	<b>Compiling and implementing M&amp;U plans for the construction of all the pavement layers</b>				
	(a) Gravel wearing course (parking area)	No	1.00		
	(b) G7 selected gravel material (parking area)	No	1.00		
	(c) G5B gravel subbase (access road)	No	1.00		
	(d) G7 selected gravel material (access road)	No	1.00		
	(e) In situ subgrade (min. G9 quality)	No	1.00		
<b>C5.3.2</b>	<b>Construction of pavement layers:</b>				
C5.3.2.1	Construction of layers using conventional construction methods:				
	(a) Upper selected subgrade layer, G7 (150mm) compacted to 93% of MDD	m³	25.00		
	(a) Upper selected subgrade layer, G7 (200mm) compacted to 93 % of MDD	m³	30.00		
	(g) Gravel wearing course layer (150mm) compacted to 95 % of MDD	m³	25.00		
	(o) G5B crushed rock/boulder subbase layer (150mm) compacted to 95% of MDD	m³	25.00		
<b>Total Carried Forward To Summary</b>					

**SCHEDULE 3: ZEEKOE RIVER FISHWAY**

SECTION C6.2

Item	Description	Unit	Quantity	Rate	Amount
<b>C6.2</b>	<b>SEGMENTAL BLOCK PAVING LAYERS</b>				
<b>C6.2.1</b>	<b>Segmental block paving:</b>				
C6.2.1.1	Concrete block paving (80mm thick, Class 30/2, S-A interlocking on all sides)	m <sup>2</sup>	140.00		
<b>C6.2.2</b>	<b>Casti-in-situ concrete edge and intermediate beams, 25MPa/20mm</b>	m <sup>3</sup>	8.00		
<b>C6.2.3</b>	<b>Provision and application of approved herbicide and ant poison:</b>				
C6.2.3.1	Provision of materials	PC sum	1.00	5 000.00	5 000.00
C6.2.3.2	Contractor's charges and profit added to the prime cost sum	%	5 000.00		
<b>C6.2.4</b>	<b>Re-sanding of joints in segmental block paving:</b>				
C6.2.4.1	Concrete block paving (80mm thick, Class 30/2, S-A interlocking)	m <sup>2</sup>	70.00		
<b>Total Carried Forward To Summary</b>					

**SCHEDULE 3: ZEEKOE RIVER FISHWAY**

SECTION C11.2

Item	Description	Unit	Quantity	Rate	Amount
<b>C11.2</b>	<b>NON-STRUCTURAL GABIONS</b>				
<b>C11.2.1</b>	<b>Foundation trench excavation:</b>				
C11.2.1.1	Excavating all material situated within the following depth ranges below the surface level:				
	(a) 0 m to 1,5 m	m <sup>3</sup>	350.00		
	(b) Exceeding 1,5 m and up to 3,0 m	m <sup>3</sup>	25.00		
C11.2.1.2	Extra over sub-item C11.2.1.1 for excavation in hard material, irrespective of depth	m <sup>3</sup>	10.00		
<b>C11.2.2</b>	<b>Surface preparation for bedding the gabion boxes and mattresses</b>	m <sup>2</sup>	300.00		
<b>C11.2.3</b>	<b>Gabion boxes and mattresses:</b>				
C11.2.3.2	PVC coated gabion boxes (2mx1mx1m), min 3mm galvanised wire mesh, Polimac coated or equivalent	m <sup>3</sup>	450.00		
C11.2.3.4	PVC-coated gabion mattresses (2mx3mx0.3m), min 3mm galvanised wire mesh, Polimac coated or equivalent	m <sup>3</sup>	15.00		
<b>C11.2.4</b>	<b>Geotextile (Kaytech A8 or equivalent), min 50kn/m tensile strength, min 9kN puncture strength</b>	m <sup>2</sup>	1 000.00		
<b>PC11.2.5</b>	<b>Removal of existing gabion structures</b>	m <sup>3</sup>	25.00		
<b>Total Carried Forward To Summary</b>					

SCHEDULE 3: ZEEKOE RIVER FISHWAY

SECTION C11.5

Item	Description	Unit	Quantity	Rate	Amount
C11.5	FENCING				
C11.5.5	Providing temporary fences and gates:				
C11.5.5.4	Game fences, 2.4m height, 150mm diam. timber posts at 2m spacing, as per existing	km	0.10		
C11.5.5.5	Temporary gates (3.5m x 2.4m height)	No	1.00		
Total Carried Forward To Summary					



**SCHEDULE 3: ZEEKOE RIVER FISHWAY**

**C13.1: FOUNDATIONS**

Item	Description	Unit	Quantity	Rate	Amount
<b>C13.1</b>	<b>FOUNDATIONS</b>				
<b>C13.1.1</b>	<b>Provision of designs and drawings of temporary works by an ECSA-registered Professional Engineer or Technologist or Geotechnical Engineer (description of works to which applicable)</b>				
	(i) Zeekoe River bridge Fishway	lump sum	1.00		
<b>C13.1.3</b>	<b>Excavation:</b>				
C13.1.3.1	Excavating soft material situated within the following successive depth ranges:				
	(a) 0m up to 1,5m				
	(i) Zeekoe River bridge Fishway	m³	100.00		
C13.1.3.2	Extra over subitem C13.1.3.1 for excavation in hard material irrespective of depth				
	(i) Zeekoe River bridge Fishway	m³	7.00		
C13.1.3.3	Extra over subitem C13.1.3.1 for additional excavation required by the Engineer after excavation is complete				
	(i) Zeekoe River bridge Fishway	m³	30.00		
C13.1.3.5	Extra over subitem C13.1.3.1 for excavation in restricted areas				
	(i) Zeekoe River bridge Fishway	m³	4.00		
<b>C13.1.6</b>	<b>Access and drainage:</b>				
C13.1.6.1	Access				
	(i) Zeekoe River bridge Fishway	lump sum	1.00		
C13.1.6.2	Drainage				
	(i) Zeekoe River bridge Fishway	lump sum	1.00		
<b>C13.1.7</b>	<b>Backfill to excavations utilising:</b>				
C13.1.7.1	Material from excavation				
	(i) Zeekoe River bridge Fishway	m³	40.00		
C13.1.7.3	Soil cement	m³	20.00		
<b>C13.1.9</b>	<b>Fill within a restricted area (extra over item C5.2.2)</b>				
	(i) Zeekoe River bridge Fishway	m³	4.00		
<b>C13.1.14</b>	<b>Foundation fill consisting of:</b>				
C13.1.14.1	Rock fill	m³	15.0		
C13.1.14.2	Crushed-stone fill	m³	15.0		
<b>Total Carried Forward</b>					

SCHEDULE 3: ZEEKOE RIVER FISHWAY

C13.1: FOUNDATIONS

Item	Description	Unit	Quantity	Rate	Amount
Brought Forward					
C13.1.14.4	Mass concrete (Class C15/20-20)	m³	20.00		
C13.1.14.5	Concrete blinding (75mm thk, C15/20-20)				
	(i) Zeekoe River bridge Fishway	m³	10.00		
C13.1.21	Foundation lining:				
	(a) Foundation lining (polyethylene sheet, minimum 250microns thick)	m²	10.00		
	(b) Foundation lining (needle punched & non-woven, Grade 1 geotextile) below concrete blinding	m²	60.0		
C13.1.23	Lateral support for excavations:				
C13.1.23.1	Excavation or fill at (indicate location)				
	(a) 0m to 2,5m depth				
	(i) Zeekoe River bridge Fishway	m²	66.00		
Total Carried Forward To Summary					

SCHEDULE 3: ZEEKOE RIVER FISHWAY

C13.2: FALSEWORK, FORMWORK AND CONCRETE FINISH					
Item	Description	Unit	Quantity	Rate	Amount
C13.2	FALSEWORK, FORMWORK AND CONCRETE FINISH				
C13.2.2	Vertical formwork to provide:				
C13.2.2.1	F1 surface finish to fill/non-exposed faces to:				
	(i) Zeekoe River bridge fishway	m²	286.00		
C13.2.2.2	F3 surface finish to non-fill/exposed faces to:	m²	20.00		
C13.2.10	Provision of designs and drawings of falsework and formwork by an ECSA registered Professional Engineer or Technologist for all structures within the following divisions:				
	(i) Zeekoe River bridge fishway	lump sum	1.00		
Total Carried Forward To Summary					

SCHEDULE 3: ZEEKOE RIVER FISHWAY

C13.3: STEEL REINFORCEMENT					
Item	Description	Unit	Quantity	Rate	Amount
C13.3	STEEL REINFORCEMENT				
C13.3.1	Reinforcement for:				
C13.3.1.1	Zeeko River bridge Fishway				
	(a) Mild-steel bars	t	0.50		
	(b) High-yield-stress-steel bars (450MPa)	t	5.00		
	(e) Mild-steel R20 movement dowel bars, 500mm long, inclusive of 300mm bond breaker membrane sleeve as per drawings	t	0.050		
C13.3.4	Extra-over item C13.3.1 (a), (b), etc. for galvanising of reinforcement	t	5.50		
Total Carried Forward To Summary					

CITY OF CAPE TOWN  
DIRECTORATE: SPATIAL PLANNING & ENVIRONMENT, URBAN DEVELOPMENT IMPLEMENTATION  
CONTRACT NO. 285Q/2024/25  
UPGRADE TO THE ZEEKOE VLEI WEIR IN THE FALSE BAY NATURE RESERVE

**SCHEDULE 3: ZEEKOE RIVER FISHWAY**

C13.4: CONCRETE

Item	Description	Unit	Quantity	Rate	Amount
<b>C13.4</b>	<b>CONCRETE</b>				
<b>C13.4.1</b>	<b>Cast in situ concrete:</b>				
C13.4.1.2	Durable concrete (class D):				
	(a) (i) Zeeko River bridge Fishway, D40/50-XS3A(100)-20	m³	33.00		
<b>C13.4.3</b>	<b>Extra over item C13.4.1 for the protection of concrete from adverse environmental conditions, if required:</b>				
C13.4.3.2	Durable concrete (class D):				
	(a) (i) Zeekoe River bridge Fishway , D40/50-XS3A(100)-20	m³	33.00		
<b>C13.4.5</b>	<b>Curing and surface protection of cast in situ concrete, as and where specifically required:</b>				
C13.4.5.1	Indicate structural element and surface to be cured (Tenderer to specify method of curing)				
	(i) Zeekoe River bridge Fishway	m²	286.00		
<b>PC13.4.9</b>	<b>Manufacturing precast concrete members:</b>				
C13.4.9.1	Zeekoe River bridge Fishway:				
	(a) Fishladder drop-in baffle, approx. 300kg, for exposed marine conditions, inclusive of galvanised reinforcing steel, in accordance with dwg -320-1101	No	27.00		
<b>C13.4.11</b>	<b>Transporting and erecting precast concrete members:</b>				
C13.4.11.1	Zeekoe River bridge Fishway:				
	(a) Fishladder drop-in baffle, approx. 300kg, for exposed marine conditions, inclusive of galvanised reinforcing steel, in accordance with dwg -320-1101	No	27.00		
PC13.4.13	Complete demolition and disposal of existing structural concrete elements or parts existing structures:				
C13.4.13.1	Zeekoe River bridge Fishway				
	(a) Existing reinforced concrete or masonry miscellaneous structures	m³	10.00		
<b>PC13.4.14</b>	<b>Controlled demolition of concrete from structural elements:</b>				
C13.4.14.1	Zeekoe River bridge Fishway				
	(a) Existing reinforced concrete structures	m³	10.00		
	(b) Existing brickwork wall	m³	15.00		
<b>Total Carried Forward To Summary</b>					

SCHEDULE 3: ZEEKOE RIVER FISHWAY

C13.7: JOINTS					
Item	Description	Unit	Quantity	Rate	Amount
C13.7	JOINTS				
C13.7.2	Filled joints:				
C13.7.2.1	Zeekoe River bridge Fishway				
	(a) 20mm thick joint, with rigid expanded polyethylene foam joint filler:	m²	8.00		
C13.7.4	Sealing joints with:				
C13.7.4.1	(a) Sealant (construction/contraction joint, silicon sealant & backing chord, 10mm wide) in Zeekoe River bridge Fishway	m	60.00		
C13.7.4.2	Waterstop (Centrally placed 200mm wide PVC waterstop, ribbed with centre bulb, to vertical joint)	m	60.00		
Total Carried Forward To Summary					

SCHEDULE 3: ZEEKOE RIVER FISHWAY

C13.8: ANCILLARY STRUCTURAL ELEMENTS					
Item	Description	Unit	Quantity	Rate	Amount
C13.8	ANCILLARY STRUCTURAL ELEMENTS				
PC13.8.22	Movement dowels for expansion or contraction joints:				
PC13.8.22.1	Supply and installation of 25mm dia. Grade 304 stainless steel movement dowel bar for expansion joints, 400mm long, inclusive of 200mm bond-breaker sleeve as per drawing	No	100.00		
Total Carried Forward To Summary					

SCHEDULE 3: ZEEKOE RIVER FISHWAY

SECTION C14.5

Item	Description	Unit	Quantity	Rate	Amount
C14.5	ANCHORING OF REINFORCEMENT, GROUTING AND CRACK INJECTION				
C14.5.1	Anchoring of reinforcing steel:				
C14.5.1.1	Y16 diameter, 1.3m long, 0.3m deep, into existing concrete with epoxy anchor	m	100.00		
Total Carried Forward To Summary					



SCHEDULE 3: ZEEKOE RIVER FISHWAY

SUMMARY OF SECTIONS

Section	Description	Amount
C1.6	C1.6: CLEARING AND GRUBBING	.....
C1.7	C1.7: LOADING AND HAULING	.....
C4.1	C4.1 BORROW MATERIALS	.....
C4.2	C4.2: CUT MATERIALS	.....
C4.4	C4.4: COMMERCIAL MATERIALS	.....
C5.1	C5.1: ROADBED	.....
C5.2	C5.2: FILL	.....
C5.3	C5.3 ROAD PAVEMENT LAYERS	.....
C6.2	C6.2: SEGMENTAL BLOCK PAVING LAYERS	.....
C11.2	C11.2: NON-STRUCTURAL GABIONS	.....
C11.5	C11.5: FENCING	.....
C13.1	C13.1: FOUNDATIONS	.....
C13.2	C13.2: FALSEWORK, FORMWORK AND CONCRETE FINISH	.....
C13.3	C13.3: STEEL REINFORCEMENT	.....
C13.4	C13.4: CONCRETE	.....
C13.7	C13.7: JOINTS	.....
C13.8	C13.8: ANCILLARY STRUCTURAL ELEMENTS	.....
C14.5	C14.5: ANCHORING OF REINFORCEMENT, GROUTING AND CRACK INJECTION	.....
Total Carried Forward To Summary Of Schedules		.....

SCHEDULE 4: TEMPORARY ACCESS ROADS CONSTRUCTION

SECTION C1.6					
Item	Description	Unit	Quantity	Rate	Amount
C1.6	CLEARING AND GRUBBING				
C1.6.1	Clearing:				
C1.6.1.1	Clearing with machines and some hand labour where necessary	ha	1.50		
C1.6.2	Grubbing:				
C1.6.2.1	Grubbing with machines and some hand labour where necessary	ha	1.50		
C1.6.3	Removal and grubbing of large trees and tree stumps:				
C1.6.3.1	Girth equal to or exceeding 1,0 m up to and including 2,0 m	No	5.00		
C1.6.7	Re-clearing of previously cleared areas	ha	0.50		
Total Carried Forward To Summary					

**SCHEDULE 4: TEMPORARY ACCESS ROADS CONSTRUCTION**

C4.1: BORROW MATERIALS

Item	Description	Unit	Quantity	Rate	Amount
	C4.1: BORROW MATERIALS				
C4.1.3	Construction and maintenance of temporary haul and access roads				
C4.1.3.1	Temporary unsealed roads				
	(a) Proposed temporary access road to site camp (3.5m width)	km	0.61		
	(b) Access road 1 from Peninsula Road to Zeekoevlei weir (3m width)	km	0.74		
	(c) Access road 2 from False Bay Nature Reserve Headquarters to Peninsula Radio Flyers (3m width)	km	0.50		
	(d) Access road 3 from WWTW to Zeekoe River Fishway (3m width)	km	1.05		
C4.1.3.2	Cost to repair existing public roads or streets	prov sum	1.00	300 000.00	300 000.00
C4.1.3.3	Handling cost and profit in respect of item C4.1.3.2	%	300 000.00		
Total Carried Forward To Summary					

SCHEDULE 4: TEMPORARY ACCESS ROADS CONSTRUCTION

SECTION C4.2

Item	Description	Unit	Quantity	Rate	Amount
C4.2	CUT MATERIALS				
C4.2.4	Excavating of materials in cuttings, material obtained from:				
C4.2.4.1	Soft excavation	m³	300.00		
C4.2.8	Excavate material to spoil in sites designated by the Employer, material obtained from:				
C4.2.8.1	Soft excavation, overburden and unsuitable material	m³	2 800.00		
Total Carried Forward To Summary					

SCHEDULE 4: TEMPORARY ACCESS ROADS CONSTRUCTION

SECTION C4.4

Item	Description	Unit	Quantity	Rate	Amount
C4.4	COMMERCIAL MATERIALS				
C4.4.2	Commercial materials identified by the Contractor from commercial, private or other non-commercial suppliers:				
C4.4.2.1	Pavement layer material:				
	(g) Type G7 gravel material	m³	1 700.00		
	(q) Natural or crushed gravel material for the wearing course of an unsealed road	m³	1 200.00		
Total Carried Forward To Summary					

SCHEDULE 4: TEMPORARY ACCESS ROADS CONSTRUCTION

SUMMARY OF SECTIONS

Section	Description	Amount
C1.6	C1.6: CLEARING AND GRUBBING	.....
C4.1	C4.1: BORROW MATERIALS	.....
C4.2	C4.2: CUT MATERIALS	.....
C4.4	C4.4: COMMERCIAL MATERIALS	.....
Total Carried Forward To Summary Of Schedules		.....

SCHEDULE 5: ENGINEER'S MATERIAL TESTING

SECTION C20.1					
Item	Description	Unit	Quantity	Rate	Amount
C20.1	TESTING MATERIALS AND JUDGEMENT OF WORKMANSHIP				
C20.1.2	Special tests requested by the Engineer:				
C20.1.2.2	Employer's contribution to other special tests:				
	(a) Specify test	PC sum	1.00	300 000.00	300 000.00
	(i) Handling costs and profit in respect of item C20.1.2.2(a)	%	300 000.00		
Total Carried Forward To Summary					

**SCHEDULE 5: ENGINEER'S MATERIAL TESTING**

SUMMARY OF SECTIONS

Section	Description	Amount
C20.1	C20.1: TESTING MATERIALS AND JUDGEMENT OF WORKMANSHIP	.....
Total Carried Forward To Summary Of Schedules		



SUMMARY OF SCHEDULES

Schedule	Description	Amount
1	SCHEDULE 1: GENERAL ITEMS	.....
2	SCHEDULE 2: ZEEKOEVLEI WEIR STRUCTURES	.....
3	SCHEDULE 3: ZEEKOE RIVER FISHWAY	.....
4	SCHEDULE 4: TEMPORARY ACCESS ROADS CONSTRUCTION	.....
5	SCHEDULE 5: ENGINEER'S MATERIAL TESTING	.....
Total		.....

**DECLARATION (In respect of completeness of Tender)**

City of Cape Town  
Tower Block, Civic Centre  
12 Hertzog Boulevard  
CAPE TOWN

I/we, the undersigned, do hereby declare that these are the properly priced Bills of Quantities forming Part C2.2 of this Contract Document containing 64 pages in consecutive order upon which my/our tender for **TENDER NO. 285Q/2024/25: UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE** has been based. If I/we have submitted a printed version of the Bills of Quantities, I/we warrant that no amendments have been made to it from the original, other than amendments issued in any Addenda in terms of Clause C.3.2 in Part T1.2 Tender Data.

-----  
SIGNATURE OF TENDERER/S

-----  
DATE

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## Part C3: Scope of Work

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	Pages
<b>C3.1 Description of the Works .....</b>	<b>141 – 147</b>
<b>C3.2 Engineering / Design .....</b>	<b>148 – 149</b>
<b>C3.3 Procurement .....</b>	<b>150 – 151</b>
<b>C3.4 Construction .....</b>	<b>152 – 161</b>
<b>C3.5 Management.....</b>	<b>162 – 224</b>
<b>C3.6 Annexes.....</b>	<b>225 – 231</b>

### Status

Should any requirement or provision in the parts of the Scope of Work conflict with any requirement of any Standardised Specification, particular specification or any drawings, the order of precedence, unless otherwise specified, is:

Drawings  
Scope of Work (Parts C3.1, C3.4, C3.5 and C3.6)  
Particular Specifications  
COTO Specifications

## C3.1 Description of the Works

### CONTENTS

- 3.1.1 EMPLOYER'S OBJECTIVES
- 3.1.2 OVERVIEW OF THE WORKS
- 3.1.3 EXTENT OF THE WORKS
- 3.1.4 LOCATION OF THE WORKS
- 3.1.5 TEMPORARY WORKS

#### 3.1.1 EMPLOYER'S OBJECTIVES

Zeekoevlei is an important recreational water body situated in the False Bay Nature Reserve, which is a proclaimed Ramsar Site. Rondevlei and Zeekoevlei are part of a highly urbanised catchment and has for many years been eutrophicated. This project is part of the Sanitation and Inland Water Quality Programme to improve water quality and restore the recreational vleis.

The project has the following objectives:

- Modification of the existing Zeekoevlei weir to allow for rapid lowering when required than the existing wooden penstocks.
- New fishway between the Zeekoevlei and Zeekoe River to reintroduce natural estuarine fish into the vlei which will help to reduce elevated nutrients and benefit the fish stocks in the inshore coastal environment.
- New fishway at the downstream bridge, to allow access from the lower portion of the Zeekoe River to upstream of the foul sewer rising mains bridge structure which currently acts as a barrier to fish movement.

#### 3.1.2 OVERVIEW OF THE WORKS

The project comprises of civil and structural engineering infrastructure. The work takes places in two precincts/work areas. The components per precinct are as follows:

- Existing Zeekoevlei weir precinct
  - Demolition of existing concrete structures
  - Construction of new Zeekoevlei channel gates, gate house and sluice channel
  - Demolition of existing timber pedestrian bridge and construction of new vehicular access culvert bridge
  - Construction of concrete vehicular maintenance access ramps onto weir apron and sluice channel
  - ± 940m<sup>2</sup> of gravel parking area and access way
  - Construction of in-situ/precast concrete sloping weir fishway connecting the Zeekoe River to Zeekoevlei
  - Several concrete retaining walls
  - Sundries, including hippo spikes, gabions, welded mesh fencing and vehicle gates
- Zeekoe River bridge precinct

- Construction of in-situ/precast concrete sloping weir fishway
- Gabions and reno mattresses
- New concrete block paved vehicular maintenance access road
- Gravel parking area for maintenance vehicles to access the new fishway

### 3.1.3 EXTENT OF THE WORKS

The extent of the work that is to be carried out under the contract is shown on the drawings, measured in the Bill of Quantities and is described in the specifications. If during construction, conditions are found to differ from those anticipated, the Employer's Agent reserves the right to modify the scope of the work to suit the prevailing conditions and circumstances. Variations introduced in this manner will be measured and paid for at the rates tendered for appropriate items listed in the schedule of quantities or in the absence of such rates, as extra work.

### 3.1.4 LOCATION OF THE WORKS

The Zeekoevlei and Rondevlei weirs are located in the False Bay Nature Reserve adjacent to the suburbs of Grassy Park, Lavender Hill, Pelican Park and Zeekoevlei, as shown in Figure 3.1. The key points which are of importance for this project are the existing Rondevlei and Zeekoevlei weirs, the Rondevlei Canal, and the downstream bridge on the Zeekoe River shown in Figure 3.2

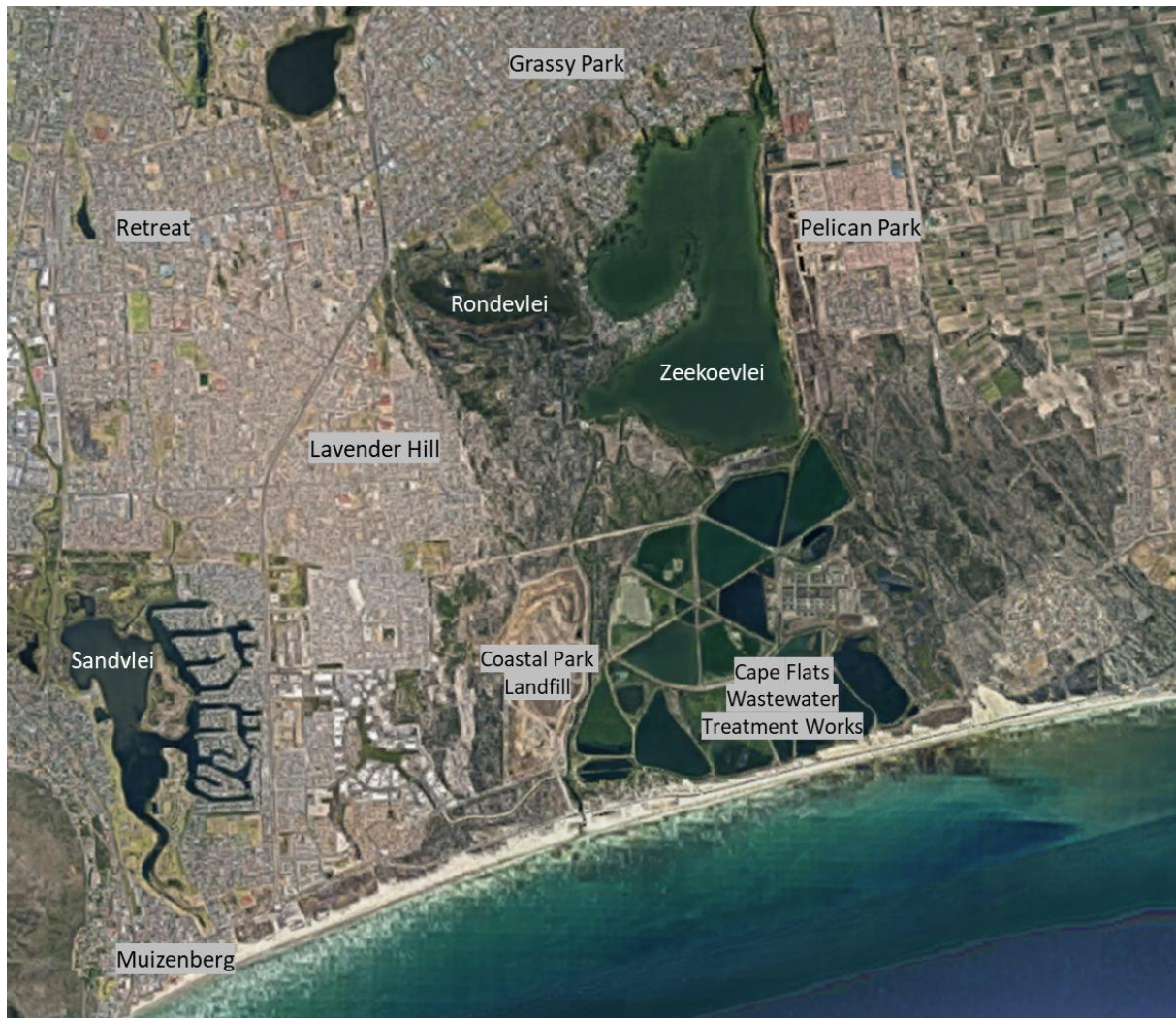


Figure 3.1: Locality Plan





**Figure: Precincts/Work Areas**

### 3.1.5 TEMPORARY WORKS

The Contractor shall be responsible for the identification, design, installation and removal of all required temporary works, which must be allowed for in the rates, to safeguard the Works and the Site and enable the permanent work to be constructed safely. No temporary works will be allowed to remain in position on completion of the Works.

The majority of the Works is located within a functioning river and weir environment. The Contractor must design and provide adequate temporary works in order to provide a safe and protected working environment for the execution of the Works, including but not limited to, during demolitions, excavations and structures as well as the provision of adequate protection against the flooding of works (including allowance for completing the works in the dry).

The Contractor shall take all necessary precautions to protect the existing infrastructure and the Works from damage during the execution of the Works. If the Contractor causes any damage to existing infrastructure, the Contractor is required to make good all damage, at their own cost, to the satisfaction of the Employer's Agent.

The Contractor shall familiarise himself with the site and all local conditions/data and any environmental information/data (i.e. weather, water levels etc) and make provision for such conditions that could impact the Works and construction activities.

The Contractor is to note the following:

- The Works are generally located within a functioning river and weir environment, which has varying water levels throughout the year dependent on the seasonal rainfall and the annual drawdowns of the two vleis, which will affect the Works and construction activities.

- The Contractor is responsible for making provision for working in stages, as well as working in restricted areas and experiencing disrupted construction activities due to site conditions including water levels, that may impact the Works and will need to be allowed for in the construction programme.
- The Works are located within a Nature Reserve and will need to be undertaken in accordance with the environmental authorisation's requirements (refer to the EMPr).
- The majority of the Works are located in areas where hippos are present. The Contractor will be responsible for the temporary fencing off of Works areas to prevent access.

### **Design of Temporary Works**

All temporary works are the responsibility of the Contractor and shall be designed by a professionally qualified engineer or an experienced person who is required to sign off on the temporary works design.

The Contractor shall indemnify the Employer's Agent and the Employer against any claims and actions that may arise out of the temporary works. The Contractor shall be responsible for full compliance with all the relevant codes of practice, legislation, safety, professional procedures, checking, site approval and requirements of the construction regulations with regards to temporary works. Temporary works are all works other than the permanent works as indicated on the drawings.

The elements that require temporary works include, but are not limited to, the following:

- Works located within the river or below the ground water table, where inundation will occur should dewatering and the construction of cofferdams not take place
- Protection of existing structures including lateral support of foundations where in close proximity to the Works and where the possible risk of undermining or collapse is evident.
- Protection of existing services such as electrical services, stormwater and sewer pipelines where exposure is evident during the execution of the Works.
- Areas affected by demolitions and excavations

The Contractor shall submit all temporary works designs to the Employer's Agent, for acceptance, at least 14 days before commencing with the construction of the temporary works.

### **Constraints and Restrictions**

The Contractor's temporary works will need to be established within the site boundaries. Refer to site boundaries as reflected on the drawings. The Contractor must take cognisance of the programming of activities at each work area in order to plan the installation and decommissioning of temporary works accordingly to avoid any project delays.

### **Temporary Lateral Support**

Although the design has been based on the excavation of slopes to a safe angle, temporary lateral support may be required for the construction of the Works where:

- excavation may undermine or cause collapse of existing structures not to be demolished.
- excavations in the in-situ sand may be unstable.

### **Cofferdams**

The Contractor will need to construct several cofferdams during the Execution of the Works to provide working areas that can be dewatered for structures to be built. The cofferdams must comply with the following:

- a) The cofferdams are to be constructed from GSCs (Geosynthetic Sand Container's), bulk bags or sugar bags, or a similar product acceptable to the Employer's Agent that can easily be reused for each stage and then removed on completion of the works.
- b) The Contractor is responsible for designing the cofferdam and the selection of the type and size of containers used.
- c) The containers used are to be made from suitably robust material so that the containers can be filled, transported, placed, relocated, reused and removed at the end of the works with minimal damage to the containers.

- d) The Contractor is responsible for the cofferdam design including the layout, height and cross-section of the structure as may be required to protect the Works and facilitate construction of the permanent Works.
- e) The contractor is responsible for the maintenance of the cofferdam, which is included in the rates provided.
- f) All material used to construct cofferdams must be removed on completion of the works and the area reinstated.

## **Dewatering**

It is expected that the Contractor will need to dewater sections of the Work throughout construction, primarily due to the local water table, river levels or stormwater.

Any dewatering must be designed to enable structural works to be completed in the dry, prevent the washing out of cement from the concrete mixture, minimise the segregation of materials and the formation of laitance, and prevent the flow of water through or over new concrete less than 24 hours old.

### **3.1.6 PROGRAMME AND METHOD OF WORKS**

The construction of Works will require careful planning to ensure that work can be undertaken in several works areas simultaneously, while allowing for the operating conditions of the existing weir structure, as well as the flow of the Zeekoe River.

#### **3.1.6.1 Preliminary Programme**

The Contractor shall include with his tender a preliminary programme on the prescribed form (see Part C5.1 Schedule 16: Preliminary Programme) to be completed by all Tenderers. The programme shall be in the form of a simplified bar chart with sufficient details to show clearly how the works will be performed within the time for completion as stated in the Contract Data. The Contractor shall be deemed to have allowed fully in his tendered rates and prices, as well as in his programme, for the local river and weir environment, as well as for all possible delays due to normal adverse weather conditions (refer to Clause 5.12.2.2) and special non-working days (refer to Clause 5.8.1) as specified in the in the Contract Data.

#### **3.1.6.2 Programme in Terms of Clause 5.6 of the General Conditions of Contract**

It is essential that the construction programme, which shall conform in all respects to Clause 5.6 of the General Conditions of Contract, be furnished within the time stated in the Contract Data (refer to Clause 5.3.1). The preliminary programme to be submitted with the tender shall be used as basis for this programme.

The Tenderer's attention is drawn to the fact that a number of factors will affect the programming of and method of carrying out the works. The more important of these are:

- 1) Allow for the two month start-up period to obtain the Construction Permit not included as part of the Commencement of the Works.
- 2) Commencement of the Works (construction period) starts once all documentation has been received, inclusive of the 14 days to obtain further documentation.
- 3) Time allowances to be made for the ordering of special items.
- 4) Any special sequence in which work must be carried out
- 5) Temporary works facilities which need to be relocated during the execution of the works.
- 6) Water levels related to the river and weir conditions that will affect the work rate of the Contractor.
- 7) It is expected that work will be undertaken on multiple fronts, in order to achieve the practical completion date. However, the contractor remains responsible for the development of his programme and completing the works in the required duration.

#### **3.1.6.3 Requirements for Accommodation of Traffic**

The Works will be taking place within the False Bay Nature Reserve which does not include any public roads requiring specific traffic accommodation. However, construction vehicles will be required to access the site via several access points along public roads. The Contractor's tendered rates for the relevant items in the Bill of Quantities shall include full compensation for all possible additional costs which may arise from this, and no claims for extra payment due to inconvenience as a result of the modus operandi will be considered.

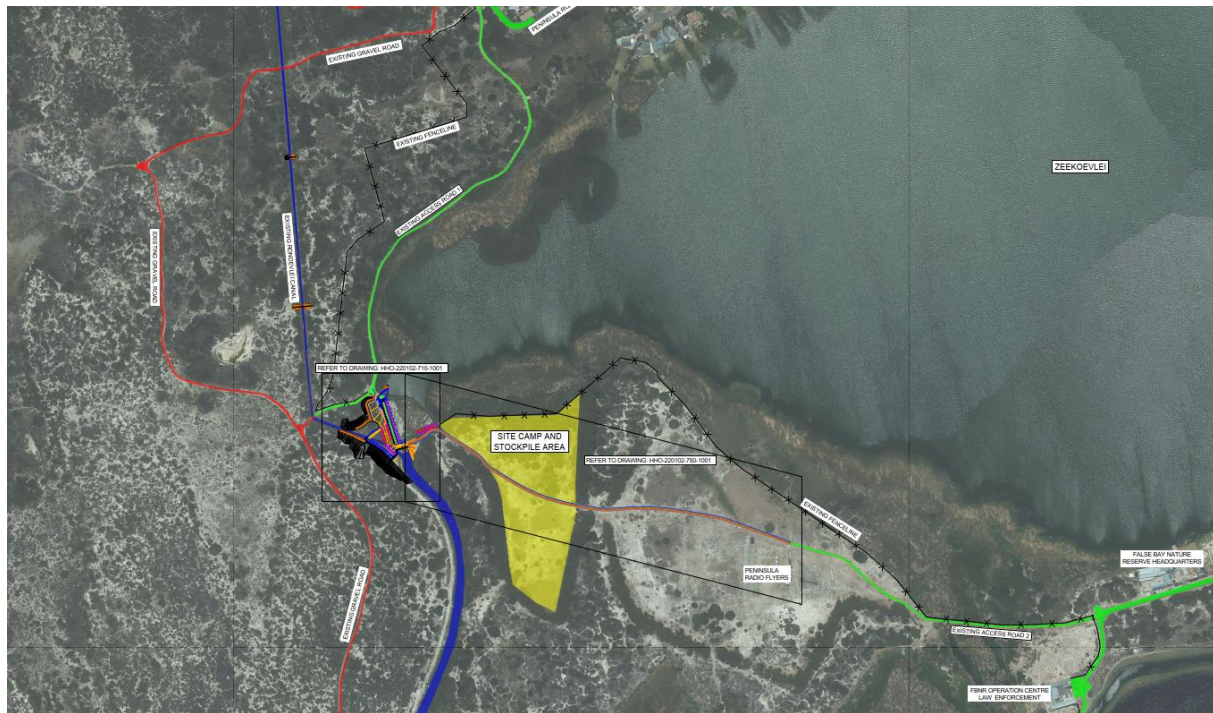


### 3.1.7 CONTRACTOR'S SITE CAMP AND SITE FACILITIES

### 3.1.7.1 Location of Contractor's Site Camp

The location of the Contractor's Site Camp may only be established on the Eastern shore of the existing Zeekoevlei Weir, in an area known as Billy's Block. This area is shown in Figure 3.3 below. This area is also the only designated area for stockpiling of excavation material, gravel, rock or demolition material. This requirement forms part for the Environmental Authorisation and is included in the EMPr.

The Contractor is required to keep a photo record of the “before construction” and “after construction” scenarios when establishing on site and de-establishing upon completion of the works. The Contractor shall also ensure that a formal letter/s of agreement/s is obtained from the respective landowner (i.e. False Bay Nature Reserve) where the site office and any temporary spoil and stockpile area/s shall be established.



### Figure 3.3 Location of Site Camp and Stockpile Area

### 3.1.7.2 Provision for Services

The provision of services for the site camp is the responsibility of the Contractor. No direct payment will be made for the provision of water, electrical and other services and the cost thereof is deemed to be included in the rates and amounts tendered for the various items of work for which these services are required, or in the Contractor's priced general items as the case may be.

### 3.1.8 FEATURES REQUIRING SPECIAL ATTENTION

### 3.1.8.1 Construction in Confined Spaced

It will be necessary for the Contractor to work within confined and restricted areas. Specific payment items have been provided where this is applicable however some items are inclusive of restricted work.

### 3.1.8.2 Water for Construction Purposes

The Contractor must make adequate provision in his tender for all negotiations and procurement of water for construction activities and all related costs will be deemed to be included in his tendered rates. His rates will include obtaining authorisation from the Employer to source and transport water from nearby water bodies such as rivers, dams etc. if at all possible. Effluent water can be used for certain construction works related to general earthworks such as fills, embankments, road beds, selected layers and dust control. Approval from the Employer's Agent is required before effluent is used in the works. Potable water or similar must be used in cement stabilisation, curing and concrete works to the approval of the Employer's Agent.

### **3.1.8.3 Weatherproof Protection for Workers**

All staff required to continue working during rain or within the river shall be provided with oilskins and rubber knee boots, or other approved protective clothing and footwear.

### **3.1.8.4 Health and Safety Plan**

Prior to commencing work, the Contractor shall submit a Health and Safety Plan, compiled in accordance with the Health and Safety Specifications in C3.4: Part H of the Works Specifications to the Employer's Agent for approval. The Contractor may not commence construction without the Employer's Agent's approval of the Health and Safety Plan.

## C3.2 Engineering / Design

### CONTENTS

- 3.2.1 DESIGN
- 3.2.4 DRAWINGS

#### 3.2.1 DESIGN

The design responsibility shall be as follows:

All permanent work:	Employer/Employer's Agent
Temporary works:	Contractor
Preparation of all as-built drawings:	Employer's Agent with input as requested from the Contractor

All temporary works shall be designed by a professionally registered engineer or technologist, and remain the responsibility of, the Contractor. The Contractor shall appoint suitably qualified and experienced designers to carry out such work and shall indemnify and hold indemnified the Employer's Agent and the Employer against any claims and actions that may arise out of the temporary works. The Contractor shall be responsible for full compliance with all the relevant codes of practice, safety, professional procedures, checking, site approval and requirements of the construction regulations with regards to temporary works. Temporary works are all works other than the permanent works as indicated on the drawings.

Procedure for temporary works design:

1. It will be the Contractor's responsibility to make provision for a Registered Professional Engineer or Technologist to approve all temporary works design(s).
2. The Contractor shall submit any temporary works design to the Employer's Agent within 14 days after the contract award as stated in the Works Project.
3. The Contractor shall be notified within 3 working days after submission of temporary works design if it is approved by the Employer's Agent.

#### 3.2.2 DRAWINGS

The following drawings are applicable to the contract and are issued electronically and are available via a flash drive issued with this tender document and form part of the Contract Documents as Volume 4.

The Works shall be constructed in accordance with the issued design drawings.

The Contractor shall ensure that accurate as-built records are kept during the contract for input required in the as-built drawings prepared by the Employer's Agent.

The Contractor shall keep one complete set of drawings available on site for mark-up purposes. This set of drawings shall be regularly marked up in red ink by the Contractor to reflect the latest as-built status. Immediately after completion of each part of the Works, the completed marked-up drawing shall be handed over to the Employer's Agent, who will acknowledge receipt and arrange with the Designer for the completion of the as-built drawing.

DRAWING NUMBER	DRAWING TITLE
HHO-220102-700-1000	Locality Plan
HHO-220102-710-1001	Existing Zeekoevlei Weir: General Layout
HHO-220102-710-1002	Existing Zeekoevlei Weir: Layout Details
HHO-220102-710-1101	Existing Zeekoevlei Weir: Typical Cross Sections Sheet 1 of 2
HHO-220102-710-1102	Existing Zeekoevlei Weir: Typical Cross Sections Sheet 2 of 2

HHO-220102-710-2801	Existing Zeekoevlei Weir: Channel Gates Detail
HHO-220102-710-3201	Standard Fencing Details
HHO-220102-720-1001	Zeekoe River Fishway: General Layout
HHO-220102-720-1101	Zeekoe River Fishway: Typical Cross Sections
HHO-220102-720-2001	Zeekoe River Fishway: Maintenance Road Longsection
HHO-220102-750-1001	Proposed Temporary Access Road: Layout and Setting out Sheet 1 of 2
HHO-220102-750-1002	Proposed Temporary Access Road: Layout and Setting out Sheet 2 of 2
HHO-220102-750-2001	Proposed Temporary Access Road: Longitudinal Sections Sheet 1 of 3
HHO-220102-750-2002	Proposed Temporary Access Road: Longitudinal Sections Sheet 2 of 3
HHO-220102-750-2003	Proposed Temporary Access Road: Longitudinal Sections Sheet 3 of 3
HHO-220102-300-1101	Site Plan Layout
HHO-220102-311-1101	Zeekoevlei Gatehouse Layout
HHO-220102-311-1102	Zeekoevlei Gatehouse Sections
HHO-220102-312-1101	Zeekoevlei Fishway Layout & Sections
HHO-220102-312-1102	Proposed Zeekoevlei Fishway Details
HHO-220102-313-1101	Sluice Channel Retaining Wall Layout, Section & Details
HHO-220102-313-1102	Sluice Channel Retaining Wall Layout, Section & Details
HHO-220102-313-2001	Sluice Channel (Surface Beds)
HHO-220102-313-2002	Sluice Channel Gratings
HHO-220102-314-1101	Access Ramps (Retaining Walls Layout)
HHO-220102-314-1102	Access Ramps (Retaining Wall Sections & Details)
HHO-220102-314-2001	Access Ramps (Surface Beds)
HHO-220102-316-1101	New Rondevlei Channel Retaining Wall
HHO-220102-317-1101	Zeekoevlei Linking Swimway Layout & Sections
HHO-220102-317-1102	Zeekoevlei Linking Swimway Details
HHO-220102-318-1101	Culvert General Arrangement
HHO-220102-318-1102	Culvert Walls & Barrier Details
HHO-220102-318-2001	Culvert, Hippo Spike & Fire Truck Surface Beds
HHO-220102-320-1101	Zeekoe River Fishway
HHO-220102-320-1102	Zeekoe River Fishway: Fishway Details

## C3.3 Procurement

### CONTENTS

- 3.3.1 PREFERENTIAL PROCUREMENT
- 3.3.2 SUB-CONTRACTING PROCEDURES

#### 3.3.1. PREFERENTIAL PROCUREMENT

The Works shall be executed in accordance with the conditions associated with the granting of preferences detailed in the **Preference Schedule** where preferences are granted in respect of the specific goals

Financial penalties, as described in the **Preference Schedule**, shall be applied in the event that the Contractor is found to have breached any of the conditions contained in the **Preference Schedule** (unless proven to be beyond the control of the Contractor).

Notwithstanding the application of penalties, the Contractor's attention is drawn to other sanctions that may be applied by the Employer (listed in the **Preference Schedule**) with due consideration to the circumstances.

#### 3.3.2. SUB-CONTRACTING PROCEDURES

##### 3.3.2.1 Monitoring the use of sub-contractors

Notwithstanding the restriction on sub-contracting as described on the **Preference Schedule**, it is recognised that sub-contracting is an integral part of construction, which the conditions of contract make provision for.

In order, however, to comply with the requirements of the **Preference Schedule**, the Contractor shall submit to the Employer's Agent, on a monthly basis, a **B-BBEE Sub-contract Expenditure Report**. The format of this report is provided in Annex 2 attached.

The Contractor shall submit to the Employer's Agent documentary evidence in accordance with the applicable codes of good practise, , of the B-BBEE status level of every sub-contractor employed by the Contractor. Until such time as documentary evidence as described above has been submitted to the Employer's Agent, a sub-contractor shall be deemed to be a non-compliant contributor.

The Contractor shall furthermore, on the written request of the Employer's Agent, provide documentary evidence showing the value of work sub-contracted to any or all of the sub-contractors employed by the Contractor.

### 3.3.2.2 Procedure for the selection of sub-contractors/suppliers

Where monetary allowances for provisional sums or prime costs items have been provided in the Bills of Quantities, and where the work or items to which the allowances relate are to be executed/supplied by sub-contractors/suppliers, then the following selection process shall be followed in respect of the required sub-contractors/suppliers:

Where the monetary allowance is less than or equal to R300 000, the Contractor shall invite three quotations from suitably qualified sub-contractors/suppliers for the required work or items. The selection of the three sub-contractors/suppliers shall be in consultation with, and to the approval of the Employer's Agent. The evaluation of the quotations received must include a preference points system as described in C.3.11 of the Tender Data.

Where the monetary allowance is in excess of R300 000, an open competitive tender process shall be followed in respect of the selection of a sub-contractor/supplier for the required work or items. In such circumstances, tender documentation will be prepared by the Employer's Agent in consultation with and to the approval of the Contractor, invitations to tender will be advertised in the media by the Employer's Agent on behalf of the Contractor, and a sub-contractor/supplier will be selected from the responses received, by the Contractor and Employer's Agent in consultation. The evaluation of the offers received must include a preference points system as described in C.3.11 of the Tender Data. The Contractor must satisfy itself that the selected sub-contractor/supplier can meet the requirements of the sub-contract /supply agreement and may, on reasonable grounds, elect not to employ a particular sub-contractor/supplier.

In both instances above (less than or equal to R300 000 or in excess of R300 000), the contractual relationship between the Contractor and sub-contractor/supplier shall be as described in the conditions of contract.

## C3.4 Construction

### CONTENTS

- 3.4.1 TRADE NAMES OR PROPRIETARY PRODUCTS
- 3.4.2 APPLICABLE STANDARDISED SPECIFICATIONS
- 3.4.3 PARTICULAR / PROJECT SPECIFIC SPECIFICATIONS
- 3.4.4 WAYLEAVES, PERMISSIONS AND PERMITS
- 3.4.5 LOCAL PRODUCTION AND CONTENT
- 3.4.6 EMPLOYMENT OF SECURITY PERSONNEL
- 3.4.7 UNIVERSAL ACCESS

#### 3.4.1. TRADE NAMES OR PROPRIETARY PRODUCTS

Bid specifications may not make any reference to any particular trade mark, name, patent, design, type, specific origin or producer, unless there is no other sufficiently precise or intelligible way of describing the characteristics of the work, in which case such reference must be accompanied by the words "or equivalent".

**CONTRACTORS MUST NOTE THAT WHEREVER THIS DOCUMENT REFERS TO ANY PARTICULAR TRADE MARK, NAME, PATENT, DESIGN, TYPE, SPECIFIC ORIGIN OR PRODUCER, SUCH REFERENCE SHALL BE DEEMED TO BE ACCOMPANIED BY THE WORDS 'OR EQUIVALENT'**

#### 3.4.2 APPLICABLE STANDARDISED SPECIFICATIONS

The specification on which this contract is based are the Standard specifications for Road and Bridgeworks for South African Authorities (draft standard October 2020 edition) prepared by the Committee of Transport Authorities (COTO) for the sections listed below.

COTO CHAPTER 1:	GENERAL
COTO CHAPTER 3:	DRAINAGE
COTO CHAPTER 4:	EARTHWORKS AND PAVEMENT LAYERS: MATERIALS
COTO CHAPTER 5:	EARTHWORKS AND PAVEMENT LAYERS: CONSTRUCTION
COTO CHAPTER 6:	CONCRETE LAYERS
COTO CHAPTER 11:	ANCILLIARY ROADWORKS
COTO CHAPTER 13:	STRUCTURES
COTO CHAPTER 14:	REPAIR AND REHABILITATION OF STRUCTURES
COTO CHAPTER 20:	QUALITY ASSURANCE

#### 3.4.3 PARTICULAR / PROJECT SPECIFIC SPECIFICATIONS

Amendments to the standard specifications are included in this Project Specifications.

- (i) The project specifications form an integral part of the contract documents and supplement the standard specifications.
- (ii) In the event of any discrepancy between the project specifications and a part of the standard specifications, the schedule of quantities, or the drawings, the project specifications shall take precedence. In the event of any discrepancy between the schedule of quantities and the drawings, the drawings shall take precedence.
- (iii) The standard specifications, which form part of this contract, have been written to cover all phases of work normally required for road contracts, and they may therefore cover items not applicable to this particular contract.

In certain clauses the standard specifications allow a choice to be specified in the project specifications between alternative materials or methods of construction and for additional requirements to be specified to suit a particular contract. Details of such alternatives or additional requirements applicable to this contract are contained in this part of the project specifications. It also contains some additional specifications required for this particular contract.

The number of each clause and each payment item in this part of the project specifications consists of the prefix P followed by a number corresponding to the number of the relevant clause or payment item in the standard specifications. The number of a new clause or a payment item which does not form part of a clause or a payment item in the standard specifications and which is included here, is also prefixed by P followed by a new number. The new numbers follow on the last clause or item number used in the relevant section of the standard specifications.

The following sections of the standard specifications have been amended indicated below.

COTO CHAPTER 1.3	CONTRACTOR'S SITE ESTABLISHMENT AND GENERAL OBLIGATIONS
COTO CHAPTER 11.2	NON-STRUCTURAL GABIONS
COTO CHAPTER 11.5	FENCING
COTO CHAPTER 13.1	FOUNDATIONS
COTO CHAPTER 13.3	STEEL REINFORCEMENT
COTO CHAPTER 13.4	CONCRETE
COTO CHAPTER 13.8	ANCILLARY STRUCTURAL ELEMENTS

#### **3.4.4 WAYLEAVES, PERMISSIONS AND PERMITS**

The Contractor shall be responsible for obtaining all of the necessary wayleaves, permissions or permits applicable to working near any existing services or other infrastructure on Site, and shall ensure that any wayleaves, permissions or permits obtained by the Employer's Agent prior to the award of the contract are transferred into the Contractor's name.

The Contractor shall abide by any conditions imposed by such wayleaves, permissions or permits.

The Contractor shall ensure that all wayleaves, permissions and permits are kept on site and are available for inspection by the relevant service authorities on demand.

The Contractor shall also ensure that any wayleaves in respect of electricity services are renewed timeously every three months.

#### **3.4.6 EMPLOYMENT OF SECURITY PERSONNEL**

All security staff employed by the contractor on behalf of the CCT or at any CCT property must be registered with Private Security Industry Regulatory Authority (PSiRA). Proof of such registration must be made available to the employer's agent upon request.

#### **3.4.7 UNIVERSAL ACCESS**

In pursuit of becoming a fully accessible city, the City of Cape Town expects all Consultants and Service Providers to design and construct to SANS Standards for accessible Design, and any relevant City of Cape Town documents as may be relevant, and to exhibit a commitment to employing Universal Design Principles in their design, construction, service and product delivery of construction projects. This applies to all projects whether new, temporary, upgrades or rehabilitation works.

The contractor will engage with project representatives and the CCT's Universal Accessibility Department on how Universal Design Principles will enhance accessibility, within this project, that meets a variety of needs and creates a city that is accessible to everyone.



## PARTICULAR / PROJECT SPECIFIC COTO SPECIFICATIONS

### COTO CHAPTER 1: GENERAL

#### SECTION 1.3: CONTRACTOR'S SITE ESTABLISHMENT AND GENERAL OBLIGATIONS

#### PART C: MEASUREMENT AND PAYMENT

##### (iv) Items specifically for this Section of the specifications

*Amend / Add pay items as follows*

Item	Description	Unit
<b>PC1.3.1.3</b>	<b>Time related obligations</b>	
	(a) For "Start-up period"	Month
	(b) For "Construction Period"	Month

*Add the following paragraph before the sentence starting with "The unit of measurement for item C1.3.1.3 is the month..."*

"The contract rate per month for subitem PC1.3.1.3 (a) will represent full compensation for that part of the contractor's general obligations to meet the requirements of the Construction Work Permit application in terms of the Construction Regulation Act 2014 and all time related costs indirectly or directly associated with this application up to receiving the approved Construction Work Permit. The tendered rate will be paid monthly and/or parts of the month (to two decimal places) from the date on which the Employer has signed the Principal Contractor Appointment which forms part of the Construction Work Permit application up to receiving the approved Construction Work Permit."

*Delete the following*

"The unit of measurement for item C1.3.1.3 is the month or part thereof that the services are provided for the approved duration of the contract. Part of a month shall be calculated to two decimal places.

The contract rate shall include full compensation for that part of the Contractor's general obligations which are mainly a function of construction time. The contract rate will be paid monthly, pro rata for parts of a month, from the date of commencement in terms of the Contract Documentation until the end of the original Contract Period specified for completion of the Works."

*Replace with the following:*

"The unit of measurement for item C1.3.1.3(b) is the month or part thereof that the services are provided for the approved construction period. Part of a month shall be calculated to two decimal places. The contract rate shall include full compensation for that part of the Contractor's general obligations which are mainly a function of construction time. The contract rate will be paid monthly, pro rata for parts of a month, from the date of Commencement of Works in terms of the Contract Documentation until the end of the original Contract Period specified for completion of the Works."

*Amend the sentence "The following conditions also apply...under item C1.3.1.3:" to include (b):*

*"The following conditions also apply to the time related payment made under item C1.3.1.3 (b):"*

*Add the following items after Item C1.3.2*

Item	Description	Unit
<b>PC1.3.3</b>	<b>Community Liaison Officer (CLO)</b>	
	(a) Remuneration of 1 CLO	PC Sum
	(b) Handling costs and profit in respect of subitem PC1.3.3 (a)	%

Payment under the PC sum provided in subitem (a) to cover the employment and remuneration of 1 (one) Community Liaison Officer shall be effected in accordance with the provisions of clause 6.6 of the general conditions of contract. It should be noted that the office accommodation, furniture, equipment and transport for the Community Liaison Officer shall be deemed to have been included in the rates tendered for the Contractor's establishment costs under Item C1.3.

**COTO CHAPTER 11: ANCILLARY ROAD WORKS**

**SECTION 11.2: NON-SUTRCTURAL GABIONS**

**PART C: MEASUREMENT AND PAYMENT**

**(v) Items specifically for this Section of the specifications**

*Add the following Item after Item C11.2.4*

Item	Description	Unit
PC11.2.5.	Removal of existing gabion structures	cubic metre (m <sup>3</sup> )

The unit of measurement shall be the cubic metre of existing gabion structures removed as instructed by the Employer's Agent.

The tendered rate shall include full compensation for all demolition, which requires the dismantling of gabion boxes or mattresses and removal of gabion stone and filter fabric, and for loading, transporting and disposing of products of demolition, including all haul."

**SECTION 11.5: FENCING**

**PART C: MEASUREMENT AND PAYMENT**

**(v) Items specifically for this Section of the specifications**

*Add the following Item after Item C11.5.1.11*

Item	Description	Unit
PC11.5.1.12.	Galvanised welded mesh with powder coating, 2.4m height, 3m length sections including posts, finishes as per dwg HHO-220102-750-3201	metre (m)

The unit of measurement shall be the linear metre of galvanised welded mesh fencing which is in accordance with drawing HHO-220102-750-3201.

The tendered rate shall include full compensation for the manufacturing, supply, and installation of the fencing panels, including posts, bolts, washers and nuts, drilling of holes and any required excavation. No separate payment will be made for panels less than 3m, which may be required to tie into the existing or proposed infrastructure. Concrete required for post foundations will be paid for separately under item PC11.5.1.14.

*Add the following Item under Item PC11.5.1.12*

Item	Description	Unit
PC11.5.1.13.	Stile v-shape welded mesh fence panels, 2.4m height, including posts, finishes as per dwg HHO-220102-750-3201	metre (m)

The unit of measurement shall be the linear metre of galvanised welded mesh fencing which is in accordance with drawing HHO-220102-750-3201.

The tendered rate shall include full compensation for the manufacturing, supply, and installation of the fencing panels required to form a the V-shaped stile, including posts, bolts, washers and nuts, drilling of holes and any required excavation. Concrete required for post foundations will be paid for separately under item PC11.5.1.14.

Add the following Item under Item PC11.5.1.13

Item	Description	Unit
PC11.5.1.14.	In-situ concrete, grade 30MPa/20mm, for fencing post foundations	cubic metre (m <sup>3</sup> )

The unit of measurement for cast in situ concrete shall be the cubic metre of concrete in place. Quantities shall be calculated from the dimensions shown on the drawings or as authorised by the Engineer.

The tendered rate shall include full compensation for procuring and furnishing all the materials, storing the materials, providing all plant, mixing, transporting, placing and compacting the concrete.

## **COTO CHAPTER 13: STRUCTURES**

### **SECTION 13.1: FOUNDATIONS**

#### **PART B: LABOUR ENHANCEMENT**

#### **B13.1.7 EXECUTION OF THE WORKS**

##### **B13.1.7.4 Utilisation of excavated material**

*Delete reference to: "100 m" and replace with "50 m".*

### **SECTION 13.3: STEEL REINFORCEMENT**

#### **PART A: SPECIFICATION**

#### **A13.3.8 WORKMANSHIP**

##### **A13.3.8.4 Tolerances**

##### **b) Concrete cover**

*Delete reference to "Clause A13.4.8.1a)(iv)" and replace with: "Clause A13.4.8.1a)(v)".*

### **SECTION 13.4: CONCRETE**

#### **PART A: SPECIFICATION**

#### **A13.4.2 DEFINITIONS**

##### **Fresh phase of concrete**

*Add the following at the end of the definition of "Fresh phase of concrete":*

*"This is also known as the plastic phase."*

*Add the following definition between "Fresh phase of concrete" and "Hardened phase of concrete":*

**"Hydration or curing phase** – this is concrete that is no longer a semi-liquid but has not yet reached a solid state."

#### **A13.4.7 EXECUTION OF THE WORKS**

##### **A13.4.7.12 Placing and Compaction**

##### **b) Placing**

*Delete the 3<sup>rd</sup> sentence of the 1<sup>st</sup> paragraph and replace with the following:*

*"The Contractor shall not be permitted to pour unless the specific method statement for that pour has been accepted by the Engineer."*

**PART C: MEASUREMENT AND PAYMENT**

**(v) Items specifically for this Section of the specifications**

<b>Item</b>	<b>Description</b>	<b>Unit</b>
<b>PC13.4.9</b>	<b>Manufacturing precast concrete members:</b>	<b>number (No)</b>

*Add the following:*

“All precast concrete members are to be reinforced with high quality steel fibres of 20-80mm in length, at a ratio of 1% by volume (80kg/m<sup>3</sup>) with crimped hook ends. Steel fibres shall comply with EN 14889-1 or ASTM A820.

Details of the steel fibres, concrete mix-design and fibre dispersion and mixing procedure are to be submitted to the Engineer for approval. Trial samples of all precast elements are to be submitted for approval.

Concrete for all precast elements must meet the durability index requirements of Environmental Class XS3a in the Standard Specifications, with durability tests carried out and interpreted by an independent, accredited laboratory.

Any cast-in lifting hooks that may be required for installation of precast elements are to be designed by the Contractor and submitted to the Engineer for approval.”

<b>Item</b>	<b>Description</b>	<b>Unit</b>
<b>PC13.4.13</b>	<b>Complete demolition and disposal of existing structural concrete elements or parts existing structures:</b>	<b>number (No)</b>

*The words “or masonry” shall be inserted after all references to the word “concrete” in this Item.*

*Delete the following:*

“, process the demolished product to ensure acceptance by the approved construction waste facility, and disposal of the product of the demolition at the construction waste facility with unlimited haul distance.”

*Replace with the following:*

“Demolished concrete or masonry shall be broken up on site and stockpiled. All reinforcing steel shall be removed and disposed of at a recycling facility with unlimited haul distance, and the remainder of the demolished material used to form a pioneer layer below the foundations for new structures – see C4.4.2.6”

<b>Item</b>	<b>Description</b>	<b>Unit</b>
<b>PC13.4.14</b>	<b>Controlled demolition of concrete from structural elements:</b>	<b>number (No)</b>

*The words “or masonry” shall be inserted after all references to the word “concrete” in this Item.*

*Delete the following:*

“The tendered rate shall also include the processing of the demolished product to ensure acceptance by the approved construction waste facility, loading, lifting, transport and the disposal of the construction waste at the construction waste facility within a haul distance of 10 km.”

*Replace with the following:*

“Demolished concrete or masonry shall be broken up on site and stockpiled. All reinforcing steel shall be removed and disposed of at a recycling facility with unlimited haul distance, and the remainder of the demolished material shall be used as rock fill material below the foundations for new structures – see C4.4.2.6”

**SECTION 13.7: JOINTS****PART C: MEASUREMENT AND PAYMENT****(v) Items specifically for this Section of the specifications**

*Replace Item C13.7.3.1 with the following Item:*

Item	Description	Unit
<b>C13.7.3</b>	<b>Unfilled joints</b>	
PC13.7.3.1	Saw cut expansion joint, 50mm deep, to 200mm thick concrete surface bed slab	metre (m)

Contraction joints sawn in surface bed slabs shall not exceed 3,0 mm in width. The grooves shall be sawn to the depth shown on the drawings.

The Contractor shall be responsible for determining the optimum time and sequence for the sawing of joints, bearing in mind the risk of excessive ravelling and spalling with early sawing, and the risk of cracking with delayed sawing, but shall not be later than 24 hours after the concrete has been placed. The timing shall depend on the strength gain characteristics of the cementitious products incorporated in the concrete mix, the hardness of the aggregate and weather conditions at the time of placing. The Contractor shall use the type of blade and equipment best suited to the hardness of the concrete, type of aggregate and the site conditions in order to prevent uncontrolled cracking and any spalling adjacent to the joint being sawn. Sufficient standby power saws shall be held available by the Contractor, ready for use, at all times when concrete is being placed. Immediately after sawing, the joint grooves shall be washed out with a jet of clean water to remove all fine material which shall be appropriately disposed of at an approved site. The joints shall then be sealed temporarily by means of an approved material, flush with the permanent surface. No traffic of any kind shall be allowed on the pavement until all the joints have been permanently sealed.

All joints shall initially be sawn to the full depth as indicated. In sealed joints the top portion of the groove shall be reamed out to the specified final width and depth not sooner than 7 days after the initial sawing.

**SECTION 13.8: ANCILLARY STRUCTURAL ELEMENTS****PART A: SPECIFICATION****A13.8.7 EXECUTION OF THE WORKS****A13.8.7.2 Drainage for structures****d) Crushed stone in drainage strips behind walls**

*Delete "19 mm nominal size" and replace with "20 mm nominal size".*

**PART C: MEASUREMENT AND PAYMENT****(v) Items specifically for this Section of the specifications**

*Add the following Items after Item C13.8.17:*

Item	Description	Unit
<b>PC13.8.18</b>	<b>Hinged drain gratings for sluice channel low-flow drains:</b>	
PC13.8.18.1	Moulded glass-fibre reinforced vinyl ester polymer grating panel, 726x1146x38mm, 38mm square mesh pattern, inclusive of M8 stainless steel eyebolt hinge connection detail as shown on drawing	number (No.)

<b>PC13.8.18.2</b>	<b>Moulded glass-fibre reinforced vinyl ester polymer grating panel, 726x1336x38mm, 38mm square mesh pattern, inclusive of M8 stainless steel eyebolt hinge connection detail as shown on drawing</b>	<b>number (No.)</b>
<b>PC13.8.18.3</b>	<b>Poltruded glass-fibre reinforced vinyl ester polymer grating panel, 726x1155x38mm overall, with 38mm x 150mm rectangular mesh pattern, inclusive of M8 stainless steel eyebolt hinge connection detail as shown on drawing</b>	<b>number (No.)</b>

The Glassfibre Reinforced Polymer (GRP) grating material covered by these specifications shall be furnished by a reputable and qualified manufacturer of proven ability who has regularly engaged in the manufacture and installation of GRP systems. Substitution of any component or modification of system shall be made only when approved by the Engineer.

Materials used in the manufacture of the GRP products shall be new stock of the best quality and shall be free from all defects and imperfections that might affect the performance of the finished product.

GRP grating shall be manufactured using a vinyl ester resin with ultra-violet (UV) inhibitor additives and shall additionally receive one millimetre thick UV coating. A synthetic surface veil shall be the outermost layer covering the exterior surface.

The top surface of all panels shall have a non-skid grid affixed to the surface by a cured resin followed by a topcoat of cured resin. All cut and machinery edges, holes and abrasions shall be sealed with a resin compatible with the resin matrix used in the grating.

Pultruded grating shall have a minimum glass content of 65%. Moulded grating panels shall have a minimum glass content of 35%.

The unit of measurement shall be the number of each type of grating and hinge connection supplied in accordance with the details shown on the drawings.

The tendered rates shall include full compensation for procuring and furnishing all materials, manufacturing, transporting and storing the grating panels and connection components.

<b>Item</b>	<b>Description</b>	<b>Unit</b>
<b>PC13.8.19</b>	<b>Installation of hinged glass-fibre reinforced grating panel onto precast concrete sluice channel low-flow drain units using chemical anchors</b>	<b>number (No.)</b>

The unit of measurement shall be the number of all types of grating installed complete in position using the hinge connection in accordance with the details shown on the drawings.

All hinge fittings shall be stainless steel Grade 304.

The hinge fittings shall be assembled and installed such that the gratings are not supported vertically by the hinges, but rest directly on the top surface of the precast concrete drain units.

A working sample of a complete hinge installed on a precast concrete drain unit shall be submitted to Engineer for approval before the gratings are installed on site.

The tendered rates shall include full compensation for all labour, construction plant and materials required for installing the grating panel and connection components as specified.

<b>Item</b>	<b>Description</b>	<b>Unit</b>
<b>PC13.8.20</b>	<b>Supply and installation of steel plate security door with frame and lintel, opens outwards, 6mm thick outer plate with protective weather and fire coatings, 8 No. 40mm locking bolts</b>	<b>number (No.)</b>

The unit of measurement shall be the number of doors supplied and securely installed complete in position in accordance with the details shown on the drawings.

The tendered rates shall allow for installation in the masonry exterior curtain wall as detailed on the drawings and include for a lintel beam, all connections, security fittings and set of six (6 no.) spare keys.

The tendered rates shall include full compensation for procuring and furnishing all materials, manufacturing, transporting and storing, and all labour, constructional plant and materials required for installing the doors as specified.

Item	Description	Unit
<b>PC13.8.21</b>	<b>Supply and installation of 1000mm wide x 1050mm high channel gate as per dwg HHO--220102-710-2801</b>	<b>number (No.)</b>

The unit of measurement shall be the number of channel gates supplied and installed complete in position in accordance with the details and specifications shown on the drawing.

The tendered rate shall include full compensation for procuring and furnishing all materials, manufacturing, transporting and storing, and all labour, constructional plant and materials required for installing the channel gates as specified.

Item	Description	Unit
<b>PC13.8.22</b>	<b>Movement dowels for expansion or contraction joints:</b>	
PC13.8.22.1	Supply and installation of 25mm dia. Grade 304 stainless steel movement dowel bar for expansion joints, 400mm long, inclusive of 200mm bond-breaker sleeve as per drawing	number (No.)
PC13.8.22.2	Supply and installation of R20 galvanised mild steel movement dowel bar for contraction joints, 500mm long, inclusive of 300mm bond-breaker sleeve as per drawing	number (No.)

Dowel bars shall have a smooth, circular section produced on a Kocksblock to ¼ DIN tolerance of the DIN 1013 specification. Dowel bars shall be straight and free from irregularities and without any burred ends, and shall have their sliding ends sawn and bevelled. Cropping of dowels shall not be permitted. The dowels shall be encased at one end in a close-fitting cap. The cap shall be placed on the free half of each dowel which half shall be coated as late as possible before concreting, with a bond-breaking coating or sleeve which complies with the requirements of Clause A6.1.5.5d). The free or un-bonded end of the dowel shall be coated with a bond-breaking coating, as directed by the Engineer, to prevent the concrete from adhering to it. The coating or sheath shall cover at least two-thirds of the dowel length. The bond-breaking coating shall be an approved synthetic material applied at a thickness of 0,5 mm in accordance with the manufacturer's recommendations. The sheath shall be a tough polyethylene material with an average thickness of 1,0 mm ± 0,2 mm.

Dowel bars shall be installed at locations as indicated on the drawings. Dowels shall be fixed rigidly both in horizontal and vertical alignment perpendicular to the joint and parallel to the surface of the slab, by robust supporting frames or cradles which do not project within 150 mm of the joint and are left permanently in place. The frames shall be fixed so that they will be stable and remain undisturbed during concrete pouring. The free end of the dowel shall not be tack-welded to the frame but shall be held in position by soft binding wire. Dowel alignment shall be accurate to within the tolerance given in Clause A6.1.8.

Item	Description	Unit
<b>PC13.8.23</b>	<b>Fishway drainage tubes:</b>	
PC13.8.23.1	Supply and installation of 200mm dia. UV-stabilised PVC drainage tube, 300mm long, cast into fishladder box, in accordance with dwg -312-1101	number (No.)

The unit of measurement shall be the number of drainage tubes installed complete in position within cast-in-situ concrete elements of the fishway in accordance with the details shown on the drawings.

The tendered rates shall include full compensation for all labour, construction plant and materials required for installing the drainage tubes as specified.

Item	Description	Unit
PC13.8.23	Fishway drainage tubes:	
PC13.8.23.2	Supply of 200mm dia. UV-stabilised PVC drainage tube end cap	number (No.)

The unit of measurement shall be the number of end caps supplied, the majority of which shall be installed with the fishway drainage tubes, and the remainder provided to the Employer as replacement spares.



## C3.5 Management

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- 3.5.6. HEALTH AND SAFETY
- 3.5.7 CONTRACTOR'S SUPERVISION AND KEY PERSONNEL

#### 3.5.1. FORMS FOR CONTRACT ADMINISTRATION

The Contractor shall complete, sign and submit with each monthly statement for payment, the following updated returns (the format of which are attached in C3.6 Annexes as amended from time to time):

- a) Monthly Project Labour Report (Annex 1)
- b) B-BBEE Sub-contract Expenditure Report (Annex 2)
- c) Joint Venture Expenditure Report (Annex 3)
- d) Targeted Labour Contract Participation Expenditure Report (Annex 4)
- e) Targeted Enterprises Contract Participation Expenditure Report (Annex 5)

The Monthly Project Labour Report must include details of all labour (including that of sub-contractors) that are South African citizens earning less than **R460.00** per day, as adjusted from time to time (excluding any benefits), who are employed on a temporary or contract basis on this contract in the month in question.

In addition to the Monthly Project Labour Report the Contractor shall simultaneously furnish the Employer's Agent with copies of the signed employment contracts entered into with such labour, together with certified copies of identification documents, proof of attendance in the form of attendance register or timesheets as well as evidence of payments to such labour in the form of copies of payslips or payroll runs. 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 and proof of such acknowledgement shall be furnished to the Employer's Agent.

The Monthly Project Labour Reports shall be completed and submitted in accordance with the instructions therein and copies of all submitted documents must be kept on site be made available to the employer's agent upon request.

The **B-BBEE Sub-contract Expenditure Report** is required for monitoring the prime contractor's compliance with the sub-contracting conditions of the **Preference Schedule**.

The Joint Venture Expenditure Report is required for monitoring the joint venture's compliance with the percentage contributions of the JV partners as tendered, where the joint venture has been awarded preference points in respect of its consolidated B-BBEE scorecard.

The Targeted Labour Contract Participation Expenditure Report (if applicable) is required for monitoring the contractor's compliance for achieving the specified minimum targeted labour contract participation goal (CPGL) and, if applicable, for calculating any penalty in terms thereof.

The Targeted Enterprises Contract Participation Expenditure Report (if applicable) is required for monitoring the contractor's compliance for achieving the specified minimum targeted enterprises contract participation goal (CPGE) and, if applicable, for calculating any penalty in terms thereof.

The Expenditure Reports shall be verified by the Employer's Agent/Employer's Agent's Representative.

In respect of Annexes 2 and 3, the Employer shall, in addition to any other sanctions available to it, apply the financial penalties applicable to breach of preferencing conditions in the **Preference Schedule**

Preference Schedule in Part T2.2 Returnable Schedules. In the case of joint ventures (Annex 3), the contractor shall prove his compliance with item 6) in Section 2 of the Preference Schedule by providing a consolidated scorecard at his own cost on instruction from the Employer's Agent.

### 3.5.2 PARTICIPATION OF TARGETED LABOUR

#### 3.5.2.1 Minimum targeted labour contract participation goal

In support of the National Department of Public Works' Expanded Public Works Programme which is aimed at alleviating poverty through the creation of temporary employment opportunities using labour intensive methodologies and practices where possible, the Employer is seeking to increase the intensity of labour, as appropriate, in all of its infrastructure sector projects.

It is a requirement of this contract, therefore, that the work be executed in such a manner so as to maximise the use of labour intensive construction methods in order to provide low and semi-skilled temporary employment opportunities.

To this end, a minimum targeted labour contract participation goal is specified below, which shall be achieved by the Contractor in the performance of the contract, failing which, penalties as described will be applied. The Contractor is required to provide all skills training where necessary, so as to ensure that a minimum level of competence is achieved and maintained, such that the various activities are carried out safely and to the required standard. The cost of training shall be included in the rates for the various work activities.

The specified minimum targeted labour contract participation goal (CPGL) is

2 %

The minimum CPGL is such that the Contractor will have to carry out some of the work that would normally have been undertaken using mechanised construction methods, by using labour intensive construction methods instead. It is left to the discretion of the Contractor to identify suitable work activities for the intensification of labour. The Contractor shall, within 5 working days of being requested in writing by the Employer's Agent to do so, submit details of his/her plan to achieve the minimum CPGL.

#### 3.5.2.2 Definitions

For the purposes of the requirements in respect of the participation of targeted labour, the following definitions shall apply:

**"Target area"** means the geographical area shown on plan in Part C4: Site Information

**"Targeted labour contract participation goal (CPGL)"** means the sum of the wages (excluding any benefits), for which the Contractor, or any of his/her sub-contractors contracts targeted labour in the performance of the contract, expressed as a percentage of the value of the contract.

**"Targeted labour"** means low and semi-skilled individuals, whose wages (excluding any benefits) do not exceed the threshold value, who reside in the target area, that are employed by the Contractor, or any of his/her sub-contractors, in the performance of the contract.

**"Threshold value"** is R350.00 per day as adjusted from time to time (excluding any benefits). The threshold value is not to be confused with any industry sector minimum wage determined in accordance with the Basic Conditions of Employment Act, 75 of 1977.

**"Value of the contract"** means the contract sum (accepted contract amount) less provisional sums, contingencies and VAT.

#### 3.5.2.3 The selection and recruitment of targeted labour

Where targeted labour is to be drawn from specific local communities (defined in terms of the target area), such labour shall be identified using the relevant Sub-Council Job-Seekers Database. The Contractor shall request, via a Community Liaison Officer, a list of suitable candidates from the database, from which the Contractor shall make his/her final selection. The contractor shall enter into written contracts of temporary employment with all targeted labour.

Any difficulty experienced by the Contractor in identifying candidates through the Job-Seekers Database, or as regards any matter relating to the employment of targeted labour, shall be immediately referred to the Employer's Agent.

#### 3.5.2.4 Contract participation goal credits

Credits towards the achieving the minimum CPG<sub>L</sub> shall be granted by converting the total monetary value of wages paid to targeted labour (including that of sub-contractors) to a percentage of the value of the contract. No credits shall be accorded should the contractor/sub-contractor fail to enter into written contracts with the targeted labour. Furthermore, no credits shall be accorded in respect of targeted labour employed on work in respect of provisional sums or prime cost items. Such labour shall nevertheless be recorded on the Project Labour Report which is required to be furnished by the Contractor.

#### 3.5.2.5 Training of targeted labour

The Contractor is required to provide all informal (on-the-job) skills training so as to ensure that a minimum level of competence is achieved and maintained, such that the various activities are carried out safely and to the required standard. The cost of informal training shall be included in the rates for the various work activities.

#### 3.5.2.6 Penalties

The financial penalty to be applied for failing to meet the specified minimum targeted labour contract participation goal in the performance of the contract (unless proven to be beyond the control of the Contractor), is as follows:

$$\text{Penalty} = (\text{CPG}_L^S - \text{CPG}_L^A) \times P^*$$

Where  $\text{CPG}_L^S$  = the specified minimum targeted labour contract participation goal (expressed as a percentage).

$\text{CPG}_L^A$  = the targeted labour contract participation goal achieved (expressed as a percentage).

$P^*$  = the value of the contract.

#### 3.5.3. COMMUNITY LIAISON OFFICER

It is a requirement of this Contract that a Community Liaison Officer (CLO) shall be appointed by the Contractor. The primary functions of the CLO shall be to assist the Contractor with the selection and recruitment of targeted labour, to represent the local community in matters concerning the use of targeted labour (and/or enterprises) on the works, and to assist with and facilitate communication between the Contractor, the Employer's Agent and the local communities.

The identification of suitable candidates (maximum 5; minimum 3) for the CLO position shall be resolved by the relevant Sub-council Manager through a process of advertising and shortlisting. Should suitable candidates not be identified through this process, the Contractor shall be allowed to seek candidates from the relevant Sub-Council Job-Seekers Database. The final selection and appointment of the CLO in terms of the contract shall be the responsibility of the Contractor.

The period of appointment of the CLO shall be as stated in the Contract for Temporary Employment as a Community Liaison Officer referred to below. The date of commencement of temporary employment of the CLO shall be as agreed with the Employer's Agent.

It is required, therefore, that the Contractor enter into a contract of temporary employment with the selected CLO, the contracting parties being the Contractor and the CLO. To this end, a specimen Form of Contract of Temporary Employment as Community Liaison Officer is included in this document (Part C1.7: Agreement and Contract Data). This Form of Contract sets out, inter alia, the agreement between the parties, the duties and conditions of employment of the CLO. The rate of remuneration for the CLO, payable by the Contractor, is currently **R460.00** per day. This rate shall only be adjusted for escalation when the standard daily rate of employment for CLOs is adjusted by the Employer.

The contract will be between the Contractor and the CLO. All costs of employment and transport shall be borne by the Contractor, except for those costs claimable under the prime cost sum provided in payment item PC1.3.3.

### 3.5.4. PARTICIPATION OF TARGETED ENTERPRISES

#### 3.5.4.1 Minimum targeted enterprises contract participation goal

It is a requirement of this contract that enterprises located within the target area, as defined, be engaged by the Contractor for the provision of supplies, services or works necessary for the performance of this contract.

To this end, a minimum targeted enterprises contract participation goal is specified below, which shall be achieved by the Contractor in the performance of the contract, failing which, penalties as described will be applied.

The specified minimum targeted enterprises contract participation goal (CPG<sub>E</sub>) is

2 %

The Contractor shall engage targeted enterprises directly or indirectly in the performance of the contract to the extent that the total monetary value of such engagements (exclusive of VAT), expressed as a percentage of the value of the contract, is sufficient to achieve the specified minimum CPG<sub>E</sub>.

#### 3.5.4.2 Definitions

For the purposes of the requirements in respect of the participation of targeted enterprises, the following definitions shall apply:

“**Target area**” means the geographical area shown on plan in Part C4: Site Information

“**Targeted enterprises contract participation goal (CPG<sub>E</sub>)**” means the value of supplies, services or works (exclusive of VAT), for which the Contractor contracts targeted enterprises, either directly or indirectly, in the performance of the contract, expressed as a percentage of the value of the contract.

“**Targeted enterprises**” means any sole trader, partnership or legal entity that acts as a supplier, manufacturer, service provider or sub-contractor, and which has its base of operations in the target area.

“**Value of the contract**” means the contract sum (accepted contract amount) less provisional sums, contingencies and VAT.

#### 3.5.4.3 Achieving the contract participation goal

The contractor may achieve the specified minimum CPG<sub>E</sub> as follows:

- a) by engaging one or more targeted enterprises to perform commercially useful functions in the performance of the contract;
- b) by engaging non-targeted enterprises, who in turn engage one or more targeted enterprises to perform commercially useful functions in the performance of the contract;
- c) by a combination of the above.

The Contractor shall, within 5 working days of being requested by the Employer's Agent to do so, submit details of his/her plan to achieve the minimum CPG<sub>E</sub>.

#### 3.5.4.4 Contract participation goal credits

Credits towards achieving the minimum CPG<sub>E</sub> shall be granted by converting the total monetary value (exclusive of VAT) of the agreements between the Contractor, or Contractor's sub-contractors, and targeted enterprises, to a percentage of the value of the contract.

No credits shall be accorded should the Contractor (or sub-contractors):

- a) make direct payment to third parties in connection with the contract on behalf of targeted enterprises, when such payment is recovered by making deductions from payments due to the targeted enterprise;
- b) fail to enter into written contractual agreements with the relevant targeted enterprises.

Credits claimed towards the contract participation goal shall be denied where such written contractual agreements contain any of the following:

- c) conditions which are more onerous than those that exist in the prime contract (this contract);
- d) payment procedures based on a pay when paid system;
- e) authoritarian rights given to the employing contractor, with no recourse to independent adjudication in the event of a dispute arising.

No credits may be claimed in respect of targeted enterprises that do not adhere to statutory labour practices.

No credits shall be accorded in respect of targeted enterprises engaged on work in respect of provisional sums or prime cost items.

In the event that a targeted enterprise sub-contracts to another targeted enterprise, only the value of the higher level sub-contract shall be granted as credit towards achieving the specified minimum CPG<sub>E</sub>.

In addition to the form required for contract administration (the Targeted Enterprises Contract Participation Expenditure Report), the Contractor shall furnish the Employer's Agent, upon written request, with documentary evidence that the targeted enterprises have their base of operations in the target area, copies of the contractual agreements with the various targeted enterprises, as well as documentary proof of payments made to the various targeted enterprises.

#### **3.5.4.5 Penalties**

The financial penalty to be applied for failing to meet the specified minimum targeted enterprises contract participation goal in the performance of the contract (unless proven to be beyond the control of the Contractor), is as follows:

$$\text{Penalty} = (\text{CPG}_E^S - \text{CPG}_E^A) \times P^*$$

Where  $\text{CPG}_E^S$  = the specified minimum targeted enterprises contract participation goal (expressed as a percentage).

$\text{CPG}_E^A$  = the targeted enterprises contract participation goal achieved (expressed as a percentage).

$P^*$  = the value of the contract.

#### **3.5.5. ENVIRONMENTAL MANAGEMENT PROGRAMME**

Particular Specification E: Environmental Management Specification and its Annexures are attached hereto.

#### **3.5.6. HEALTH AND SAFETY**

Particular Specification H: Health and Safety Specification is attached hereto.

#### **3.5.7 CONTRACTOR'S SUPERVISION AND KEY PERSONNEL**

The Contractor shall provide an adequate, experienced and stable project team for the duration of the contract. Every effort must be exercised by the Contractor to minimise the replacement of his key personnel allocated to this contract in order to ensure optimum contract management continuity.

Key Personnel cannot be substituted without approval of the Employers Agent. Should it become necessary to replace any of the Key Personnel, including the Construction Manager, listed at the time of tender during the course of this contract, they may only be replaced by individuals with similar or better qualifications and experience, who satisfy the minimum requirements and then only with the written approval of the Employer's Agent.

## **E: ENVIRONMENTAL MANAGEMENT SPECIFICATION**

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## E: ENVIRONMENTAL MANAGEMENT SPECIFICATION

For use with the General Conditions of Contract for Construction Works, Third Edition, 2015.

### E1 SCOPE

The Environmental Management Programme (EMP) for the project is comprised of this Environmental Management (EM) Specification and its Annexures, including the “Additional environmental issues deemed to form part of the Environmental Management Specification” attached as Annexure D hereto, which together cover the requirements for controlling the impact on the environment of construction activities.

#### Purpose of the Environmental Management Programme (EMPr)

The purpose of this Environmental Management Specification is to provide for impact prevention and mitigation measures during construction.

An environmental authorisation by the national Department of Forestry, Fisheries and the Environment is relevant to the Project. Please refer to the authorisation and Environmental Management Programme (EMPr) approved by the competent authority attached in **Annexure B** that forms part of this Environmental Management Specification.

**The Specification (including the environmental authorisation and the EMPr) forms part of the Contract and the costs of compliance therewith must be included in the Contractor's bid.**

### E2 INTERPRETATIONS

#### E2.1 Supporting specifications

The following standardised specification shall, *inter alia*, apply to this Contract:

- a) SANS 1200A, as may be varied or added to in the Scope of Work

#### E2.2 Application

This EM Specification contains clauses that are generally applicable to the undertaking of construction works in areas where it is necessary to impose pro-active controls on the extent to which the construction activities impact on the environment.

#### E2.3

In the event of any difference or discrepancy between the provisions of the Standardised Specifications and the provisions of the EM Specification, the latter shall prevail.

#### E2.4 Definitions and abbreviations

For the purposes of this EM Specification the following definitions and abbreviations shall apply:

##### E2.4.1 Environment

The surroundings within which humans exist and that are made up of –

- a) the land, water and atmosphere of the earth;
- b) micro-organisms, plant and animal life;
- c) any part or combination of i) and ii) and the interrelationships among and between them; and
- d) the physical, chemical, aesthetic and cultural properties and conditions of the foregoing that influence human health and well-being.

##### E2.4.2 Potentially hazardous substance

E2.4.3 A substance which, in the reasonable opinion of the Employer's Agent, can have a deleterious effect on the environment.

##### E2.4.4 Method Statement

A written submission by the Contractor to the Employer's Agent in response to the EM Specification or a request by the Employer's Agent, setting out the plant, materials, labour and method the Contractor proposes using to carry out an activity, in such detail that the Employer's Agent is enabled to assess whether the



Contractor's proposal is in accordance with the Scope of Work and/or will produce results in accordance with the EM Specification.

Reasonable

Unless the context indicates otherwise, means reasonable in the opinion of the Employer's Agent after he has consulted with a person suitably experienced in "environmental implementation plans" and "environmental management plans" (both as defined in the National Environmental Management Act, 107 of 1998).

E2.4.5 Solid waste

All solid waste, including construction debris, chemical waste, excess cement/ concrete, wrapping materials, timber, tins and cans, drums, wire, nails, domestic waste, dead vegetation, asphalt products, etc.

E2.4.6 Contaminated water

Water contaminated by the Contractor's activities containing cements, concrete, lime, paint products, thinners, turpentine, chemicals, fuels, oils washing detergents, etc.

E2.4.7 Working area

Any area within the boundaries of the Site where construction is taking place.

E2.4.8 Contractor's camp or construction camp

The area designated for all temporary site offices, storage areas, construction plant parking areas, staff welfare facilities, etc.

E2.4.9 Employer's Agent

The person/firm so named in the Contract Data, whose function is to administer the Contract as agent of the Employer.

E2.4.10 Employer's Agent's Representative (ER)

The natural person appointed by the Employer's Agent in terms of the Contract, who shall observe the execution of the Works, examine and test materials and workmanship, and deliver and receive communications to/from the Contractor.

E2.4.11 Environmental Officer (EO)

Appointed by the Employer's Agent as his environmental representative on Site, with the mandate to enforce compliance with the EMP. The duties of the EO are stipulated in the City's guideline document for the EO and ER.

E2.4.12 Environmental Control Officer (ECO)

An independent appointment to objectively monitor implementation of relevant environmental legislation, conditions of Environmental Authorisations (EAs), and the EMP for the project.

E2.4.13 Environmental Site Officer (ESO)

Employed by the Contractor as his environmental representative to monitor, review and verify compliance with the EMP by the Contractor. The ESO must ensure that he is involved at all phases of the construction (from site clearance to rehabilitation). The ESO shall have at minimum an NQF level 6 qualification in environmental management, environmental health or equivalent.

E2.4.14 Abbreviations

The following abbreviations occur in this EM Specification:

EMP - Environmental Management Programme  
EM Specification – Environmental Management Specification  
EO - Environmental Officer  
ECO – Environmental Control Officer  
ESO – Environmental Site Officer  
ER – Employer's Agent's Representative  
MSDS - Material Safety Data Sheets

## **E2.5 Employer's Agent's authority to delegate**

In terms of Clause 3.2.4 of the General Conditions of Contract, Third Edition, 2015 (GCC 2015), the Employer's Agent has the authority to appoint a representative. Other than the Employer's Agent's Representative (ER) in terms of Clause 3.2, this can be in the form of an Environmental Officer (EO), who shall be responsible for monitoring compliance with the EMP. All instructions given by the EO shall go through the ER, who will then convey these to the Contractor, except in the case of an environmental emergency, in which case the EO can issue an instruction directly to the Contractor. An environmental emergency is one which, in the opinion of the EO, would cause serious environmental harm if not addressed immediately.

Depending on the nature/environmental sensitivity of the Contract the following variations in the organisational structure are possible:

- a) The ER may work together with an EO; or
- b) There may be an ER only (for construction projects with low potential for causing significant environmental impacts). In this case the ER has responsibility for the EO's functions.
- c) There may be an independently appointed Environmental Control Officer (ECO) who will fulfil essentially the same functions as the EO. The ECO may work with just the ER (if there is no EO) or may work with both the ER and EO.

The term "Employer's Agent" in this EM Specification refers to the Employer's Agent as defined in Clause E2.3.9 acting through the ER/EO/ECO as delegated.

## **E3 MATERIALS**

### **E3.1 Materials handling, use and storage**

The Contractor shall ensure that any delivery drivers are informed of all procedures and restrictions (including "no go" areas) required to comply with the EM Specification. The Contractor shall ensure that these delivery drivers are supervised during off loading by someone with an adequate understanding of the requirements of the EM Specification.

Materials shall be appropriately secured to ensure safe passage between destinations. Loads, including but not limited to, sand, stone chip, fine vegetation, refuse, paper and cement, shall have appropriate cover to prevent them spilling from the vehicle during transit. The Contractor shall be responsible for any clean-up resulting from the failure by his employees or suppliers to properly secure transported materials.

All manufactured and or imported materials shall, where reasonably possible, be stored within the Contractor's camp and, if so required by the Employer's Agent, out of the rain. The location and method of protection of such materials stored outside of the Contractor's camp and the method of rehabilitation of these areas, shall be subject to the Employer's Agent's approval.

Stockpile areas shall be approved by the Employer's Agent before any stockpiling commences.

### **E3.2 Hazardous substances**

Hazardous chemical substances (as defined in the Regulations for Hazardous Chemical Substances in GN 1179 (25 August 1995)) stored on Site for use during construction shall be stored in secondary containers which are clearly and appropriately marked/signed. The relevant Material Safety Data Sheets (MSDS) shall be available on Site. Procedures detailed in the MSDSes shall be followed in the event of an emergency situation.

If potentially hazardous substances are to be stored on Site, the Contractor shall inform the Employer's Agent of such substances and provide a Method Statement detailing the substances/ materials to be used, together with the storage, handling and disposal procedures of the materials. Hazardous substances shall be stored out of flood risk areas and disposal of these substances shall be at a licensed waste disposal facility.

## **E4 PLANT (referring to "Construction Equipment" as defined in GCC 2015, and the Contractor's facilities as used in SANS 1200A)**

## **E4.1 Fuel (petrol and diesel) and oil**

### **E4.1.1 Storage**

If fuel and oil is to be stored on Site, then the Contractor shall submit a Method Statement covering the procedures for dealing with accidental hydrocarbon spillage and leaks, and detailing how these liquids will be stored, handled and disposed of.

The Employer's Agent shall approve the location of all fuel storage areas. All necessary approvals with respect to fuel storage and dispensing shall be obtained from the appropriate authorities. Symbolic safety signs depicting "**No Smoking**", "**No Naked Lights**" and "**Danger**" conforming to the requirement of SANS 1186 are to be prominently displayed in and around the fuel storage area. There shall be adequate fire-fighting equipment at the fuel storage area.

The Contractor shall ensure that all liquid fuels and oils are stored in tanks with lids, which are kept firmly shut and adequately secured. The capacity of the tank shall be clearly displayed and the product contained within the tank clearly identified using the emergency information system detailed in SANS 0232 part 1. Fuel storage tanks shall have a capacity not exceeding 9000 litres and shall be kept on site only for as long as fuel is needed for construction activities, on completion of which they shall be removed.

The tanks shall be situated on a smooth impermeable base with an earth bund. The volume inside the bund shall be 110% of the total capacity of the largest storage tank. The base may be constructed of concrete, or of plastic sheeting with impermeable joints, covered by a layer of compacted earth to protect the sheeting. The impermeable lining shall extend to the crest of the bund. The floor of the storage area shall be sloped to enable any spilled fuel and/or fuel-contaminated water to be removed easily.

If any rainwater collects in the bunded areas, it shall be promptly removed and taken off Site to a disposal site approved by the Employer's Agent.

Only empty and externally clean tanks may be stored on the bare ground. Empty and externally dirty tanks shall be sealed and stored on an area where the ground has been protected.

Adequate precautions shall be provided to prevent spillage during the filling of any tank and during the dispensing of the contents. If fuel is dispensed from 200 litre drums, the proper dispensing equipment shall be used, and the drum shall not be tipped in order to dispense fuel. The dispensing mechanism for the fuel storage tanks shall be stored in a waterproof container when not in use.

### **E4.1.2 Refuelling**

Plant shall be refuelled at a designated refuelling area approved by the Employer's Agent. The surface under the temporary refuelling area shall be protected against pollution to the reasonable satisfaction of the Employer's Agent prior to any refuelling activities. The Contractor shall ensure that there is always a supply of absorbent material (e.g. Spill Sorb or Enretech #1 powder or equivalent) readily available that is designed to absorb, break down and encapsulate minor hydrocarbon spillage. The quantity of such material shall be able to handle a minimum of 200 litres of hydrocarbon liquid spill.

### **E4.1.3 Treatment and remediation**

Treatment and remediation of hydrocarbon spill and leak areas shall be undertaken to the satisfaction of the Employer's Agent. In the event of a hydrocarbon spill the source of the spillage shall be isolated and the spillage contained.

The Contractor shall be responsible for establishing an emergency procedure for dealing with spills or release of these substances (in the form of a Method Statement). Due to the nature of the construction operation, specific consideration must be given to the fact that hydrocarbon spill remediation measures and products will need to be kept on site for response to a water based spill and/or a land based spill. The Contractor shall submit his emergency procedure to the ER prior to bringing on site any such substances.

The Contractor shall ensure that the necessary materials and equipment for dealing with spills and leaks are available on site at all times. These should include at minimum:

- Containment Booms
- Skimmers
- Sorbents
  - A combination of sorbent booms, pads, rolls and loose sorbents should be included.
- Storage Tanks and Containers

- Used to store any contaminated water.
- Bioremediation kit

The source of the spillage shall be isolated. The Contractor shall contain the spillage using such combination of sand berms, sandbags, pre-made booms, sawdust or absorbent materials as may be appropriate to the nature and extent of the spill. Treatment and remediation of the spill areas shall be undertaken to the reasonable satisfaction of the Engineer and ECO.

All spills or accidents involving such materials are to be recorded. The clean-up of spills and any damage caused by the spill shall be for the Contractor's account.

The contractor shall ensure that his employees are aware of the procedure to be followed for dealing with spills and leaks, which shall include notifying the engineer and ECO.

#### **E4.2 Ablution and toilet facilities**

Washing, whether of the person or of personal effects, defecating and urinating are strictly prohibited other than at the facilities provided.

The Contractor shall provide ablution facilities for all personnel employed on the Site, including shelter, toilets and washing facilities. The Contractor's personnel will not be permitted to use the City's ablution facilities.

Toilet facilities provided by the Contractor shall occur in a ratio of not less than 1 toilet per 30 workers (1:15 is preferred) for each sex. Toilet facilities shall be located within the Contractor's camp, but also at work areas remote from the camp, all to the satisfaction of the Employer's Agent. All portable toilets shall be adequately secured to the ground to prevent them toppling over as a result of wind or any other cause.

The Contractor shall ensure that the entrances to these toilets are adequately screened from view, that they are maintained in a hygienic state, serviced regularly, that no spillage occurs when they are cleaned and that contents are removed from Site. Toilets shall also be emptied before any temporary site closure for a period exceeding one week. Discharge of waste from toilets into the environment and burial of waste is strictly prohibited. The Contractor shall provide toilet paper at all times.

No ablution facilities shall be located closer than 50m to any water body

A Method Statement shall be provided by the Contractor detailing the provision, location, and maintenance of ablution facilities.

#### **E4.3 Eating areas**

The Contractor shall designate eating areas within the approved Contractor's camp. The feeding of, or leaving of food for, animals is strictly prohibited. Sufficient bins, as specified in Clause E4.4 below, shall be present in these areas.

Any cooking on Site shall be done on well-maintained gas cookers with fire extinguishers present. No open fires for cooking purposes shall be permitted, unless for occasional use in facilities specifically provided for this purpose and within the confines of the Contractor's camp.

#### **E4.4 Solid waste management**

##### **E4.4.1 Litter and refuse**

The site shall be kept neat and clean at all times, littering is prohibited.

No on-site burying or dumping of any waste materials, vegetation, litter or refuse shall occur. The Contractor shall provide scavenger and weatherproof bins with lids, of sufficient number and capacity to store the solid waste produced on a daily basis. The lids shall be kept firmly on the bins at all times. Bins shall not be allowed to become overfull and shall be emptied regularly, at least once a week. Waste from bins may be temporarily stored on Site in a central waste area that is weatherproof and scavenger-proof, and which the Employer's Agent has approved. Wherever possible refuse shall be recycled, and containers for glass, paper, metals and plastics shall be provided and the contents delivered to suitable recycling facilities when necessary.

All other litter and refuse shall be disposed of off Site at an approved landfill site. The Contractor shall supply the Employer's Agent with a certificate of disposal.

#### **E4.4.2    Construction waste**

Where possible all construction waste or spoil material shall be recycled, either on Site or elsewhere. As a last resort all construction waste shall be disposed of off Site at an approved landfill site. The Contractor shall supply the Employer's Agent with a certificate of disposal.

#### **E4.5        Contaminated water management**

Potential pollutants of any kind and in any form shall be kept, stored, and used in such a manner that any spill or escape can be contained and the water table and/or any adjacent water courses or bodies are not endangered. Spill kits which can be used to contain and/or mop up spills shall be available. Water containing such pollutants as cements, concrete, lime, chemicals, oils and fuels shall be discharged into a conservancy tank for removal from the Site to a licensed disposal facility. This particularly applies to water emanating from concrete batching plants and to runoff from fuel storage, refuelling or construction equipment washing areas. Wash down areas shall be placed and constructed in such a manner so as to ensure that the surrounding areas are not polluted.

No paint products, chemical additives and cleaners, such as thinners and turpentine, may be disposed of into the stormwater system or elsewhere on Site. Brush/roller wash facilities shall be established to the satisfaction of the Employer's Agent.

A Method Statement shall be provided by the Contractor detailing the management of contaminated water.

Should contaminated water be released into the environment, specifically into a water course, monitoring thereof shall commence in accordance to the National Water Act, 36 of 1998, Section 21(f) – refer to GN 399 (26 March 2004). Contaminated water must not be released into the environment without authorisation from the relevant authority.

The Contractor shall notify the Employer's Agent immediately of any pollution incidents on Site and, at his own cost, take all reasonable measures to contain and minimise the effects of the pollution

Any rehabilitation of the environment required as a result of such pollution shall be carried out by the Contractor at his own cost in accordance with a Method Statement approved by the Employer's Agent.

#### **E4.6        Site structures**

The type and colour of roofing and cladding materials to the Contractor's temporary structures shall be selected to reduce the visual impact.

#### **E4.7        Lights**

The Contractor shall ensure that any lighting installed on the Site for his activities does not cause a reasonably avoidable disturbance to other users of the surrounding area.

Lighting installed shall, as far as practically possible, be energy efficient. Lighting utilised on Site shall be turned off when not in use.

#### **E4.8        Workshop, equipment maintenance and storage**

No workshops or plant maintenance facilities shall be constructed on Site for performing major or routine maintenance of equipment and vehicles.

The Contractor shall ensure that in those areas where, after obtaining the Employer's Agent's approval, the Contractor carries out emergency or minor routine plant maintenance, there is no contamination of the soil, water sources or vegetation. Drip trays to collect waste oil and other lubricants shall be provided in any areas of the Site where such maintenance takes place. Drip trays must be emptied regularly and after rain, and the contents disposed of at a licensed disposal facility.

All vehicles and plant shall be kept in good working order. Leaking vehicles and plant shall be repaired immediately or removed from the Site.

The washing of vehicles and plant on Site shall be restricted to emergency or minor routine maintenance requirements only. Washing may only be undertaken in areas designated by the Employer's Agent.

#### **E4.9 Noise**

The Contractor shall limit noise levels (for example, by installing and maintaining silencers on plant). The provisions of SANS 1200A Clause 4.1 regarding "built-up areas" shall apply.

Appropriate directional and intensity settings are to be maintained on all hooters and sirens.

No amplified music shall be allowed on Site. The use of audio equipment shall not be permitted, unless the volume is kept sufficiently low so as to be unobtrusive. The Contractor shall not use sound amplification equipment on Site, unless in emergency situations.

Construction activities generating output levels of 85 dB(A) or more in residential areas, shall be confined to the hours 08h00 to 17h00 Mondays to Fridays. Should the Contractor need to do this work outside of the above times, he shall do so only with the approval of the Employer's Agent, and the surrounding communities shall be informed prior to the work taking place.

### **E5 CONSTRUCTION**

#### **E5.1 Method Statements**

The Contractor shall submit the environmental method statements required within such reasonable time as the Employer's Agent shall specify or as required by the EM Specification. The Contractor shall not commence any activity until the Method Statement in respect thereof has been approved and shall, except in the case of emergency activities, allow a period of two weeks for consideration of the Method Statement by the Employer's Agent.

The Employer's Agent may require changes to a Method Statement if the proposal does not comply with the specification or if, in the reasonable opinion of the Employer's Agent, the proposal may result in, or carries a greater than reasonable risk of, damage to the environment in excess of that permitted by the EM Specification.

**E5.2** Approved Method Statements shall be readily available on the Site and shall be communicated to all relevant personnel. The Contractor shall carry out the Works in accordance with the approved Method Statement. Approval of the Method Statement shall not absolve the Contractor from any of his obligations or responsibilities in terms of the Contract.

Changes to the way the Works are to be carried out must be reflected by amendments to the original approved Method Statements, and these amendments require the signature of both the Contractor and the Employer's Agent.

Method Statements shall consider all environmental hazards and risks identified by the Contractor and/or Employer's Agent and shall contain sufficient information and detail to enable the Employer's Agent to assess the potential negative environmental impacts associated with the proposed activity and shall cover applicable details with regard to:

- a) construction procedures,
- b) materials and equipment to be used,
- c) getting the equipment to and from Site,
- d) how the equipment/material will be moved while on Site,
- e) how and where material will be stored,
- f) the containment (or action to be taken if containment is not possible) of leaks or spills of any liquid or material that may occur,
- g) the control of fire,
- h) timing and location of activities,
- i) compliance/non-compliance with the EM Specification,
- j) any other information deemed necessary by the Employer's Agent.

The format to be used for the required method statements is bound in Annexure A of this EM Specification. The Contractor (and, where relevant, any sub-contractors) must also sign the Method Statement, thereby indicating that the work will be carried out according to the methodology contained in the approved Method Statement.

##### **E5.1.1 Method Statements to be provided within 14 days from the Commencement Date**

- a) Layout and Preparation of Contractor's Camp (E5.4).
- b) Ablution Facilities: number of, location, cleaning, method of securing to the ground, etc. of portable toilets (E4.2).

- c) Solid Waste Management: number of, type, location, cleaning, method of securing to the ground, etc. of bins (E4.4).
- d) Environmental Awareness Training: logistics for the environmental awareness courses for all the Contractor's management staff, as well as other employees (E5.2).
- e) Emergency Procedures for Accidental Hydrocarbon Leaks and Spillages (E4.1 and E5.8).
- f) Asphalt and Bitumen: details of all methods and logistics associated with the use of bitumen and asphalt (E5.11).
- g) Contaminated water management (E4.5).
- h) Storage and use (refuelling etc.) of hazardous materials (E4.1).
- i) Installation and removal of all infrastructure needed for construction in waterways.
- j) Dewatering and subsequent drainage/handling of water/sediment as a result of dewatering.
- k) Diverting of flows to accommodate construction in watercourses, and subsequent rehabilitation.
- l) Control of access for hippopotamus

## **E5.2 Environmental Awareness Training**

It is a requirement of this Contract that environmental awareness training courses are run for all personnel on Site. Two types of courses shall be run: one for the Contractor's and subcontractors' management, and one for all site staff and labourers. Courses shall be run during normal working hours at a suitable venue provided by the Contractor. All attendees shall remain for the duration of the course and sign an attendance register that clearly indicates participants' names on completion, a copy of which shall be handed to the Employer's Agent. The Contractor shall allow for sufficient sessions to train all personnel. Subsequent sessions shall be run for any new personnel coming onto Site. A Method Statement with respect to the organisation of these courses shall be submitted.

Notwithstanding the specific provisions of this clause, it is incumbent upon the Contractor to convey the spirit of the EM Specification to all personnel involved with the Works.

### **E5.2.1 Training Course for Management and Foremen**

The environmental awareness training course for management shall include all management and foremen. The course, which shall be presented by the Employer's Agent or his designated representative, shall be of approximately one hour duration. The course shall be undertaken prior to the commencement of work on Site.

### **E5.2.2 Training Course for Site Staff and Labour**

The environmental awareness training course for site staff and labour shall be presented by the Contractor from material provided by the Employer's Agent. The course shall be approximately one hour long. The course shall be undertaken not later than 3 working days after the commencement of work on Site, with sufficient sessions to accommodate all available personnel.

All the Contractor's employees, sub-contractors' employees and any suppliers' employees that spend more than 1 day a week or four days in a month on Site shall attend the Environmental Awareness Training Course for Site Staff and Labour

## **E5.3 Contractor's Environmental Representative (ESO)**

The Contractor shall appoint an environmental representative, also called an Environmental Site Officer (ESO), who shall be responsible for undertaking a daily site inspection to monitor compliance with this EM Specification. The Contractor shall forward the name of the environmental representative (ESO) to the Employer's Agent for his approval. The environmental representative (ESO) shall complete Environmental Site Inspection Checklists (Annexure B attached hereto) and these shall be submitted to the Employer's Agent once a week.

## **E5.4 Site division, demarcation and "no go" areas**

The Contractor shall restrict all his activities, materials, plant and personnel to within the Site or any particular working areas specified or indicated on the drawings.

The Contractor shall erect and maintain permanent and/or temporary fences of the type and in the locations specified

elsewhere in the Scope of Work or on the drawings. Such fences shall, if so specified, be erected before undertaking any construction activities.

Where environmentally sensitive areas are specified as “no go” areas, the Contractor shall ensure that, insofar as he has the authority, no person, plant or material shall enter the “no go” areas at any time.

A Method Statement detailing the layout and method of establishment of the Contractor’s camp (including all offices, shelters, eating areas, storage areas, ablution facilities and other infrastructure required for the running of the project) shall be provided.

No-go areas shall be demarcated by the Contractor directed by the Employer’s Agent prior to commencing construction (using appropriate fencing or other markers such as buoys for no-go areas in the water).

Special care must be taken to prevent the passage of hippopotamus into the Site or other areas not currently designated for their use.

#### **E5.5 Access routes/ haul roads**

On the Site and, if so required, within such distance of the Site as may be stated by the Employer’s Agent, the Contractor shall control the movement of all vehicles and construction equipment, including that of his suppliers, so that they remain on designated routes, are distributed so as not to cause an undue concentration of traffic, and that all relevant laws are complied with. In addition, the movement of such vehicles and construction equipment shall be planned and operated so as to minimise disruption to regular users of the routes. As far as possible the Contractor shall use existing access and haul routes. Damage to existing access roads as a result of construction activities shall be repaired to the satisfaction of the Employer’s Agent, using material similar to that originally used. The cost of the repairs shall be borne by the Contractor. New temporary access or haul routes may only be established with the prior approval of the Employer’s Agent. The rehabilitation of such routes shall be to the Contractor’s own cost and to the approval of the Employer’s Agent.

Any directional signage required by the Contractor for the purposes of directing the movement of his own vehicles and construction equipment (or that of his subcontractors or suppliers) must be of a design and in a location approved by the Employer’s Agent. Directional signage may not be erected in such a manner that it interferes with sight lines or pedestrian movement.

#### **E5.6 Construction personnel information posters**

The Contractor shall erect and maintain information posters for the information of his employees, depicting actions to be taken to ensure compliance with aspects of the EM Specification. A2 information posters, printed on white vinyl, shall be erected at the eating areas and any other locations specified by the Employer’s Agent.

The specification for the poster is presented in Annexure C of this EM Specification. The symbols shall be black and the circles shall be red lines. The Contractor shall ensure that the construction personnel information posters are not damaged in any way, and shall replace a poster if any part of it becomes illegible.

#### **E5.7 Fire control**

Other than for cooking purposes as specified in Clause E4.3, no fires may be lit on Site. Any fires which occur shall be reported to the Employer’s Agent immediately.

Smoking shall not be permitted in those areas where it is a fire hazard. Such areas shall include fuel storage and refuelling areas, and any other areas where the vegetation or other materials are susceptible to the start and rapid spread of fire.

In terms of the National Environment Management: Air Quality Act, 39 of 2004 and Community Fire Safety By-law, burning is not permitted as a disposal method.

The Contractor shall appoint a Fire Officer (who may be the ESO) who shall be responsible for ensuring immediate and appropriate actions in the event of a fire and shall ensure that employees are aware of the procedure to be followed. The Contractor shall advise the relevant authority of a fire as soon as one starts and shall not wait until he can no longer control it. The Contractor shall forward the name of the Fire Officer to the Employer’s Agent for his approval.

The Contractor shall comply with Clause 27 of the Construction Regulations, 2014 where applicable, and shall ensure that there is suitable and sufficient fire-fighting equipment available on Site at all times.

The Contractor shall be liable for any costs relating to the rehabilitation of burnt areas, should the fire be the result of the Contractor’s activities on Site

The Contractor shall submit a Method Statement to the Employer’s Agent covering the procedure to be followed in the event of a fire.



#### **E5.8 Emergency procedures**

The Contractor's attention is drawn to the Method Statements required in terms of Clauses E4.1 and E5.7 above. Such Method Statements shall include procedures to be followed by the Contractor in the event of an emergency.

Furthermore, in the event of an emergency the Contractor shall contact the City of Cape Town's Emergency Call Centre by telephoning 107 or 021 480 7700 (from a cell phone). Telephone numbers of emergency services, including the local fire fighting service, shall be posted conspicuously in the Contractor's office near the telephone.

#### **E5.9 Health and safety**

The Contractor shall comply with requirements of the Occupational Health and Safety Act, 85 of 1993 and Construction Regulations, 2014, the Health and Safety Specification and relevant clauses of GCC 2015, insofar as health and safety is concerned.

#### **E5.10 Community relations**

If so required, the Contractor shall erect and maintain information boards in the position, quantity, design and dimensions specified in the Scope of Work or as directed by the Employer's Agent. Such boards shall include contact details for complaints by members of the public in accordance with details provided by the Employer's Agent.

The Contractor shall keep a "Complaints Register" on Site. The Register shall contain all contact details of the person who made the complaint, and information regarding the complaint itself.

#### **E5.11 General protections in terms of the National Heritage Resources Act, 25 of 1999**

The Contractor shall take cognisance of the provisions of the National Heritage Resources Act, 25 of 1999 in respect of, *inter alia*, structures older than 60 years; archaeology, palaeontology and meteorites; burial grounds and graves; and public monuments and memorials.

#### **E5.12 Protection of natural features**

The Contractor shall not deface, paint, damage or mark any natural features (e.g. rock formations) situated in or around the Site for survey or other purposes, unless agreed beforehand with the Employer's Agent. Any features affected by the Contractor in contravention of this clause shall be restored/ rehabilitated to the satisfaction of the Employer's Agent. The cost of restoration/rehabilitation shall be borne by the Contractor.

The Contractor shall not permit his employees to make use of any natural water sources (e.g. springs, streams, open water bodies) for the purposes of swimming, personal washing and the washing of machinery or clothes.

#### **E5.13 Protection of flora and fauna**

Except to the extent necessary for the carrying out of the Works, as specified by the Employer's Agent, no vegetation shall be removed, damaged or disturbed.

The presence of any wild animals found on Site shall be reported to the Employer's Agent, who shall issue an instruction with regard to their removal or relocation. If a wild animal needs removal from the Site the Cape Nature (Metro Region) Conservation Services Manager may be contacted for assistance (tel 021 955 9132/9121/3122/9130). Trapping poisoning, injuring or shooting animals is strictly forbidden. No domestic pets or livestock are permitted on Site, with the exception of controlled watchdogs approved by the Employer's Agent.

Where the use of herbicides, pesticides and other poisonous substances has been specified, the Contractor shall submit a Method Statement to the Employer's Agent for approval.

#### **E5.14 Erosion and sedimentation control**

The Contractor shall take all reasonable measures to limit erosion and sedimentation due to the construction activities and shall, in addition, comply with such detailed measures as may be required by the Scope of Work. Where erosion and/or sedimentation, whether on or off the Site, occurs, rectification shall be carried out in accordance with details specified by the Employer's Agent. Where erosion and/or sedimentation occur due to the fault of the Contractor, rectification shall be carried out to the reasonable requirements of the Employer's Agent, at the Contractor's cost. In particular, the Contractor shall ensure that the City's stormwater system is kept free from sediment arising from the Works.

Any runnels or erosion channels developed during the construction period or during the vegetation establishment period shall be backfilled and compacted, and the areas restored to a proper condition. Stabilisation of cleared areas to prevent and control erosion shall be pro-actively managed by the Contractor. The method of stabilisation shall be determined in consultation with the Employer's Agent.

#### **E5.15 Aesthetics**

The Contractor shall take any requisite measures to ensure that construction activities do not have an undue negative impact on the aesthetics of the area.

#### **E5.16 Temporary site closure**

In the event of temporary site closure (for a period exceeding one week), the Contractor's ESO shall carry out checks and ensure that, amongst others, the following conditions pertain and report on compliance with this clause:

- a) Fire extinguishers are serviced and accessible.
- b) There is adequate ventilation in enclosed spaces.
- c) All hazardous substance stores are securely locked.
- d) Fencing and barriers are in place.
- e) Emergency and management contact details are prominently displayed and available.
- f) Wind and dust mitigation measures, e.g. straw, brush packs, irrigation, etc. are in place.
- g) Excavated and filled slopes and stockpiles are at a stable angle and capable of accommodating normal expected water flows.
- h) There are sufficient detention ponds or channels in place.
- i) Cement and materials stores are secured.
- j) Toilets are empty and secured.
- k) Central waste area and all refuse bins are empty and secured.
- l) Contaminated water conservancy tank empty.
  
- m) Any bunded areas are clean and treated with an approved product where applicable (e.g. Spill Sorb or Enretech #1 powder or equivalent).
- n) Drip trays are empty and secure

#### **E5.17 Asphalt and bitumen**

Bitumen drums/products, if stored on Site, shall be stored in an area approved by the Employer's Agent. This area shall be indicated on the Method Statement for the Layout and Preparation of the Contractor's Camp. The storage area shall be constructed with an appropriate base, bunding and sump to the satisfaction of the Employer's Agent. A Method Statement shall be provided in this regard.

When heating bitumen products, the Contractor shall take cognisance of appropriate fire risk controls. Heating shall only be undertaken using LPG or similar zero emission fuels. Appropriate fire fighting equipment shall be readily available on Site.

#### **E5.18 Dust**

The Contractors shall be solely responsible, at his cost, for the control of dust arising from his activities on Site, and for any costs involved in damages resulting from the dust. The Contractor shall take all reasonable measures to minimise the generation of dust

#### **E5.19 Contractor's advertising signage**

Any advertising on the Site or any part of the Works shall remain at the sole discretion of the Employer, who reserves the right to order, via the Employer's Agent, its removal, covering or re-sizing, wherever placed, at no cost to the Employer.

Apart from at the Contractor's camp, no signage advertising the Contractor, or any of its subcontractors, manufacturers, suppliers or service providers shall be placed, fixed or erected anywhere on the Site or on the Works without the prior approval of the Employer's Agent. No advertising signage will be permitted on any designated scenic route. Notwithstanding any prior approval given, the Employer's Agent may instruct the Contractor to remove, cover or re-size any advertising signage at any time at no cost to the Employer.

Advertising signage at the Contractor's camp shall be appropriately designed and sized with due consideration to the surrounding environment, views and sight lines.

Branding or identification markings on the Contractor's and subcontractor's vehicles and equipment is generally permitted, although the Employer reserves the right to instruct, via the Employer's Agent, the removal, covering or re-sizing of any branding, markings or signage, on any equipment (scaffolding, for example), which it considers inappropriate in the environment in which it is placed.

No third party advertising (that is, in respect of any person, business or product that is not associated with the Works) shall be permitted anywhere on the Site or Works.

## **E5.20 Clearance of Site on completion**

On completion of the Works, and at final completion when all defects have been remedied or corrected, the Contractor shall, in addition to the requirements for clearance of the Site in terms of the Contract, ensure that he has complied with the following requirements in terms of this EM Specification:

### **E5.20.1 Clause E3.1**

Clean-up of improperly secured transported materials, and rehabilitation of storage areas.

### **E5.20.2 Clause E4.1.3**

Remediation of hydrocarbon spill and leak areas.

### **E5.20.3 Clause E4.4**

Disposal of litter, refuse and Contractor's waste.

### **E5.20.4 Clause E5.4**

Removal of temporary fences and Contractor's camp.

### **E5.20.5 Clause E5.5**

Repair of access roads damaged by the Contractor, and rehabilitation of temporary access routes.

### **E5.20.6 Clause E5.7**

Rehabilitation of burnt areas should a fire be the result of Contractor's activities on Site.

### **E5.20.7 Clauses E5.11 to 5.13**

Rehabilitation of heritage and natural features, including vegetation which is damaged or disturbed, which required protection in terms of these clauses.

### **E5.20.8 Clause E5.14**

Rectification where erosion and/or sedimentation has occurred due to the fault of the Contractor .

### **E5.20.9 Clause E5.19**

Removal of Contractor's advertising signage.

## **E6 TOLERANCES**

### **E6.1 Fines**

Environmental management is concerned not only with the final results of the Contractor's operations, but also with the control of how these operations are carried out. Tolerance with respect to environmental matters applies not only to the finished product, but also to the standard of the day-to-day operations required to complete the Works.

It is thus required that the Contractor shall comply with the EM Specification on an on-going basis and any failure on his part to do so will entitle the Employer's Agent to certify the imposition of a fine. Fines may be issued per incident at the discretion of the Employer's Agent. Such fines will be issued in addition to any remedial costs incurred as a result of non-compliance with the environmental specifications. The Employer's Agent will inform the Contractor of the contravention and the amount of the fine, and will deduct the amount from monies due in payment certificates issued under the Contract.

Maximum fines for the following transgressions by either the Contractor and/or his sub-contractors may be imposed by the Employer's Agent, as follows:

	Maximum fine per incident
a) Vehicles, plant or materials related to the Contractor's operations, parked or stored outside the demarcated boundaries of the Site.	R 2 000
b) Persons, vehicles, plant or materials related to the Contractor's operations, found within the designated boundaries of a "no go" area.	R 4 000
c) Persistent and unrepaired oil leaks from machinery/not using a drip tray to collect waste oil and other lubricants/not using specified absorbent material to encapsulate hydrocarbon spillage/using inappropriate methods of refuelling (the use of a funnel rather than a pump).	R 3 000
d) Refuelling in areas not approved by the Employer's Agent.	R 3 000
e) Litter on Site.	R 1 000
f) Deliberate lighting of fires on Site.	R 5 000
g) Individual not making use of the Site ablution facilities.	R 1 000
h) Damage to trees not specified to be removed.	R 5 000
i) Dust or excessive noise emanating from the site	R 1 000
j) Not containing water contaminated with pollutants such as cement, concrete, fuel, etc.	R 2 000

For each subsequent similar offence the fine shall be doubled in value to a maximum value of R50 000.

## **E7 TESTING**

Not applicable to this tender.

## **E8 MEASUREMENT AND PAYMENT**

### **E8.1 Basic principles**

Except where separate pay items have been measured in the Bills of Quantities, all costs in respect of complying with the EM Specification are deemed to be covered by the sum tendered for complying with the EM Specification.

**ANNEXURE A: ENVIRONMENTAL METHOD STATEMENT**

**CONTRACT:**..... **DATE:**.....

**PROPOSED ACTIVITY** (give title of method statement and reference number from the EMP):

**WHAT WORK IS TO BE UNDERTAKEN** (give a brief description of the works - attach extra information to ensure accurate description given):

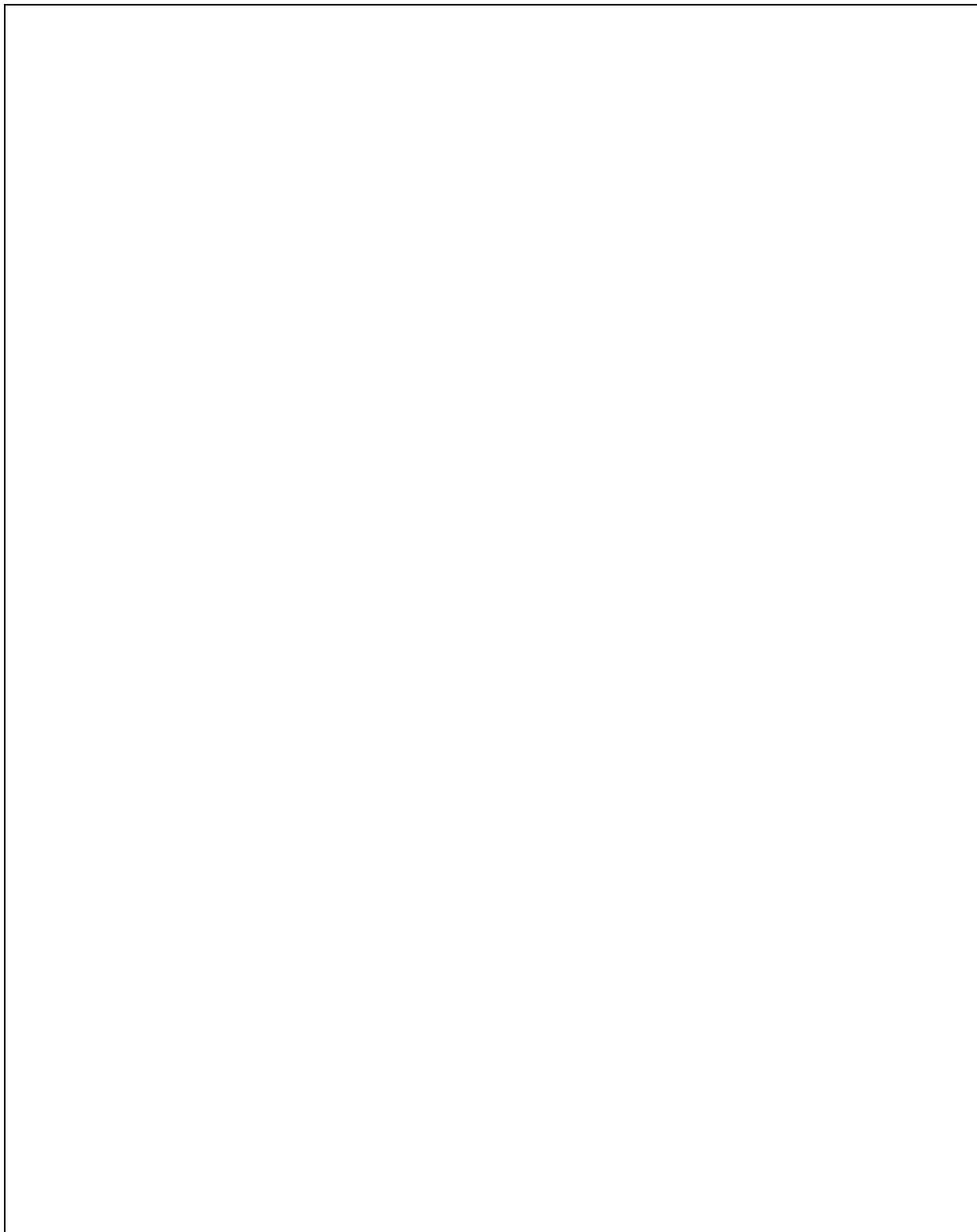
**WHERE THE WORKS ARE TO BE UNDERTAKEN** (where possible, provide an annotated plan and a full description of the extent of the works):

**START AND END DATE OF THE WORKS FOR WHICH THE METHOD STATEMENT IS REQUIRED:**

Start Date:

End Date:

**HOW THE WORKS ARE TO BE UNDERTAKEN** (provide as much detail as possible, including annotated sketches and plans where possible):



Note: please give too much information rather than too little. Please ensure that issues such as emergency procedures, hydrocarbon management, wastewater management, access, individual responsibilities, materials, plant used, maintenance of plant, protection of natural features, etc. are covered where relevant

## **DECLARATIONS**

### **1) EMPLOYER'S AGENT'S REPRESENTATIVE/ENVIRONMENTAL OFFICER/ENVIRONMENTAL CONTROL OFFICER**

The work described in this Method Statement, if carried out according to the methodology described, appears to be satisfactorily mitigated to prevent avoidable environmental harm:

\_\_\_\_\_  
(signed)

\_\_\_\_\_  
(print name)

Dated: \_\_\_\_\_

### **2) CONTRACTOR**

I understand the contents of this Method Statement and the scope of the works required of me. I further understand that this Method Statement may be amended on application to other signatories and that the Employer's Agent's Representative/Environmental Officer/Environmental Control Officer will audit my compliance with the contents of this Method Statement. I understand that this method statement does not absolve me from any of my obligations or responsibilities in terms of the Contract.

\_\_\_\_\_  
(signed)

\_\_\_\_\_  
(print name)

Dated: \_\_\_\_\_

### **3) EMPLOYER'S**

**AGENT**

The works described in this Method Statement are approved.

\_\_\_\_\_  
(signed)

\_\_\_\_\_  
(print name)

\_\_\_\_\_  
(designation)

Dated: \_\_\_\_\_

**ANNEXURE B: ENVIRONMENTAL SITE INSPECTION CHECKLIST**  
TO BE SUBMITTED TO THE EMPLOYER'S AGENT ONCE A WEEK

**CONTRACT:**.....

**DATE:**.....
















ENVIRONMENTAL ASPECT	YES/ NO (✓ or X)	COMMENTS
• All new personnel on Site are aware of the contents of the EMP and have been through the environmental awareness course.		
• Contractor's camp is neat and tidy and the labourers' facilities are of an acceptable standard.		
• Sufficient and appropriate fire fighting equipment is visible and readily available in the appropriate places.		
• Waste control and removal system is being maintained.		
• Fences are being maintained.		
• Drip trays are being utilised where there is a risk of spillage.		
• Bunded areas/drip trays are being emptied on a regular basis (especially after rain).		
• No leaks are visible from construction vehicles.		
• Refuelling of vehicles and plant occurs within designated areas, and appropriate refuelling apparatus and drip trays are being used.		
• "No go" areas, natural features, vegetation, etc. have not been damaged.		
• Dust control measures (if necessary) are in place and are effectively controlling dust.		
• Noise control measures (if necessary) are in place and are working effectively.		
• Erosion and sedimentation control measures (if necessary) are in place and are controlling effectively.		
• Material stockpiles are located within the boundary of the Site and are protected from erosion.		
• Other		

Completed by:.....

Signed:.....



## ANNEXURE C: CONSTRUCTION PERSONNEL INFORMATION POSTER

ENVIRONMENTAL MANAGEMENT DO'S AND DON'TS			
	Workers & equipment must stay inside the site boundaries at all times		Use the toilets provided Report full or leaking toilets
	Do not swim in or drink from streams Do not throw oil, petrol, diesel, concrete or rubbish in the stream Do not work in the stream without direct instruction Do not damage the banks or vegetation of the stream		Only eat in demarcated eating areas Never eat near a river or stream Put packaging & leftover food into rubbish bins
	Protect animals on the site Ask your supervisor or Contract's Manager to remove animals found on site		Do not litter - put all rubbish (especially cement bags) into the bins provided Report full bins to your supervisor The responsible person should empty bins regularly
	Do not damage or cut down any trees or plants without permission Do not pick flowers		Always keep to the speed limit Drivers - check & report leaks Ensure loads are secure & do not spill
	Put cigarette butts in a rubbish bin Do not smoke near gas, paints or petrol Do not light any fires without permission Know the positions of fire fighting equipment Report all fires Do not burn rubbish or vegetation without permission		Know all the emergency phone numbers
	Work with petrol, oil & diesel in areas marked for this Report any petrol, oil & diesel leaks or spills Use a drip tray under vehicles & machinery Empty drip trays after rain & do not throw this water into a river		Fines of between R1000 and R5000 Removal from site Construction may be stopped
	Try to avoid producing dust - wet dry ground & soil		Report any breaks, floods, fires, leaks and injuries to your supervisor Ask questions!
	Do not make loud noises around the site, especially near schools and homes Report or repair noisy vehicles		

## **ANNEXURE D: ADDITIONAL ENVIRONMENTAL ISSUES DEEMED TO FORM PART OF THE ENVIRONMENTAL MANAGEMENT PROGRAMME**

Listed below are issues pertaining to the environment that form part of the Contract Document. The clause references relate to the **General Conditions of Contract for Construction Works, Third Edition, 2015 (GCC 2015)**. They are listed here to emphasise that they form part of the environmental considerations and requirements for this project. They must be read together with any Contract Specific Data referring thereto in Part C1.2 Contract Data. The comments made below on the various issues are to be taken as explanatory, in so far as environmental matters are concerned, and do not modify the clauses in any way.

### **1. Monitoring**

Clause 3.1.1 makes provision for the Employer's Agent to administer the Contract in accordance with the provisions of the Contract, including the monitoring of any environmental variables.

### **2. Health and safety**

Clauses 3.1.4, 4.3.1, 4.3.2 and 4.10.1 remind the Contractor of his obligations in terms of the Occupational Health and Safety Act (No. 85 of 1993) and Construction Regulations 2014.

Clause 5.7 of SANS 1200A reinforces these requirements through the observation of proper and adequate safety arrangements.

### **3. Employer's Agent's authority to delegate**

Clause 3.2.4 gives the Employer's Agent the authority to appoint a representative to act as the Environmental Officer (EO) for the Contract. The EO, who shall be responsible for monitoring compliance with the EMP, may be the Employer's Agent's Representative or any other person accountable to the Employer's Agent.

### **4. Employer's Agent's instructions**

Clause 4.2.1 requires that the Contractor comply with the Employer's Agent's instructions on any matter relating to the Works. Moreover, Clause 4.2.2 ensures that the Contractor only takes instructions from the Employer's Agent, the Employer's Agent's Representative or a person authorised by the Employer's Agent in terms of Clause 3.2.4.

### **5. Compliance with applicable laws**

Clause 4.3.1 requires that the Contractor comply with all applicable laws, regulations, etc. in fulfilling the Contract.

### **6. Protection of fossils, etc.**

Clause 4.7.1 requires the Contractor to take reasonable precautions to prevent any person from damaging, *inter alia* anything of geological or archaeological interest, and requires that he inform the Employer's Agent and follows any instructions issued in this regard.

### **7. Housing, food and transport**

Clause 4.10.1 requires the Contractor to make his own arrangements for payment, housing, feeding and transport for his employees, provided that if he uses any part of the Site for such purposes he shall obtain the Employer's Agent's prior approval.

Clause 4.2 of SANS 1200A further requires that facilities provided comply with local authority regulations and are maintained in a clean and sanitary condition.

### **8. Competent employees**

Clause 4.11.1 requires that all persons employed on Site are careful, competent, and efficient. These attributes embrace knowledge of the environmental matters and issues dealt with in the EMP.

### **9. Removal from Site**

Clause 4.11.2 makes provision for the Employer's Agent to instruct the removal from the Works and Site of any person who is guilty of misconduct, or is incompetent or negligent, or is an undesirable presence on Site.

Clause 7.1.1 requires that all Construction Equipment be in good working order. Accordingly, the Employer's Agent may order that any Construction Equipment not complying with the environmental specifications be removed from Site.

#### **10. Unacceptable documentation**

Clauses 5.3.1 and 5.3.2 require the Contractor to provide documentation required before commencement with Works execution, failing which the Employer may terminate the Contract. Such documentation includes the Protection of the Environment Declaration provided for in the Contract Document.

#### **11. Programme and Method Statements**

Clause 5.6.1 makes provision for the Employer's Agent to request the programmes for carrying out the Works.

Clause 5.6.2 makes provision for the Employer's Agent to request statements from the Contractor for the entire scope of the work. In the case of the environmental specifications, these would be submitted as Method Statements.

#### **12. Hours of operation**

Clause 5.8.1 restricts the Contractor's hours of operation to between sunrise and sunset on working days (usually from Monday to Saturday), unless, *inter alia*, permitted by the Employer's Agent in writing.

Clause 5.7.2 further requires that in the event that permission is granted for night work, then such work shall be carried out without excessive noise and disturbance.

#### **13. Suspension of Works**

Clause 5.11.1 enables the Employer's Agent to suspend the progress of the Works or any part thereof, which may be as a result of some default or breach of the Contract on the part of the Contractor.

#### **14. Site clean-up**

Clause 5.15.1 requires that, on completion of the Works, the Contractor shall clear away and remove from the Site all Construction Equipment, surplus materials, rubbish and Temporary Works of every kind and leave the whole of the Site and Works clean and in a safe condition. All streams and watercourses shall be restored to the condition as at the commencement of the Works. Should the Contractor fail to do the work upon notice from the Employer's Agent, the Employer may in terms of Clause 7.8.3, employ others to carry out the work and recover the cost of doing so from the Contractor.

#### **15. Access to the Works**

Clause 7.3.1 makes provision for the Employer's Agent to authorise the Environmental Officer (EO) to have access to the Works and Site.

#### **16. Pollution prevention and interferences**

Clause 8.1.2 requires that all operations necessary for the execution of the Works be carried out so as not to cause unnecessary noise or pollution, or to interfere unnecessarily or improperly with public services, or the access to, use and occupation of public or private roads and footpaths or properties.

Clause 5.6 of SANS 1200A further requires the Contractor to minimise dust nuisance and pollution of streams and inconvenience to or interference with the public.

#### **17. Dust**

Clause 8.1.2 requires that all operations necessary for the execution of the Works be carried out so as not to cause unnecessary pollution.

Clause 5.6 of SANS 1200A requires that the Contractor take all reasonable measures to minimise any dust nuisance.

## **18. Noise**

Clause 8.1.2 requires that all operations necessary for the execution of the Works be carried out so as not to cause unnecessary noise.

Clause 4.1 of SANS 1200A requires that when working in built-up areas, the Contractor shall provide and use suitable and effective silencing devices for pneumatic tools and other plant that would otherwise cause a noise level exceeding 85dB.

## **19. Protection of existing environment**

Clause 8.1.3 requires that the Contractor uses every reasonable means to prevent any roads or bridges to or in the vicinity of the Site being subjected to damage by excessive loads, or disruption due to excessive traffic, occasioned by his transport arrangements.

## **20. Reinstatement**

Clauses 8.2 and 8.4 make provision for the Contractor to repair and make good any damage to the Works in his care (other than "excepted risks"), and bear any costs associated with such reinstatement.

## **21. Reporting accidents**

Clause 8.5.1 requires the Contractor to report to the Employer's Agent every occurrence on the Site which causes environmental damage.

## H: HEALTH AND SAFETY SPECIFICATION

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## 1. **INTRODUCTION AND BACKGROUND**

### 1.1 **Background to The Health and Safety Specification**

The Construction Regulations (February 2014) place the onus on the Client to prepare a preconstruction Health and Safety specification, highlighting all risks not successfully eliminated during design setting standards for Health and Safety during construction phase. The Health and Safety Specification will be based on the findings of the Baseline Risk Assessment.

### 1.2 **Purpose of The Health and Safety Specification**

To assist in achieving compliance with the Occupational Health and Safety Act 85/1993 and the promulgated Construction Regulations (February 2014) to reduce incidents and injuries. This specification shall act as the basis for the drafting of the construction phase Health and Safety plan by the Principal Contractor.

The specification sets out the requirements to be followed by the Principal Contractor and their Contractors so that the Health and Safety of all persons potentially at risk may receive the same priority as other facets of the project e.g. Cost, programme, environment, quality etc.

## 2. **DEFINITIONS**

Agent	means a competent person who acts as a representative for a client.
Angle Of Repose	means the steepest angle of a surface at which a mass of loose or fragmented material will remain stationary in a pile on the surface, rather than sliding or crumbling away.
Bulk Mixing Plant	means machinery, appliances or other similar devices that are assembled in such a manner so as to be able to mix materials in bulk for the purposes of using the mixed product for construction work.
Client	As stated in the contractual agreement
Competent Person	means a person who- (a) has in respect of the work or task to be performed the required knowledge, training, and experience and, where applicable, qualifications, specific to that work or task: Provided that where appropriate qualifications and training are registered in terms of the provisions of the National Qualification Framework Act, 2000 (Act No.67 of 2000), those qualifications and that training must be regarded as the required qualifications and training. and (b) is familiar with the Act and with the applicable regulations made under the Act.
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 the management of the physical construction processes and the coordination, administration, and management of resources on a construction site.
Construction Vehicle	means a vehicle used as a means of conveyance for transporting persons or material, or persons and material, on and off the construction site for the purposes of performing construction work.
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 c) Page 7 of 79 d) 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.
Demolition Work	means a method to dismantle, wreck, break, pull down or knock down of a structure or part thereof by way of manual labour, machinery, or the use of explosives.
Design	in relation to any structure, includes drawings, calculations, design details and specifications.
Designer	means- a) a competent person who- I. prepares a design. II. checks and approves a design.

	<p>III. 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</p> <p>IV. designs temporary work, including its components.</p> <p>b) an architect or engineer contributing to or having overall responsibility for a design.</p> <p>c) a building services engineer designing details for fixed plant.</p> <p>d) a surveyor specifying articles or drawing up specifications.</p> <p>e) a Contractor carrying out design work as part of a design and building project. or</p> <p>an interior designer, shopfitter, or landscape architect.</p>
Excavation Work	means the making of any man-made cavity, trench, pit, or depression formed by cutting, digging, or scooping.
Explosive Actuated Fastening Device	means a tool that is activated by an explosive charge and that is used for driving bolts, nails, and similar objects for the purpose of providing fixing.
Fall Arrest Equipment	means equipment used to arrest a person in a fall, including personal equipment, a body harness, lanyards, deceleration devices, lifelines, or similar equipment.
Fall Prevention Equipment	means equipment used to prevent persons from falling from a fall risk position, including personal equipment, a body harness, lanyards, lifelines, or physical equipment such as guardrails, screens, barricades, anchorages, or similar equipment.
Fall Protection Plan	means a documented plan, which includes and provides for- a) all risks relating to working from a fall risk position, considering the nature of work undertaken. b) the procedures and methods to be applied in order to eliminate the risk of falling. and a rescue plan and procedures.
Fall Risk	means any potential exposure to falling either from, off or into.
Health And Safety File	means a file, or other record containing the information in writing required by these Regulations.
Health And Safety Plan	means a site, activity, or project specific documented plan in accordance with the client's H&S specification.
Health And Safety Specification	means a site, activity or project specific document prepared by the client pertaining to all health and safety. Page 8 of 79 requirements related to construction work.
Material Hoist	means a hoist used to lower or raise material and equipment, excluding passengers.
Medical Certificate of Fitness	means a certificate contemplated in CR 7(8).
Mobile Plant	means any machinery, appliance or other similar device that can move independently and is used for the purpose of performing construction work on a construction site.
Principal Contractor	means an employer appointed by the client to perform construction work, used interchangeably with the term "Principal Contractor".
"Professional Construction Health and Safety Agent	means a person holding registration as a Professional Construction Health and Safety Agent in terms of the Project and Construction Management Act (Act No. 48 of 2000).
"Professional Engineer or Professional Certificated Engineer	means a person holding registration as either a Professional Engineer or Professional Certificated Engineer in terms of the Engineering Profession Act, 2000 (Act No. 46 of 2000).
Professional Technologist	means a person holding registration as a Professional Engineering Technologist in terms of the Engineering Profession Act, 2000.
Scaffold	means a temporary elevated platform and supporting structure used for providing access to and supporting workmen or materials or both.
Shoring	means a system used to support the sides of an excavation and which is intended to prevent the cave-in or the collapse of the sides of an excavation.
Structure	means- a. any building, steel, or reinforced concrete structure (not being a building), railway line or siding, bridge, waterworks, reservoir, pipe or pipeline, cable, sewer, sewage works, fixed vessels, road, drainage works, earthworks, dam, wall, mast, tower, tower crane, bulk mixing plant, pylon, surface and underground tanks, earth



	retaining structure, or any structure designed to preserve or alter any natural feature, and any other similar structure. b. any falsework, scaffold or other structure designed or used to provide support or means of access during construction work. or any fixed plant in respect of construction work which includes installation, commissioning, decommissioning, or dismantling and where any construction work involves a risk of a person falling.
Suspended Platform	a working platform suspended from supports by means of one or more separate ropes from each support.
Temporary Works	means any falsework, formwork, support work, scaffold, shoring or other temporary structure designed to provide support or means of access during construction work.
The Act" Or "OHS Act	means the Occupational Health and Safety Act, 1993 (Act No. 85 of 1993).
Tunnelling	means the construction of any tunnel beneath the natural surface of the earth for a purpose other than the searching for or winning of a mineral.

### 3. **HEALTH AND SAFETY SPECIFICATION**

#### 3.1 **Scope**

This specification covers the requirements for eliminating and mitigating incidents and injuries at the **Upgrade to the Zeekoevlei Weir in the False Bay Nature Reserve Project**

##### Scope of Work

- Concrete works
- Bulk earthworks and shaping
- Mechanical channel gates
- Road layer works
- Paving
- Gabions
- Working within and existing watercourse and wet environment will require significant planning and temporary works.
- Earthworks required on fairly large dune embankment
- Working within an environmentally sensitive area where hippos are present
- Work will naturally take place in quite constrained areas due to the watercourses being diverted etc. Large machinery will be required to work in these areas

#### 3.2 **Provision for Health & Safety Cost**

The Principal Contractor and their contractors shall make adequate provision for the cost of Health & Safety Measures during the construction process as required by the Construction Regulation 5(1)(g). and must allow for (but not limited to) adequate funds for at least one Full-Time Safety Officer until all activities have been completed including Night Work if applicable, Equipment, Signage, Training for all relevant personnel, PPE, Edge Protection, Safe Access, Emergency/Rescue and Equipment, on site monitoring, adequate supervision, safe removal of rubble especially from elevated areas (e.g. Chutes, loading platforms etc.), adequate welfare facilities, Medicals.

### 4.0 **INTERPRETATIONS**

#### 4.1 **Application**

This specification is a compliance document drawn up in terms of the South African legislation and is therefore binding. It must be read in conjunction with relevant legislation as noted previously.

#### 4.2 **Definitions**

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

## **5.0 MINIMUM ADMINISTRATIVE REQUIREMENTS**

### **5.1 Notification of Intention to Commence Construction Work**

The appointed CHSA shall inform the Provincial Director of the Department of Labour in writing as per the Annexure 1 in terms of CR 3.

Every principal contractor shall furnish the H&S Agent with the following documentation for inclusion in the construction work permit application:

1. Completed Annexure 1 of Construction Regulation 3(2)
2. Health and Safety Plan, including site specific Risk Assessments
3. Principal Contractor Appointment Letter
4. Construction Manager Appointment
5. Construction Manager Competency
6. Construction Health and Safety Officer Appointment
7. Construction Health and Safety Officer Competency & SACPCMP Registration
8. Letter of Good Standing
9. CIDB letter of Registration
10. Company Profile including list of projects and values
11. Health and Safety Specification acknowledgement Letter
12. Principal Contractor Cost of Health and Safety- Full Breakdown
13. Appointment of the project manager/director (section 16.2 appointee)
14. Temporary works designer and proof of competence

Should any of the team members identified in the construction work permit application documentation change, the H&S agent shall be notified timeously, and attributing documentation shall be provided immediately upon request. It is the principal contractor's responsibility to proactively inform the agent and client before any changes to the team on site is made.

The appointed CHSA shall inform the Provincial Director of the Department of Labour in writing as per the Annexure 1 in terms of CR 3.

A copy of the issued Construction Work Permit must be clearly displayed on the site notice board and at the site entrance.

### **5.2 Assignment of Contractor's Responsible Persons to Manage and Supervise Health and Safety on Site**

The Principal Contractor shall submit management and supervisory appointments as well as any relevant Appointments in writing (as stipulated by the OHSA and Construction Regulations), prior to commencement of work. Proof of competency must be included.

*Note: All appointees shall be appointed by the Chief Executive Officer/Managing Director or his/her assistant in terms of Section 16 of the OHS Act 85/1993 with exception to the Construction Manager in terms of Construction Regulation 8. The Construction Manager shall be full time on site. The construction manager shall demonstrate his/her competence as defined by this specification (See section 5.4)..*

#### **Section 8 (OHS Act 85/1993) General duties of employers to their employees**

"ensuring that work is performed, and that plant or machinery is used under the general supervision of a person trained to understand the hazards associated with it and who have the authority to ensure that precautionary measures taken by the employer are implemented; and"

#### **Management and supervision of construction work**

8. (7) "A construction manager must in writing appoint construction supervisors responsible for construction activities and ensuring occupational health and safety compliance on the construction site".
- (8) "A contractor must, upon having considered the size of the project, in writing appoint one or more competent employees for different sections thereof to assist the construction supervisor contemplated in sub regulation (7), and every such employee has, to the extent clearly defined by the contractor in the letter of appointment, the same duties as the construction supervisor: Provided that the designation of any such employee does not relieve the construction supervisor of any personal accountability for failing in his or her supervisory duties in terms of this regulation".

### 5.3 Competence

In accordance with the Construction Regulation the Principal Contractor shall appoint, in writing, competent persons (in addition to the Construction Managers – CR 8 (1)(2) & Construction Supervisor/s-8(7)(8) responsible for supervising construction work as applicable to the project. **The Principal Contractor shall ensure that all its employees, including their contractors, are able to demonstrate the relevant competence and training to perform their duties and to carry out construction activities.**

A competent person may be appointed for more than one part of the construction work with the understanding that the person must be suitably qualified and able. The appointment of competent persons to supervise parts of the construction work does not relieve the Principal Contractor from any of its responsibilities to comply with all requirements of the Construction Regulations.

**Note: The Principal Contractor and their contractors shall ensure that all certificates provided are issued by an accredited service provider as required by the National Qualification Framework Act 67/2000 and the South African Qualifications Authority (SAQA)**

**The Principal Contractor shall assess all work areas on a regular basis and ensure that sufficient and competent Supervision is present.**

Minimum Competency Requirements Per Appointment		
Legislation	Appointment Description	Required Competency
OHS Act 16(1)	CEO – highest ranking officer	Legal Liability
OHS Act 16(2)	Delegated authority/project manager	CV
CR 8(1)	Construction Manager	<b>CV, HIRA, Building related NHD/ND/Bachelors Degree or Valid SACPCMP Construction Manager Registration</b>
CR 8(2)	Assistant Construction Manager	CV, Legal Liability & HIRA
CR 8(7)	Construction Supervisor	CV, Legal Liability & HIRA
CR 8(8)	Assistant Construction Supervisor	CV, Legal Liability & HIRA
CR 10(1)(a)	Fall Protection Planner	US ID 229994 – Fall Protection Plan Developer  <b>Training to be accredited by the institute for Work at Height</b>
CR 10(4)(b)	Fall Arrest Equipment Inspector	US ID 229998 – Explain and perform fall arrest techniques when working at heights.  <b>Training to be accredited by the institute for Work at Height</b>
	All employees working at heights	US ID 229998 – Explain and perform fall arrest techniques when working at heights.  <b>Training to be accredited by the institute for Work at Height</b>
	Work Heights Rescue Technician	US ID 229998 – Install, use and perform basic rescues from fall arrest systems and implement the fall protection plan  <b>Training to be accredited by the institute for Work at Height</b>
CR 13 (1)(a)	Excavation Supervisor	CV
CR 23(d)(k)	Vehicle/plant Operator & Inspector	Relevant code operators' license/certificate. Any training on attachments must be reflected on the operator competence certificate.
DMR 18(11)	Lifting Machine Operator & Inspector	Relevant Operating License (Refer to Driven Machinery Regulations)
DMR 18(10)(e)	Lifting Tackle Inspector	CV
EMR 10(4)	Portable Electric Tool Inspector	CV
CR 28(a)	Stacking & Storage Supervisor	CV

GSR 13A	Ladder Inspector	CV
CR 16(1) & SANS 10085	Scaffolding Supervisor	US ID 263245 – Erect, use and dismantle access scaffolding US ID 263205 – Inspect access scaffolding
	Scaffolding Erector	US ID 264245 – Erect, use and dismantle access scaffolding
	Scaffolding Inspector	US ID 263245 – Erect, use and dismantle access scaffolding  US ID 263205 – Inspect access scaffolding
OHS Act 8	Hand tool inspector	CV
OHS Act 8 & SARTSM	Flagman	Aligned to US 258923 – Ensure safety at road works in urban areas
OHS Act 8 & SARTSM	Traffic Safety Officer	US 258923 – South African Road Federation (Traffic Safety Officer course)
CR 8(5)	HSE Officer	SACPCMP CHSO/CHSM registration
CR 9(1)	Risk Assessor	Risk Assessor Training US ID 244287   US ID 244383   US ID 120330
GAR 9(2)	Incident Investigator	Incident Investigator Training US ID 120335   US ID 120483
GSR 3(4)	First Aider	As prescribed by General Safety Regulation 3
CR 29(h)(i)	Fire Equipment inspector/operator	US ID 12484
OSHA 17(1)	Health & Safety Representative	US ID 259622
OHS Act 19(3)	H&S Committee Members	N/A
GSR 5	Confined Space Entry (NS)	US ID 15034 – Work in confined spaces on construction sites
GSR 5	Confined Space Rescue (NS)	US ID 260139 – Undertake an emergency rescue operation in a confined space

#### 5.4 Compensation for Occupational Injuries and Diseases Act (Coida) 130 Of 1993.

The Principal Contractor and their contractors shall submit a valid Letter of Good Standing from their Compensation Insurer-FEM or Compensation Commissioner to the Client's Representative as proof of registration before they commence work on site.

*Note: A client must ensure before any work commences on a site that every principal contractor is registered and in good standing with the compensation fund or with a licensed compensation insurer as contemplated in the Compensation for Occupational Injuries and Diseases Act, 1993 (Act No. 130 of 1993);*

*A principal contractor must ensure prior to work commencing on the site that every contractor is registered and in good standing with the compensation fund or with a licensed compensation insurer as contemplated in the Compensation for Occupational Injuries and Diseases Act, 1993;*

#### 5.5 Occupational Health and Safety Policy

The Contractor and their Contractors shall submit a Health and Safety Policy signed by their Chief Executive Officer. The Policy must outline objectives and how they will be achieved and implemented by the Company / Contractor.

#### 5.6 Health and Safety Organogram

The Principal Contractor and their Contractors shall submit an organogram with contact numbers, outlining the Health and Safety Site Management Structure including the relevant appointments / competent persons. In cases where appointments have not been made, the organogram shall reflect the intended positions. The organogram shall be updated when there are any changes in the site Management Structure and must be site specific.

#### 5.7 Preliminary Hazard Identification and Risk Assessment

The Principal Contractor and their contractors shall develop Risk Assessments and Method statements by a competent person for the risk that they foresee during construction.

All Risk Assessments shall be conducted by the appointed Risk Assessor/Team PRIOR to start of any work. *Note: This shall apply for all contractors.*

*Note: the Principal Contractor shall ensure that a competent Risk Assessor is appointed in writing and shall be Full Time on site for the duration of the project.*

*Principal Contractor to provide a 14-day Look Ahead Hazard Identification Risk Assessment (HIRA) for upcoming activities before they are encountered on a bi-weekly basis and forward an electronic copy to the appointed Health and Safety Agent.*

*Furthermore, the Principal Contractor and their contractors to ensure that Daily Safe Task Instruction/ Planned Tasked Observations are conducted prior to any activity with proof placed on file. Contractors may use their own Formats/Templates.*

The following is a site-specific source of risks that have been identified but is not limited to and must as a minimum, be appropriately addressed by the Principal Contractor in their Health & Safety Plan with Control Measures but is not limited to:

#### **Site Establishment**

- Offloading of containers/site office
- Secure / Safe Storage of Material, Plant & Equipment
- Ablution Facilities
- Eating facilities
- Vehicle Access to Site
- Location of existing Services
- Hoarding Permits (If Applicable)
- Dealing with existing structures and Traffic
- Provision for drinking water for all staff

#### **Crane Management System (i.e. All Cranes)**

- Competency and Medical Certificates of Operator
- Load Test Certificates
- Rescue Plan
- Crane Management Plan/System to be provided
- (Emergency Procedures)
- CR 23 and Driven Machinery Regulations (2015) must be adhered to
- Relevant Inspections conducted by an LMI as per DMR 18 (2015)

#### **Hoarding & Access Control**

- Public Liability / Access Control / Compliance to Section 9
- Site needs to be Adequately Secured
- Relevant Construction Warning Signage
- Daily inspections with proof placed on file
- Hoarding to be in line with approved Drawings

#### **Public Liability**

- Effect of Construction Work on members of the public and existing property e.g. Neighboring Property
- Noise Control
- Dust Control
- Temporary lighting
- Relevant signage
- Hazardous Chemical Substances

#### **Temporary Works**

- The Principal Contractor shall comply with CR 11, CR 12, CR10 and CR 13
- Competent persons to be appointed in writing (**Proof of competency to be provided for all relevant appointments and shall include competency for all employees erecting temporary works**)
- Erecting and Stripping of Temporary Works to be done by competent persons
- Approved Design Drawings issued by a competent person to be done by competent persons
- Casting of Concrete
- All temporary works components shall be inspected with proof placed on file prior to utilization for any temporary work structure.
- Daily Inspections to be conducted by competent person
- Control measures should Drilling/ Cutting into Slab be required (If Applicable)
- Adequate Edge Protection- **No Danger Tape or shade cloth**
- Authorization to be provided in writing by a competent person (**Before Concrete Pour**) and
- Handover Certificates/Signed off by a Competent Person **before Stripping any temporary works**

### **structures**

- Authorization to be provided in writing by a competent person (Before Concrete Pour) and Handover Certificates/ Signed off by a Competent Person before Stripping any temporary works structures

*The contractor shall make available a temporary works file which shall include temporary documentation per temporary work section which must be easily trackable and referenced to the temporary works drawing. The appointed contractor shall closely monitor and control all construction loads when busy with temporary works. The contractor shall consult the appointed Structural Engineer and verify any specific requirements.*

*Note: the Principal Contractor and their appointed contractor/temporary works team shall provide a procedure to ensure that edge protection is always provided especially when erecting or removing/stripping temporary works structures*

### **Unplanned collapse of Material or structures- Contractor to provide control measures**

- Principal Contractor to provide adequate protection to avoid falling objects e.g. Crash Decks, Catch Nets, Apron Fans etc. or any other similar protection as and where needed. Principal Contractor to assess all work areas prior to start of work.
- Structure to be inspected periodically by a competent person to render the structure safe. The structure to be maintained in such a manner so that it remains safe for continuous use.
- Records of inspections and maintenance are to be kept on file and must be made available on request to an inspector.
- Principal Contractor to provide full method statement and risk assessment

### **Working near existing services**

- Identification and protection of existing services
- Electrical Cables, Telkom, Data etc.

### **Working Close to Water:**

- The Principal Contractor to comply with CR 26
- Emergency Procedures with Rescue Plan
- Contractor to specify Safe Means of Access
- Contractor to provide what control measures will be provided for employees
- Life ring to be available at all times

### **Plant & Machinery**

- Principal Contractor to provide designated area should any plant and machinery be parked at night. Plant to be fully secured to avoid possible unauthorized access.

### **Scaffolding and Working at Heights**

- Principal Contractors and their contractors to compile a Site-Specific Fall Protection Plan in Line with CR 10.
- The Scaffolding must comply with SANS 10085:1-2004, fully cladded including Catch Nets or similar equipment.
- Process to Remove Equipment, Tools Scrap, Material etc. to and from Elevated Positions.
- Compliance to Environmental Regulations for Workplaces 6(3).
- System to Protect Persons / items or material falling through Ceilings or any elevated positions/areas.
- Design Drawings to be provided by a competent person
- Temporary Works Designer to be appointed in writing.

### **Structural Steel**

- Principal Contractor to submit Task Specific Method Statements and Task Specific Risk Assessments of their lifting and installation procedures e.g. Manually or Mechanically.
- Full compliance with CR 9, 10, CR 23 and DMR 18 (2015)
- Guide Ropes shall be used as far as reasonably practicable when busy with all lifting operations to assist with possible uncontrolled loads especially during inclement weather and restricted areas.
- Only competent persons to conduct operations
- Task Specific Fall Protection & Rescue Plan
- All work areas shall be adequately demarcated with spotters' present

### **Traffic Management Plan to include but is not limited to i.e.: (The entrance road to site is being used by community)**

- Traffic Plan and Layout to be approved and signed by Engineer/Client Representative and relevant local authorities
- Delivering of Material and Equipment
- Advance construction Signage, Competent Flagmen and Compliance with all relevant regulation and legislation including the South African Road Traffic Signs Manual (SARTSM) Chapter 13.
- Plan to be Monitored and Reviewed at least monthly (Every 30 Days) or as the building program/activities changes

- Adequate barriers and delineators to be provided and placed strategically as needed
- Procedure for maintaining road signage
- All employees working in or close to the road to wear Hi-Viz vests at all times
- Flagmen shall be provided and readily available to assist with all Deliveries
- Flagmen shall not be on duty for a period longer than 8 (eight) hours per day. Flagmen to be rotated as needed (If Applicable)
- Heat and Inclement weather to be considered for all Flagmen. Adequate control measures required

*Principal Contractor and their contractors shall provide adequate control measures when working close to public roads. Note, the Principal Contractor to consider safe drop off zones if and when needed. No road may be closed without the engineer's approval and traffic shall be accommodated as per the approved drawings/layout. Pedestrian and vehicle access are of paramount importance with relevant signage displayed*

*Note: the Principal Contractor shall provide adequate control measures for both internal and external roads.*

#### **Lifting and Installation Procedures**

- Principal Contractor to submit Full Method Statements of their lifting and installation procedures e.g. manually or mechanically.
- All lifting equipment to comply with Driven Machinery Regulation (2015)

#### **Waste Management Plan/System to be implemented**

- Rubble to be stored neatly in bags/bins and collected as needed.
- Principal Contractors to provide sufficient Bins / Bags always and must be removed on a regular basis or as and when needed.
- All hazardous material to be stored separately and must be disposed of at an authorized landfill site. Proof of Disposal to be provided
- Rubble shall not be allowed to accumulate on site and shall be removed at regular intervals

#### **Hot Works**

- Principal Contractors and their contractors to ensure that Fire Equipment and adequate precaution measures are in place when grinding, welding / hot works etc. including PPE and demarcation
- Hot work permits to be issued once the area has been inspected by a responsible person and declared safe with proof placed on file. **(Note- All permits should not exceed one (1) working day)**
- Compliance with CR 25& 29

#### **Temporary Flammable Liquid/Material Storage**

- Principal Contractor to ensure that adequate ventilation is provided with Relevant Signage and Fire Precautions provided.
- Adequate Fire Equipment to be readily available.
- Compliance with all relevant legislation and regulations including the Community Fire Safety By-law Compliance and CR 25& 29

#### **Working near of Electrical Cables**

- Contractor to provide full method statement and risk assessment when working on live electrical Cables. Must be communicated to all staff prior to the activity.
- All Staff must be provided with the relevant Personal Protective Equipment (PPE)

#### **Procedure to identify HV/Electrical Cables**

#### **Electrical Installations – High and Low Voltage**

#### **Compliance to the Driven Machinery Regulations (2015)**

#### **Safe Use of Portable Electrical Equipment**

- Electrical Drilling Machine
- Angle Grinder
- Kango / Jack Hammer
- High Pressure Equipment
- Any Other Equipment used by Principal Contractor

#### **Emergency Preparedness**

- Emergency Evacuation Plan with Relevant Emergency Numbers
- Revision of Emergency Plan
- Principal Contractor to monitor site conditions and conduct Evacuation Drills as and when needed with proof placed on file (Roll call, report to be placed on file etc.)
- Enough workers are Trained (Competent) in the use of Fire Extinguishing Equipment

- Emergency assembly point to be established with the relevant signage displayed.
- Air horn/alarm/siren to be provided on site

#### **Dust Control**

- Principal Contractor to provide a procedure to control dust

#### **Noise Control**

- Principal Contractor to provide a procedure to control noise

#### **Manual and Mechanical Handling**

#### **Mechanical Installations**

#### **Protection of Storm Water System**

- Method to Prevent Run Off into Storm Water System

#### **Health Hazards**

- Threats by bees, snakes, etc.
- Existing storage of hazardous materials
- Polluted drinking water
- Working with cementitious material
- Dust
- Noise
- Contaminated land
- Vibration
- Inhaling of Bituminous and cementitious material
- Exposure to Anime bases epoxy products

#### Additional Activities foreseen on site

- Public Safety- Relevant precautions to be taken (Hoarding/Physical Barriers, signage etc.)
- Process to move equipment, tools, scrap material, etc. to and from elevated positions.
- Storage/control of Hazardous substances
- Wet Works
- Concrete Works
- Use of Temporary Access
- Guard Rails
- Paving

Principal Contractors and their contractors to ensure that the risk assessments, as well as other risks identified by them, are updated at least every 30 days or as the risk changes are recorded and communicated to all relevant parties with proof placed on file- CR 9. Note: All reviews must be signed off by the appointed Risk Assessor.

*Note: All identified risks and hazards must be based on a documented method (method statements).*

The Principal Contractor shall comply with the Occupational Health and Safety Act 85/1993, Construction Regulations and all relevant Legislation.

Furthermore, the Principal Contractor and their contractors shall provide a Monitoring and a Review Plan including a Risk Register indicating all activities.

Note: Principal contractor must ensure as far as is reasonably practicable, ergonomic related hazards are analysed, evaluated and addressed in a risk assessment.

#### **5.8 Fall Protection Plan: Scaffolding / Working at Heights Including Rescue Plan (This Includes Excavations)**

Working at heights includes any work that takes place in an elevated position. The Principal Contractor and their contractors must submit a risk/task-specific Fall Protection Plan in accordance with Construction Regulations 10. The Fall Protection Plan must be job specific, be reviewed at least monthly (Every 30 Days) or as the risk changes or after any incident. Contractors to ensure that medicals are provided for all persons exposed to elevated positions.

Scaffolding must comply with the requirements of **SANS 10085-1:2004**. Scaffolds are used extensively by Contractors and strict control measures must be in place to prevent Unauthorized alterations to scaffolding such as removing ties and scaffold boards.

Competent persons to be appointed in writing to:

- erect scaffolding (Scaffold Erector/s)
- act as Scaffold Team Leaders



- inspect Scaffolding daily and after inclement weather (Scaffold Inspector/s).
- The Scaffolding must comply with SANS 10085:1-2004, fully cladded including, Crash Decks etc. as and when needed

*Note: No Trestle or Walkthrough Scaffolds may be used on site. Furthermore, the Contractor shall provide a site-specific Risk Assessment based on their Fall Risk.*

**Written Proof of Competency of above appointees to be available on Site.**

Where scaffolding or work from scaffolding may negatively affect the public, it must include a scaffold fan/apron or access tunnel. Shade cloth must be used to enclose the scaffolding below the first fan/apron. Should the scaffolding be adjacent to an existing pavement of similar public walkway, a pavement gantry and crash deck will be required (overhead protective structure).

**All employees working on heights must have a Medical Certificate issued by an Occupational Health Practitioner (OHP)**

*Note: The Principal Contractor shall provide a programme for the training of employees working from a fall risk position and the records thereof.*

**A fall protection plan must include:**

- a) a risk assessment of all work carried out from a fall risk position and the procedures and methods used to address all the risks identified per location;
- b) the processes for the evaluation of the employees' medical fitness necessary to work at a fall risk position and the records thereof;
- c) a programme for the training of employees working from a fall risk position and the
- d) records thereof;
- e) the procedure addressing the inspection, testing and maintenance of all fall protection equipment; and a rescue plan detailing the necessary procedure, personnel and suitable equipment required to affect a rescue of a person in the event of a fall incident to ensure that the rescue procedure is implemented immediately following the incident.

**5.9 Edge Protection and Penetrations (This includes excavations)**

The Principal Contractor and their contractors must ensure that all exposed excavations and penetrations are guarded and demarcated always until permanent protection has been erected.

The Principal Contractor has the following options when contemplating the protection of openings, slabs and edges:

- A physical barrier at the edge of the excavation, which must be strong enough to carry the weight of a person in the process of falling.
- Any other suitable means of protection may be used that will prevent a fall.
- Alternatively, any other means of protection may be used that will prevent a fall.

Any person working near an unprotected/exposed excavation edge to wear fall prevention devices, like safety harness, life lines etc.

**The Principal Contractors' risk assessment must include these items. E.g. all other openings and areas where a person may fall.**

**5.10 Health and Safety Officer 8(5)**

The Principal Contractor shall appoint at least a Full-Time Safety Officer on site until all activities has been completed including Night Work if applicable with proof of competency to be attached to each appointment.

*Note: The Safety Officers shall be registered with the South African Council for the Project and Construction Management Professions (SACPCMP) with proof provided.*

*Note: This applies to all contractors and their sub-contractors*

Furthermore, The Principal Contract shall ensure that all appointed Sub-contractors have a competent safety officer who shall visit the site as often as needed but at least once a month

*Note: All Site Visits shall include Physical and Administrative inspections and attend to all Health and Safety Requirements*

**The following health & safety officer related duties will be required to be carried out:**

- a) Health & safety audits and inspections 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) Weekly inspection reports – site hazard survey findings recorded, and actions taken recorded;
- c) Assess, and finally approving sub-contractor H&S plans;
- d) Maintain and co-ordinate the Principal Contractor's health & safety management plan and file;
- e) Investigate near misses, incidents and injuries;
- f) Co-ordinate the function of reviewing the hazard identifications and risk assessments;
- g) Assisting with method statements and safe work procedures and checking whether the responsible persons follow these safe work procedures;
- h) Enforcing discipline on the site and checking on compliance with safety procedures, standards and rules;
- i) Co-ordinating health & safety induction training and weekly safety awareness sessions;
- j) Implement and enforce the site hot work permit system.
- k) Ensure that public protection protocols are adequate and well maintained.
- l) Conduct planned job observations to check whether workers are carrying out activities in accordance with the safe work procedures.
- m) Fire risk assessments and enforcement.

**Note:** “No contractor may appoint a construction health and safety officer to assist in the control of health and safety related aspects on the site unless he or she is reasonably satisfied that the construction health and safety officer that he or she intends to appoint is registered with a statutory body approved by the Chief Inspector and has necessary competencies and resources to assist the contractor”, however an exemption was issued and all Safety Officers/Practitioners must now provide confirmation of application for registration of the construction health and safety discipline with the SACPCMP should he/she not be registered as yet.

#### **5.11 Medicals**

The Principal Contractor to ensure that all his or her employees including all appointed contractors have a valid medical certificate of fitness specific to the construction work to be performed and issued by an Occupational Health Practitioner in the form of an Annexure 3.

#### **5.12 Health and Safety File (HSF)**

The Principal Contractor/s and their contractors shall, in terms of CR 7(1), maintain the HSF on site always. The HSF is a file with permanent records containing information on aspects of the construction project - which will be necessary to ensure the health and safety of any persons who may be affected by the construction work.

The HSF must include all documentation required in terms of the Act and Regulations and must also include a list of all Contractors on site that are accountable to the Principal Contractors and the agreements between the parties and details of work being done.

The Principal Contractors shall appoint a suitably qualified person to prepare the HSF and to keep it up to date for the duration of the contract.

#### **5.13 The HSF Shall Include At Least The Following Information:**

- a) Notification of Construction Work (CR 3)
- b) Copy of OHSA (updated) (GAR 4.)
- c) Proof of Registration and good standing with a COIDA Insurer (CR 5(1)(j)) (The Principal Contractors shall submit a letter of good standing with the compensation Insurer, at the tender stage).
- d) OHSP agreed with client including the underpinning Risk Assessment/s & Method Statements CR 9(1)
- e) Designs/drawings including scaffolding and Temporary works (form work)
- f) A list of Contractors (Sub-Contractors) including copies of the agreements between the parties and the type of work being done by each Contractor (CR 7)
- g) Appointment/Designation forms
- h) Registers
- i) Inductions

The HSF/CD shall be handed over to the Client on completion of the contract. It must contain all the documentation as set out above, or as instructed, as well as any handed to the Principal Contractor by any subcontractors together with a record of all drawings, designs, materials used and other similar information concerning the completed project.

#### **5.14 Health and Safety Representative(s)**

The Principal Contractor and their Contractors shall ensure that competent Health and Safety Representative(s) are appointed under consultation and trained to carry out their functions as soon as the total workforce has reached a number of 20 employees or more. Should the Principal Contractor and their contractors have less than 20

employees, then the accumulative amount shall apply. The appointments must be in writing. The Health and Safety Representative shall carry out regular inspections at least monthly, keep records and report all findings to the Responsible Person forthwith and at Health and Safety meetings.

*Note: The Principal Contractor and their contractors shall ensure that all certificates provided are issued by an accredited service provider as required by the National Qualification Framework Act 67/2000.*

The number of representatives for each contractor shall be as per Section 17 of the OHS Act 85/1993, but as a minimum, The Principal Contractor shall appoint at least one competent Health and Safety Representative on the project.

#### **5.15 Health and Safety Committees**

Principal Contractor shall schedule at least monthly Health & Safety meetings. Minutes and records shall be kept. Principal Contractors Health & Safety representative and responsible person shall attend this meeting. Principal Contractor to ensure that all Contractor Representatives attend these meetings.

*Note: These meetings shall be conducted regardless how many contractors are appointed.*

#### **5.16 Health and Safety Training**

##### **5.16.1 Induction**

Principal Contractor shall ensure that all (including site visitors etc.) undergo site- specific induction presented by a competent person and proof placed in the Safety File prior to start of work. Employees to carry proof of inductions.

##### **5.16.2 Awareness**

The Principal Contractor shall ensure that, on site, toolbox talks take place at least once per week. These talks should deal with risks relevant to the construction work at hand. A record of attendance shall be kept in the Health and Safety file. All Principal Contractors have to comply with this minimum requirement. Contractors to ensure that the discussion is recorded on file (Topics with notes).

##### **5.16.3 Health and Safety Site Rules**

The Principal Contractors must develop a Set of Site-Specific Health and Safety Rules that will be applied to regulate the Health and Safety aspects on Site. Security and Access control must be included in the rules and those non-employees or visitors will not be allowed on site unaccompanied.

##### **5.16.4 Competency**

In accordance with the Construction Regulation the Principal Contractors shall appoint, in writing, competent persons (in addition to the Construction Managers – CR 8 (1)(2) & Construction Supervisor/s-8(7)(8) responsible for supervising construction work for the following work situations that may be expected on the site of the works, as applicable to the project.

A competent person may be appointed for more than one part of the construction work with the understanding that the person must be suitably qualified and able to manage and supervise at the same time the construction work on all the work situations for which he/she has been appointed.

The appointment of competent persons to supervise parts of the construction work does not relieve the Principal Contractors from any of his responsibilities to comply with all requirements of the Construction Regulations.

*Note: The Principal Contractor and their contractors shall ensure that all certificates provided are issued by an accredited service provider as required by the National Qualification Framework Act 67/2000 and the South African Qualifications Authority (SAQA) .*

#### **6.0 GENERAL RECORD KEEPING**

The Principal Contractor and their Contractors shall keep and maintain Health and Safety records to demonstrate compliance with this Specification, with the OHS Act 85/1993, and with the Construction Regulations (February 2014).

The Principal Contractor and their contractors shall ensure that all records of incidents / accidents, emergency procedures training, inspections, audits, etc. are kept in a Health and Safety file held in the site office.

The Principal Contractor must ensure that every contractor keeps and maintains its own Health and Safety file and must be readily available at all times. (The file must include the Contractor's health and safety plan). These records are crucial for inclusion in the Principal Contractors' consolidated health and safety file for handover to the Client on completion of construction work.

## **7.0 HEALTH AND SAFETY AUDITS, MONITORING AND REPORTING**

The Client's Health & Safety Agent shall conduct 1 monthly Health and Safety audits/inspections with follow up audits of the work. Operations including a full audit of physical site activities as well as an audit of the administration Health and Safety. The Health and Safety Agent may conduct unannounced visits as and when needed.

The Principal Contractor and their contractors are obligated to conduct similar audits on their Contractors.

Detailed reports of the audit findings and results shall be reported on at all levels of project management meetings. Copies of the reports shall be kept on file and must be readily available for inspection. The Principal Contractor must audit their Contractors and keep records of these audits in their Health and Safety files and must be available on request.

*Note: The Principal Contractor shall ensure that all contractors documentation is assessed and approved prior to start of work with proof placed on file.*

### **7.1 Internal Audits/Inspections**

The Principal Contractor's safety manager/responsible person must conduct weekly inspections/audits with a detailed report. A copy of these inspections/audits must be placed on file for perusal by the Health and Safety Agent.

*Note, these reports shall include photographic evidence*

Principal Contractor to provide a Corrective Action Plan within 3 days for all non-compliances noted in the Audits conducted by the Client's Health and Safety Agent.

Note: This Plan shall include proof that all non-compliances have been rectified and an electronic copy shall be sent to the Client Representative including the appointed Health and Safety Agent as proof of items closed out

## **8.0 EMERGENCY PROCEDURES**

The Principal Contractor/s shall submit a detailed Emergency Procedure and Evacuation Plan with assembly point and contact details in the case of any emergency. The procedure shall detail the response plan 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; Information on hazardous material/situations.
- Emergency procedure(s) shall include, but shall not be limited to, fire, spills, accidents to employees, use of hazardous substances, bomb threats, major incidents/accidents, etc.

The Principal Contractors shall advise, inform and notify the Client, Agent, Engineer and all relevant authorities forthwith, of any emergencies, together with a record of action taken. This shall be confirmed in writing as soon as possible after the incident.

A contact list of all service providers (Fire Department, Ambulance, Police, Medical and Hospital, etc.) must be maintained and available to site personnel. These procedures shall form part of the OHSF. The Principal Contractor to ensure that the relevant staff is trained to perform such duties as required by the OHS Act. All emergency procedures must be monitored on a regular basis and must be in line with the building program.

The Emergency/Evacuation plan and routes must be revised on a regular basis for all employees and contractor (including staff) should any unforeseen event take place during the implementation phase/s of the project. Evacuation Drills must be conducted as and when needed. Contractor to assess all activities to ensure this is implemented with proof placed on file.

## **9.0 FIRST AID BOXES AND FIRST AID EQUIPMENT**

The Principal Contractor and their Contractors shall appoint in writing First Aider(s). The appointed First Aider(s) are to be sent for accredited first aid training. Valid certificates are to be kept on site. All Contractors with more than 5 employees shall supply their own first aid box. Principal Contractor with more than 10 employees shall have trained, certified first aider on site at all times & First aid Box stocked always.

## **10.0 ACCIDENT / INCIDENT REPORTING AND INVESTIGATION**

Injuries are to be categorized into first aid, medical, disabling and fatal. The Principal Contractor and their contractors must stipulate in its construction phase Health and Safety plan how it will handle each of these categories. When reporting injuries to the Client, these categories shall be used. All contractors must investigate and report on the 4 categories of injuries to the Principal Contractor at least monthly.

Contractors must investigate injuries and accidents involving their employees within seven days of the incident in the form on Annexure1 (General Administrative Regulations) and forward a copy on the investigation report to the principal contractor forthwith.

All incidents reportable in terms of the provision of Section 24 of the OHS Act 1993 must be reported to the local Dept. of Labour in the prescribed manner.

Should construction work be finished/completed within 3 days after any occurrence, the investigation shall be conducted before such construction work is completed.

The Principal Contractor and their contractors must report all injuries to the Client in the form of a spreadsheet, which includes all contractor injuries/incidents including near misses, property damage and man-hours worked for the month as well as the cumulative total. This report must be done on a monthly basis and must form part of the Principal Contractor's progress report.

*Note: Principal Contractor must provide an Incident Register and must record all incidents when applicable*

The Principal Contractor shall immediately notify the Client and Client's Health & Safety Agent of any hazardous or potentially hazardous situations that may arise during the performance of construction activities immediately or within 24 hours by means of a flash report.

Furthermore, the contractor shall liaise with the Client prior to any communication with any source of Media.

## **11.0 HAZARDS AND POTENTIAL SITUATIONS**

The Principal Contractor shall immediately notify the Client and Client's Health & Safety Agent of any hazardous or potentially hazardous situations that may arise during the performance of construction activities.

## **12.0 PERSONAL PROTECTIVE EQUIPMENT (PPE) AND CLOTHING**

The Principal Contractor shall ensure that all workers are issued and wear but is not limited to i.e. hard hats, protective footwear, Hi-Viz vests and overalls. The Principal Contractor and their Contractors shall make provision and keep adequate quantities of SANS approved PPE on site always.

Contractors to provide control measures should employees continuously fail to use the prescribed PPE.

Contractors to provide control measures should employees continuously fail to use the prescribed PPE.

*Note: The Client will remove any person from the construction site who is working without necessary personal protective equipment and/or clothing.*

## **13.0 OCCUPATIONAL HEALTH AND SAFETY SIGNAGE**

The Principal Contractor shall provide adequate on-site OHS signage. Including but not limited to: "no unauthorized entry", "report to site office", "site office", and "hard hat area". Signage shall be posted up at all entrances to site as well as on site in strategic locations e.g. Access routes, entrances to structures and buildings, scaffolding and other potential risk areas / operations. All Contractors to adhere.

## **14.0 CONTRACTORS**

The Principal Contractor shall ensure that all Contractors appointed by them comply with this Specification, the OHS Act 85/1993, and Construction Regulation (February 2014).

The Principal Contractor may only appoint a contractor after approving the contractor's health & safety plan with proof placed on file. The Principal Contractor must audit each of its Contractors at least monthly, with audit reports filed in the health & safety file on site.

The audit must include an administrative assessment as well as a physical inspection of the contractor's health & safety system.

The Principal Contractor must stop any Contractor from carrying out construction work that is not in accordance with the Principal Contractor's 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 these regulations;

The Principal Contractor must ensure that their Contractors are registered and in good standing with a recognized 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 their Contractor the contents of the health and safety Plan and shall finally approve that plan for implementation.

## **15.0 NO-GO AREAS**

Principal contractor and their contractors to avoid all no-go areas and ensure that all relevant parties/employees and visitors are informed. These areas will be identified by the Client.

## **16.0 PHYSICAL REQUIREMENTS**

### **16.1 Demolition During Construction Process- (Method Statement/Procedure)**

The Client/Principal Contractor must ensure that a demolition permit is obtained from the Local Authority prior to demolition work commencing on site. Proof of the permit must be placed on file for inspection.

The Principal Contractor and their contractors shall always appoint a competent person in writing to supervise and control all Demolition work on site.

Prior to any demolition work being carried out, the Principal Contractor shall submit a method statement and a detailed engineering survey for approval by the Client/Engineer. Acceptance will then be issued to the Principal Contractor to proceed with the demolition work. The Principal Contractor shall ensure that demolition work complies with the Construction Regulations section 14 (February 2014). Principal Contractor to ensure that:

All Demolition work to comply with the Engineers methodology, procedures, requirements and drawings.

- Work should be carried out by competent operatives experienced in demolition work under the control of an experienced, competent supervisor.
- Restricted areas and safe distances should be established.
- Underground services to be considered, including electrical cables, water mains, etc. (If Applicable)
- All services should be disconnected prior to demolition.
- Adequate precautions against accidental collapse of the structure or adjacent structures should be in place.
- Pre-stressed reinforced concrete should be demolished under supervision of a suitability qualified and experienced engineer. (If Applicable)
- Measures should be taken to protect the public, e.g. 2m high fence, debris fans, etc.
- Floors should not be overloaded.
- All plant and equipment should be suitable for the task, well maintained, and inspected and tested in accordance with legislation.
- Work at heights should be minimized.
- Measures should be taken to protect persons working at height, e.g. working platforms, harness, nets, etc.
- Appropriate personal protective equipment (PPE) should be worn.
- Adequate Dust Control

### **16.2 Cranes (All) including a Crane Management Plan, Rescue Plan & (Emergency Procedures)**

The Principal Contractor and all Contractors shall ensure that lifting machinery and tackle is inspected before use and thereafter in accordance with the Amended Driven Machinery Regulations (2015). There must be competent lifting machinery and lifting tackle inspectors who must inspect the equipment daily or before use, taking into account that:

- Contractors to plan carefully when crane work is required. Overhead electrical cables to be kept in planning.
- All lifting machinery and tackle must carry a load test certificate and must have an inspector register.
- All lifting machinery and tackle have a safe working load clearly indicated,
- Regular inspections and servicing are carried out

*Note: Records are kept of inspections and of service certificates conducted by an approved LMI*

- There is proper supervision in terms of guiding the loads that includes a trained banksman/rigger to direct lifting operations and check lifting tackle,
- Rescue Plan to be provided
- Inventory to be provided and updated as and when needed

The operators are competent as well as physically and psychologically fit to work and in possession of a medical certificate of fitness to be available on site.

### **16.3 Confined Space Entry (If Applicable)**

The Principal Contractor to prepare a confined space procedure in line with General Safety Regulation (5) OHS Act including Task Specific Risk Assessments, Method Statements and Emergency Procedures.

### **16.4 Deliveries**

Delivery of materials and the safe movement of construction vehicles will be controlled by the Contractor always to alleviate any congestion or interference in the main road leading to the construction site.

Principal Contractor shall ensure vehicle management procedures are in place by way of flagmen control during contractor deliveries.

- No contractor vehicles are to be left unattended during deliveries.
- Existing parking bays, other than what has been agreed for the use by the Contractor, are not for the contractor or construction vehicles.

### **16.5 Regulation for Hazardous Chemical Agents**

The Principal Contractor working with Hazardous chemical substances to obtain copies of all the (SDS) Material Safety Data Sheets and this to be kept on site in the Health and Safety File. Risk Assessments to be compiled. First Aider to have copies of SDS.

All hazardous waste shall be disposed of at an authorised landfill site and proof of disposal shall be provided upon request. Employees shall be provided with suitable PPE including Respirators as and when needed. Adequate control measures shall be taken to avoid exposure to employees and members of the Public.

### **16.6 Stacking of Materials**

The Principal Contractor shall ensure that there are sufficient appointed stacking supervisors and all materials and equipment are stacked and stored safely. Double handling of material should be avoided and for this purpose, pallets and other stacking options should be used.

## 16.7 Excavations, Shoring, Dewatering/Drainage

The Principal Contractor and any relevant Contractor shall make provision in their tender (for bracing, shoring, dewatering and or drainage if applicable) of any excavations as per this specification. Principal Contractor to obtain a Civil Works Permit from the local authorities should any works be required close to any electrical kiosks

The Principal Contractor shall ensure the following but is not limited to,

- Wayleaves and all relevant permits to be obtained
- Excavations/trenches are inspected before every shift, after blasting, after unexpected fall of ground, after substantial damage of supports, and after rain.
- A record of these inspections must be kept;
- The location and nature of all existing services must be established before trenching operation is undertaken.
- Safe work procedures have been communicated to the workers;
- The safe work procedures are enforced and maintained by the Principal Contractor and Contractors' Responsible Persons always;
- Safe access/egress is provided to all levels;
- No load, material, plant or equipment is placed or moved near the edge of any excavation or trench which may undermine the stability of the same unless adequate steps are taken to prevent the sides from collapsing;
- All excavations and trenches that are adjacent to public access routes must be barricaded and illuminated.
- All excavations next to any building to be carefully monitored during such an operation.
- The contractor shall comply with all the requirements as set out by legislation and shall include but is not limited to CR 10, CR 13, Section 8 and 9 of the OHS Act 85/1993
- Permit/Authorisation in writing to be provided by competent person prior to any person entering the Excavation

The Principal Contractor shall provide Emergency/Rescue Procedures and must include but is not limited to,

- Possible collapse of Excavation
- Persons Falling into Excavations
- Mobile Plant falling into Excavations

*Should an HV cable be discovered, the Principal Contractor and their contractors shall cease all current works and activities, make the area safe and then immediately contact the Electrical Consultant/Client Representative to provide a method statement prior to re-commencement. Proof of Communication shall be provided.*

Furthermore, the Principal Contractor and their contractors shall ensure that the excavated sides are battered and include considering dewatering/creating site run offs during winter. All deep excavations and high cut slopes should be battered back to a safe and stable angle during construction and as per the Client/Engineers requirements

## 16.8 Erosion and Sedimentation Control

The Contractor shall take all reasonable measures to limit erosion and sedimentation due to the construction activities and shall, in addition, comply with such detailed measures as may be required by the Scope of Work.

Where erosion and/or sedimentation, whether on or off the Site, occurs, rectification shall be carried out in accordance with details specified by the Engineer.

Where erosion and/or sedimentation occur due to the fault of the Contractor, rectification shall be carried out to the reasonable requirements of the Engineer, at the Contractor's cost.

The Contractor shall ensure that the Municipality storm water system is kept free from sediment arising from the Works.

Any runnels or erosion channels developed during the construction period or during the vegetation establishment period shall be backfilled and compacted, and the areas restored to a proper condition. Stabilisation of cleared areas to prevent and control erosion shall be pro-actively managed by the Contractor. The method of stabilisation shall be determined in consultation with the Engineer.

## 16.9 High & Low Voltage Electrical Installations

Should high voltage electrical lines/fencing be present on the site perimeter, the Contractor must take extra caution and demarcate as far as reasonably practicable. These demarcations must be maintained for the duration of the construction work. The minimum safety clearances as per Electrical Machinery Regulations must be adhered to.

The Principal Contractor and their contractors must ensure that prior notice is given to Local Authority Electrical Department of any work involving electrical installation. A lock-out certificate must be issued to the relevant Principal



Contractor. The Principal Contractor must ensure that a lock-out procedure is adhered to by his/her employees whenever required. The Principal Contractor must ensure that safety measures stipulated in the Electrical Installation Regulations, Machinery Regulations, General Machinery Regulations and Construction Regulations are always adhered to.

All installations must comply with SANS 10142 & the regulations of the OHS Act 85/1993 and Construction Regulation 24. All temporary electrical installations must be inspected at least weekly with proof placed on file.

#### **16.10 Removal of Rubble & Debris**

The Principal Contractor must ensure the safe removal of debris and rubble from all levels where demolition occur. A safe work procedure or method statement detailing the removal process and steps to be taken to contain the debris and rubble must be drafted and placed on File.

#### **16.11 Temporary Works and Support Work**

The Principal Contractor shall ensure that the provisions of Section 12 of Construction Regulations (February 2014) are adhered to.

These provisions must include but not be limited to ensuring that all equipment used is examined for suitability before use, that all Temporary Works and support work is inspected by a competent person immediately before, during and after placement of concrete or any other imposed load and thereafter daily until the Temporary Works and support work has been removed. Records of all inspections must be kept in a register on site. Temporary Works Design Drawings shall be provided by a competent person for all Temporary Works Structures

*A designated temporary works documentation file must be maintained on site at all times and must include records of all temporary works structures.*

*Note: Authorisation shall be provided in writing by a competent person before concrete is poured and before any temporary works structure is removed with proof placed on file. The Principal Contractor shall ensure that all employees erecting temporary works (False Work, Formwork, Support Work) are competent to perform such work, including the Temporary Works Designer, Temporary Works Supervisor and Temporary Works Inspector*

#### **Summary of required documents:**

- Temporary works design (signed off by designer)
- Temporary works designer appointment and competence
- Temporary works inspector appointment and competence
- Temporary works supervisor appointment and competence
- Material quality inspection (before use)
- Handover for steel fixing to load deck
- Authorisation to cast
- Pre during and post cast inspections
- Authorisation to strip

#### **16.12 Cranes (All) including a Crane Management Plan, Rescue Plan & (Emergency Procedures)**

The Principal Contractor and all other Contractors shall ensure that lifting machinery and tackle is inspected before use and thereafter in accordance with the Amended Driven Machinery Regulations (2015) and 23. Competent lifting machine and lifting tackle inspectors to be appointed and tasked with inspecting equipment daily or before use, taking into account that:

- Contractors to plan carefully when crane work is required.
- All lifting machinery and tackle must carry a load test certificate and must have an inspector register.
- All lifting machinery and tackle have a safe working load clearly indicated,
- Regular inspections and servicing are carried out
- There is proper supervision in terms of guiding the loads that includes a trained banksman/rigger to direct lifting operations and check lifting tackle,
- Rescue Plan to be provided
- All lifting machines shall be fitted with an anemometer (wind gauge) and a system shall be implemented to cease lifting activities when the measured wind speed exceed the design capabilities of the machine as set out by the manufacturer.
- Adequate control measures and procedures are required to determine the relevant loads when busy with lifting operations

The Principal Contractor to provide an updated Lifting Inventory and must include all lifting equipment and machinery with proof placed on file clearly indicating the inspection dates

*Note: Records are kept of inspections and of service certificates conducted by an approved LMI/LME. The operators are competent as well as physically and psychologically fit to work and in possession of a medical certificate of fitness to be available on site*

*Note: Sugar/sand/grit bags may not be used as lifting equipment and may only be used for its intended purpose or as per the manufacturer's specifications*

### 16.13 Permit to Work

All relevant permits must be obtained from Local Authority (where needed) before any demolition and construction work commences.

A permit system to be established for the following but not limited to:	Person responsible for the issue/close out of permit
<b>Hot work</b>	Safety manager /officer
<b>Entering Eskom controlled areas</b>	Construction Manager
<b>Entering deep excavations</b>	Appointed Excavation Supervisor
<b>Entering confined spaces (where applicable)</b>	Confined space supervisor

### 16.14 Access Routes/ Haul Roads

On the Site and, if so required, within such distance of the Site as may be stated by the Engineer, the Contractor shall control the movement of all vehicles and construction equipment, including that of his suppliers, so that they remain on designated routes, are distributed so as not to cause an undue concentration of traffic, and that all relevant laws are complied with.

In addition, the movement of such vehicles and construction equipment shall be planned and operated to minimise disruption to regular users of the routes.

As far as possible the Contractor shall use existing access and haul routes. Damage to existing access roads because of construction activities shall be repaired to the satisfaction of the Engineer, using material like that originally used. The cost of the repairs shall be borne by the Contractor. New temporary access or haul routes may only be established with the prior approval of the Engineer. The rehabilitation of such routes shall be to the Contractor's own cost and to the approval of the Engineer.

Any directional signage required by the Contractor for the purposes of directing the movement of his own vehicles and construction equipment (or that of his subcontractors or suppliers) must be of a design and in a location approved by the Engineer. Directional signage may not be erected in such a manner that it interferes with sight lines or pedestrian movement.

### 16.15 Plant and Machinery

#### 16.15.1 Pressure Equipment Regulations

The Principal Contractor and their contractors shall comply with the Pressure Equipment Regulations and SANS 10087, including:

- Providing competency and awareness training to the operators,
- Providing PPE or clothing,
- Inspect Equipment regularly and keep record of inspections,
- Providing appropriate firefighting equipment (Fire Extinguishers) on hand.
- Correct storage of cylinders

#### 16.15.2 Fire Extinguishers and Firefighting Equipment

The Principal Contractor shall provide adequate, regularly serviced fire-fighting 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. All fire extinguishers to be handled and inspected by competent persons in compliance with CR 29.

The Principal Contractor to provide an initial Fire Risk Assessment. Note: The Principal Contractor shall ensure that sufficient and suitable storage is provided for all flammable liquids, solids and gases.

The Principal Contractor shall ensure that sufficient number of workers is trained in the use of Fire Equipment.

### **16.15.3 Hired Plant and Machinery**

The Principal Contractor shall ensure that any hired plant and machinery used on site is safe for use. The necessary requirements as stipulated by the OHS Act 85/1993 and Construction Regulations (February 2014) shall apply. The Contractor shall ensure that operators hired with machinery are competent and that certificates are kept on site in the Health and Safety file. All relevant Contractors must ensure the same.

### **16.15.4 General Machinery**

The Principal Contractor shall ensure compliance with the amended Driven Machinery Regulations (2015), which include inspecting machinery regularly, appointing a competent person to inspect and ensure maintenance, issuing PPE or clothing, and training those who operate machinery.

### **16.16 Portable Electrical Tools**

The Principal Contractor and their contractors shall ensure that the use of all portable electrical tools follows relevant legislation.

The Contractor shall ensure that all electrical tools, electrical distribution boards, extension leads, and plugs are kept in safe working order. Regular inspections and toolbox talks must be conducted to make workers aware of the dangers and control measures to be implemented e.g. Personal protection equipment, guards, etc.

A competent person to undertake routine/daily inspections and records are kept. Only authorized trained persons to use the tools, the safe work procedures to apply. Awareness training to be carried out and compliance enforced always, and PPE and clothing are provided and maintained.

*Note: All power tools shall be inspected by the Authorised Operator daily with proof placed on file.*

### **16.17 Welding Equipment**

- Only authorized / trained persons to use the equipment.
- Welder using correct PPE - eye/ face/foot/body/respirator.
- Flashback arrestors fitted at cylinders and gauges when using gas welding equipment.
- Fire prevention methods to be applied.
- Where electric arc welders are used, equipment only to be used in a dry area, protected from wetness.
- All welding to be carried out in designated area, where not applicable welding screens to be used.
- Demarcation and signage

## **17.0 PUBLIC AND SITE VISITOR'S HEALTH AND SAFETY**

Both the Client and the Principal Contractor have a duty in terms of the OHS Act 85/1993 to do all that is reasonably practicable to prevent members of the public and site visitors from being affected by the construction activities. Site visitors must be briefed on the hazards and risks they may be exposed to and what measures are in place or should be taken to control these hazards and risks. A record of these inductions must be kept on site in accordance with the Construction Regulations.

Appropriate Nets, Canopies, Hoarding, Fencing, Gantry's and Crash Decks etc. must be provided to protect members of the public and their vehicles passing / entering the site, in accordance with Construction Regulation 27. Sufficient Safety, direction Signage and Flagmen to be placed to direct traffic near the site.

Principal Contractor to ensure that no unauthorized persons enter the construction area by implementing access control measures / registers.

## **18.0 NIGHT WORK**

Where work is required to be done during the night, and approved by the Engineer, the Contractor shall make adequate provision for additional lighting to ensure that the equipment and the areas where work is to be done are lighted. For this purpose, the Contractor will not be allowed just to make use of the lighting on the equipment, but to provide such floodlights on the plant and along the road to ensure 200 lux lighting levels.

The Contractor shall also make sure that this additional lighting is provided such that it does not interfere with the general traffic. Adequate lighting/illumination to be provided where required with backup generators. Security to be provided as and when needed. All emergency procedures to be in place. Adequate PPE to be provided for all employees e.g. Hi-Viz Vests.

## **18.0 OCCUPATIONAL HEALTH**

### **18.1 Occupational Hygiene**

Exposure of workers to occupational health hazards and risks is very common in any work environment, especially in construction. Occupational exposure is a major problem and Principal Contractor must ensure that proper health and hygiene measures are put in place to prevent exposure to these hazards.

#### ***The Risk to be looked at includes: Ventilation***

Adequate ventilation / extraction / exhausting in hazardous areas e.g. chemicals/ adhesives / welding / petrol or diesel/ motors running and in confined spaces /basements.

### **18.2 Noise**

Tasks identified where noise exceeds 85 dBA. All reasonable steps to be taken to reduce noise levels at the source. Hearing protection to be used where noise levels cannot be reduced below 85dBA.

#### **18.2.1 Noise Induced Hearing Loss**

Where noise is identified as a hazard the requirements of the NIHL regulations must be complied with and the following must be included / referred to in the Health and Safety Plan:

- Proof of training with regards to these regulations.
- Risk assessment
- Monitoring carried out by an AIA and done according to SABS 083.
- Medical surveillance programme established and maintained for the necessary employees.
- Engineering methods considered
- Admin control (number of employees exposed) considered
- Personal protective equipment considered/decided on
- Describe how records are going to be kept for 40 years.

### **18.3 Dust**

Principal Contractor to ensure that employees working with grinders, drills, etc. are issued with dust masks and dust exposure to be minimized at all times. Suitable measures to be implemented by the Principal Contractor to ensure that members of the public are not detrimentally affected by such activities. Working Area to be fully clad with a Hundred Percent Shade Cloth or anything similar.

### **18.4 Welfare Facilities**

The Principal Contractor to provide at least one sanitary facility for every 30 employees on site, including changing facilities & hand washing facilities. Safe and adequate eating areas must be provided. Waste bins must be strategically placed and emptied regularly. Safe and clean storage areas must be provided for workers to store personal belongings and personal protective equipment.

### **18.5 Waste Management**

Principal Contractor must implement their waste management in line with Environmental Terms and Conditions.

### **18.6 Alcohol and Other Drugs**

The Principal Contractor and their contractors to ensure that no alcohol and other drugs are 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 drugs must inform his/her superior, who shall in turn report this to the Contractor forthwith. Any person suffering from any illness / condition that may have a negative effect on his/her 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 his records. No Smoking is allowed on site.

## **ANNEXURE A - ACKNOWLEDGEMENT OF H&S SPECIFICATION**

### **Annexure A: Acknowledgement of Health and Safety Specification**

**Acknowledgement of Receipt of the Health and Safety Specifications:**

I, \_\_\_\_\_ representing

\_\_\_\_\_ Contractor

**Have satisfied myself with the content of the construction Health and Safety Specification and shall ensure that the Contractor and its personnel comply with all obligations / requirements in respect thereof.**

\_\_\_\_\_  
Signature of Principal Contractor

\_\_\_\_\_  
DATE

\_\_\_\_\_  
Signature of Client Agent

\_\_\_\_\_  
DATE

**COMMENTS:**

## **ANNEXURE B - APPOINTMENT OF PRINCIPAL CONTRACTOR**

Appointment of Principal Contractor

IN TERMS, OF

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

CONSTRUCTION REGULATION 5(1)(k)

I, ..... Client Responsible Person,  
for..... do hereby appoint:  
.....as the Principal Contractor  
of.....Project

### **Responsibilities:**

- *Prepare a Health and Safety Plan to comply with the requirements of the Construction Regulation 5(1)(b), and in compliance with the Health and Safety Specification for the Project.*
- *Ensure co-operation between all contractors to enable each of those contractors to comply with the provisions of these regulations.*
- *Provide all contractors with the required safety specification for their area of responsibility.*
- *Appoint each contractor in writing in accordance with Construction Regulations.*
- *Ensure implementation of the contractor's health and safety plan*
- *Stop contractors from working if not in accordance with the client specification*
- *Provide health and safety information to contractors should their design change*
- *Ensure all contractors are registered and in good standing with the compensation commissioner*
- *Ensure contractors submitting tenders have made provision for health and safety during construction*
- *Ensure risk assessments are conducted & the identified controls are communicated to all employees and visitors.*
- *Ensure Compliance to Occupational Health and Safety Act 85/1993, Construction Regulations 2014, Community Fire Safety Bylaw and Relevant Sans Codes.*

**Signature:** .....

**Date:** .....

**Client / Principal Agent**

### **Acceptance**

I, ..... hereby accept and acknowledge that I understand the requirements of this appointment.

**Signature:** .....

**Date:** .....

## ANNEXURE C - BASELINE RISK ASSESSMENT

Baseline Risk Assessment for Health and Safety Specification: Upgrade to the Zeekoevlei Weir in the False Bay Nature Reserve Project.				
Activity	Risk Rating	Hazard	Control Measure	Responsible Person
Off-loading of Material/deliveries and	H	<ul style="list-style-type: none"> <li>Possible load falling</li> <li>Public Safety-potential injuries to workers and members of the public</li> </ul>	<ul style="list-style-type: none"> <li>All work areas to be adequately demarcated-All Activities to done under supervision</li> <li>Ensure a spotter is available if and when needed.</li> <li>Once site has been secured it must be maintained to avoid unauthorised.</li> <li>Site security to be available.</li> <li>Relevant construction signage to be displayed</li> <li>Contractors to be aware of live services e.g. electrical cables.</li> </ul>	CR 8.1
	M	<ul style="list-style-type: none"> <li>Possible Collision/contact with property or stationary vehicles, workers and members of the public</li> </ul>	<ul style="list-style-type: none"> <li>Driver to be in possession of a valid driver's licence.</li> <li>All notices and signs to be obeyed. Driver to adhere to the speed limits. Employer and Driver to ensure that he is not intoxicated and must be of sober habits.</li> </ul>	CR 8.1
Carrying of material	M	<ul style="list-style-type: none"> <li>Possible Contact with fellow employees and results into possible injuries.</li> </ul>	<ul style="list-style-type: none"> <li>Employees to take caution when walking on site</li> <li>Employees to keep material as close to themselves or structure as possible to avoid possible contact with persons</li> <li>Ensure your vision is not obstructed.</li> <li>Watch your blind spots and get assistance when carrying heavy and large objects</li> </ul>	CR 8.1
	L	<ul style="list-style-type: none"> <li>Possible Falling material and possible foot and body injuries</li> </ul>	<ul style="list-style-type: none"> <li>Operatives to ensure that all material are adequately secured. Appropriate PPE to be worn at all times. Don't carry material in precarious (dangerous) positions so as to obstruct your vision etc.</li> </ul>	CR 8.1
	L	<ul style="list-style-type: none"> <li>Possible Ergonomics /Possible back injuries</li> </ul>	<ul style="list-style-type: none"> <li>Employees to ensure that they use correct bending techniques. Please get assistance when lifting heavy objects.</li> </ul>	CR 8.1
Off-loading of containers by means of Cranes	H	<ul style="list-style-type: none"> <li>Possible Uncontrolled release of Container and material</li> </ul>	<ul style="list-style-type: none"> <li>All work areas to be adequately demarcated with relevant signage displayed.</li> <li>Competent flagman and riggers to be present</li> <li>Only competent person to execute lifting operations</li> <li>All operators to have relevant documentation as per CR 23 and DMR 18.</li> <li>Task Specific Risk Assessments and Method Statement must be readily available and communicated to all relevant persons with proof placed on file</li> </ul>	CR 8.1

			<ul style="list-style-type: none"> <li>• Load test certificates for all lifting equipment and lifting Machinery.</li> <li>• All Contractors to be informed of live services e.g. electrical cables.</li> <li>• Only certified and load tested Lifting Equipment and Machinery shall be used. Lifting equipment shall be of good standard with correct latches etc.</li> </ul>	
		<ul style="list-style-type: none"> <li>• Possible Collision with property or stationary vehicles, workers and members of the public</li> </ul>	<ul style="list-style-type: none"> <li>• All work areas to be adequately demarcated with relevant signage displayed.</li> <li>• Competent flagman and riggers to be present</li> <li>• Only competent person to execute lifting operations.</li> <li>• All deliveries shall take place in the designated areas</li> </ul>	CR 8.1
		<ul style="list-style-type: none"> <li>• Possible Fall of persons while placing or removing chains from containers</li> </ul>	<ul style="list-style-type: none"> <li>• Safe Access to be provided.</li> </ul>	CR 8.1
<b>Brickwork and stacking thereof</b>	<b>L</b>	<ul style="list-style-type: none"> <li>• Possible cuts, fractures to employees' body. Stacks falling over or collapsing, or bricks knocked from scaffold platform.</li> </ul>	<ul style="list-style-type: none"> <li>• Only Competent Persons to conduct Activities.</li> <li>• Task Specific Risk Assessments to be provided.</li> <li>• Stacking of bricks must not be higher than two pallets and when stacking. Bricks shall not be stacked higher than toe boards when working on scaffolds.</li> <li>• Stay clear of suspended loads and ensure that only authorised persons give signals to crane operator when applicable.</li> </ul>	CR 8.1
<b>Working with Cement (Bagging/Plastering, Mortar etc.)</b>	<b>L</b>	<ul style="list-style-type: none"> <li>• Cement dust, Respiratory problems.</li> </ul>	<ul style="list-style-type: none"> <li>• Only Competent Persons to conduct Activities.</li> <li>• Task Specific Risk Assessments to be provided.</li> <li>• Dust masks to be used when spending even short periods of time in high dust areas and when using concrete saws/cutters or cement mixers.</li> </ul>	CR 8.1
	<b>L</b>	<ul style="list-style-type: none"> <li>• Possible Contact with cement dermatitis, skin burns, skin irritation</li> </ul>	<ul style="list-style-type: none"> <li>• Avoid contact with the skin as far as reasonably practicable.</li> <li>• Remove clothing that has been contaminated by wet concrete.</li> <li>• Wear suitable PPE e.g. Gum boots.</li> <li>• Wash hands thoroughly after contact and use a barrier cream.</li> </ul>	CR 8.1
	<b>L</b>	<ul style="list-style-type: none"> <li>• Possible Eye injuries</li> </ul>	<ul style="list-style-type: none"> <li>• Follow Safety instructions (MSDS) when using concrete additives.</li> </ul>	CR 8.1
	<b>L</b>	<ul style="list-style-type: none"> <li>• Faulty hand tools and the excessive inhalation of cement dust.</li> </ul>	<ul style="list-style-type: none"> <li>• Hand tools to be in good condition.</li> <li>• Persons mixing mortar should wear dust masks when required.</li> </ul>	CR 8.1
<b>Working in close proximity of electrical cables.</b>	<b>H</b>	Electrocution, even fatal. Damage to equipment	Equipment to be used to detect live/high voltage cables. Restricted areas to be identified. Toolbox Talks to be conducted on Risk	



			Assessments with declarations / acknowledgement signed daily. <b>PPE to be used:</b> • Safety glasses, safety shoes and overall (100% cotton) to be worn.	CR 8.1
<b>Lifting of Material</b>	<b>H</b>	• Unplanned release or dropping of load.	• Task Specific Method statements and Risk Assessments required as per CR 9 Excavators/digger-loader safe working load must be greater than the foreseeable weight of loads to be lifted. Load Test certificates of chains and slings to be obtained and put on file. • Compliance with CR 23 and DMR 18.	CR 8.1
<b>Temporary Works</b>	<b>H</b>	Collapses	Compliance with CR 12. Competent Contractor to be appointed Temporary Works designer to be appointed Design drawings to be approved by engineer	CR8.1
			<b>Handover Certificates required Before Concrete Pours and Before Stripping any Temporary Works material (Proof to be placed on file)</b> Task specific risk assessment to be compiled and Formwork to be inspected daily By competent person with proof placed on file	
	<b>H</b>	Falling of Persons/Material/Equipment	<b>All material to be adequately secured</b> <b>Task Specific Fall Protection Plan</b> <b>Adequate Signage and Demarcation required.</b> <b>Only Authorised persons to enter these areas- erecting and stripping</b> <b>Area must be declared safe prior to any person entering decks</b> <b>Compliance with CR 12.</b> <b>All RISK assessments and method statements to be communicated with relevant persons (Proof placed on file.)</b>	
<b>Steel Fixing</b>	<b>H</b>	Hand, back injuries	A competent contractor to be appointed. Manual handling to be minimized by the use of lifting equipment.	CR 8.1
	<b>M</b>	Cuts and abrasions	Only competent persons will use grinders and equipment.	CR8.1
			PPE to be supplied and used, including gloves	
			Trained steel fixers to be used who understand bending schedules and drawings.	
			Steel fixers will only work in areas that are protected with handrail when above 2 meters or use suitable fall arrest system.	
			Ladders to be removed or boarded up to prevent access outside working hours.	
	<b>H</b>	• Objects falling from boom/bucket	• Lifting to be supervised to ensure the stability of the machine and the load. • Loads must not be slewed over personnel, public vehicle or where there is a risk of possible injuries or property damage.	CR 8.1

			<ul style="list-style-type: none"> <li>• A banksman/rigger/spotter is to be used where driver's vision is impaired or where operating in congested areas.</li> </ul>	
<b>Cement</b>	<b>M</b>	Cement dust, Respiratory problems.	masks to be used when spending even short periods of time in high dust areas and when using concrete saws or cement mixers. <ul style="list-style-type: none"> <li>•</li> </ul>	CR8.1
	<b>M</b>	Dermatitis, Skin burns, Skin sensitisation	Avoid contact with the skin.	
			Remove clothing that has been contaminated by wet concrete.	
			Wear suitable PPE as listed below.	
			Wet concrete workers to wear Gum boots.	
			Wash hands thoroughly after contact and use a barrier cream.	
			Follow Health & Safety instructions when using concrete additives.	
<b>Working with Hazardous Substances</b>	<b>L</b>	<ul style="list-style-type: none"> <li>• Possible Respiratory problems.</li> </ul>	<ul style="list-style-type: none"> <li>• Respirators to be used when spending even short periods of time.</li> <li>• Adequate ventilation required.</li> <li>• Ensure that all containers are clearly identified when decanting</li> </ul>	CR 8.1
		<ul style="list-style-type: none"> <li>• Dermatitis, Skin burns, Skin sensitization</li> </ul>	<ul style="list-style-type: none"> <li>• Avoid contact with the skin as far as reasonably practicable.</li> <li>• Use barrier cream if possible.</li> </ul>	CR 8.1
		<ul style="list-style-type: none"> <li>• Possible Eye injuries</li> </ul>	<ul style="list-style-type: none"> <li>• Remove clothing that has been contaminated by wet hazardous substances.</li> </ul>	CR 8.1
			<ul style="list-style-type: none"> <li>• Wear suitable PPE as listed below.</li> <li>• Wash hands thoroughly after contact and use a barrier cream.</li> </ul>	CR 8.1
			<ul style="list-style-type: none"> <li>• Follow Safety instructions (MSDS) as indicated by the MSDS.</li> </ul>	CR 8.1
<b>Pouring of Concrete</b>	<b>M</b>	Manual handling of shutters and reinforcement	All work to be planned in advance and experienced personnel to be used to carry out work	CR 8.1
<b>Storage of Hazardous Substances</b>	<b>H</b>	<ul style="list-style-type: none"> <li>• Possible Explosion/fires Possible</li> </ul>	<ul style="list-style-type: none"> <li>• Comply with CR 25 &amp; CR 29. Store all Hazardous Substances in the correct categories.</li> <li>• Store all flammable material separately.</li> <li>• Ensure relevant signage is clearly displayed.</li> <li>• Adequate fire extinguishers to be readily available.</li> <li>• Fire Risk Assessment to be conducted by a competent person.</li> <li>• Hazardous bins to be provided</li> </ul>	CR 8.1
<b>Electrical Installations</b>	<b>M</b>	<ul style="list-style-type: none"> <li>• Possible Electrocution, even fatal. Damage to equipment</li> </ul>	<ul style="list-style-type: none"> <li>• Task Specific Method statements and Risk Assessments required as per CR 9</li> <li>• Competent contractor to be appointed if necessary.</li> </ul>	CR 8.1

			<ul style="list-style-type: none"> <li>• Equipment to be used to detect live/high voltage cables.</li> <li>• Restricted areas to be identified.</li> <li>• All installations must comply with SANS 10142 &amp; the regulations of the OHS Act 85/1993 and Construction Regulation 24 and Electrical Installation Regulations</li> <li>• Toolbox Talks to be conducted on Risk Assessments with declarations / acknowledgement signed daily.</li> <li>• Relevant PPE to be used.</li> <li>• Lockout procedures to be provided where applicable.</li> <li>• Only competent persons to be used with proof of competency to be provided.</li> </ul>	
			<ul style="list-style-type: none"> <li>• CoC must be issued for all electrical installations.</li> <li>• All temporary electrical installations to be inspected at least weekly and prior to use.</li> <li>• All cables to be treated as live</li> </ul>	CR 8.1
<b>Working at Heights including but is not limited to Scaffolds and Ladders</b>	<b>H</b>	<ul style="list-style-type: none"> <li>• Possible Fall of persons, Possible Death</li> </ul>	<ul style="list-style-type: none"> <li>• Task Specific Method statements and Risk Assessments required as per CR 9.</li> <li>• All work to be done under supervision.</li> <li>• Compliance with Fall Protection Plan.</li> <li>• All exposed to heights to medically fit issued by OHP/OHN.</li> <li>• Scaffolding to be SANS 10085-1:2004 compliant.</li> <li>• Daily inspections to be conducted as per CR 12. PPE to be worn at all times.</li> </ul>	CR 8.1
		<ul style="list-style-type: none"> <li>• Possible Falling Objects / Equipment. Falling/slipping</li> </ul>	<ul style="list-style-type: none"> <li>• As far as reasonably practicable, all equipment to be tied to rope.</li> <li>• No Items to be thrown from elevated positions but must be safely lowered.</li> <li>• No persons to work underneath overhead work area or ground.</li> <li>• No work on open structures at heights during inclement weather.</li> <li>• No work on scaffolding during wet conditions/inclement weather.</li> </ul>	CR 8.1
<b>Scaffold erecting &amp; dismantling</b>	<b>H</b>	<ul style="list-style-type: none"> <li>• Possible Falling of persons, Collapse of Scaffold structures and damage property and employees.</li> </ul>	<ul style="list-style-type: none"> <li>• Design Drawings required.</li> <li>• Work on scaffolds to be coordinated by appointed scaffold supervisor.</li> <li>• Lanyard to be used when erecting &amp; dismantling scaffolding. (Scaffold erectors) Compliance with SANS 10085-1:2004, CR 12 and CR 16.</li> <li>• All scaffolding to be inspected daily and after inclement weather and findings recorded in a register.</li> <li>• Fully boarded platforms must be provided at all times</li> <li>• Only those employees who are authorised may be on the scaffold.</li> <li>• Where safe platforms cannot be erected, safety harnesses are compulsory.</li> </ul>	CR 8.1
			<ul style="list-style-type: none"> <li>• Guard rails and toe boards compulsory.</li> </ul>	CR 8.1

			<ul style="list-style-type: none"> <li>• PPE required for persons working on scaffolding: safe shoes; hardhats.</li> <li>• Area below to be cordoned off.</li> <li>• Platforms to be cleaned on a daily basis.</li> <li>• Only competent erectors to change structure of scaffold.</li> <li>• No overloading of scaffold. PPE used: Safety boots, helmets, overalls.</li> </ul>	
<b>Working with Power Tools</b>	<b>H</b>	<ul style="list-style-type: none"> <li>• Possible Contact with moving parts.</li> </ul>	<ul style="list-style-type: none"> <li>• Task Specific Method statements and Risk Assessments required as per CR 9.</li> <li>• Only competent personnel should operate these tools.</li> </ul>	CR 8.1
			<ul style="list-style-type: none"> <li>• Machines to be checked before use, guards are correctly fitted and work properly.</li> </ul>	CR 8.1
		<ul style="list-style-type: none"> <li>• Noise above 85DbA</li> </ul>	<ul style="list-style-type: none"> <li>• Employees to be issued with relevant PPE including hearing protection.</li> </ul>	CR 8.1
		<ul style="list-style-type: none"> <li>• Possible Malfunction of Blade</li> </ul>	<ul style="list-style-type: none"> <li>• Blades should be regularly inspected to ensure they are sharp/good condition</li> </ul>	CR 8.1
		<ul style="list-style-type: none"> <li>• Possible Back Injuries</li> </ul>	<ul style="list-style-type: none"> <li>• Employees to be trained on proper lifting and bending techniques.</li> </ul>	CR 8.1
<b>Working with Hand Tools</b>	<b>M</b>	<ul style="list-style-type: none"> <li>• Possible Eye injury</li> </ul>	<ul style="list-style-type: none"> <li>• Visual checks must be completed by operatives on tools prior to their use.</li> <li>• Eye protection is to be provided and used whenever work is done using cold chisels or other tools where there is risk of flying particles or other pieces of the tool breaking off.</li> </ul>	CR 8.1
		<ul style="list-style-type: none"> <li>• Possible Injury to hands, feet and body</li> </ul>	<ul style="list-style-type: none"> <li>• Tools are required to be suitable for the purpose for which they to be used.</li> <li>• Open bladed knives, screwdrivers, and other sharp tools are to be carried and used so as not to cause injury to the user or others.</li> </ul>	CR 8.1
		<ul style="list-style-type: none"> <li>• Possible Tripping over tools</li> </ul>	<ul style="list-style-type: none"> <li>• Tools should not be left lying around, they constitute a severe tripping hazard and they are liable to get damaged.</li> </ul>	CR 8.1
<b>Lifting Operations</b>	<b>M</b>	<ul style="list-style-type: none"> <li>• Uncontrolled release of material</li> </ul>	<ul style="list-style-type: none"> <li>• Task Specific Method Statements and Risk Assessments required with proof of communication.</li> <li>• Rescue Plan and task specific Fall Protection Plan required, to be compiled by competent person.</li> <li>• Competent Banksman/Rigger to be readily available</li> </ul>	CR 8.1
			<ul style="list-style-type: none"> <li>• Banksman/Rigger to have signalling device</li> <li>• No person to be under suspended load</li> <li>• No Crane operations when banksman/Rigger is not available or present</li> <li>• Only appointed banksman/rigger to assist with lifting operations.</li> </ul>	CR 8.1

Excavations/ trenches with Plant and Manually	H	Possible fatalities/ injuries Possible Electrocution due to unknown electrical cables	Only Competent Persons to conduct Activities. Task Specific Risk Assessments and method statements to be provided. All contractors to comply with CR 9, CR 10, CR 12, 13 and CR 23. Way leaves or drawings to be obtained from the Client. Cable Detector to determine the presence of possible unknown services especially electrical cables. All work to be conducted under supervision	Cr 8.1
		Possible Damage to existing services	Way leaves or drawings to be obtained from the Client. Cable Detector to determine the presence of possible services especially electrical cables.	CR8.1
			<ul style="list-style-type: none"> <li>• Only competent persons to excavate.</li> <li>• Compliance with CR 13.</li> </ul> All work to be conducted under supervision	
		Possible Excavation collapse	<ul style="list-style-type: none"> <li>• Competent persons and contractor to be appointed in writing to supervise and inspect excavations.</li> <li>• Daily inspections to be conducted</li> <li>• Adequate bracing and shoring required as and when needed. Plant to stay at least 1m clear of Embankment</li> <li>• Excavation inspected daily by competent person</li> <li>• Access provided at least every 6 meters.</li> <li>• Shoring and bracing whenever necessary</li> <li>• Contractor to consult and communicate with the relevant Engineers</li> <li>• Backfilling done as soon as practicable.</li> <li>• Appropriate personal protective equipment required.</li> <li>• Relevant Signage to be provided and displayed</li> </ul>	
		Possible falling of Persons and plant into excavation	<ul style="list-style-type: none"> <li>• Task Specific FPP to be compiled by competent person.</li> <li>• Safe Access required for all mobile plant and persons</li> </ul>	

			<ul style="list-style-type: none"> <li>• Designated walkways</li> <li>• Physical barrier of at least 1-meter-high must be provided with relevant signage displayed</li> <li>• Backfilling to be done as soon as practicable.</li> </ul>	
<b>Traffic Management</b>		Possible Injuries. Public Safety Possible Road Accidents	<ul style="list-style-type: none"> <li>• Principal Contractor to comply with but not limited to, CR 9, Section 8 &amp; 9 of the OHS Act 85/1993.</li> <li>• Task Specific Method Statements and Risk Assessments required.</li> <li>• Traffic Plan and Layout to be approved and signed by Engineer/Client Representative and relevant local authorities</li> <li>• Advance construction Signage, Competent Flagmen and Traffic Safety Officer/s</li> <li>• Compliance with all relevant regulation and legislation including the South African Road Traffic Signs Manuel (SARTSM) Chapter 13.</li> <li>• Plan to be Monitored and Reviewed at least monthly (Every 30 Days) or as the building programme/activities changes</li> <li>• Adequate barriers and delineators to be provided and placed strategically as needed</li> <li>• Procedure for maintaining road signage</li> <li>• All employees working in or close to the road to wear Hi-Viz vests at all times</li> <li>• Flagmen shall be provided and readily available to assist with all Deliveries</li> <li>• Flagmen shall not be on duty for a period longer than 8 (eight) hours per day. Flagmen to be rotated as needed</li> <li>• Heat and Inclement weather to be considered for all Flagmen. Adequate control measures required</li> </ul>	CR 8.1
<b>Working Close to Water</b>	<b>H</b>	Possible Drowning	Principal Contractor (PC) to provide Safe Means of Access. PC to comply with CR 26. All work to be done under supervision.	CR8.1

			<ul style="list-style-type: none"> <li>• Emergency procedures and rescue plan to be provided. PC to provide task specific risk assessments</li> </ul>	
--	--	--	---	--

*Note: All Activities to be re-assessed by the Principal Contractor and their contractors prior to start of work and must be communicated with all relevant employees with proof placed on file.*

**Compiled by:**

Stephan Julius (Construction Health & Safety Agent with SACPCMP – CHSA/014/2014)

**Assisted by:**

Alphonso Potgieter (Construction Health & Safety Agent with SACPCMP – CHSA/116/2021)

**General Notes**

Principal Contractor to keep the following factors in mind:

- Special care to be taken of the environment and when working close to water, no pollution
- No smoking on site
- Avoid loitering
- Site Hoarding to be approved by Client with good aesthetics
- Store all material in designated areas provided by Client
- Safe access to be provided to all areas
- Works will be conducted in restrictive areas

**CITY OF CAPE TOWN**

**SPATIAL PLANNING AND ENVIRONMENT: ENVIRONMENTAL MANAGEMENT DEPARTMENT**

**CONTRACT NO. 285Q/2024/25**

**UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE**

## **C3.6 Annexes**

### **CONTENTS**

Annex 1: Monthly Project Labour Report

Annex 2: B-BBEE Sub-contract Expenditure Report

Annex 3: Joint Venture Expenditure Report

Annex 4: Targeted Labour Contract Participation Expenditure Report

Annex 5: Targeted Enterprises Contract Participation Expenditure Report



## ANNEX 1

## CITY OF CAPE TOWN MONTHLY PROJECT LABOUR REPORT



### Instructions for completing and submitting forms

#### General

- 1 The Monthly Project Labour Reports must be completed in full, using typed, proper case characters; alternatively, should a computer not be available, handwritten in black ink.
- 2 Incomplete / incorrect / illegible forms will not be accepted.
- 3 Any conditions relating to targeted labour stipulated in the Contract (in the case of contracted out services or works) shall apply to the completion and submission of these forms.
- 4 This document is available in Microsoft Excel format upon request from the City's EPWP office, tel 021 400 9406, email EPWPLR@capetown.gov.za.

#### Project Details

- 5 If a field is not applicable insert the letters: NA
- 6 Only the Project Number supplied by the Corporate EPWP Office must be inserted.  
The Project Number can be obtained from the Coordinator or Project Manager or from the e-mail address in point 4 above.
- 7 On completion of the contract or works project the anticipated end date must be updated to reflect the actual end date.

#### Beneficiary Details and Work Information

- 8 Care must be taken to ensure that beneficiary details correspond accurately with the beneficiary's ID document.

- 9 A new beneficiary is one in respect of which a new employment contract is signed in the current month. A certified ID copy must accompany this labour report on submission.
- 10 Was the beneficiary sourced from the City's job seeker database?
- 11 The contract end date as stated in the beneficiary's employment contract.
- 12 Where a beneficiary has not worked in a particular month, the beneficiary's name shall not be reflected on this form at all for the month in question.
- 13 Training will be recorded separately from normal working days and together shall not exceed the maximum of 23 days per month
- 14 Workers earning more than the maximum daily rate (currently R450 excluding any benefits) shall not be reflected on this form at all.

#### Submission of Forms

- 15 Signed hardcopy forms must be scanned and submitted to the City's project manager in electronic (.pdf) format, together with the completed form in Microsoft Excel format.
- 16 Scanned copies of all applicable supporting documentation must be submitted along with each monthly project labour report. Copies of employment contracts and ID documents are only required in respect of new beneficiaries.
- 17 If a computer is not available hardcopy forms and supporting documentation will be accepted.

### PROJECT DETAILS

Numbers in cells below e.g (6) refer to the relevant instruction above for completing and submitting forms

CONTRACT OR WORKS PROJECT NAME: (6)		EPWP SUPPLIED PROJECT NUMBER: (6)	
DIRECTORATE:		DEPARTMENT:	
CONTRACTOR OR VENDOR NAME:		CONTRACTOR OR VENDOR E-MAIL ADDRESS:	
CONTRACTOR OR VENDOR CONTACT PERSON:		CONTRACTOR OR VENDOR TEL. NUMBER:	CELL WORK
PROJECT LABOUR REPORT CURRENT MONTH (mark with "X")			
JAN	FEB	MAR	APR
MAY	JUN	JUL	AUG
SEP	OCT	NOV	DEC
YEAR			

ACTUAL START DATE (yyyy/mm/dd)		ANTICIPATED / ACTUAL END DATE (yyyy/mm/dd) (7)	
TOTAL PROJECT EXPENDITURE / VALUE OF WORK DONE TO-DATE (INCLUDING ALL COSTS, BUT EXCLUDING VAT)			
R			

## MONTHLY PROJECT LABOUR REPORT



CITY OF CAPE TOWN  
ISIXEKO SASEKAPA  
STAD KAAPSTAD

## BENEFICIARY DETAILS AND WORK INFORMATION

CONTRACT OR WORKS PROJECT NUMBER:				Year    Month		Sheet 1    of	
--------------------------------------	--	--	--	---------------	--	------------------	--

No.	(8) First name	(8) Surname	(8) ID number	(9) New Beneficiary (Y/N)	Gender (M/F)	Disabled (Y/N)	(10) Job seeker database (Y/N)	Contract start date (DDMMYY)	Contract end date (DDMMYY)	(12) No. days worked this month (excl. training)	(13) Training days	(14) Rate of pay per day (R – c)
1												
2												
3												
4												
5												
6												
7												
8												
9												
10												
11												
12												
13												
14												
15												
16												
17												
18												
19												
20												

0                      0 R                      -

Declared by Contractor or Vendor to be true and correct:	Name		Signature	
	Date			

Received by Employer's Agent / Representative:	Name		Signature	
	Date			

ANNEX 2

CITY OF CAPE TOWN

CONTRACT NO. AND NAME: \_\_\_\_\_

CONTRACTOR: \_\_\_\_\_

B-BBEE SUB-CONTRACT EXPENDITURE REPORT BASED ON PAYMENT CERTIFICATE NO. ....

Value of the contract (as defined in the Preference Schedule) (P*)	R	B-BBEE Status Level of Prime Contractor	
--	---	---	--

Name of Sub-contractor (list all)	B-BBEE Status Level of Sub-contractor <sup>1</sup>	Total value of Sub-contract (excl. VAT) <sup>1</sup>	Value of Sub-contract work to date (excl. VAT) <sup>1</sup>	Value of Sub-contract work to date (excl. VAT) <sup>1</sup>	Value of Sub-contract work to date (excl. VAT) <sup>1</sup>
Sub-contractor A		R	R	R	
Sub-contractor B		R	R	R	
Sub-contractor C		R	R	R	

<sup>1</sup> Documentary evidence to be provided	Total:	R
	Expressed as a percentage of P*	%

Signatures

Declared by Contractor to be true and correct: \_\_\_\_\_

Date: \_\_\_\_\_

Verified by Employer's Agent/  
Employer's Agent's Representative: \_\_\_\_\_

Date: \_\_\_\_\_

ANNEX 3

CITY OF CAPE TOWN

CONTRACT NO. AND NAME: \_\_\_\_\_

CONTRACTOR: \_\_\_\_\_

JOINT VENTURE EXPENDITURE REPORT BASED ON PAYMENT CERTIFICATE NO. ....

Value of the contract (as defined in the Preference Schedule) (P*)	R	B-BBEE Status Level of Joint Venture	
--	---	--------------------------------------	--

Name of Joint Venture partner (list all)	B-BBEE Status Level of each JV partner as at contract award	Percentage contribution of JV partner per JV Agreement <sup>1</sup> A	Total value of JV partner's contribution (excl. VAT) <sup>1</sup> B = A% x P*	Value of JV partner's contribution to date (excl. VAT) <sup>1</sup> C	Value of JV partner's contribution as a percentage of the work executed to date D = C/P*x100
JV Partner A		%	R	R	%
JV Partner B		%	R	R	%
JV Partner C		%	R	R	%

<sup>1</sup>Documentary evidence to be provided

Signatures

Declared by Contractor to be true and correct: \_\_\_\_\_

Date: \_\_\_\_\_

Verified by Employer's Agent/  
Employer's Agent's Representative: \_\_\_\_\_

Date: \_\_\_\_\_

ANNEX 4

CITY OF CAPE TOWN

CONTRACT NO. AND NAME: \_\_\_\_\_

CONTRACTOR: \_\_\_\_\_

TARGETED LABOUR CONTRACT PARTICIPATION EXPENDITURE REPORT BASED ON CERTIFICATE NO. \_\_\_\_\_

Value of the contract (as defined in the Preference Schedule) (P*)	R	Specified Targeted Labour Contract Participation Goal	%
--	---	---	---

Name of Contractor/Sub-contractor (list all)	Total previous expenditure on wages in respect of targeted labour	Net Amount for this month <sup>1</sup>	Total expenditure on wages in respect of targeted labour
Contractor	R	R	R
Sub-contractor A	R	R	R
Sub-contractor B	R	R	R
<sup>1</sup> Documentary evidence to be provided			
Total:			R
Expressed as a percentage of P*			%

Signatures

Declared by Contractor  
to be true and correct: \_\_\_\_\_

Date \_\_\_\_\_

Verified by Employer's  
Agent/  
Employer's Agent's  
Representative: \_\_\_\_\_

Date \_\_\_\_\_

ANNEX 5

CITY OF CAPE TOWN

CONTRACT NO. AND NAME: \_\_\_\_\_

CONTRACTOR: \_\_\_\_\_

TARGETED ENTERPRISES CONTRACT PARTICIPATION EXPENDITURE REPORT BASED ON CERTIFICATE NO. \_\_\_\_\_

Value of the contract (as defined in the <b>Preference Schedule</b> ) (P*)	R	Specified Targeted Enterprises Contract Participation Goal	%
--	---	--	---

Name of targeted enterprise (list all)	Total previous expenditure (excl. VAT) to targeted enterprises	Net Amount for this month <sup>1</sup>	Total expenditure (excl. VAT) to targeted enterprises
Targeted Enterprise A	R	R	R
Targeted Enterprise B	R	R	R
Targeted Enterprise C	R	R	R
<sup>1</sup> Documentary evidence to be provided			Total: R
			Expressed as a percentage of P* %

Signatures

Declared by Contractor  
to be true and correct: \_\_\_\_\_

Date \_\_\_\_\_

Verified by Employer's  
Agent/  
Employer's Agent's  
Representative: \_\_\_\_\_

Date \_\_\_\_\_

---

**Part C4: Site information**

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	<b>Pages</b>
<b>C4    Site information .....</b>	<b>233 - 245</b>

CITY OF CAPE TOWN

SPATIAL PLANNING AND ENVIRONMENT: ENVIRONMENTAL MANAGEMENT DEPARTMENT

CONTRACT NO. 285Q/2024/25

UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE

## **C4 Site Information**

### **CONTENTS**

- 1.0 INTRODUCTION**
- 2.0 SITE ACCESS & TEMPORARY ROADS**
- 3.0 SITE CONDITIONS**
  - 3.1 HYDROLOGICAL INVESTIGATION
  - 3.2 GEOTECHNICAL INVESTIGATION
- 4.0 PROPOSED INDICATIVE CONSTRUCTION PHASING DIAGRAMS**
  - 4.1 EXISTING ZEEKOEVLEI WEIR PRECINCT
  - 4.2 ZEEKOE RIVER FISHWAY PRECINCT
- 5.0 SUBCOUNCIL LOCALITY MAPS**



## 1.0 INTRODUCTION

The Contractor is cautioned that the information contained in this section is limited and is by no means to be taken as conclusive. It is merely to give the Contractor an indication of the site and typical conditions that can be expected in the project area. The Contractor is to take note of the information presented here and make their own conclusions as to what conditions can be expected on and around the site.

## 2.0 SITE ACCESS & TEMPORARY ROADS

Site access will be restricted to certain access roads within the False Bay Nature Reserve, as well as via the Strandfontein Waste Water Treatment Works. Drawing HHO-220102-700-1000 provides a detailed layout of the various roads and the position of the construction works, as well as the site camp and stockpile area. A simplified version of this is shown in Figure 1 below.



**Figure 1. Locality plan of site access roads and site camp location**

To the north of the existing Zeekoevlei Weir, access can be gained from Peninsula Road. This is an existing surfaced public road used by the residents of Zeekoevlei. It is imperative that safety signage and traffic management procedures are in place if and when construction vehicles use this access point. The road which connect Peninsula Road to the existing weir (identified as existing access road 1) is approximately 3m wide with an existing laterite surface. It is expected that ongoing maintenance will be required throughout construction to maintain the status quo of this road, and prevent damage caused by heavy vehicles such as concrete trucks.

The site camp and stockpile area will be located within Billy's Block, east of the proposed culvert vehicle bridge. No satellite camps or stockpiles will be permitted. Once the culvert bridge has been completed, access for construction vehicles to the Zeekoevlei Weir precinct will be via the bridge, and not Peninsula Road. In order to establish the site camp at this location, and for ongoing access during construction, a temporary access road will need to be constructed between the Peninsula Radio Flyers Club and the culvert bridge.

The road between the False Bay Nature Reserve Headquarters and the Peninsula Radio Flyers Club is currently a dirt track, approximately 3m wide and 500m long. It is expected that ongoing maintenance will be required throughout the contract to maintain the status quo of this road, and prevent damage caused by construction vehicles.

The Zeekoe River Fishway precinct to the south is accessible via the Strandfontein Waste Water Treatment Works. A section of dirt road, approximately 3m wide and 1050m long, known as existing access road 3 is shown in Figure 2 below. It is expected that ongoing maintenance will be required throughout the contract to maintain the status quo of this road, and prevent damage caused by construction vehicles. It may also be necessary to improve the existing quality of this road to accommodate the heavy vehicles.



**Figure 2. Existing access road 3**

### **3.0 SITE CONDITIONS**

#### **3.1 HYDROLOGICAL INVESTIGATION**

##### **3.1.1 Introduction**

The Zeekoevlei and Rondevlei wetland system is shown in Figure 3 below. The diagram shows that the existing Rondevlei weir discharges into the Rondevlei canal, which joins the Zeekoevlei system immediately downstream of the Zeekoevlei weir. A single earth channel accommodates both the flows from Rondevlei and Zeekoevlei and transports the flows to the sea.



**Figure 3: Overall view of the Rondevlei and Zeekoevlei wetland systems**

Details of the two Zeekoevlei and Rondevlei catchments are shown in Table 1.

**Table 1 – Rondevlei and Zeekoevlei catchment data**

**Details of the present-day Zeekoevlei and Rondevlei**

	Zeekoevlei	Rondevlei
Catchment area	$8.01 \times 10^7 \text{ m}^2$	$1.23 \times 10^7 \text{ m}^2$
Mean annual runoff	$2.01 \times 10^7 \text{ m}^3$	$4.26 \times 10^6 \text{ m}^3$
Lake surface area	$2.56 \times 10^6 \text{ m}^2$	$4.49 \times 10^5 \text{ m}^2$
Lake volume	$5.0 \times 10^6 \text{ m}^3$	$6.8 \times 10^3 \text{ m}^3$
Lake mean depth	1.91 m	1.43 m
Mean annual precipitation minus evaporation	-0.85 m	-0.85 m

### 3.1.2 Rondevlei Catchment Runoff

The rainfall data was obtained from the City of Cape Town's Rainfall Grid, which makes allowance for a 15% increase due to climate change:

- Location: 34 deg 3 mins (lat) ; 18 deg 29 mins (long)
- MAP: 772 mm

Following this, runoff was calculated both using the rational method and a PCSWMM model. The runoff calculate is provided in Table 2.

Table 2: Rainfall and runoff data for Rondevlei catchment

Recurrence Period	2	5	10	20	50	100
24 hr Rainfall (mm)	74.1	99.4	117.8	137	163.9	186.0
Rational method runoff (m <sup>3</sup> /s)	21.5	28.2	34.8	56.8	70.3	21.5
PCSWMM model runoff (m <sup>3</sup> /s)	3.7	6.4	7.8	9.7	11.5	3.7

### 3.1.3 Zeekoevlei Catchment Runoff

As a hydrological study of the Big and Little Lotus Rivers is an extensive undertaking and was not within the scope of this project, a very simplified approach (interpolation and extrapolation) was used to determine the flow rates from the available information so that the required analyses could be adequately conducted.

The 100 year peak flow over the Zeekoevlei weir was estimated at approximately 24m<sup>3</sup>/s.

## 3.2 GEOTECHNICAL INVESTIGATION

### 3.2.1 Background

A geotechnical investigation was undertaken in June 2023 by HHO to determine the subsurface conditions at the location of the proposed Rondevlei weir and upper fishway. This investigation included rotary borehole drilling, including standard penetration testing at 1,5m intervals, detailed logging of the boreholes, in-situ dynamic cone super heavy (DPSH) testing, and recording/monitoring of water table depth.

An initial desk study of the site and surrounds was conducted prior to the on-site testing which was conducted by Fairbrother Geotechnical Engineering.

### 3.2.2 Scope of Work

Rotary core boreholes were drilled at two (2) positions, in the vicinity of the existing Zeekoevlei Weir. Prior to drilling, pilot holes were hand-dug at each borehole location to ensure no services were present. Standard Penetration Tests (SPTs) at typically 1.5m intervals were conducted in both boreholes. Piezometers were installed into each of the two (2) boreholes for the purpose of monitoring water rest levels.

The two boreholes indicate that the site soil profile comprises aeolian (wind-blown) sandy soils overlying transported sands with calcretes present at depth. A groundwater table depth of 1,4m to 3,5m below existing ground levels is apparent.

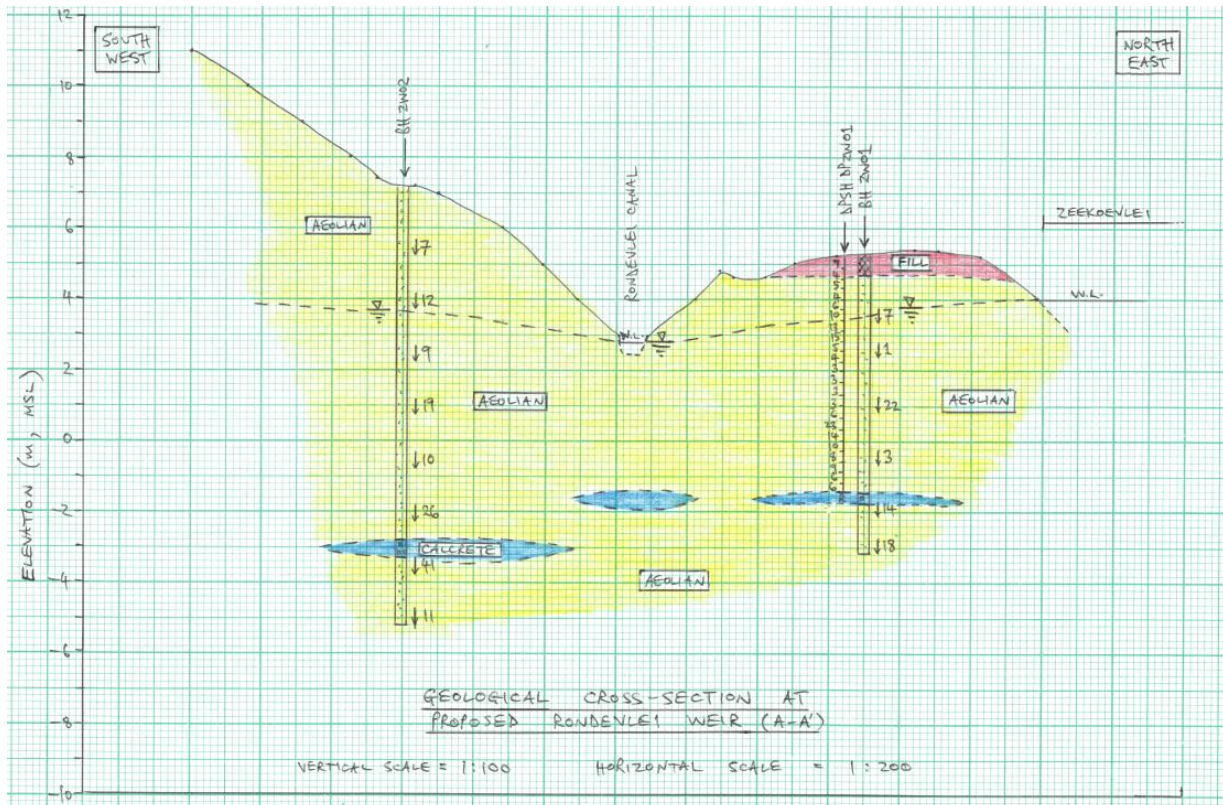
Dynamic Probe Super Heavy (DPSH) testing was conducted to verify and supplement the information gathered by the boreholes and to gather in-situ soil density data. Two (2) DPSH's were conducted with the blow counts for every 100mm (10cm) being recorded



i.e:  $N_{10H}$  value. Prior to probing, pilot holes were hand-dug at each DPSH location to ensure no services were present. The locations and results of these tests can be found in **Annexure A: Factual Report on Subsurface Investigations**.

### 3.2.3 Soil Profile and Groundwater

The two boreholes at the site indicate that the site soil profile comprises aeolian (wind-blown) sandy soils overlying transported sands with calcretes present at depth. A groundwater table depth of 1,4m to 3,5m below existing ground levels is apparent. Borehole BHZW\_01 revealed some disturbed ground or filled material in the upper 600mm from existing ground surface. The findings are summarized in the cross section shown in Figure 4.



**Figure 4: Geological Cross-section**

## 4.0 PROPOSED INDICATIVE CONSTRUCTION PHASING DIAGRAMS

The construction works will be taking place in two precincts, the existing Zeekoevlei Weir precinct and the Zeekoe River Fishway precinct. The construction phasing for each precinct has been carefully considered and is discussed further below. It should be noted that construction may need to be undertaken in both precincts concurrently. Programming of the project's scope of works will need to be thoroughly planned prior to commencement of works.

### 4.1 EXISTING ZEEKOEVLEI WEIR PRECINCT

This portion of the construction is highly complex, as it comprises numerous interconnected structural elements, at widely varying founding levels, while accounting for flows in two separate watercourses. It also involves significant earthworks, with most of the new works being placed several meters below the existing ground level and the water table.

It is envisioned that a temporary site camp be established within this precinct, while a permanent site camp is established within Billy's Block on the Eastern side of the reserve. All stockpiling of materials will need to take place within Billy's Block, with only small stockpiles adjacent to the temporary site camp. Work will need to be undertaken on both sides of the Zeekoe River simultaneously. Once access is created across the Zeekoe River, the temporary site camp will

need to be removed. The overview of the stages to the construction within the precinct are as follows:

*Stage 1:* Site camp temporary access road from Peninsula Flying Club to Zeekoevlei Weir and access ramp to Zeekoevlei weir apron on the eastern side. Simultaneously, on the western side, a temporary crossing of the Rondevlei canal is established, and bulk earthworks for western portion of the new Rondevlei weir channel completed.

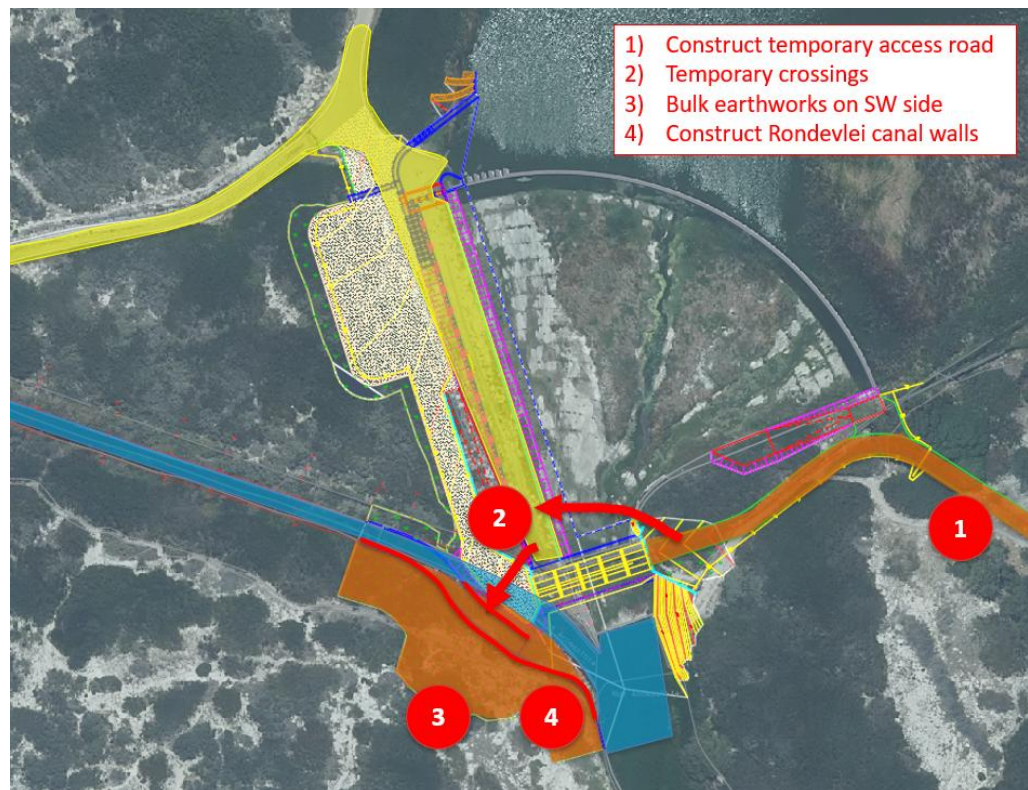
*Stage 2:* Construct realigned Rondevlei Canal walls and divert the canal. Construction of vehicular bridge over Zeekoevlei apron.

*Stage 3:* Construction of cofferdam above and below Zeekoevlei sluice gates to enable bulk earthworks for the majority of the site

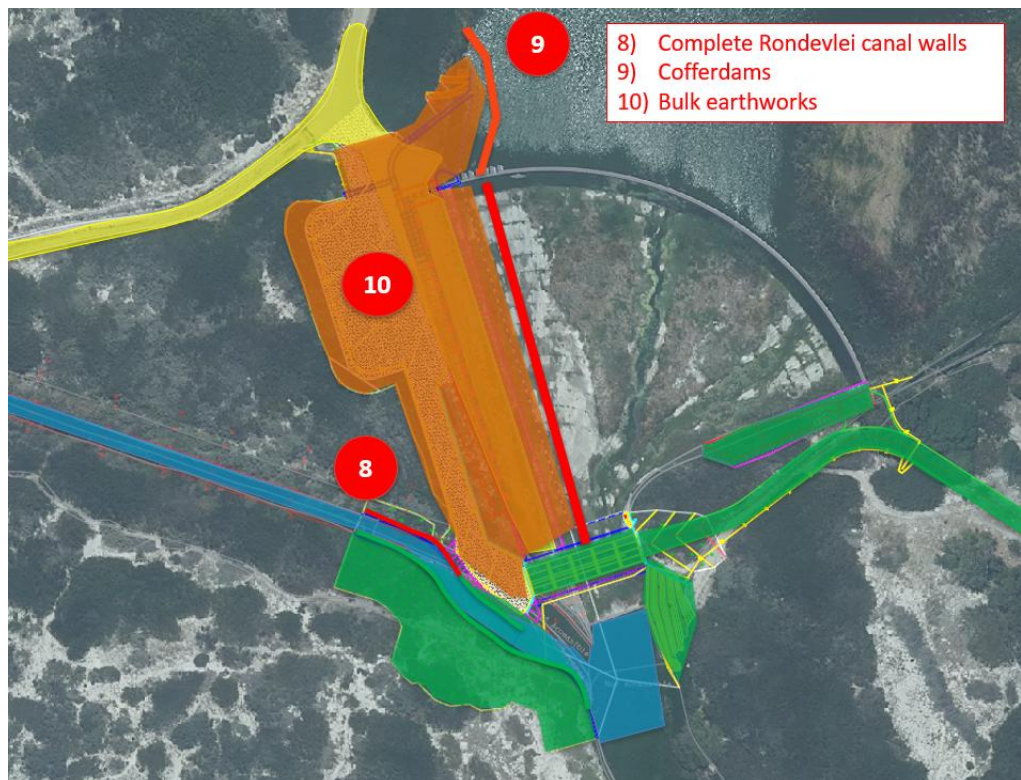
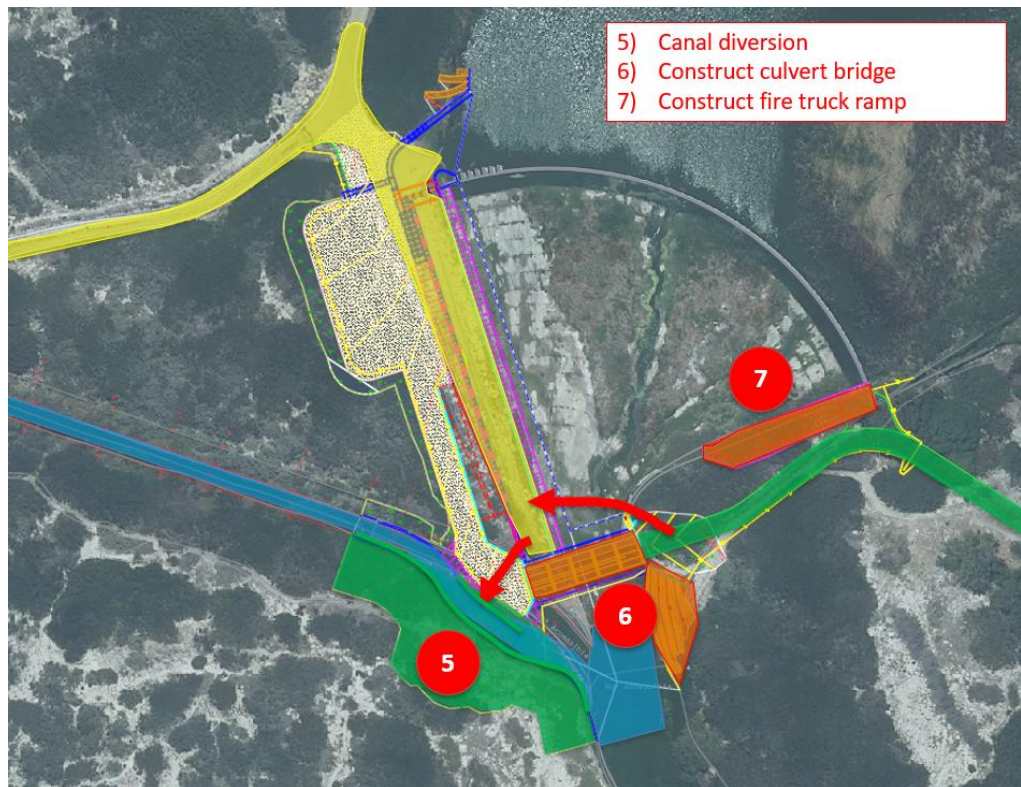
*Stage 4:* Local foundation excavations and concrete works to be completed for the gate house, fishway, sluice channel and vehicle ramp.

*Stage 5:* Gabion works, removal of cofferdams and temporary access. Final roadworks and sundry items such as fencing and gates.

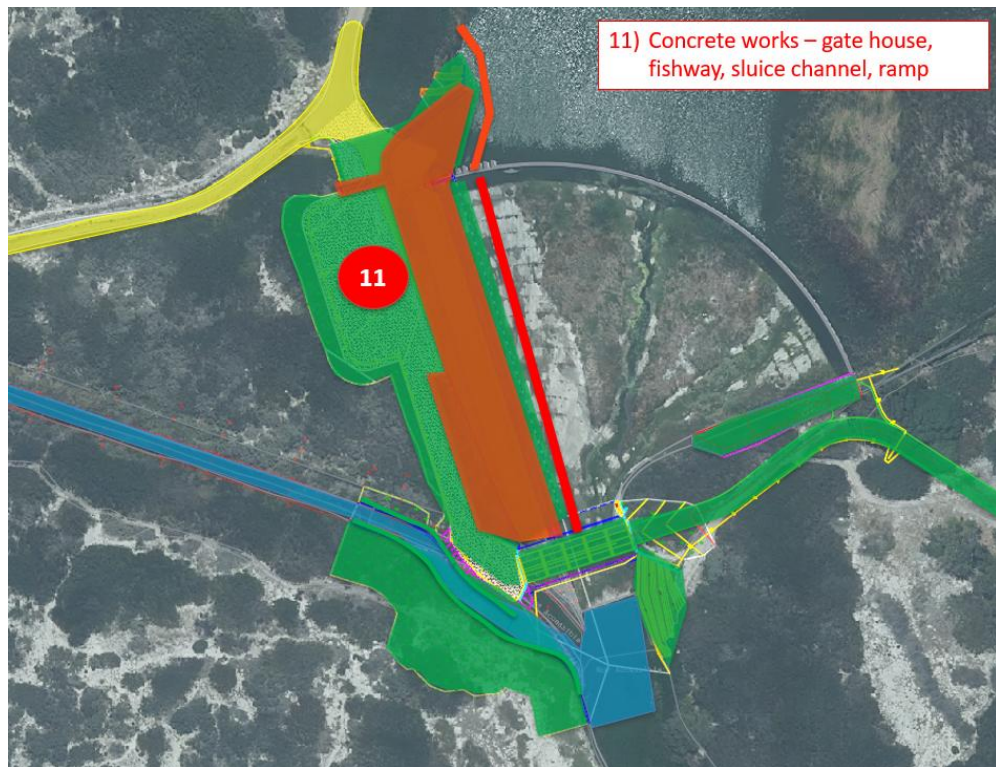
These stages are shown in the diagrams which follow.











#### 4.2 ZEEKOE RIVER FISHWAY PRECINCT

This site has the highest water flows, and it is anticipated that it will be less feasible to divert or stop the flow of water through this site compared to the site upstream, for practical and environmental reasons. Since much of the works are in or immediately adjacent to the river, construction will take place sequentially behind a series of berms or cofferdams that are established and removed one after another.



Stage 1: Construction of a cofferdam to protect the Eastern side of the river

Stage 2: Bulk earthworks on the Eastern side of the river, behind the cofferdam, followed by concrete works and gabion construction on the Eastern side of the river

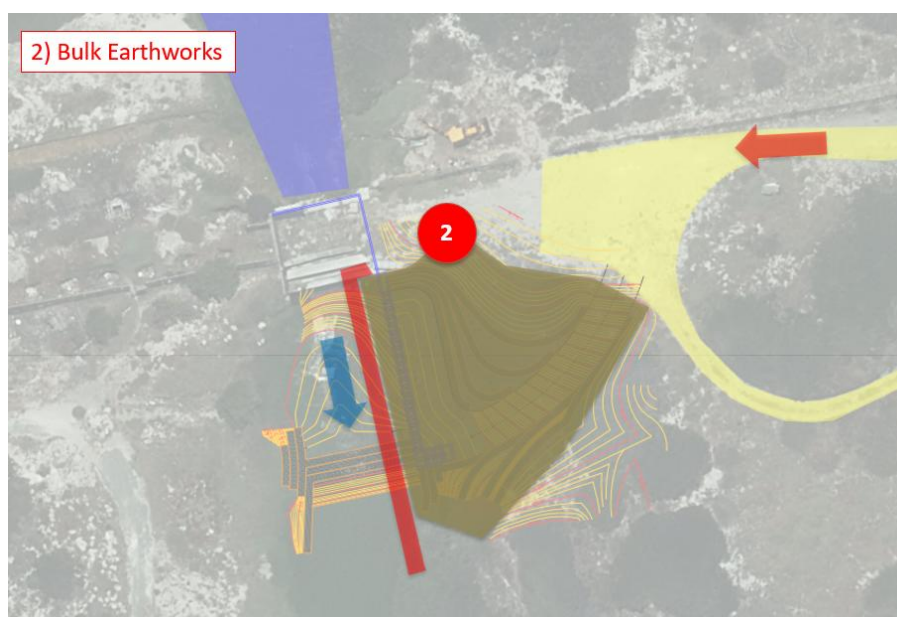
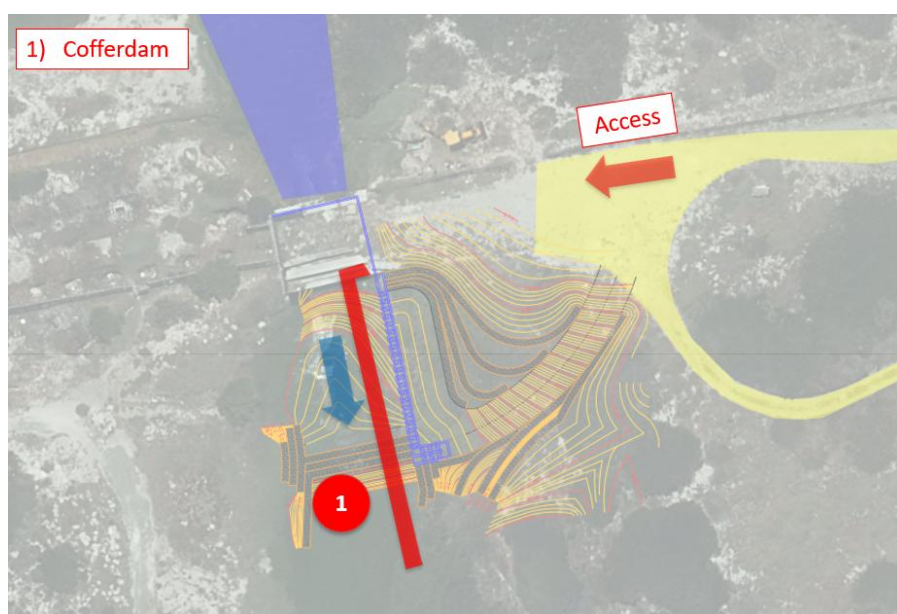
Stage 3: Construction of second cofferdam to protect the Western side of the river and demolition of first cofferdam. Construction of road and parking area.

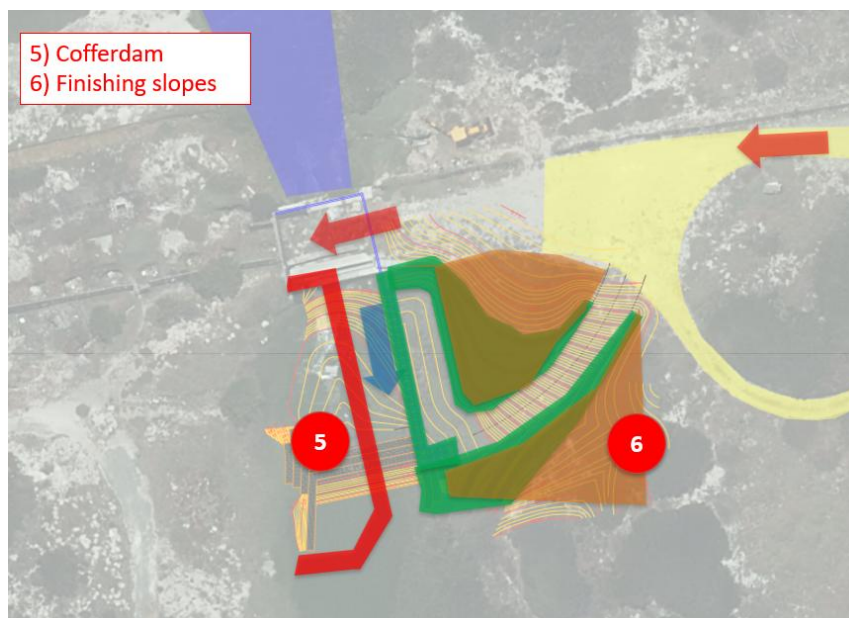
Stage 5: Bulk earthworks and gabion construction on Western side of the river, including Western portion of gabion weir in the watercourse

Stage 6: Demolition of second cofferdam and construction of third cofferdam to protect Eastern portion of gabion weir

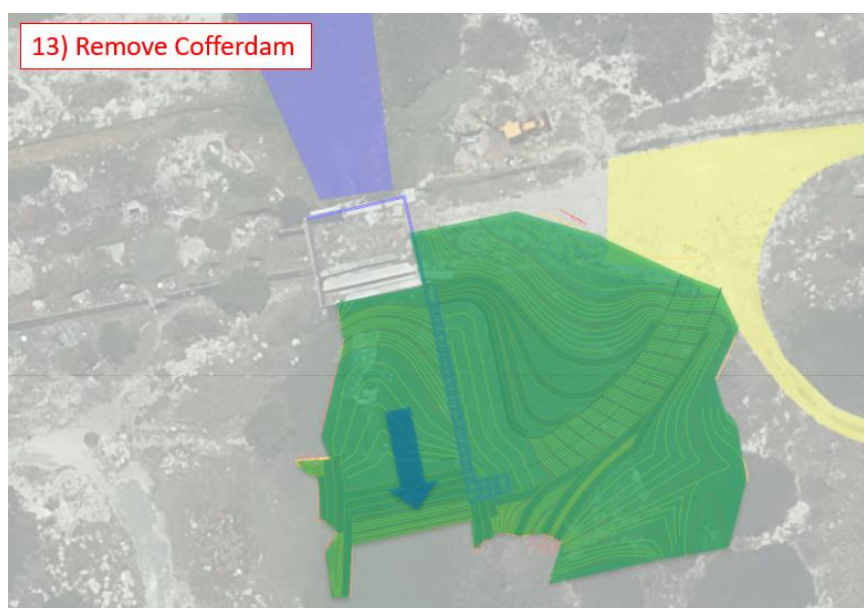
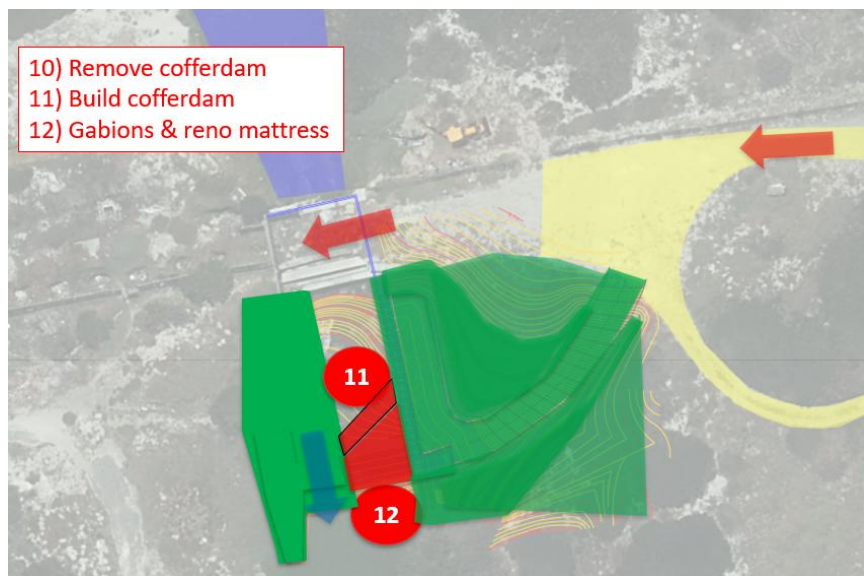
Stage 7: Completion of Eastern portion of gabion weir. Removal of third cofferdam.

These stages are shown in the diagrams which follow.











The project area falls within Subcouncil 18 which is shown in Figure 5.



**Figure 5: City of Cape Town Subcouncil 18 map**

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**Part C5: Returnable Documents**

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	<b>Pages</b>
<b>C5.1 List of Returnable Documents .....</b>	<b>247</b>
<b>C5.2 Returnable Schedules .....</b>	<b>248 – 286</b>

## C5.1 List of Returnable Documents

The tenderer must complete the following Returnable Documents in non-erasable **black ink**:

### Returnable Schedules that will be incorporated into the Contract

	Pages
1: COMPULSORY ENTERPRISE QUESTIONNAIRE .....	249-250
2: CERTIFICATE OF INDEPENDENT TENDER DETERMINATION .....	251-252
3: CERTIFICATE OF AUTHORITY FOR JOINT VENTURES.....	253
4: DECLARATION OF TENDERER'S PAST SUPPLY CHAIN MANAGEMENT PRACTICES (MBD 8) .....	254-255
5: DECLARATION OF INTEREST – STATE EMPLOYEES (MBD 4) .....	256-258
6: DECLARATION OF INTEREST .....	259
7: AUTHORISATION FOR THE DEDUCTION OF OUTSTANDING AMOUNTS OWED TO CCT .....	260
8: DECLARATION IN RESPECT OF COMPLIANCE WITH LABOUR LEGISLATION .....	261
9: CONFIRMATION OF CCT SUPPLIER DATABASE REGISTRATION.....	262
10: SCHEDULE OF WORK EXPERIENCE OF TENDERER .....	263-264
11: SCHEDULE OF EQUIPMENT INSTALLATIONS AND SERVICE HISTORY .....	265
12: CONFIRMATION OF CONTRACTOR REGISTRATION / ACCREDITATION .....	266
13: DETAILS OF QUALIFICATIONS/REGISTRATIONS AND EXPERIENCE OF CONSTRUCTION MANAGER .....	267-268
14: SCHEDULE OF CONSTRUCTION EQUIPMENT .....	269-270
15: DETAILS OF TENDERER'S WORKSHOP FACILITIES .....	271
16: PRELIMINARY PROGRAMME (FOR INFORMATION PURPOSES ONLY) .....	272
17: PROPOSED WORK PLAN .....	273
18: SCHEDULE OF ESTIMATED MONTHLY EXPENDITURE .....	274
19: SCHEDULE OF SUBCONTRACTORS.....	275
20: HEALTH AND SAFETY PLAN .....	276
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### Other documents required for tender evaluation purposes

- a) Joint Venture Agreement (if applicable) - append to Schedule 3.
- b) Health and Safety Plan - append to Schedule 20.
- c) Functionality Criteria - append to Schedule 22.

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## **C5.2 Returnable Schedules**

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**SCHEDULE 1: 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.	
<b>Section 1: Name of enterprise:</b> .....	
<b>Section 2: VAT registration number, if any:</b> .....	
<b>Section 2a: National Treasury Central Supplier Database registration number :</b> .....	
<b>Section 2b: SARS Tax Compliance Status PIN :</b> .....	
<b>Section 3: CIDB registration number, if any:</b> .....	
<b>Section 4: Particulars of sole proprietors and partners in partnerships</b>	
* Complete only if sole proprietor or partnership and attach separate page if more than 3 partners	
<b>Section 5: Particulars of companies and close corporations</b>	
Company registration number .....	
Close corporation number .....	
Tax reference number .....	
<b>Section 6: Foreign Bidding Suppliers</b>	
Is tenderer the accredited representative in South Africa for the Goods / Services / Works offered?	<input type="checkbox"/> Yes <input type="checkbox"/> No If yes, enclose proof
Is tenderer a foreign based supplier for the Goods / Services / Works offered?	<input type="checkbox"/> Yes <input type="checkbox"/> No If yes, answer the Questionnaire to Bidding Foreign Suppliers (below)
<b>Questionnaire to Bidding Foreign Suppliers</b>	
a) Is the tenderer a resident of the Republic of South Africa or an entity registered in South Africa?	<input type="checkbox"/> Yes <input type="checkbox"/> No
b) Is the tenderer a resident of the Republic of South Africa or an entity registered in South Africa?	<input type="checkbox"/> Yes <input type="checkbox"/> No
c) Does the tenderer have a permanent establishment in the Republic of South Africa?	<input type="checkbox"/> Yes <input type="checkbox"/> No
d) Does the tenderer have any source of income in the Republic of South Africa?	<input type="checkbox"/> Yes <input type="checkbox"/> No
e) Is the tenderer liable in the Republic of South Africa for any form of taxation?	<input type="checkbox"/> Yes <input type="checkbox"/> No



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

- i) authorizes the Employer to obtain a tax clearance certificate from the South African Revenue Services that my / our tax matters are in order;
- ii) confirms that the neither the name of the enterprise or the name of any partner, manager, director or other person, who wholly or partly exercises, or may exercise, control over the enterprise appears on the Register of Tender Defaulters established in terms of the Prevention and Combating of Corrupt Activities Act of 2004 or Database of Restricted Suppliers;
- iii) confirms that no partner, member, director or other person, who wholly or partly exercises, or may exercise, control over the enterprise appears, has within the last five years been convicted of fraud or corruption;
- iv) confirms that I / we are not associated, linked or involved with any other 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
- iv) 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*

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**SCHEDULE 2: CERTIFICATE OF INDEPENDENT TENDER DETERMINATION**

I, the undersigned, in submitting this tender for Contract No. **285Q/2024/25: UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE**

in response to the invitation for the tender made by the City of Cape Town, 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 Tenderer)

1. I have read and I understand the contents of this Certificate;
2. I understand that this tender will be disqualified if this Certificate is found not to be true and complete in every respect;
3. I am authorized by the tenderer to sign this Certificate, and to submit this tender on behalf of the tenderer;
4. Each person whose signature appears on this tender has been authorized by the tenderer to determine the terms of, and to sign, the tender, on behalf of the tenderer;
5. For the purposes of this Certificate and this tender, I understand that the word "competitor" shall include any individual or organization, other than the tenderer whether or not affiliated with the tenderer, who:
  - (a) has been requested to submit a tender in response to this invitation to tender;
  - (b) could potentially submit a tender in response to this invitation to tender, based on their qualifications, abilities or experience; and
  - (c) provides the same goods and services as the tenderer and/or is in the same line of business as the tenderer;
6. The tenderer has arrived at this tender independently from, and without consultation, communication, agreement or arrangement with any competitor. However, communication between partners in a joint venture or consortium<sup>1</sup> will not be construed as collusive tendering;
7. In particular, without limiting the generality of paragraph 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 tender;
  - (e) the submission of a tender which does not meet the specifications and conditions of the tender; or
  - (f) tendering with the intention not to win the tender;

<sup>1</sup>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.

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 invitation to tender relates;
9. The terms of this tender have not been, and will not be, disclosed by the tenderer, directly or indirectly, to any competitor, prior to the date and time of the official tender opening or of the awarding of the contract;
10. I am aware that , in addition and without prejudice to any other remedy provided to combat any restrictive practices related to tenders and contracts, tenders that are suspicious will be reported to the Competition Commission for investigation and possible imposition of administrative penalties in terms of section 59 of the Competition Act No. 89 of 1998 and or may be reported to the National Prosecuting Authority (NPA) for criminal investigation and or may be restricted from conducting business with the public sector for a period not exceeding ten (10) years in terms of the Prevention and Combating of Corrupt Activities Act No. 12 of 2004 or any other applicable legislation.

.....  
Signature

.....  
Date

.....  
Name

.....  
Position

SCHEDULE 3: CERTIFICATE OF AUTHORITY FOR JOINT VENTURES

This returnable schedule is to be completed by joint ventures.

We, the undersigned, are submitting this tender offer in joint venture and hereby authorize

Mr/Ms .....  
.....authorised signatory of the company,  
close corporation or partnership .....  
....., acting in the capacity  
of lead partner, to sign all documents in connection with the tender offer and any contract resulting from it on our behalf.

NAME OF FIRM	ADDRESS	DULY AUTHORISED SIGNATORY
Lead partner		Signature..... Name..... Designation.....
		Signature..... Name..... Designation.....
		Signature..... Name..... Designation.....
		Signature..... Name..... Designation.....

Note :

A copy of the Joint Venture Agreement, showing clearly the **percentage contribution of each partner** to the joint venture, shall be appended to this schedule.

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**SCHEDULE 4: DECLARATION OF TENDERER'S PAST SUPPLY CHAIN MANAGEMENT PRACTICES (MBD 8)**

Where the entity tendering is a joint venture, each party to the joint venture must sign a declaration in terms of the Municipal Finance Management Act, 56 of 2003, and attach it to this schedule.

- 1 The tender offer of any tenderer may be rejected if that tenderer or any of its directors/members have:
  - a) abused the municipality's / municipal entity's supply chain management system or committed any improper conduct in relation to such system;
  - b) been convicted for fraud or corruption during the past five years;
  - c) willfully neglected, reneged on or failed to comply with any government, municipal or other public sector contract during the past five years; or
  - d) 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).
- 2 In order to give effect to the above, the following questionnaire must be completed and submitted with the bid.

Item	Question	Yes	No
2.1	Is the Tenderer or any of its directors listed on the National Treasury's Database of Restricted Suppliers 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 Accounting Officer/Authority of the institution that imposed the restriction after the <i>audi alteram partem</i> rule was applied). The Database of Restricted Suppliers now resides on the National Treasury's website <a href="http://www.treasury.gov.za">www.treasury.gov.za</a> and can be accessed by clicking on its link at the bottom of the home page.	Yes <input type="checkbox"/>	No <input type="checkbox"/>
2.1.1	If so, furnish particulars:		
2.2	Is the Tenderer or any of its directors listed on the Register for Tender Defaulters in terms of section 29 of the Prevention and Combating of Corrupt Activities Act, 12 of 2004? The Register for Tender Defaulters can be accessed on the National Treasury's website ( <a href="http://www.treasury.gov.za">www.treasury.gov.za</a> ) by clicking on its link at the bottom of the home page.	Yes <input type="checkbox"/>	No <input type="checkbox"/>
2.2.1	If so, furnish particulars:		
2.3	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?	Yes <input type="checkbox"/>	No <input type="checkbox"/>
2.3.1	If so, furnish particulars:		
2.4	Does the Tenderer or any of its directors owe any municipal rates and taxes or municipal charges to the municipality / municipal entity, or to any other municipality / municipal entity, that is in arrears for more than three months?	Yes <input type="checkbox"/>	No <input type="checkbox"/>
2.4.1	If so, furnish particulars:		
2.5	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?	Yes <input type="checkbox"/>	No <input type="checkbox"/>
2.5.1	If so, furnish particulars:		

I, \_\_\_\_\_, the undersigned,  
(full name in block letters)  
certify that the information furnished on this declaration form is true and correct, and 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 Tenderer/Contractor

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SCHEDULE 5: DECLARATION OF INTEREST – STATE EMPLOYEES (MBD 4 amended)

1. No bid will be accepted from:
- 1.1 persons in the service of the state<sup>1</sup>, or
  - 1.2 if the person is not a natural person, of which any director, manager or principal shareholder or stakeholder is in the service of the state, or
  - 1.3 from persons, or entities of which any director, manager or principal shareholder or stakeholder, has been in the service of the City of Cape Town during the previous twelve (12) months, or
  - 1.4 from an entity who has employed a former City employee who was at a level of T14 or higher at the time of leaving the City's employ and involved in any of the City's bid committees for the bid submitted, if:
    - 1.4.1 the City employee left the City's employment voluntarily, during the previous twelve (12) months;
  - 1.5 a person who was a City employee, or an entity that employs a City employee, if
    - 1.5.1 the City employee left the City's employment whilst under investigation for alleged misconduct, or
    - 1.5.2 was facing disciplinary action or potential disciplinary action by the City, or
    - 1.5.3 was involved in a dispute against the City during the previous thirty six (36) months.
2. Any person, having a kinship with persons in the service of the state, including a blood relationship, may make an offer or offers in terms of this invitation to bid. In view of possible allegations of favouritism, should the resulting bid, or part thereof, be awarded to persons connected with or related to persons in service of the state, it is required that the tenderer or their authorised representative declare their position in relation to the evaluating/adjudicating authority.
- 3 In order to give effect to the above, the following questionnaire must be completed and submitted with the bid.
- 3.1 Full Name of tenderer or his or her representative:.....
- 3.2 Identity Number: .....
- 3.3 Position occupied in the Company (director, trustee, shareholder<sup>2</sup>):.....
- 3.4 Company or Close Corporation 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. ....
- .....
- 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 supplier 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 directors, trustees, managers, principle shareholders or stakeholders in service of the state? **YES / NO**

3.13.1 If yes, furnish particulars.  
.....  
.....

13.4 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:  
.....  
.....

3.15 Have you, or any of the directors, trustees, managers, principle shareholders, or stakeholders of this company been in the service of the City of Cape Town in the past twelve months? **YES / NO**

3.15.1 If yes, furnish particulars .....

3.16 Do you have any employee/s who was/were in the service of the City of Cape Town at a level of T14 or higher at the time they left the employ of the City, and who was involved in any of the City's bid committees for this bid? **YES / NO**

3.16.1 If yes, furnish particulars .....

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

Full Name	Identity Number	State Employee Number



If the above table does not sufficient to provide the details of all directors / trustees / shareholders, please append full details to the tender submission.

The tenderer hereby certifies that the information set out in this schedule and/or attached thereto is true and correct, and acknowledges that failure to properly and truthfully complete this schedule may result in the tender being disqualified, and/or (in the event that the tenderer is successful) the cancellation of the contract, restriction of the tenderer or the exercise by the employer of any other remedies available to it

\_\_\_\_\_  
Signature

\_\_\_\_\_  
Date

\_\_\_\_\_  
Name (PRINT)  
(For and on behalf of the tenderer, duly authorised)

***'MSCM Regulations: "in the service of the state" means to be –***

- (a) a member of –***
  - (i) any municipal council;***
  - (ii) any provincial legislature; or***
  - (iii) the national Assembly or the national Council of provinces;***
- (b) a member of the board of directors of any municipal entity;***
- (c) an 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) an executive member of the accounting authority of any national or provincial public entity; or***
- (f) an employee of Parliament or a provincial legislature.***

***<sup>2</sup> Shareholder" means a person who owns shares in the company and is actively involved in the management of the company or business and exercises control over the company.***

SCHEDULE 6: CONFLICT OF INTEREST

1. The tenderer shall declare whether it has any conflict of interest in the transaction for which the tender is submitted. (Please mark with X)

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

1.1 If yes, the tenderer is required to set out the particulars in the table below:


2. The tenderer shall declare whether it has directly or through a representative or intermediary promised, offered or granted:
- 2.1 Any inducement or reward to the CCT for or in connection with the award of this contract; or
- 2.2 Any reward, gift, favour or hospitality to any official or any other role player involved in the implementation of the supply chain management policy. (Please mark with X)

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

If yes, the tenderer is required to set out the particulars in the table below:


**Should the tenderer be aware of any corrupt or fraudulent transactions relating to the procurement process of the CCT, please contact the following:**

**The CCT's anti-corruption hotline at 0800 32 31 30 (toll free)**

The tenderer hereby certifies that the information set out in this schedule and/or attached hereto is true and correct, and acknowledges that failure to properly and truthfully complete this schedule may result in steps being taken against the tenderer, the tender being disqualified, and/or (in the event that the tenderer is successful) the cancellation of the contract, restriction of the tenderer or the exercise by the CCT of any other remedies available to it.

Signature  
Print name:  
On behalf of the tenderer (duly authorised)

Date

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SCHEDULE 7: AUTHORISATION FOR THE DEDUCTION OF OUTSTANDING AMOUNTS OWED TO THE CITY OF CAPE TOWN

To: THE CITY MANAGER, CITY OF CAPE TOWN

From: \_\_\_\_\_  
(Name of tenderer)

The tenderer:

- a) hereby acknowledges that according to SCM Regulation 38(1)(d)(i) the City Manager may reject the tender of the tenderer if any municipal rates and taxes or municipal service charges owed by the tenderer (or any of its directors/members/partners) to the CCT, or to any other municipality or municipal entity, are in arrears for more than 3 (three) months; and
- b) therefore hereby agrees and authorises the CCT to deduct the full amount outstanding by the Tenderer or any of its directors/members/partners from any payment due to the tenderer; and
- c) confirms the information as set out in the tables below for the purpose of giving effect to b) above;
- d) The tenderer hereby certifies that the information set out in this schedule and/or attached hereto is true and correct, and acknowledges that failure to properly and truthfully complete this schedule may result in steps being taken against the tenderer, the tender being disqualified, and/or (in the event that the tenderer is successful) the cancellation of the contract and/or steps in terms of abuse of the Supply Chain Management Policy.

Physical <b>Business</b> address of the Tenderer	Municipal Account number(s)

If there is not enough space for all the names, please attach the additional details to the Tender Document

Name of Director / Member / Partner	Identity Number	Physical <b>residential</b> address of Director / Member / Partner	Municipal Account number(s)

\_\_\_\_\_  
Signature  
Print name:  
On behalf of the tenderer (duly authorised)

\_\_\_\_\_  
Date

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**SCHEDULE 8: DECLARATION IN RESPECT OF COMPLIANCE WITH LABOUR LEGISLATION**

Tenderers must be registered with the relevant Bargaining Council as contained in the tender conditions and must append to this schedule a certificate of compliance / letter of good standing in terms of the relevant Government Gazette that indicates compliance / validity at the time of tender award.

Each party to a Consortium/Joint Venture shall append separate certificates in the above regard.

**Declaration in respect of labour legislation**

The tenderer, by signing this schedule, declares that it will comply with all labour legislation, as may be applicable.

**SIGNED ON BEHALF OF TENDERER:** .....

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**SCHEDULE 9: CONFIRMATION OF CITY OF CAPE TOWN SUPPLIER DATABASE REGISTRATION**

<b><u>CITY OF CAPE TOWN</u> SUPPLIER DATABASE REGISTRATION</b>		
<b>COMPANY NAME</b>	<b>REGISTERED YES/NO</b>	<b>REGISTRATION NUMBER IF APPLICABLE</b>

**SIGNED ON BEHALF OF TENDERER:** .....

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SCHEDULE 10: SCHEDULE OF WORK EXPERIENCE OF TENDERER

The tenderer shall provide details of previous relevant experience. Projects listed shall be Similar Relevant Projects as defined in Volume 1: C.2.1.4.3. Tenderers are encouraged to provide additional supporting information detailing the nature of the work for each project. Add more pages if necessary.  
The first line in the table below is illustrative of the manner in which information must be presented to attain optimum scoring outcomes.

PROJECT NAME and CLIENT (NAME, TEL NO. & EMAIL)	CONSULTING ENGINEER (NAME, TEL NO. & EMAIL)	PROJECT DESCRIPTION AND LOCATION	VALUE OF WORK (Rands) (inclusive of VAT/contingencies)	START DATE	COMPLETION DATE	PROJECT REFERENCE (ACTIVE CONTACT DETAILS – NAME, TEL NO. & EMAIL)
New Zeekoevlei Weir – City of Cape Town Municipality  John Doe Project Manager 021 xxx xxxx johndoe@xxx.xx	XX Consulting Engineers (Pty) Ltd.  John Doe Employers Agent 021 xxx xxxx johndoe@xxx.xx	Construction of a new weir in Zeekoevlei, for the management of the vleivel. Works included a cofferdam which required wellpoints and the realignment of a canal.  Zeekoevlei, Cape Town, South Africa. or GPS coordinates -xx.xxxxxxx, xx.xxxxxxx	R x xxx xxx.xx	May 20xx	June 20xx	John Doe Project Manager 021 xxx xxxx johndoe@xxx.xx

PROJECT NAME and CLIENT (NAME, TEL NO. & EMAIL)	CONSULTING ENGINEER (NAME, TEL NO. & EMAIL)	PROJECT DESCRIPTION AND LOCATION	VALUE OF WORK (Rands) <i>(inclusive of VAT/contingencies)</i>	START DATE	COMPLETION DATE	PROJECT REFERENCE (ACTIVE CONTACT DETAILS – NAME, TEL NO. & EMAIL)

Number of sheets appended by the tenderer to this Schedule ..... (If nil, enter NIL).

**SIGNED ON BEHALF OF TENDERER:** .....

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SCHEDULE 11: SCHEDULE OF EQUIPMENT INSTALLATIONS AND SERVICE HISTORY

Not Applicable.



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SCHEDULE 12: CONFIRMATION OF CONTRACTOR REGISTRATION / ACCREDITATION

Not Applicable.

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**SCHEDULE 13: DETAILS OF QUALIFICATIONS/REGISTRATIONS AND EXPERIENCE OF CONSTRUCTION MANAGER**

The tenderer shall provide details of qualification/registration and previous relevant experience. The tenderer must provide a copy/copies of the Construction Manager's qualification/registration, appended to Schedule 13. Projects listed shall be Similar Relevant Projects as defined in Volume 1: C.2.1.4.3. The first line in the table below is illustrative of the manner in which information must be presented to attain optimum scoring outcomes.

CONSTRUCTION MANAGER NAME: .....		QUALIFICATION / NQF LEVEL..... AND/OR SACPCMP / ECSA REG NO.: .....				
PROJECT NAME and CLIENT (NAME, TEL NO. & EMAIL)	CONSULTING ENGINEER (NAME, TEL NO. & EMAIL)	PROJECT DESCRIPTION AND LOCATION	VALUE OF WORK (Rands) (inclusive of VAT/contingen cies)	START DATE	COMPLETION DATE	PROJECT REFERENCE (ACTIVE CONTACT DETAILS – NAME, TEL NO. & EMAIL)
<i>New Zeekoevlei Weir – CCT Municipality</i>  <i>John Doe Project Manager 021 xxx xxxx johndoe@xxx.xx</i>	<i>XX Consulting Engineers (Pty) Ltd.</i>  <i>John Doe Employer's Agent 021 xxx xxxx johndoe@xxx.xx</i>	<i>Construction of a new weir in Zeekoevlei, for the management of the vlei level. Works included a cofferdam which required wellpoints and the realignment of a canal.</i>  <i>Zeekoevlei, Cape Town, South Africa. or GPS coordinates -xx.xxxxxxxx, xx.xxxxxxxx</i>	<i>R x xxx xxx.xx</i>	<i>May 20xx</i>	<i>June 20xx</i>	<i>John Doe Project Manager 021 xxx xxxx johndoe@xxx.x x</i>


Number of sheets appended by the tenderer to this Schedule ..... (If nil, enter NIL).

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

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**SCHEDULE 14: SCHEDULE OF CONSTRUCTION EQUIPMENT**

The tenderer shall state below what construction equipment will be available for this Contract. The tenderer shall differentiate, if applicable, between construction equipment immediately available and construction equipment which will become available by virtue of outstanding orders, and indicate what further construction equipment will be acquired or hired for the work should he be awarded the Contract.

**CONSTRUCTION EQUIPMENT IMMEDIATELY AVAILABLE**

DESCRIPTION, SIZE, CAPACITY	NUMBER

**CONSTRUCTION EQUIPMENT ON ORDER**

(State details of arrangements made, with delivery dates)

DESCRIPTION, SIZE, CAPACITY	NUMBER

**CONSTRUCTION EQUIPMENT THAT WILL BE ACQUIRED OR HIRED**

(State details of delivery arrangements)

DESCRIPTION, SIZE, CAPACITY	NUMBER

Number of sheets appended by the tenderer to this Schedule ..... (If nil, enter NIL).

**SIGNED ON BEHALF OF TENDERER:** .....

CITY OF CAPE TOWN

SPATIAL PLANNING AND ENVIRONMENT: ENVIRONMENTAL MANAGEMENT DEPARTMENT

CONTRACT NO. 285Q/2024/25

UPGRADE TO THE ZEEKOEVLEI WEIR IN THE FALSE BAY NATURE RESERVE

**SCHEDULE 15: DETAILS OF TENDERER’S WORKSHOP FACILITIES**

Not Applicable.

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**SCHEDULE 16: PRELIMINARY PROGRAMME (FOR INFORMATION PURPOSES ONLY)**

The tenderer shall attach a preliminary programme, to this schedule.

This programme shall be in the form of a bar chart (Gantt chart) or similar acceptable time/activity form reflecting the proposed sequence and tempo of the various activities and the quantities that will be carried out every week under each of the elements, comprising the work for this contract. The programme shall also indicate the point where the tenderer intends to commence work operations and the direction in which the work will proceed. The working hours shall be indicated.

The tenderer shall also take into account the additional requirements stated in the Project Specifications when drawing up the programme.

**Details of the preliminary programme shall be appended to this Schedule.**

Number of sheets appended by the tenderer to this Schedule ..... (If nil, enter NIL).

**SIGNED ON BEHALF OF TENDERER:** .....

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**SCHEDULE 17: PROPOSED WORK PLAN**

The tenderer shall append their proposed work plan to this Schedule.

It should be noted that while a programme may form part of the required work plan, more than a programme is expected in response to this requirement. The work plan must indicate the approach and methodology that the tenderer intends following in order to reach the required outcomes. The work plan must show that the tenderer has appreciated the Scope of Work, and has good insight as to what actions or activities are required in order to comply with the Employer’s objectives.

**SIGNED ON BEHALF OF TENDERER:** .....



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**SCHEDULE 18: SCHEDULE OF ESTIMATED MONTHLY EXPENDITURE**

The tenderer shall state his estimated expenditure indicating the value of work done and materials not yet built into the Permanent Works for each month of the Contract period which he estimates will arise based on his preliminary programme and tendered rates, as set out in the table below. The total of the monthly amounts shall be equal to the tender sum.

MONTH	VALUE
1.	R
2.	R
3.	R
4.	R
5.	R
6.	R
7.	R
8.	R
9.	R
10.	R
11.	R
12.	R
13.	R
14.	R
15.	R
SUBTOTAL	R
CONTINGENCIES (6%)	R
SUBTOTAL	R
VAT (15%)	R
TOTAL	R (INCLUDING VAT @ 15%)

**SIGNED ON BEHALF OF TENDERER:** .....

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SCHEDULE 19: SCHEDULE OF SUB-CONTRACTORS

We notify you that it is our intention to employ the following sub-contractors for work (excluding work covered by provisional sums and contingencies) in this contract.

Acceptance of this tender shall not be construed as approval of all or any of the listed sub-contractors. Should any of the sub-contractors not be approved subsequent to acceptance of the tender, this shall in no way invalidate the contract, and the tendered unit rates for the various items making up the work activities shall remain final and binding.

SUB-CONTRACTORS		
Sub-contractor's name	Work activities to be undertaken by the Sub-contractor	Estimated value of work (Rand)

Number of sheets appended by the tenderer to this Schedule ..... (If nil, enter NIL).

SIGNED ON BEHALF OF TENDERER: .....

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**SCHEDULE 20: HEALTH AND SAFETY PLAN**

Tenderers are referred to the requirements of Clause C.2.18.4 in Part T1.2 Tender Data and shall append the required draft Health and Safety Plan to this Schedule.

Number of sheets appended by the tenderer to this Schedule ..... (If nil, enter NIL).

**SIGNED ON BEHALF OF TENDERER:** .....

**SCHEDULE 21: DEVIATIONS AND QUALIFICATIONS BY TENDERER**

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 attached to his tender and reference such letter in this schedule. Any deviations or qualifications contained in a covering letter which is not referenced in this schedule will not be considered.

**The Tenderer’s attention is drawn to clause C.3.8 of the Standard Conditions of Tender referenced in the Tender Data regarding the Employer’s handling of material deviations and qualifications.**

If no deviations or qualifications are made, the schedule hereunder is to be marked NIL and signed by the Tenderer.

PAGE	CLAUSE OR ITEM	PROPOSED DEVIATION OR QUALIFICATION

Number of sheets appended by the tenderer to this Schedule ..... (If nil, enter NIL).

**SIGNED ON BEHALF OF TENDERER:** .....

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SCHEDULE 22: FUNCTIONALITY CRITERIA

The Tenderer shall provide information for the functionality criteria listed in this Returnable Schedule.

The Tenderer’s attention is drawn to clause C.2.1.4.3 in the Tender Data for a more detailed explanation of the functionality criteria given in the table below and how the score will be calculated (with applicable values).

Description of functionality criteria	Maximum possible score
1. Demonstrated experience of the tendering entity with respect to similar relevant projects	25
2. Construction Manager Qualification / Registration	25
3. Demonstrated experience of the Construction Manager in relation to the Scope of Work	25
Maximum possible score for Functionality	75

The minimum score for functionality is **52**. Tenderers that fail to achieve the minimum score for functionality will be rejected.

Number of sheets appended by the tenderer to this Schedule ..... (If nil, enter NIL).

**SIGNED ON BEHALF OF TENDERER:** .....

[illegible]

**\* State Customs Duty Tariff Reference for each item**

**Note:**

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**SCHEDULE 24: 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:		
	Date	Title or Details
1.		
2.		
3.		
4.		
5.		
6.		
7.		
8.		
9.		
10.		

Attach additional pages if more space is required.

**SIGNED ON BEHALF OF TENDERER:** .....

**CITY OF CAPE TOWN**

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**SCHEDULE 25: PREFERENCE SCHEDULE**

**1. GENERAL CONDITIONS**

- 1.1 The following preference point systems are applicable to invitations to tender:
- the 80/20 system for requirements with a Rand value of up to R50 000 000 (all applicable taxes included); and
  - the 90/10 system for requirements with a Rand value above R50 000 000 (all applicable taxes included).
- 1.2 Either the 90/10 or 80/20 preference point system will be applicable in this tender. The lowest acceptable tender will be used to determine the accurate system once tenders are received.
- 1.3 Points for this tender shall be awarded for:
- (a) Price; and
  - (b) Specific Goals.

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

The maximum points for this tender are allocated as follows:

	POINTS
PRICE	
SPECIFIC GOALS	
Total points for Price and SPECIFIC GOALS	100

- 1.5 Failure on the part of a tenderer to submit proof or documentation required in terms of this tender to claim points for specific goals with the tender, will be interpreted to mean that preference points for specific goals are not claimed.
- 1.6 The organ of state reserves the right to require of a tenderer, either before a tender is adjudicated or at any time subsequently, to substantiate any claim in regard to preferences, in any manner required by the organ of state.

**Definitions**

The following definitions shall apply to this schedule:

- (a) "tender" means a written offer in the form determined by an organ of state in response to an invitation to provide goods or services through price quotations, competitive tendering process or any other method envisaged in legislation;
- (b) "price" means an amount of money tendered for goods or services, and includes all applicable taxes less all unconditional discounts;
- (c) "rand value" means the total estimated value of a contract in Rand, calculated at the time of bid invitation, and includes all applicable taxes;



- (d) “tender for income-generating contracts” means a written offer in the form determined by an organ of state in response to an invitation for the origination of income-generating contracts through any method envisaged in legislation that will result in a legal agreement between the organ of state and a third party that produces revenue for the organ of state, and includes, but is not limited to, leasing and disposal of assets and concession contracts, excluding direct sales and disposal of assets through public auctions; and
- (e) “the Act” means the Preferential Procurement Policy Framework Act, 2000 (Act No. 5 of 2000).

## FORMULAE FOR PROCUREMENT OF GOODS AND SERVICES

### 2. POINTS AWARDED FOR PRICE

#### 2.1. THE 80/20 OR 90/10 PREFERENCE POINT SYSTEMS

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

80/20	or	90/10
$Ps = 80 \left( 1 - \frac{Pt - P_{min}}{P_{min}} \right)$		$Ps = 90 \left( 1 - \frac{Pt - P_{min}}{P_{min}} \right)$

Where

Ps = Points scored for price of tender under consideration

Pt = Price of tender under consideration

Pmin = Price of lowest acceptable tender

### 3. POINTS AWARDED FOR SPECIFIC GOALS

- 3.1. In terms of Regulation 4(2); 5(2); 6(2) and 7(2) of the Preferential Procurement Regulations, preference points must be awarded for specific goals stated in the tender. For the purposes of this tender the tenderer will be allocated points based on the goals stated in table 1 below as may be supported by proof/ documentation stated in the conditions of this tender:
- 3.2. In cases where organs of state intend to use Regulation 3(2) of the Regulations, which states that, if it is unclear whether the 80/20 or 90/10 preference point system applies, an organ of state must, in the tender documents, stipulate in the case of—
- (a) an invitation for tender for income-generating contracts, that either the 80/20 or 90/10 preference point system will apply and that the highest acceptable tender will be used to determine the applicable preference point system; or
  - (b) any other invitation for tender, that either the 80/20 or 90/10 preference point system will apply and that the lowest acceptable tender will be used to determine the applicable preference point system,

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

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

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

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

The specific goals allocated points in terms of this tender	Number of points allocated (90/10 system) (To be completed by the organ of state)	Number of points allocated (80/20 system) (To be completed by the organ of state)	Number of points claimed (90/10 system) (To be completed by the tenderer)	Number of points claimed (80/20 system) (To be completed by the tenderer)
Gender	3	5		
Race	3	5		
Disability	1	3		
Promotion of Micro and Small Enterprises	3	7		

#### DECLARATION WITH REGARD TO COMPANY/FIRM

Name of company/firm.....

Company registration number: .....

#### TYPE OF COMPANY/ FIRM

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

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

- i) The information furnished is true and correct;
- ii) The preference points claimed are in accordance with the General Conditions as indicated in paragraph 1 of this form;
- iii) In the event of a contract being awarded as a result of points claimed as shown in paragraphs 4.1 and 4.2, the contractor may be required to furnish documentary proof to the satisfaction of the organ of state that the claims are correct;
- iv) If the specific goals have been claimed or obtained on a fraudulent basis or any of the conditions of contract have not been fulfilled, the organ of state may, in addition to any other remedy it may have –
  - (a) disqualify the person from the tendering process;
  - (b) recover costs, losses or damages it has incurred or suffered as a result of that person's conduct;
  - (c) cancel the contract and claim any damages which it has suffered as a result of having to make less favourable arrangements due to such cancellation;

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

<div>..... <b>SIGNATURE(S) OF TENDERER(S)</b></div>	
<b>SURNAME AND NAME:</b>	.....
<b>DATE:</b>	.....
<b>ADDRESS:</b>	..... ..... ..... .....

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SCHEDULE 26: APPEAL APPLICATION (ANNEXURE B)

annexure 'B'

OFFICIAL RECEIPT  
(Valid only if printed  
by official cash  
receipting machine)

IRISITI ESESIKWENI  
(Isemthethweni kuphela  
xa ishicilelwe  
ngumatshini wokukhupa  
irisiti osesikweni.)

AMPTELIKE KWITANSIE  
(Geldig alleenlik indien deur  
amptelike kontantvangs  
masjien gedruk.)

GL DATA CAPTURE RECEIPT  
(CASHIER TO RETAIN A COPY)

RECEIPT NO: \_\_\_\_\_

DATE: \_\_\_\_\_

SAP GL:

8 1 0 1 0 0

PROFIT CENTRE:

1 3 0 5 0 0 0 1

NAME/COMPANY NAME:

AMOUNT:

R 3 0 0 - 0 0

SERVICE DEPARTMENT DETAILS-

DEPARTMENT: LEGAL SERVICES: APPEALS UNIT

CONTACT PERSON: CHARLENE CEBEKHULU / MELANIE CLOETE

PHONE NO: 021 400 2503 / 021 400 3788

OFFICIAL RECEIPT  
(Valid only if printed  
by official cash  
receipting machine)

IRISITI ESESIKWENI  
(Isemthethweni kuphela  
xa ishicilelwe  
ngumatshini wokukhupa  
irisiti osesikweni.)

AMPTELIKE KWITANSIE  
(Geldig alleenlik indien deur  
amptelike kontantvangs  
masjien gedruk.)

GL DATA CAPTURE RECEIPT  
(CASHIER TO RETAIN A COPY)

RECEIPT NO: \_\_\_\_\_

DATE: \_\_\_\_\_

SAP GL:

8 1 0 1 0 0

PROFIT CENTRE:

1 3 0 5 0 0 0 1

NAME/COMPANY NAME:

AMOUNT:

R 3 0 0 - 0 0

SERVICE DEPARTMENT DETAILS-

DEPARTMENT: LEGAL SERVICES: APPEALS UNIT

CONTACT PERSON: CHARLENE CEBEKHULU / MELANIE CLOETE

PHONE NO: 021 400 2503 / 021 400 3788

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**CITY OF CAPE TOWN**

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**SCHEDULE 27: INFORMATION TO BE PROVIDED WITH THE TENDER**

Not Applicable.