

 Johannesburg Water	Document title :	Minimum SHE Requirements for Construction Related RFQ projects		
	Revision	00	Author:	OHS: Projects
	Effective Date	January 2017	Pages:	01

1. SCOPE OF WORK

Electrical works to be done at Fennell Depot

2. PURPOSE

The aim of the SHE specification is to ensure that any contractor which is appointed by Johannesburg Water to conduct any work complies with the SHE requirements of the SHE specification and any other legislative requirement applicable to the contract scope.

3. APPLICABILITY

This document is applicable to all contractors and suppliers conducting contractual activities for and on behalf of Johannesburg Water.

4. APPOINTMENTS

The contractor and its appointed sub-contractor must make the relevant legislative and non-statutory appointments, which must be maintained valid for the entire contract duration.

All appointees shall be suitably trained and found to be competent for the responsibilities there are assigned for.

Copies of all relevant appointments and the relevant competence certificates must be kept in the relevant SHE file.

5.INSURANCE

The contractor and all its appointed sub-contractor(s) shall be registered with an appropriate compensation commissioner and have a valid letter of good standing from commissioner. The contractor is responsible for ensuring the Letter of Good Standing is valid for the entire duration of the project/contract. A copy of the letter of Good Standing must be kept in the SHE file.

6.COSTING FOR SHE REQUIREMENTS

The contractor is responsible for ensuring that SHE costing is taken into consideration for the entire project/contract as this will ensure they comply with the SHE legislative requirements

7. INDUCTION

An initial induction shall be done with key personnel to familiarize them with the requirements on site and for compiling the SHE file.

Once labourers are appointed JW will conduct an induction on SHE requirements, and the contractor is also required to conduct their company specific induction

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8. SUBMISSION OF SAFETY FILE

- Once appointed the contractor can submit their safety file for approval.
- Approval will be granted when the critical items have been sufficiently addressed.

9. RISK ASSESSMENT

- Every Contractor who has been appointed contractually to conduct work for Johannesburg water shall do compile a baseline risk assessment prior to starting with work, subject to the approval of the Client.
- Thereafter the task based risk assessments will be done daily with every task being done.

10. SAFE WORKING PROCEDURES / METHOD STATEMENTS

The following method statements / safe working procedures must be compiled:

- Incident investigation, emergency plan, waste management plan, PPE procedure, hand tool procedure, hazardous chemical substance procedure.

11. WORKING IN ELEVATED POSITIONS

- JW shall not require or permit any person to work in an elevated position, and no person shall work in an elevated position, unless such work is performed safely from a ladder or scaffolding, or from a position where such person has been made as safe as if he were working from scaffolding.

12 WORKING ON A LADDER

- An employer shall ensure that every ladder is constructed of sound material and is suitable for the purpose for which it is used, and is fitted with non-skid devices at the bottom ends and hooks or similar devices at the upper ends or of the stiles which shall ensure the stability of the ladder during normal use; or is so lashed, held or secured whilst being used as to ensure the stability of the ladder under all conditions and at all times.

13. WELDING, FLAME, CUTTING, SOLDERING AND SIMILAR OPERATIONS (If applicable)

- JW shall not require or permit welding or flame cutting operations to be undertaken, unless the contractor operating the equipment has been fully instructed in the safe operation and use of such equipment and in the hazards which may arise from its use and effective protection is provided and used for the eyes and respiratory system and, where necessary, for the face, hands, feet, legs, body and clothing of persons performing such operations, as well as against heat, incandescent or flying particles or dangerous radiation;

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- The Contractor must ensure that the workplace is effectively partitioned off where practicable and where not practicable all other persons exposed to the hazards are warned and provided with suitable protective equipment

14.HOUSEKEEPING AND GENERAL SAFEGUARDING ON SITE

The contractor must ensure that suitable housekeeping is continuously implemented on each construction site, including:


- The proper storage of materials and equipment.
- The removal of scrap, waste and debris at appropriate intervals; ensuring that materials required for use, are not placed on the site so as to obstruct.
- Means of access to and egress from workplaces and passageways.
- Ensuring that materials which are no longer required for use, do not accumulate on and are removed from the site at appropriate intervals.
- Ensuring that waste and debris are not disposed of from a high place with a chute, unless the chute complies with the requirements ensuring that a catch platform or net is erected above an entrance or passageway or above a place where persons work or pass under, or fencing off the danger area if work is being performed above such entrance, passageway, or place so as to ensure that all persons are kept safe in the case of danger or possibility of persons being struck by falling objects

15.ELECTRICAL CONTRACTOR & RESPONSIBILITIES

- The principal contractor may not do electrical installation work as an electrical contractor unless that contractor has been registered as an electrical contractor in terms of the Regulation.
- The principal contractor who does electrical installation work as an electrical contractor shall register annually in the form of Annexure 3 with the chief inspector or a person appointed by the chief inspector. An application for registration shall be accompanied by a prescribed fee.

16.MEDICAL SCREENING REQUIREMENTS

- The contractor shall ensure that a medical surveillance programme is implemented for all employees.
- The medical examination shall be conducted in line with the employee job profile/job description.
- A valid medical fitness certificate must be submitted together with the SHE File for approval for all employees who will be doing work for Johannesburg Water.
- Any employee(s) who are declared conditionally fit must be provided with employment which does not aggravate their medical condition as to endanger themselves or other employees.
- The following tests shall be done:

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- Audiograms.
- A cardio-respiratory examination
- Lung function tests.
- Eye/ sight tests.
- A general physical examination.
- A review of previous medical history.
- Blood pressure tests
- Glucose tests
- Vaccinations (Hepatitis A & Typhoid)

17.TOOLBOX TALKS

- The contractor shall ensure they conduct toolbox talks with their employees on a weekly basis and records of these must be kept in the SHE file.
- The objective of toolbox talks should be to communicate relevant site information to assist in improvement of occupational health and safety performance.
- Employees must acknowledge the receipt of toolbox talks and this record must also be kept in the SHE file.

18.PERSONAL PROTECTIVE EQUIPMENT (PPE)

- Contractor must issue their employees SABS approved PPE. A copy of the PPE issue register signed by the employee issued with the PPE must be kept in the SHE file.
- Contractor supervisor are required to conduct continuous inspections of the PPE issued to their employees to ensure that they are still in good condition to be used by the employee or they still comply with manufacture requirements.
- The contractor is responsible for ensuring that employees are trained on the safe use of the PPE issued to them, how to maintain it and the limitations of the PPE.
- NO SHORTS OR DRESSES WILL BE ALLOWED ON SIT

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19. WORKPLACE SIGNAGE

- Appropriate symbolic signage must be displayed where it is required by legislation.
- Appropriate warning, mandatory and information signs must be placed where required.
- All signs must comply to SANS/SABS requirements.
- Contractors shall use mandatory and prescribed symbolic safety signs at their lay down and site areas.

20. INCIDENT REPORTING AND INVESTIGATION

- All incidents shall be reported to the Client before the end of the shift or within 24hrs of occurrence.
- Section 24 incidents shall be reported to DOL using the prescribed format.
- The contractor shall develop an incident management procedure and communicate with all employees.

21. NOTIFICATION OF CONSTRUCTION WORK

- The contractor shall notify the DOL in the prescribed format of the intended work prior to work.

22. COMPLIANCE MONITORING

- Weekly inspections and monthly audits will be conducted on site.

23. PROJECT COMPLETION

- Upon completion of the project the SHE file shall be returned to the Client for retention and close out.



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Project details				
Project Scope : Repair of the vandalized equipment at the Head of Works MCC 1 & MCC 2, MV Substation 3, PLC Depot / Site / Department: Bushkoppie works Estimated duration: Three(3) months				
Documents required				
Letter of Good Standing	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/> N/A <input type="checkbox"/>
SHE plan	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/> N/A <input type="checkbox"/>
Risk Assessment	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/> N/A <input type="checkbox"/>
Safe working Procedures	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/> N/A <input type="checkbox"/>
Notification of Construction work	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/> N/A <input type="checkbox"/>
Inspection registers	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/> N/A <input type="checkbox"/>
Items required before starting				
Medicals	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/> N/A <input type="checkbox"/>
Vaccinations	Yes	<input type="checkbox"/>	No	<input checked="" type="checkbox"/> N/A <input type="checkbox"/>
PPE (boots, hard hats, overall)	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/> N/A <input type="checkbox"/>
Induction	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/> N/A <input type="checkbox"/>
Approval from OHS	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/> N/A <input type="checkbox"/>
APPOINTMENTS AND COMPETENCIES				
<u>Construction Supervisor</u>				
Appointment	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/> N/A <input type="checkbox"/>
CV (and/ certificates)	Yes	<input checked="" type="checkbox"/>	No	<input type="checkbox"/> N/A <input type="checkbox"/>
<u>Safety Officer</u>				
Appointment	Yes	<input type="checkbox"/>	No	<input checked="" type="checkbox"/> N/A <input type="checkbox"/>
CV (and/ certificates)	Yes	<input type="checkbox"/>	No	<input checked="" type="checkbox"/> N/A <input type="checkbox"/>
NB* Other appointments will be based on the number of employees on site as required by law.				

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RETURNABLE ANNEXURE A: ACKNOWLEDGEMENT OF SHE SPECIFICATION & ANNEXURES

CONTRACTOR:

I, the undersigned, hereby acknowledge that I have obtained copies of the following listed documentation and confirm that I fully understand the contents thereof and the consequences of non-compliance. The Contractor furthermore reiterates its commitment to compliance of the requirements contained within the following provided documentation:

- Johannesburg Water SOC Ltd, Safety, Health & Environmental (SHE) Specification, Annexure 1: Baseline risk assessment conducted for or on behalf of Johannesburg Water SOC Ltd;

Signed at on this Day of 20.....

CONTRACT MANAGER			
NAME	DESIGNATION	DATE	SIGNATURE
CONTRACT SUPERVISOR			
NAME	DESIGNATION	DATE	SIGNATURE
WITNESS (1)			
NAME	DESIGNATION	DATE	SIGNATURE
WITNESS (2)			
NAME	DESIGNATION	DATE	SIGNATURE



HEALTH, SAFETY & ENVIRONMENTAL (SHE) SPECIFICATION: BASELINE RISK ASSESSMENT

PROJECT NUMBER:	RFQ
PROJECT LOCATION:	Bushkoppies WWTW
PROJECT DESCR:	Repair of the vandalized equipment at the Head of Works MCC 1 & MCC 2, MV Substation 3, PLC Room and Emergency Generator at Bushkoppie Works for a period of three (3) months.

ISSUE-BASED RISK ASSESSMENT

Task	Hazard	Risk	Consequence	Rating	Controls
<ul style="list-style-type: none"> ✓ Installation and joining of electrical cables. 	<ul style="list-style-type: none"> ✓ Live power ✓ Exposed electrical wires. ✓ Faulty wiring. ✓ Fire. ✓ Explosion. 	<ul style="list-style-type: none"> ✓ Electrical shock. ✓ Electrical burn. ✓ Electrical contact. ✓ Electrical fires. ✓ Electrical arcing. ✓ Unsafe cable joints. ✓ Work carried out by an incompetent person. ✓ Accidental Lock-out procedure not implemented correctly. ✓ Switch on while work is being carried out. 	<ul style="list-style-type: none"> ✓ Fatality. ✓ Physical injuries. ✓ Damage to property. 	H	<ul style="list-style-type: none"> ✓ Isolate power when installing and joining cables. ✓ Ensure that the task is undertaken by a qualified operative. ✓ Wear correct PPE. ✓ All employees must adhere to the rules and regulations. ✓ Ensure that the lock-out procedure is adhered to.
	<ul style="list-style-type: none"> ✓ Mechanical tools/equipment. ✓ Hand Tools. 	<ul style="list-style-type: none"> ✓ Vibrations ✓ Use of faulty tools. ✓ Contact with rotating or moving parts. 	<ul style="list-style-type: none"> ✓ Hand-Arm Vibration Syndrome. ✓ Noise induced hearing loss. 	H	<ul style="list-style-type: none"> ✓ Regular breaks and rotations to reduce time exposure to vibrations. ✓ Faulty tools must be removed from site.

		<ul style="list-style-type: none"> ✓ Person not properly trained. ✓ Blows and cuts. ✓ Noise. ✓ Flying particles. 			<ul style="list-style-type: none"> ✓ Ensure that safety covers/ guards are well secured before operating the tool/ equipment. ✓ Use correct tools for each task. ✓ Ensure all tools are checked before use. ✓ Keep tools in a safe operating condition. ✓ Ensure employees are issued with correct PPE such as the ear plugs, earmuffs, gloves and safety footwear.
✓	✓ Dust	<ul style="list-style-type: none"> ✓ Eye irritation. ✓ Inhalation of dust. 	✓ Physical injury	M	<ul style="list-style-type: none"> ✓ Ensure employees are issued with correct PPE such as the goggles and dust masks.
	✓ Improper housekeeping.	✓ Trips and falls.	✓ Physical injuries	M	<ul style="list-style-type: none"> ✓ Keep the site clear of waste and scrap material. ✓ Housekeeping conditions to be maintained daily.
✓ Service and repair to generator.	✓ Faulty wiring.	<ul style="list-style-type: none"> ✓ Electrocution. ✓ Electric shock. ✓ Fire 	<ul style="list-style-type: none"> ✓ Fatality. ✓ Physical injuries. ✓ Damage to property. 	H	<ul style="list-style-type: none"> ✓ Ensure that the task is undertaken by a qualified operative. ✓ Avoid contact with terminals during operation.
	✓	✓ Burn	✓ Physical injuries.	M	<ul style="list-style-type: none"> ✓ Generator to cool before attempting any maintenance.

	✓ Flammable liquids.	✓ Explosion from fuel vapours.	✓ Physical injuries. ✓ Damage to property	H	✓ Stop the engine before refueling. ✓ Avoid contact with fuel. ✓ Avoid refueling while hot.
	✓ Leaks and spills	✓ Slipping.	✓ Physical injuries.	M	✓ Ensure that the spill tray is provided during the maintenance.
	✓ Fumes	✓ Inhalation of fumes.	✓ Breathing difficulties.	H	✓ Avoid fumes inhalation. ✓ Use in a well-ventilated area.
	✓ Rotating or moving parts.	✓ Entanglement and contact.	✓ Physical injuries.	M	✓ Ensure employees are issued with correct PPE. ✓ Ensure that safety covers/guards are well secured before operating the generator.
	✓ Noise.	✓ Noise from the generator.	✓ Noise induced hearing loss.	H	✓ Ensure employees are issued with correct PPE such as the ear plugs and earmuffs.
✓ Manual Handling.	✓ Heavy loads. ✓ Pulling heavy items.	✓ Back injuries. ✓ Back strain.	✓ Physical injuries.	M	✓ Use of lifting equipment. ✓ Ensure training on how to lift heavy load is conducted prior to the work. ✓ Avoid repetitive handling.
✓ Personal Protective Equipment.	✓ Use of incorrect PPE. ✓ Prolonged use of PPE.	✓ Trips and falls ✓ Slips ✓ Heat stress.	✓ Physical injuries. ✓ Poor health condition.	M	✓ Wear proper PPE as identified in the Risk Assessment. ✓ Ensure that PPE is inspected before use.

✓ **RISK ASSESSMENT MATRIX**

✓ Likelihood	✓ Consequences				
	Insignificant (minor problem easily handled by normal day to day processes)	Minor (Some disruption possible e.g., damage equal to R150k)	Moderate (significant time / resources required. E.g., damage equal to R500k)	Major (Operations severely damaged. E.g., damages equal to R1m)	Catastrophic (business survival is at risk. Damage equal to R5m – 10m)
Almost certain (90% chance)	High	High	Extreme	Extreme	Extreme
Likely (between 50-90%)	Moderate	High	High	Extreme	Extreme
Moderate (between 10-50%)	Low	Moderate	High	Extreme	Extreme
Unlikely (between 3-10%)	Low	Low	Moderate	High	Extreme
Rare (<3%)	Low	Low	Moderate	High	High