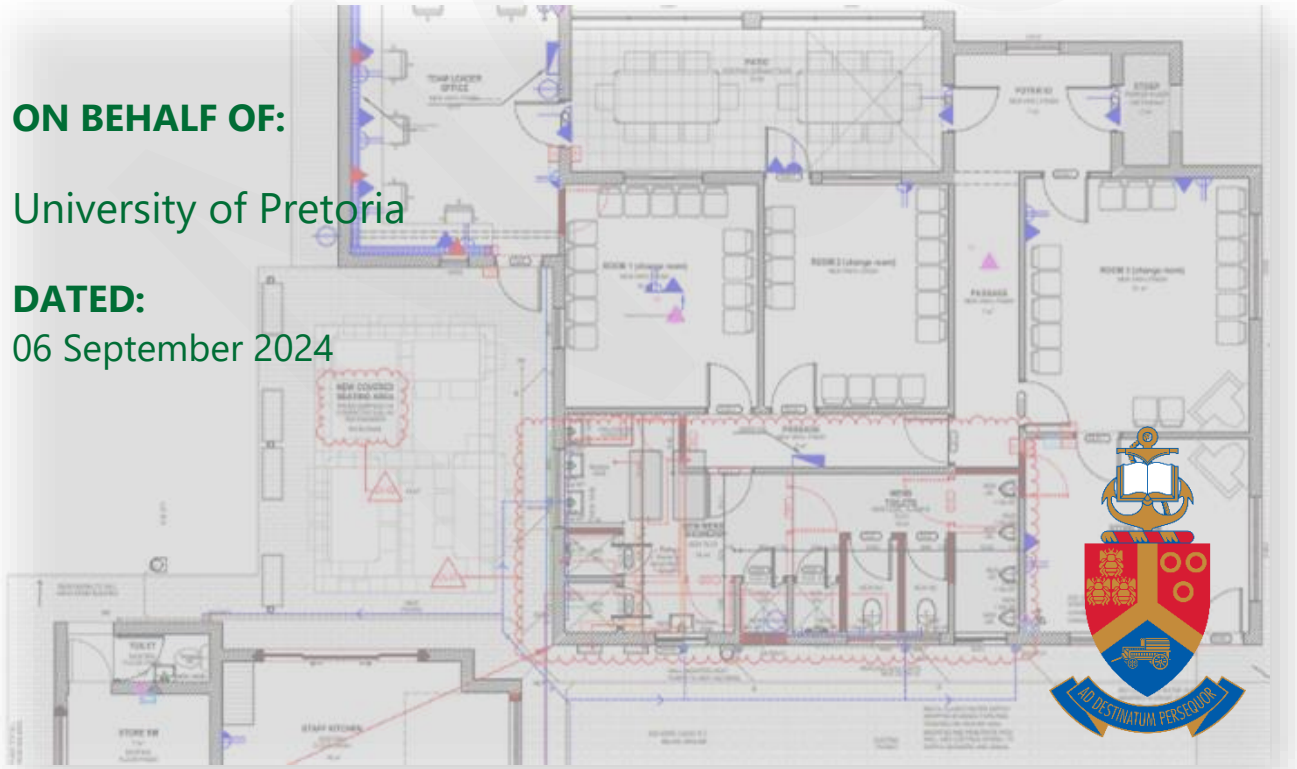
PROJECT HEALTH AND SAFETY SPECIFICATION

FOR:

UP | Post Office & Garden Service Building Upgrade Project



ON BEHALF OF:

University of Pretoria

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1 DEFINITIONS

Act:	The Occupational Health and Safety Act, 1993 (Act No. 85 of 1993)
Employer/Client:	person or organisation that enters into a contract with the contractor for the provision of the works covered by the contract i.e. "any person for whom construction work is being performed", in this instance, **University of Pretoria**, hereinafter referred to as **The Client**.
Employer's/Client's Health and Safety Agent:	the person appointed as agent by the employer in terms of Regulation 5(5) of the Construction Regulations and named in the contract data as being the employer's agent responsible for health and safety matters, in this instance, **NCC Health and Safety (Pty) Ltd**, hereinafter referred to as **NCC**.
Designer:	a competent person who – (i) prepares a design; (ii) checks and approves a design; (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 (iv) designs temporary work, including its components; (b) an architect or engineer contributing to, or having overall responsibility for a design; (c) a building services engineer designing details for fixed plant; (d) a surveyor specifying articles or drawing up specifications; (e) a contractor carrying out design work as part of a design and building project; or an interior designer, shopfitter or landscape architect;
DoEL:	Department of Employment and Labour
Principal Contractor:	an employer appointed by **The Client** to perform construction work.
Contract Manager:	a person appointed by the employer to administer the contract on his behalf.
Competent Person:	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 Qualifications

	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.
Danger:	anything which may cause injury or damage to persons or property
Hazard:	a source of or exposure to danger
Hazard Identification:	the identification and documenting of existing or expected hazards to the health and safety of persons, which are normally associated with the type of construction work being executed or to be executed.
Health and Safety Plan:	a documented plan which addresses hazards identified and includes safe work procedures to mitigate, reduce or control the hazards identified.
Health and Safety Specification:	a site, activity or project specific document pertaining to all health and safety requirements related to construction works which is included in the contractor's contract with the employer or an order issued in terms of the framework agreement.
Healthy:	free from illness or injury attributable to occupational causes
Incident:	an event or occurrence occurring at work or arising out of or in connection with the activities of persons at work, or in connection with the use of plant or machinery, in which, or in consequence of which: • Any person dies, becomes unconscious, suffers the loss of a limb or part of a limb or is otherwise injured or becomes ill to such a degree that he is likely either to die or to suffer a permanent physical defect or likely to be unable for a period of at least 14 days either to work or continue with the activity for which he was employed or is usually employed; • A major incident occurred; or • The health or safety of any person was endangered and where; • A dangerous substance was spilled; • The uncontrolled release of any substance under pressure took place; Machinery or any part thereof fractured or failed resulting in flying, falling or uncontrolled moving objects; or machinery ran out of control.
Inspector:	a person designated as such under section 28 of the Act
Major Incident:	an occurrence of catastrophic proportions, resulting from the use of plant or machinery, or from activities at a workplace
Reasonably Practicable:	practicable having regard to:

	• the severity and scope of the hazard or risk concerned. • the state of knowledge reasonably available concerning that hazard or risk and of any means of removing or mitigating that hazard or risk • the availability and suitability of means to remove or mitigate that hazard or risk; and the cost of removing or mitigating that hazard or risk in relation to the benefits deriving therefrom
Risk:	the probability that injury or damage will occur
Safe:	free from any hazard
Scaffold:	any temporary elevated platform and supporting structure used for providing access to and supporting workmen or materials or both
Structure:	(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 false work, scaffold or other structure designed or used to provide support or means of access during construction work; or (c) 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.
Substance:	any solid, liquid, vapour, gas or aerosol, or combination thereof
Suitable:	capable of fulfilling or having fulfilled the intended function or fit for its intended purpose
Temporary works:	any falsework, formwork, support work, scaffold, shoring or other temporary structure designed to provide support or means of access during construction.
Workplace:	any premises or place where a person performs work in the course of his employment.
OHSAct:	Occupational Health and Safety Act 85 of 1993

2 INTRODUCTION

In terms of Construction Regulation 5(1)(b) of the Occupational Health and Safety Act, No. 85 of 1993, **The Client** is required to compile a Health and Safety Specification for any intended project and provide such specification to any prospective contractor who, on appointment, shall submit a Health and Safety Plan which shall address the requirements of the Specification.

The objective of this Specification is to assist the Contractor entering a contract with **The Client** to achieve an acceptable level of OH&S performance. This Specification forms an integral part of the Contract and Principal, and other Contractors should make it part of any Contract that they may have with their Contractors and/or Suppliers.

Compliance with this Specification does not absolve **The Client** from complying with minimum legal requirements and **The Client** remains responsible for the health and safety of his employees and those of his Mandataries. **The Client** reserves the right to audit, monitor and where necessary regulate the site work activities of any Principal Contractor or principal appointed sub-contractor as contained in Construction Regulations 5(1)(k) and 7(1)(c)(v).

3 SCOPE

The Specification outlines the requirements for addressing, mitigating, and preventing occupational health and safety related incidents on the **UP | Post Office & Garden Service Building Upgrade Project**. The specification also addresses legal compliance, hazard identification and risk assessment, promoting a health and safety culture amongst those persons working on the project and those affected by the activities taking place in and around the construction project.

The Health and Safety Specification entails requirements that are generally applicable to construction work and imposes controls associated with activities that impact human health and safety and provides the overarching framework within which the contractor is required to demonstrate compliance with certain requirements for health and safety during construction, established by the Occupational Health and Safety Act of 1993 and associated Regulations and Standards incorporated under Section 44 of the OHS Act of 1993, even if such standards are not directly referenced in the Specification.

The specification further establishes the manner in which the contractor is to manage the risk of health and safety incidents during the construction and the manner in which **NCC** will interact with the contractor.

Contractors employed by **The Client** are to ensure that the provisions of the specification are applied both on the site and in respect of all off-site activities relating to the project, in particular in transport activities and project dedicated off site fabrication works and should further, enforce the provisions of the specification amongst all sub-contractors and suppliers to the project.

4 INTERPRETATION

This Health and Safety Specification is a compliance document drawn up in terms of the current South African legislation and is therefore binding. It must be read in conjunction with the relevant legislation and any other applicable health and safety standards as provided for in Section 44 of the Occupational Health and Safety Act, 85 of 1993.

The Health and Safety Specification contains clauses that are generally applicable to building/construction and to impose pro-active controls associated with activities that impact on human health and safety as it relates to plant and machinery. Compliance to the requirements of the OHS Act is in addition to the requirements of the Specification and is part of the Contractor's responsibility. **The Client**/**NCC** will monitor that the contractors comply with the requirements of the OHS Act and Regulations and will not prescribe to the contractor how such compliance is achieved.

The Act and its associated regulations shall have precedence in the interpretation of any ambiguity or inconsistency between the Act and the specification.

Compliance with the requirements of the specification does not necessarily result in compliance with the provisions of the Act.

The following documents are to be read in conjunction with this specification:

- Architects drawings/design reports/specifications
- Structural engineers' drawings/ design reports/ specifications
- Electrical engineers' drawings/design reports/specifications
- Electronic engineers' drawings/ design reports/ specifications
- Mechanical engineers' drawings/ designs reports/ specifications
- Wet services and Fire engineers' drawings/ designs reports/ specifications

5 PROVISION FOR COST OF HEALTH AND SAFETY

The Principal Contractor shall make and show adequate provision for the cost of adequate and required health and safety measures during the construction process as required by Construction Regulation 5(1)(g).

Additionally, **Annexure 1** in this document contains a guideline Bill of Quantities (BOQ) for health and safety, which serves as a tool to assist contractors in accurately estimating and budgeting for associated costs. It outlines specific measures and provisions that contractors should consider and incorporate into their pricing to ensure adequate health and safety standards throughout the project lifecycle.

The provided Bill of Quantities (BOQ) in **Annexure 1** is intended as a guide and is not exhaustive. It remains the responsibility of the contractor to thoroughly assess and cost all necessary health and safety measures according to project requirements and regulatory standards.

Furthermore, the Principal Contractor shall ensure that on appointing any other contractor for any portion of the construction project, each potential subcontractor submitting tenders for such work has made sufficient provision for adequate and required health and safety measures during the construction process, as required by Construction Regulation 7(1)(c)(ii).

6 PROJECT DETAILS

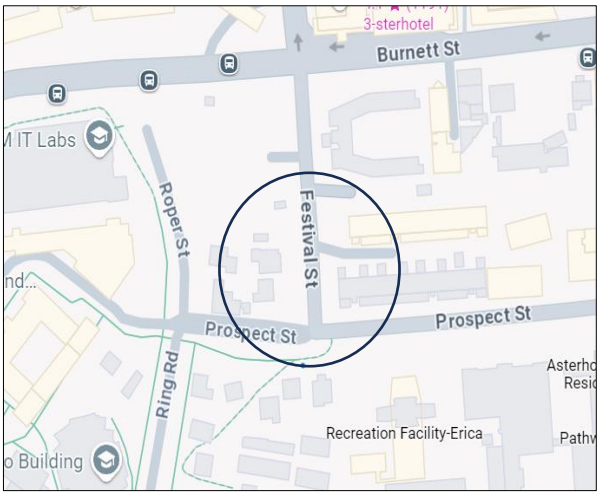
6.1 Project Purpose / Objective

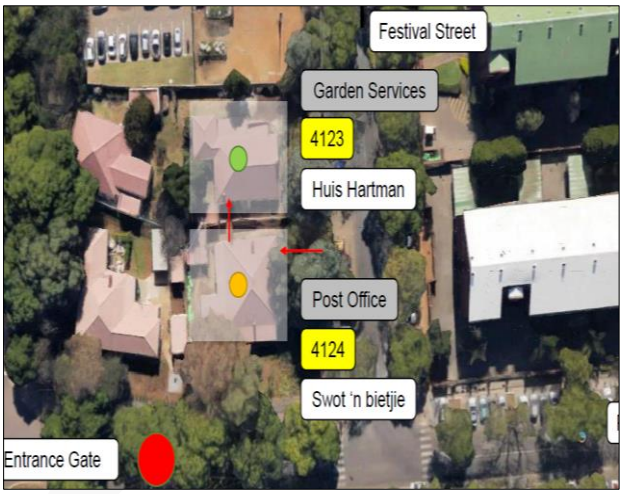
The UP | Post Office & Garden Service Building Upgrade Project aims to enhance the facility by providing necessary services and additional spaces. The University of Pretoria seeks to refurbish the building to achieve a fit for purpose facility.

6.2 Project Location

Address:

Prospect and Festival St, Hatfield, Pretoria, 0028.





6.3 Scope of Work / Intended Construction Work

The planned construction involves the renovation of the existing heritage buildings. The specific tasks for completion are detailed in this Works Project Contract document and outlined in the Bills of Quantities. To improve operational efficiency and meet current needs, it is essential to upgrade the facilities to accommodate the garden service staff's ablutions and change rooms, as well as provide for the post office administration staff. The existing facilities, both of which are heritage buildings, are in need of maintenance and occupational upgrades. Additionally, the current setup lacks sufficient ablution facilities for all staff members and does not offer enough secure storage space to meet the property's requirements. Addressing these issues will ensure that the needs of all staff are met and that the facilities are functional and compliant with modern standards However, should unforeseen conditions arise during construction that deviate from initial expectations, the Employer's Agent reserves the right to adjust the scope of work accordingly to accommodate the prevailing conditions and circumstances.

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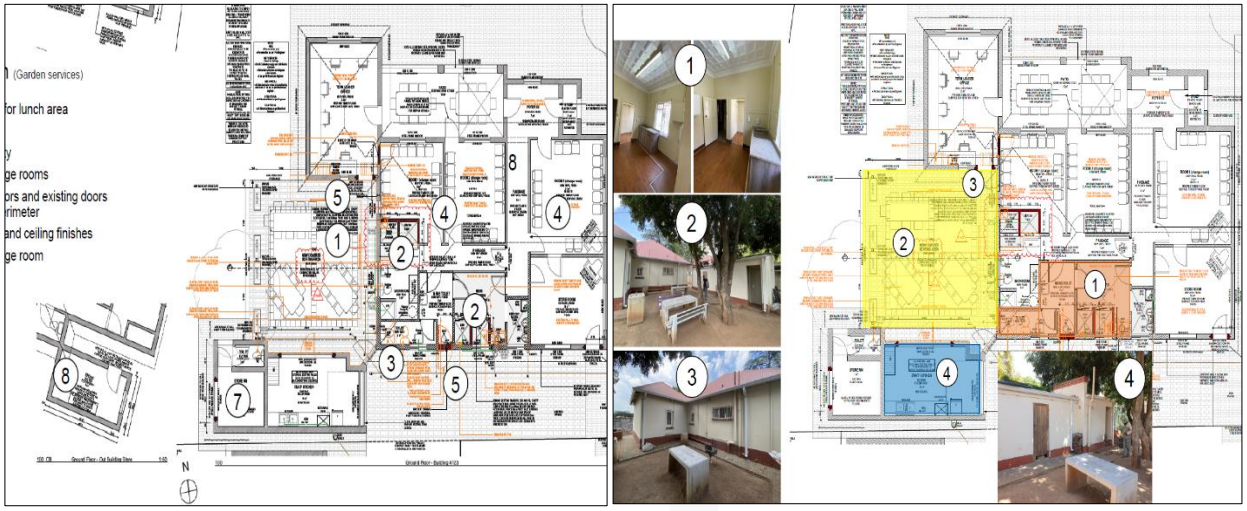

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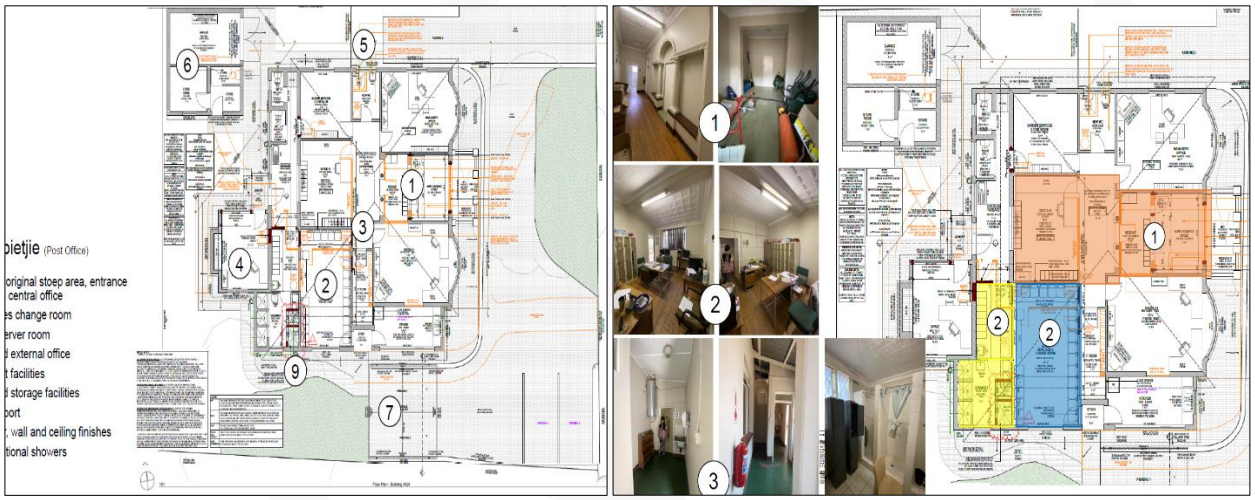


6.4 Construction Program

The intended construction work will be approximately **6 Months**.

6.5 Brief of Existing Areas and Conditions

The UP | Post Office & Garden Service Building Upgrade Project is located within an existing operational facility and poses a risk for high interface with tenants, students, the end user, and persons frequenting the campus

therefore the Principal Contractor will be required to submit a detailed construction programme for review and approval to the Clients Safety Agent, Principal Agent, and the Facilities Manager.

Hazards particular to this project by virtue of location:

Overhead: As identified by Contractor

Underground: Existing electricity, water and sewerage pipelines.

Ground level: As identified by the Contractor.

Service drawings available: Available from the Project Manager.

Way leaves required: Responsibility of the Contractor

Permits required: To be confirmed by the Contractor and Project Manager

Isolations required: As identified by the Consulting Team and Contractor.

Existing ground conditions: Refer to Geotechnical Report or client specifications.

Public, student, and university interference: Responsibility of the Contractor.

Site access and hoarding: Responsibility of the Contractor.

Public roads: Responsibility of the Contractor.

Site establishment: Responsibility of the contractor.

Noise: Responsibility of the contractor**.**

Hoarding: Responsibility of the contractor**.**

6.6 Specific Considerations or Constraints

The UP | Post Office & Garden Service Building Upgrade Project is situated in a currently operational facility, presenting significant potential for interaction with tenants, students, the end user, and visitors to the campus. This environment necessitates careful management of interfaces to ensure minimal disruption.

The construction programme must indicate the high risks activities such as areas with high public interface that will allow the end user to decant persons or ensure a specific area is kept clear during said activities as well as timeously notify tenants accordingly.

6.7 Health Risks for Consideration

Malaria is not a factor in this Gauteng region, and the need for anti-malaria medication is not necessary.

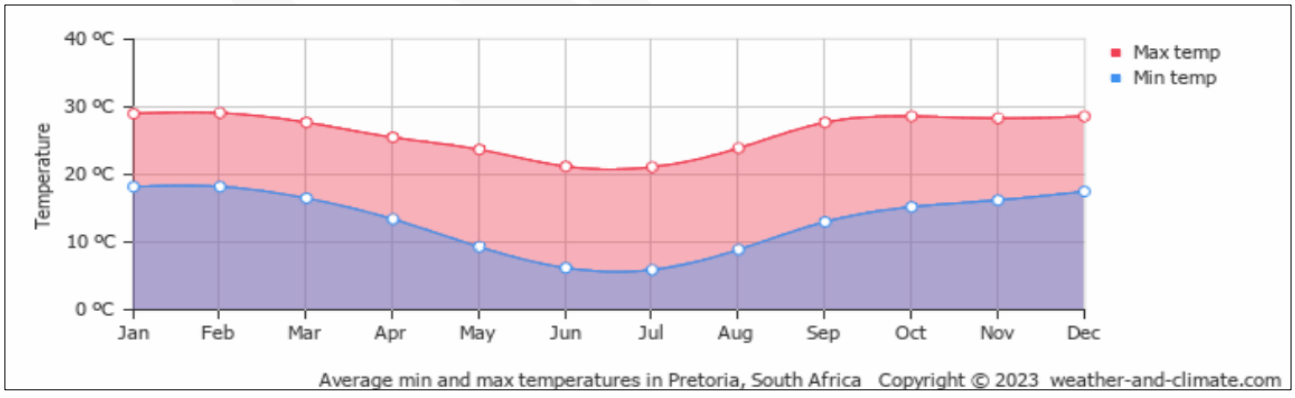
However, risks that need to be communicable health risks that could affect persons on the project include:

- Tuberculosis
- HIV/Aids
- Covid-19 Virus

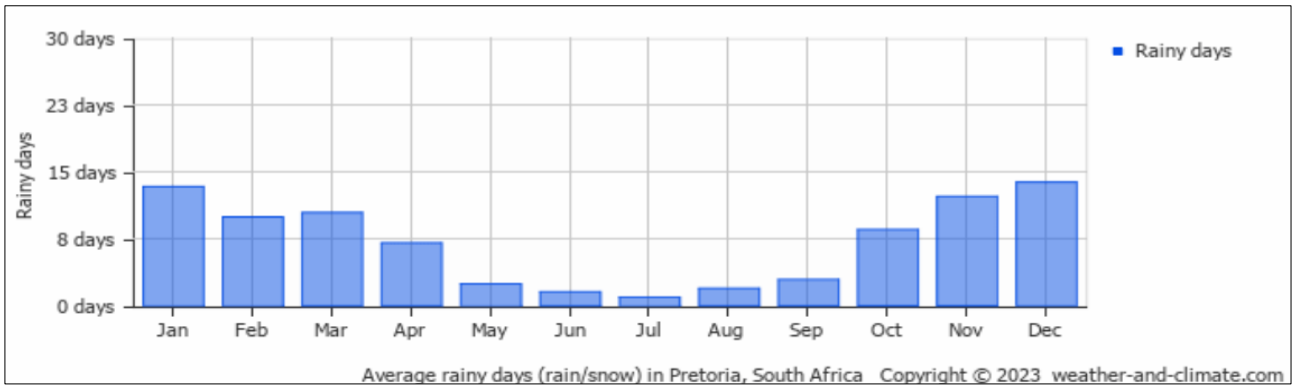
Other work-related health risks that will need to be considered include:

- Waterproofing Substance - exposure and inhalation
- Silica (sand and cement products)
- Dermatological conditions (contact with cement, concrete products, and waterproofing substance)
- Hazardous Chemical – inhalation and contact conditions.
- Ergonomic risks
- Dust (respiratory) conditions – lung infections.

6.8 Weather Patterns



(The mean minimum and maximum temperatures over the year)



(The average number of days each month with rain)

6.9 Contractor Risks

The use of local contractors will be a requirement, and these contractors, whether used as either labour only, domestic or selected, could bring in additional health & safety risks if they are not familiar with or worked with a client with specific health & safety requirements.

Potential problems that could be faced include:

- Provision of medicals for personal
- Turnover of staff or using new employees regularly resulting in medicals not being done for employees, or increasing costs related to having medicals done.
- Competencies and evidence of training and qualifications for persons taking legal liability.
- Training and experience of employees on construction sites and strict health & safety requirements
- Communication of health & safety to employees on the site
- Training of the staff on health & safety for the site
- The competency of the health & safety officer(s) used (registered) and their ability to communicate health & safety to all employees and contractors on the project.
- The competencies and qualifications of the Construction Manager used on the project.

Where local suppliers are used, these could also pose additional health & safety related risks which could stem from unsafe equipment being supplied to the site and being used on the project.

6.10 Project Objectives

The following Health & Safety Objectives will be set for the project:

- Lost Time Injury Frequency Rate (LTIFR) – Target: 0
- Lost Time Injuries – Target: 0

- Medical Treatment Injuries – Target: 0
- First Aid Injuries – Target: 1 (or as low as reasonably achievable)
- Noise-Induced Hearing Loss Cases – Target: 0
- Silicosis Cases – Target: 0
- Occupational Dermatitis Cases – Target: 0
- Hazardous Chemical Substance Incidents – Target: 0
- Accidental Release of Chemicals, Loss of Control of Machinery, Explosions – Target: 0
- Fire-Related Incidents – Target: 0

Including these specific indicators ensures that the health and safety objectives are measurable and actionable, allowing for effective monitoring and control of risks throughout the project lifecycle. Additionally, it emphasizes the importance of preventing specific types of incidents that can have significant health and safety impacts on workers and the surrounding environment.

The above objectives must be written into the Principal Contractors Health & Safety plan and be communicated to their management and all employees and contractors on the project as part of the induction programme.

7 PROFESSIONAL TEAM, DESIGNERS & DESIGN RISK MANAGEMENT

7.1 Project Manager / Principal Agent

The Client shall designate a project manager / principal agent tasked with managing the overall proposed project, with full authority and obligation to ensure compliance with the OHS Act, relevant regulatory requirements and construction contract utilized on behalf of **The Client**.

7.2 Client Health and Safety Agent

The Client shall appoint a Construction Health and Safety Agent to ensure compliance with relevant regulations like the Occupational Health and Safety Act (OHSAct). This role involves developing, implementing, and monitoring health and safety protocols, including conducting OHS compliance audits and inspections. The Agent identifies hazards, implements corrective actions, and provides guidance to maintain a safe construction site.

7.3 Architect

The Client shall appoint an Architect to oversee the design and construction process, ensuring compliance with relevant regulatory requirements and standards, such as but not limited to SANS 10400. This entails

integrating safety measures into architectural plans and overseeing implementation to guarantee adherence to safety protocols and structural integrity.

7.4 Electrical Engineering

The Client shall appoint an Electrical Engineer to oversee electrical design and implementation, ensuring compliance with relevant standards such as SANS 10142 and all applicable wiring codes. This role involves integrating electrical safety measures into designs, verifying adherence to wiring regulations, and overseeing implementation to guarantee safety and functionality throughout the electrical systems.

7.5 Quantity Surveyor

The Client shall appoint a Quantity Surveyor to manage the financial aspects of the project, ensuring adherence to relevant standards and regulations. The Quantity Surveyor is responsible for accurately estimating costs, managing budgets, and ensuring cost-effectiveness throughout the project lifecycle.

7.6 Structural Engineer

The Client shall appoint a Structural Engineers to oversee the design and construction of the infrastructure, ensuring compliance with relevant standards and regulations. This includes adherence to codes such as the South African National Standards (SANS) for structural design and construction. These engineers are responsible for ensuring the structural integrity, safety, and functionality of buildings.

7.7 Mechanical Engineers

The Client shall appoint Mechanical engineers to oversee the design and implementation of mechanical systems, ensuring compliance with relevant standards such as SANS 10227 and other applicable codes. This role involves integrating mechanical safety measures into designs, verifying adherence to engineering regulations, and overseeing implementation to guarantee the reliability, efficiency, and safety of mechanical systems throughout the project lifecycle.

7.8 Electronic engineer

The Client shall appoint an Electronic Engineer to oversee electronic design and implementation, ensuring compliance with relevant standards and all applicable wiring codes. This role involves integrating electronic safety measures into designs, verifying adherence to wiring regulations, and overseeing implementation to guarantee safety and functionality throughout the electronic systems.

7.9 Fire Engineer

The Client shall appoint Fire Engineers to oversee the design and implementation of fire safety measures, ensuring compliance with relevant standards such as SANS 10400-T and other applicable codes. This role involves integrating fire safety systems into designs, verifying adherence to fire safety regulations, and overseeing implementation to guarantee the protection of life and property against fire hazards throughout the project lifecycle.

7.10 Duties of Designers (CR 6)

All persons appointed as Designers on the project, including the Principal Contractor's appointed temporary works designer are required to familiarise themselves with the requirements of Construction Regulation 6 and OHS Act Section 10(1) in respect of the duties incumbent on designers to ensure that the applicable safety standards incorporated into the regulations under Section 44 of the Act are complied with in the design.

Designers are required to consider and be familiar with all the requirements of each part of SANS 10400 relevant to their design and ensure that their design complies with all such requirements.

Appointed designers are to refrain from including anything in their design necessitating the use of dangerous procedures or materials hazardous to the health and safety of persons. Where a designer identifies any element of the design which may pose a risk to health and safety during execution of the design during construction, operation and maintenance of the structure, such information is to be brought to the attention of **The Client** and **The Client**'s appointed Health and Safety Agent.

During the design phase, designers are required to take cognisance of ergonomic design principles in order to minimise ergonomic related hazards in all phases of construction and subsequent use and maintenance of a structure.

Designers shall further take into account the hazards relating to any subsequent maintenance of the relevant structures and must make provision in the design for that work to be performed safely and with minimal risk.

When mandated by **The Client** to do so, each designer shall carry out the necessary inspections at appropriate stages to verify that the construction is carried out in accordance with his design. Furthermore, if so mandated by **The Client**, stop any contractor from executing any construction work which is not in accordance with the relevant design's health and safety aspects.

Design reports must be provided **The Client**'s design team and client's health & safety agent for review.

All designers must acknowledge in their design or design reports that they have read through this section of the specification.

7.11 Project Design Risk Management Procedure

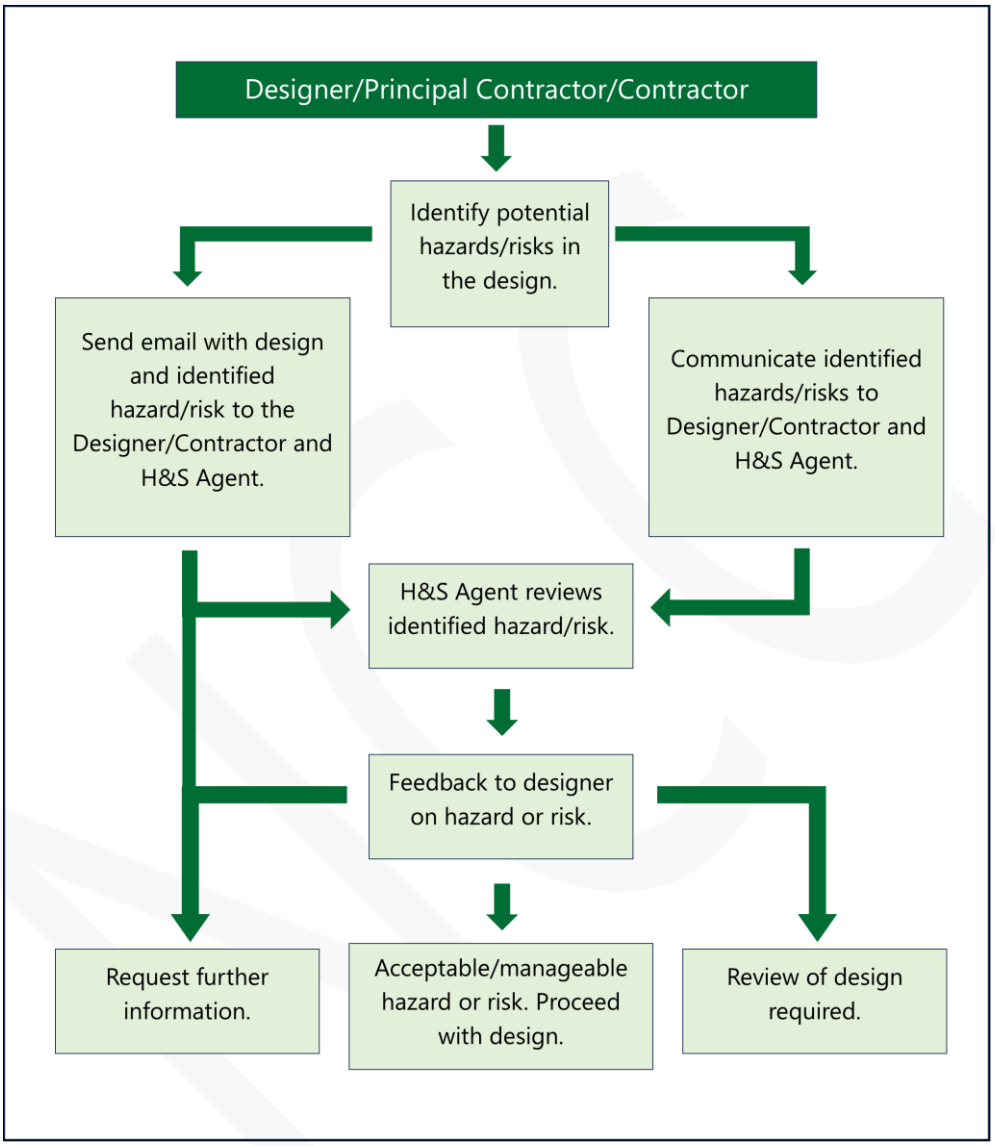


Figure 1: Risk Management Procedure

All persons appointed as Designers on the project, including the Principal Contractor's appointed temporary works designer are required to familiarise themselves with the requirements of Construction Regulation 6 and OHS Act Section 10(1) in respect of the duties incumbent on designers to ensure that the applicable safety standards incorporated into the regulations under Section 44 of the Act are complied with in the design.

Appointed designers are to refrain from including anything in their design necessitating the use of dangerous procedures or materials hazardous to the health and safety of persons.

During the design phase, designers are required to take cognisance of ergonomic design principles in order to minimise ergonomic related hazards in all phases of construction and subsequent use and maintenance of a structure.

Designers shall further take into account the hazards relating to any subsequent maintenance of the relevant structures and must make provision in the design for that work to be performed safely and with minimal risk.

When mandated by **The Client** to do so, each designer shall carry out the necessary inspections at appropriate stages to verify that the construction is carried out in accordance with his design. Furthermore, if so mandated by **The Client**, stop any contractor from executing any construction work which is not in accordance with the relevant design's health and safety aspects.

8 CONTRACTOR EVALUATIONS, AND APPROVAL

Prior to commencing any works, including site establishment, the Principal Contractor is required to supply the following documentation to **The Client**'s Health & Safety agent, for approval and verification, the contractor must attend a pre-construction audit at an agreed-upon time and date for a Health and Safety Compliance Audit before work may commence. The contractor's construction manager and safety officer must be in attendance during this audit.

- Site and project specific Health & Safety Plan
- Site and project specific Fall Protection Plan
- Site and project specific Waste management plan
- Valid Letter of Good Standing (FEM, WCA or RMA) for workmen's compensation
- Proof of sufficient public liability insurance
- Notification of Construction work and proof of submission to the DOEL
- Management appointments and management organogram for the project
- Risk Management procedure (may include Environmental and Quality risk management)
- Site and project specific Baseline Risk Assessment and initial risk assessments
- Method of works i.e., Site establishment & Roof work
- Appointments with proof of competency (Safety Officer proof CV, and proof of registration with the SACPCMP & Construction Managers CV and competency training)

Upon approval, the Principal contractor shall be required to maintain the safety file on site inclusive of the below listed requirements (this list is not exhaustive):

- Copy of the OHS Act and relevant Regulations.

- Company policies.
- Site specific rules.
- Incident and Accident Management procedure.
- Non-conformance/compliance procedure.
- Permit system and management procedures.
- Emergency plan and telephone numbers.
- H&S induction records (including visitor inductions).
- H&S information session records (toolbox talks).
- Inspection registers – various project-specific planned maintenance inspections, load test certificates, service records, etc.
- Injury and incident investigation reports and first aid dressing book.
- Safety officer inspection reports – at least weekly hazard survey finding reports.
- Planned Task Observations (PTO's).
- Audit reports – monthly audits on Contractor(s).
- Contractor H&S Plan assessments and approvals.
- Safety Data Sheets – i.e. Chemicals.
- PPE issue records.
- Health & safety meeting minutes and attendance registers.
- Certified medical assessment certificates including Annexure 3.
- Disciplinary records and unsafe act/condition warning notices issued.

Ensuring compliance with Construction Regulation 7(1)(b) It is the responsibility of the Principal contractor to open and **keep on site** a health and safety file, which must include all documentation required in terms of the Act and these Regulations, which must be made available on request to an inspector, **The Client**, **The Client**'s agent or a contractor.

9 CONSTRUCTION HEALTH AND SAFETY PLAN AND FILE

9.1 Health and Safety Plan (CR 7(1))

A project specific documented plan detailing the overarching procedures that shall be adhered to in order to identify and mitigate hazards, manage all accidents and incidents at the workplace and describe communication to all affected and interested parties. The plan shall be developed by the Principal contractor and contractor in accordance to the requirements as detailed in the health and safety specification.

The principal contractor shall submit the health and safety plan to the appointed Health and Safety Agent for review and approval prior the commencement of any activities on site

The plan shall, as a minimum, comply with the following requirements:

- Scope and brief of the works to be completed
- Process and procedure for the appointment of various roles for the project
- Process and procedure for identifying and verifying the competency of those appointed to the project
- Provide a documented procedure of identifying, evaluating, prioritizing and managing/controlling hazards according to risk profile, which must include all mobilization and site set up activities as per the Baseline Risk Assessment. Including safe working procedures, job observations, PPE surveys and training
- Process and procedure for the identification of all work at height risks, and the development of a documented fall protection plan and training thereof.
- Process and procedure for identifying the training needs for employees on the project and the resulting training (incl. fall protection, risk assessment training, etc.)
- Process and procedure for managing and evaluating emergency's for the project. This must take into consideration the integration and impact on **The Client**'s emergency procedures
- Process and procedure for dealing with first aid, medical and lost time injuries as well as the reporting thereof
- Process and procedure for the identification of Resources/ Equipment required for the project, including human resources
- Process and procedure for operational control and maintenance of equipment & machinery used on the project. This must include the process for dealing with equipment/machinery that deviates from the norm.
- Process and procedure for control of contractors appointed by the Principal contractor for the project, must include vetting of contractors prior to access to the project
- Process and procedure for identification, measuring, controlling and monitoring Regulations for Hazardous Biological Agents, Hazardous Chemical Substances Regulations, Noise Induced Hearing Loss Regulations.
- Process and procedure for induction of all employees, contractors, and visitors to the project
- Process and procedure for the control of change management and its impact on the project Process and procedure for closing out, consolidating and handing over of H&S information to **The Client**/client H&S agent
- Must be reviewed and updated by the principal contractor as work progresses.

9.2 Administrative Controls and Health and Safety File

As required by Construction Regulation 7(1)(b), the Principal Contractor and each sub-contractor appointed by him on the project, will open and maintain a Health and Safety File on site containing the records of information on aspects of the project.

NCC Health & Safety may conduct an audit on the health and safety file of the Contractors prior to appointment by **The Client**, as deemed necessary and by routine monthly audits. The results of these audit inspections will be communicated to **The Client** and Principal Contractor with recommendations and corrective action requirements where applicable. Upon receipt of the audit results, the contractor will be required to submit an action plan to address the outstanding issues and to communicate such plan in writing, detailing the measures to be taken and the time frame in which this will be achieved. The principal contractor shall inform **NCC** Health & Safety of all contractors that will start construction work on the project at least two weeks in advance.

NB: Any serious non-compliance must be dealt with immediately. In the event of non-compliance with legal requirements, work activities may be curtailed until such time as the non-compliance has been adequately addressed. This will be done after **NCC** Health & Safety has consulted with **The Client**/Principal Agent and action will be implemented on their final decision.

9.3 Close Out File (CR 7(1)):

Upon completion of the project, the contractor is required to provide a comprehensive closeout file to the Safety Agent. This file must include both original hardcopies and scanned electronic copies, meticulously organized according to specified file indexing and naming conventions. It should cover all relevant project information, including construction health and safety records, detailed drawings, designs, and a complete list of materials used. Specialist reports, such as Electrical and Plumbing Certificates of Compliance (COCs), must be included. Additionally, this documentation should incorporate essential guidelines, specifications, and instructions from the design team for the safe operation and maintenance of the completed structure(s) or part(s) thereof.

During the defects liability period and subsequent maintenance visits, the Principal Contractor is responsible for addressing risks, which may involve updating emergency procedures, method statements, and risk assessments. This entire process must be thoroughly documented in adherence to the specified safety requirements to ensure ongoing safety and regulatory compliance post-project completion.

*"CR7(1)(e): A principle contractor must handover a consolidated health and safety file to **The Client** upon completion of the construction work and must, in addition to the documentation referred to in sub regulation*

(2)(b), include a record of all drawings, designs, materials used, and other similar information concerning the competed structure".

10 CONTRACTOR MANAGEMENT

Referencing Construction Regulations 7, the Principal Contractor shall fulfil all legal obligations with regards to the management of contractors appointed by the Principal Contractor to perform any part of the works., as outlined in Construction Regulation 7(1)(c).

The Principal Contractor must make available a comprehensive and updated list of all the contractors on site accountable to the principal contractor, the agreements between the parties and the type of work being done.

The Principal Contractor shall monitor health and Safety compliance of all appointed contractors to the requirements of their H&S Plan as well as the project Health & Safety Specification by means of pre-evaluations, regular site audits and documentation verifications. Periods between these audits shall not exceed 30 days, as per Construction Regulations 7)1)(e)(vii).

10.1 Direct Contractors

During the course of the works **The Client** may appoint direct contractors to perform specific tasks on site. These contractors are appointed directly by **The Client** and therefore report to the directly to **The Client**. The direct contractors shall be required to conform the requirements of this specification. In addition, the direct contractors must be inducted by the principal contractor, and all work on site must be scheduled with the construction manager, in order to ensure the safety of all persons on site.

The principal contractor shall, as far as reasonably practicable, not restrict the work of direct contractors, unless in the interest of health and safety of all persons involved. In such events, the principal contractor must notify **The Client** and the **NCC** Health & Safety representative of the stoppage, including the reason for the stoppage and the planned duration of the stoppage.

10.2 Selected / Nominated Contractors

During the course of the works **The Client** may nominate specific contractors whom the Principal Contractor shall appoint as Subcontractors to perform specific functions on site. Nominated Contractors shall be managed by the Principal Contractor as a subcontractor, The Principal Contractor must take reasonable steps to ensure co-operation between all contractors to enable each of those contractors to comply with the regulations as per put out in the "Occupational Health and Safety Act of 1993 and associated Regulations".

The nominated contractors shall be required to conform the requirements of this specifications as well as the H&S Plan of the Principal contractor. In addition, that, the nominated contractors must be inducted by the principal contractor, and all work on site must be scheduled with the construction manager, in order to ensure the safety of all persons on site. Nominated Contractors shall be managed by the Principal Contractor as a subcontractor.

11 GENERAL HEALTH AND SAFETY REQUIREMENTS

11.1 Legal Requirements

Each Contractor entering into a contract with **The Client** shall, as a minimum, comply with the:

- Occupational Health and Safety Act and Regulations (Act 85 of 1993): A current, up to date copy of the OHS Act and Construction Regulations are to be available on site at all times;
- **The Client**'s Health and Safety Specification.
- Compensation for Occupational Injuries and Diseases Act (Act 130 of 1993): The principal contractor shall submit to **The Client** and **NCC** Health and Safety, proof of registration as an employer with the Department of Employment and Labour as well as a valid letter of good standing from the Compensation Commissioner or a licenced compensation insurer as contemplated in the COID Act (Act 130 of 1993);
- The principal contractor shall ensure that every sub-contractor appointed on the project complies with the Compensation for Occupational Injuries and Diseases Act (Act 130 of 1993), and can provide a valid letter of good standing from the Compensation Commissioner or a licence compensation insurer;
- All Contractors shall comply with the "Integration Labour Law Act" and regulations
- All Contractors shall comply with all relevant Municipal bylaws and National Building Regulations
- All Contractors shall comply with the Immigrations Act 2002, as amended, and shall further ensure that no foreign nationals are employed on the construction site without an original or certified valid work permit or asylum seekers permit.

11.2 Legal Compliance

The contractor shall comply with all applicable legislative requirements inclusive of the Act, Other relevant specification and applicable municipal bylaws. This includes but not limited to:

- Create and maintain as reasonably practicable a safe and healthy work environment
- Execute the works in a manner that complies with the requirements of the Act and all its associated regulations and standards and in so doing, minimize the risk of incidents occurring and

11.3 Legal Registers and Legislative References

Before work commences, the Principal Contractor will provide to **The Client** or Client's Health & Safety Agent a legal register for approval related to the following:

- Health & safety related acts
- Health & safety related regulations
- Health & safety related standards
- Health & safety related by-laws

The legal register will be presented to **The Client**'s health & safety agent at each audit, and must be reviewed on a monthly basis.

11.4 Response to OH&S Notices

Respond to the notices issued by **NCC** as follows:

1. Life-threatening situation - a **PROHIBITION NOTICE/ORDER** will be issued by means of a written instruction in the site instruction book or an explanation/detail in an audit report/e-mail. The activity in question must then be seized immediately and corrective measures taken to the satisfaction of the H&S Agent after which permission will be given to resume the activity.
2. Injury foreseen – a **CONTRAVENTION NOTICE** will be issued by means of an explanation/detail in an audit report/e-mail with a time frame for compliance stipulated. Failure to comply within the time frame may result in a financial penalty per noncompliance item per day that the non-compliance persists.
3. Ongoing contravention for similar non-compliances - a contravention notice will be issued with a time frame for compliance stipulated. Failure to comply within the time frame may result in a financial penalty per non-compliance item per day that the non-compliance persists. On-going noncompliance may also result in a further issue of a prohibition notice/order.
4. Minor or no injury foreseen – an **IMPROVEMENT NOTICE** will be issued. The corrective measures stipulated in an audit report/e-mail must be taken.

Respond to **Non-Conformance Reports (NCR)** issued by **NCC** as follows:

An NCR (Non-Conformance Report) will be issued to document instances where construction work does not meet the required standards, specifications, or regulations. Contractors should be aware that unresolved NCRs may lead to contractual complications.

The contractor must promptly acknowledge receipt of the NCR, cease any associated work to prevent further non-compliance and conduct a thorough investigation to ascertain its root cause. Subsequently, they should formulate and execute a detailed corrective action plan, meticulously documenting each step. Furthermore, the contractor is required to identify and apply preventative measures to preclude future occurrences, furnish **NCC** with a formal response containing comprehensive documentation, and facilitate the verification and follow-up inspections necessary to validate the efficacy of the corrective measures. The acknowledgement or issuance of the NCR will be signed by the project manager or principal agent.

11.5 Duty to Inform.

Referencing Section 13 of the OHS Act and General Administrative Regulation 8, without derogating from any specific duty imposed on an employer by this Act, every employer shall:

- As far as reasonability practicable, cause every employee to be made conversant with the hazards to his health and safety attached to any work which he has to perform, any article or substance which he has to produce, process, use, handle, store or transport and any plant or machinery which he is required or permitted to use, as well as with the precautionary measures which should be taken and observed with respect to those hazards;
- Inform the health and safety representative concerned beforehand of inspections, investigations or formal inquiries of which he has been notified by an inspector, and of any application for exemption made by him in terms of section 40; and
- Inform a health and safety representative as soon as reasonably practicable of the occurrence of an incident in the workplace or section of the workplace for which such representative has been designated.
- High rated and high potential incidents / accidents must be formally communicated to all contractors. Personal details of injured or affected persons must be redacted.

12 GENERAL HEALTH & SAFETY PROVISIONS

12.1 Project Policies and Procedures

The following policies and where required, procedures, will be mandatory for the Principal Contractor and must be reviewed by **The Client** or Client's Health & Safety Agent before work commences on the project:

- Health & safety policy.
- Drug and substance abuse policy and procedure.
- Noise Policy

The procedures outlined above encompass those necessary to carry out the work. They will be requested as needed in the relevant sections of this specification.

12.2 Health and Safety Organogram

The Principal Contractor and each of his appointed sub-contractors shall submit and maintain in the health and safety file a project organogram, with contact numbers, outlining the health and safety site management structure, including the relevant appointments for competent persons.

Such organograms shall be site specific and in addition are to be updated immediately when any changes to the site management structure are affected, or a legal appointee is substituted.

12.3 Structure and Responsibilities

Overall supervision and responsibility for OH&S:

- The Principal Contractor is to ensure that the contractors appointed in terms of Construction Regulation 7(1)(c)(v), implement and maintain the agreed, approved OH&S plan. The Principal Contractor will take full responsibility for the health and safety of all appointed sub-contractors on the project. The Principal Contractor is to ensure that all health and safety legal documentation of all contractors is compliant to the OHS Act of 1993, Construction Regulations of 2014 and **The Client**'s Safety Specification. The Principal Contractor shall further ensure that all legal documentation of all contractors and direct contractors are maintained and kept up to date for the duration of the project.
- The Chief Executive Officer of the Contractor, in terms of 16(1) of the Act, is to ensure that the Employer (as defined in the Act) complies with the Act. A Legal Compliance Audit shall be conducted by **NCC** Health & Safety for this purpose.

It is a requirement of **The Client**, that when he appoints a Contractor in terms of Construction Regulations 5(1)(k), he includes an OHS Act Section 37(2) agreement 'Agreement with Mandatary' in his agreement with such Contractors. In addition, in order to ensure that the correct structure and related responsibilities are addressed, all the required statutory appointments will be established.

Further specific supervision responsibilities for H&S: The Contractor shall appoint designated competent employees and/or other competent persons as required by the Act and Regulations. The following identified appointments may be used to select the appropriate appointments.

It is to be noted that these appointments are based on the proposed scope of works at the time of drafting of this health and safety specification. Should the scope of work or activities on the project change at any given time, legal appointments together with competency requirements required for such change in scope or additional activities will be communicated to the contractor and such appointment must be implemented by the contractor with immediate effect.

Appointment	Ref. Section/Regulation in OHS Act
General	
Assistant to the CEO	Section 16(2)
General Supervisor – OH&S	Section 8(2)(i)
Risk Assessment facilitator	Section 8(2)(d)
Health and Safety Representative **(To be on site full time)**	Section 17(1)
the Principal Contractor (PC) is responsible for appointing a health and safety representative to be present on site full-time. OHS Act Sec. 17(2) and GAR 6, requires that the appointment OR election and subsequent designation of H&S Representatives are executed in consultation with Employee Representatives or Employees. H&S Representatives to be designated in writing and designation must include the area of responsibility of the appointee and term of the designation. Duties and functions of the H&S Representatives shall be as contained in Section 18 of the OHS Act.	
Health and Safety Committee Chairman	OHS Act Section 19
Health and Safety Committee Members	OHS Act Section 19
Chairman of the H&S Committee	Section 19(5)
Recorder of Incidents	General Administrative Regulations 9
Reporter of Incidents to the D.O.L	Section 24 & General Administrative Regulations 8
Reporter of incidents to the C.C.	General Administrative Regulations 8
Incident Investigator	General Administrative Regulations 9(2)
Person Responsible for PPE	General Safety Regulations 2(2)
Stacking Supervisor	General Safety Regulations 8(1)(a)
Ladder Inspector (Designated)	General Safety Regulations 13A
Confined Space entrant	General Safety Regulations 5(3)(b)
Confined Space Attendant	General Safety Regulations 5(3)(c)
Emergency Arrangements	
Emergency Controller	Environmental Regulations for Workplaces 9
First Aid Coordinator	General Safety Regulations 3
First Aider	General Safety Regulations 3(4)
Emergency Evacuation Coordinator	Environmental Regulations for Workplaces 9

Fire Fighting Coordinator	Environmental Regulations for Workplaces 9(2)
Fire Fighter / Member of Fire Fighting Team	Environmental Regulations for Workplaces 9(2)
Fire Fighting Equipment Inspector	Environmental Regulations for Workplaces 9(2) Construction Regulation 29(h)
Construction Work	
Client's Agent	Construction Regulations 5(5) & 5(6)
Principal Contractor	Construction Regulations 5(1)(k)
Construction Manager ***(To be on site full time)***	Construction Regulations 8(1)
Construction Manager (Alternate)	Construction Regulation 8(1)
Assistant Construction Manager	Construction Regulations 8(2)
Contractor (Sub-Contractor)	Construction Regulations 7(1)(c)(v)
Construction Supervisor	Construction Regulations 8(7)
Assistant Construction Supervisor	Construction Regulations 8(8)
Construction Safety Officer	Construction Regulations 8(5)

In terms of Construction Regulation 8(5), ***The Client*** *requires the Principal Contractor to appoint a* ***Part-time Construction Health and Safety Officer*** *in writing and provide the required proof of competency. Where required by the size of the project and the degree of danger likely to be encountered, or on the instruction of an Inspector of the Department of Employment and Labour, sub-contractors shall also be required to appoint a Health and Safety Officer. Any safety officer appointed on a part time or full-time basis is to be* ***registered with the SACPCMP*** *and provide a valid certificate of registration in compliance to the requirements of Construction Regulation 8(6).*

Risk Assessor	Construction Regulations 9(1)
Fall Protection Plan Developer	Construction Regulations 10(1)(a)
Fall Protection Plan Supervisor	Construction Regulations 10(1)(b),(c)
Fall Rescue Team	Construction Regulations 10(2)(e)
Structural Designer	Construction Regulations 6(1)
Structures Supervisor	Construction Regulation 11(2)(a)
Temporary Works Designer	Construction Regulation 12(1)
Temporary Works Supervisor	Construction Regulation 12(2)
Temporary Works Pre-Pour Inspector ***(Minimum competency: Structural Technician)***	Construction Regulations 12(3)(g)
Temporary Works Inspector	Construction Regulation 12(3)(f)
Excavation Work Supervisor	Construction Regulations 13(1)(a)
Demolition Work Supervisor	Construction Regulations 14(1) Construction Regulations 14(11)
Scaffolding Supervisor	Construction Regulation 16(1)

Scaffolding Inspector **(Cannot be the Supervisor or Erector)**	Construction Regulation 16(1)
Scaffolding Erectors	Construction Regulation 16(1)
Material Hoist Inspector	Construction Regulations 19(8)(a)
Explosive Actuated Fastening Device Supervisor	Construction Regulation 21(2)(b)
Explosive Actuated Fastening Device Operator	Construction Regulation 21(1)(b)
Explosive Actuated Fastening Device Cartridge Controller	Construction Regulation 21(2)(g)
Controller of Cartridges and Nails	Construction Regulations 21(2)(g)(i)
Construction Vehicle and Mobile Plant Inspector	Construction Regulation 23(1)(k)
Construction Vehicle and Mobile Plant Operator	Construction Regulation 12(1)(d)
Temporary Electrical Installation Controller ***(To be on site full time)***	Construction Regulation 24(c)
Temporary Electrical Installation Inspector	Construction Regulation 24(d)
Electrical Machinery Inspector	Construction Regulations 24(e)
Stacking and Storage Supervisor	Construction Regulations 28(a)
Fire Fighting Equipment Inspector	Construction Regulations 29(h)
Machinery	
Supervisor of Machinery	General Machinery Regulations 2(1)
Assistant Supervisor of Machinery	General Machinery Regulations 2(7)(a)
Welding Supervisor	General Safety Regulation 9
Lifting Machine & Tackle Supervisor	Driven Machinery Regulations 18
Lifting Machine Operator	Driven Machinery Regulations 18(11)
Lifting Tackle Inspector	Driven Machinery Regulations 18(10)
A.I.A. for Pressure Equipment	Pressure Equipment Regulations 11(1)(d)
Competent Person for Pressure Equipment	Pressure Equipment Regulations 11(1)(d)
Electrical	
Electrical Installation Controller	Electrical Installation Regulations 2(1)
Earth Leakage Tester	Electrical Installation Regulations 2(1)
Portable Electrical Tool Inspector	Electrical Machinery Regulations 10(4)
Portable Electrical Light Inspector	Electrical Machinery Regulations 11 (1)
DEL Registered Electrician	Electrical Installation Regulation 6
Health	
HCA Risk Assessor	Regulations For Hazardous Chemical Agents 5(1)

HCA Trainer	Regulations For Hazardous Chemical Agents 3(1)
Person Responsible for HCA Controls	Regulations For Hazardous Chemical Agents 10
HCA Controller	Regulations For Hazardous Chemical Agents 11
Noise Risk Assessor	Noise-Induced Hearing Loss Regulations 6(1)
Trainer in Respect of Noise	Noise-Induced Hearing Loss Regulations 4(1)
Person Responsible for Noise Controls	Noise-Induced Hearing Loss Regulations 13
RHBA Risk Assessor	RHBA 6(1)
Trainer in Respect of HBA	RHBA 4(1)
Person Responsible for HBA Controls	RHBA 14
Best Practice	
Safety Harness Inspector	Construction Regulation CR 10(4)(c)(i)
Ladder Inspector	General Safety Regulations 13A(1)
Traffic Safety Officer	Construction Regulation 23(2)(b): SARTSM
Traffic Controllers/Flagmen	Construction Regulation 23(2)(b)

The following legal appointments may become applicable should the Principal Contractor or Construction Health and Safety Agent deem it necessary, or the legal requirement has made it applicable:

Appointment of Responsible Persons:

The appointments and designations must be in writing, with the responsibilities clearly stated, area of responsibility, together with the period for which the appointment is made. This information must be communicated to and accepted by the appointees.

Copies of appointments together with detailed CV's and where applicable, certificated proof of competency and proof of registration where applicable must be maintained in the contractor's health and safety file and any changes in appointees or appointments are to be amended immediately.

Appointment of Safety Officer:

Referencing C.R 8(5), A contractor must, after consultation with **The Client** and having considered the size of the project, the degree of danger likely to be encountered or the accumulation of hazards or risks on the site, appoint a **part-time** construction health and safety officer in writing to assist in the control of all health and safety related aspects on the site: Provided that, where the question arises as to whether a construction health and safety officer is necessary, the decision of an inspector is decisive. **The appointed health and safety officer is responsible for conducting weekly site inspections and submitting comprehensive reports to**

NCC. These reports must detail the ongoing work and any issues that have been addressed, ensuring thorough documentation for verification and compliance purposes.

Referencing C.R 8(6), 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. Any safety officer appointed on a part time or full-time basis is to be registered with the SACPCMP and provide a valid certificate of registration in compliance to the requirements of Construction Regulation 8(6).

Appointment of OH&S Committee:

The Principal Contractor, with his sub-contractors must establish a Health and Safety Committee consisting of all the designated OH&S Representatives together with a number of management representatives whose number shall not exceed the number of OH&S Representatives on the committee. The members of the OH&S Committee must be appointed in writing.

The OH&S Committee must meet a minimum of once per month and consider, at least, the following Agenda:

- Opening and Welcome
- Present / Apologies / Absent
- Minutes of previous meeting
- Matters arising from previous minutes
- OH&S Representative reports
- Incidents reports and investigations
- Incident/injury statistics
- Other matters
- Close / Next Meeting

Assessment of Competency:

The Client must be reasonably satisfied that the Principal Contractor it intends to appoint has the necessary competency and resources to safely conduct the work they will be appointed for and likewise the Principal Contractor must be reasonably satisfied that the sub-contractors he intends to appoint have the necessary competencies and resources to safely conduct the work they will be appointed for. This must be established at the Tender stage and before appointments are made.

In order to ensure this, the Principal Contractor shall demonstrate to **The Client** that he/she and his/her sub-contractors have a suitable and sufficiently documented OH&S Plan and shall submit the following documentation for perusal and verification by **The Client** and **NCC.**

- Site and activity specific Health and Safety Plan
- Management structure as envisaged at Tender (organogram)
- Valid registration certificate with the Compensation Commissioner or FEM
- Proof of management training on the Occupational Health & Safety Act and other related training
- Any previous convictions under the OHS Act
- The Company's previous five years injury claims as reported to your Workmen's Compensation Insurer
- The Company's approach to co-ordination of on-site health and safety (safety officer, safety consultant etc.)
- Competency and Registrations of health and safety persons (safety officer, safety consultant etc.)
- Competency and Registrations of the Construction Manager (Detailed CV, Registration with SACPCMP & other entities and legal liability training)

12.4 Method Statements

All tasks to be executed must be accompanied by a method statement before work can commence. The method statements must be compiled at least follow the following process:

- Must be developed by executing contractor(s)
- Must be specific to the task to be performed on site and must take into consideration existing site conditions.
- Must follow the sequence of work according to the task to be performed
- Must take note of specialist competencies required to perform the task
- Must take note of legally appointed persons required to be part of the task
- Must take note of tools, equipment, plant and employee requirements
- Must take note of other legal documents and references that may affect the task
- Must take note of design drawings where applicable

12.5 Hazard Identification and Risk Assessments (CR 9)

The hierarchy of controls:

The hierarchy of controls is a systematic approach to managing occupational hazards and includes the following elements in order of priority:

Elimination: Completely removing the hazard from the workplace.

Substitution: Replacing the hazard with a less hazardous alternative.

Engineering controls: Using physical modifications or engineering solutions to isolate people from the hazard.

Administrative controls: Implementing procedures or policies to reduce exposure to the hazard.

Personal protective equipment (PPE): Providing protective equipment (such as gloves, masks, goggles) to reduce exposure to the hazard. Note, PPE must only be considered as a last resort of control measures.

The Principal Contractor must provide their site-specific risk assessment based of the design risk register/assessment provided by **The Client**. **The Client**s and the Principal Contractors risk assessment should be provided to the bidding contractors for the project.

The following risk assessment process is to be adopted on the project by all contractors:

- Task specific hazard identification based off the method statement and must follow the process from start to finish according to the method statement.
- the identification of the hazards (incl. ergonomic) for each step of the method statement
- identify the associated risks of each hazard to which persons may be exposed to;
- an analysis and evaluation of the risks and hazards identified based on a documented method (risk matrix);
- the implementation of control measures and re-evaluation of the risks based off the controls;
- a documented plan and applicable safe work procedures to control the risks that have been identified;
- a monitoring plan; and
- a review plan (at least monthly, change in scope of work and/or following any incident or accident).

In addition to the above, the contractor will have a DSTI/JSA/TSA or equivalent procedure in place that is to be monitored and managed by the H&S team on the project.

Based on the risk assessments, the contractor must develop safe work procedures that will be applied to regulate the OH&S aspects of the construction.

The risk assessments, together with the site specific OH&S Plan and safe work procedures are to be submitted to **NCC Health & Safety**, prior to mobilisation and site establishment commence.

NB: A risk assessment shall be performed for all unplanned work and submitted to **NCC** Environmental Services – Health & Safety for approval, prior to work commencing.

Review of Risk Assessments: The Principal contractor and sub-contractors are to review the hazards identified, risk assessments and safe work procedures (SWP) monthly, or each time an incident occurs and/or changes are made to designs, drawings and construction methods and processes.

12.6 OH&S Goals and Objectives

The contractor will set monthly OH&S objectives and targets, approved by the project manager/ construction manager. Performance towards these goals and objectives shall be monitored and reported on at the monthly health and safety committee meeting.

12.7 Monitoring and Review Of OH&S Performance

The Contractor will maintain and provide to **NCC** the monthly and consolidated man-hours worked on the project, the number of incidents (Lost Time, First Aid Treatment and Medical Treatment) and the total cost and time consumed with respect to Lost Time Injuries. **It must be noted that any Lost Time Injury shall be communicated within 1 hour both verbally and in writing to NCC.**

12.8 Notification Of Construction Work

The Principal Contractor shall, where the contract meets the requirements laid down in Construction Regulation 4, before commencing any work on site, notify the Department of Labour of the intention to carry out construction work and proof of such notification retained on site in the OH&S file. A copy of the Notification of Construction as well as proof of submission must be forwarded to **NCC** Health & Safety for record keeping purposes. Annexure 2 in the Construction Regulations to be referenced for this purpose. When changes in the appointment's structures occur, the Department of labour must be notified, and proof of communication must be retained.

12.9 Training, Awareness and Competence

Considering the definition of competent person contained in the Construction Regulations, the Unit Standard number, where such US is registered, for all training required by the Act and Regulations will be the minimum required proof of competency and training and such unit standard numbers are to be included in the Health and Safety Plan.

General induction training:

All Principal Contractor Management, employees and contractors, Consulting Team members and their visitors, all visitors and all employees of **The Client** who wish to gain entry onto site are to be in possession of proof of General Induction Training conducted by the Principal Contractor.

Site specific induction training:

The Principal Contractor will be required to develop project specific induction training, which shall be based on the risk profile, specifications and Legislation and provide such training for all employees and contractors and their employees in this regard. As work progresses, induction training must be reviewed and changed to keep it site specific.

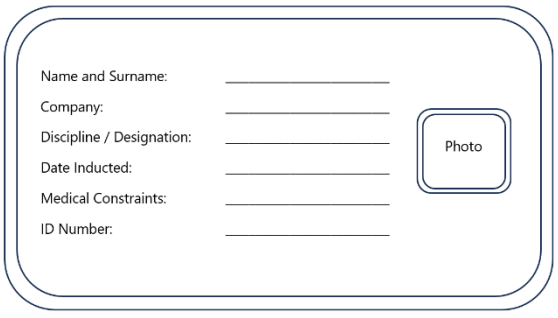
All employees, members of the professional team and visitors to the site must undergo a comprehensive health & safety induction conducted by the Principal Contractor which must address at least:

- The scope of work of the project
- The hazards and risks that persons may be potentially exposed to
- The emergency procedure for the project
- Site Health & Safety Rules
- PPE Requirements
- Stop Work Authority

Note: Inductions for Principal Contractor employees and employees of contractors shall be conducted at least 24hrs in advance of them starting on the site.

All persons that have been inducted must be issued with an access card as proof of induction which will display:

- Their name and surname.
- Company.
- Discipline / Designation.
- Date inducted.
- Medical Constraints.
- ID Number.
- Photo.



All employees on the site will undergo a re-induction when:

- They have been off site for more than a month
- Following the builders break
- They have suffered an injury
- The have been issued a non-compliance/conformance
- A major incident/accident has occurred on site

Training and competency:

All Appointees for legal appointments as required by the OHS Act and Regulations are to be in possession of proof of training and certified competent by an accredited training service provider and where a Unit Standard is registered against a legal appointment, that Unit Standard shall be deemed to be the minimum requirement. Where required, a valid medical certificate specific to the task performed as well as psychological assessment where relevant shall be kept on the Health and Safety File (required for operators and drivers of construction vehicles, mobile plant and other motorised equipment as well as for working at heights). All other appointments must be accompanied by training certificates. The Contractor shall ensure that follow-up and refresher training is conducted as the contract work progresses and the work environment or method of work changes. All proof of training required in terms of the OHS Act and Regulations are to be kept in the site OH&S file for audit purposes.

All employees working at height (any work conducted above foundation level) must have attended a course in Basic Working at Heights, aligned to US229998, and be in possession of a certificate of training issued by an accredited training provider. In addition, all employees working at height shall undergo a psychological questionnaire to assess their suitability for safe working at height.

Continuous Training Matrix:

The contractor must ensure the implementation of a robust Continuous Training Matrix detailing Health & Safety Training delivered to all Employees. This matrix should align with the project scope, outlining the specific training required for each phase or task. It's imperative that the training matrix encompasses not only current skills and knowledge but also anticipates future needs, ensuring proactive preparation for upcoming project demands.

Promoting awareness:

All Contractors are required to have a promotion and awareness campaign in place to create an OH&S culture in employees, using amongst others and not limited to, Toolbox Talks, OH&S Posters, Videos, Competitions, Incentive Schemes and Participative Activities.

12.10 Consultation, Communication and Liaison

Site safety committee meetings will be held at least on a monthly basis and in accordance with the OHS Act or as determined by the associated risks on site. This does not preclude the requirement that each contractor will implement and maintain its own safety meetings where applicable.

In addition to the above, communication may be directed to **The Client** and **NCC**, in writing, as and when the need arises.

Consultation with the workforce on OH&S matters will be through their supervisors, OH&S representatives, the OH&S committee and their elected trade union representatives, if any.

The site manager or his site safety officer will be responsible for the dissemination of all relevant OH&S information to the other contractors, e.g. design changes agreed with **The Client** and the Designer, instruction by **The Client /NCC**, the exchange of information between contractors and the reporting of hazardous and/or dangerous conditions or situations, etc.

In addition to toolbox talks, each supervisor is to conduct a Daily Safe Task Instruction (DSTI) talk with his team, relevant to the area of work and tasks to be performed. The risk assessment/s relevant to the daily activities to be executed is to be communicated during the DSTI. In addition, the Contractors will be required to conduct Toolbox Talks with their employees on a **weekly basis** as a minimum and records of such kept on the OH&S file. Employees must acknowledge the attendance of Toolbox Talks, which record must likewise be kept on the OH&S file.

The Contract Manager or suitable designate of each appointed contractor is required to attend all site OH&S meetings.

12.11 Audits, Inspections and Reporting of Corrective Actions.

Monthly audit by Client: NCC Health & Safety will conduct a monthly health and safety audit and document verification to comply with the requirements of Construction Regulation 5(1)(o), to ensure that the Contractor has implemented and is maintaining the agreed and approved OH&S Plan. Written proof of rectification in instances of non-compliance is to be issued to **NCC**.

A senior representative of the Contractor must accompany **NCC** on all Audits and Inspections and may conduct his/her own audit inspection at the same time.

Other Required Audits and Inspections by NCC Health & Safety: Where the Principal Contractor as appointed in terms of Construction Regulation 5(1)(k) elects to appoint a contractor/sub-contractor in terms of Construction Regulation 7(1)(c)(v), the Principal Contractor shall conduct monthly health and safety audits and document verification of the sub-contractors health and safety system and health and safety file as required by Construction Regulation 7(1)(c)(vii) and **The Client** or **NCC** reserves the right to conduct detailed verification audits and inspections to verify their compliance to the OH&S Plan, OHS Act and regulations. (Refer to Sec. 8.4.2. above).

NCC will conduct regular site inspections on a schedule as agreed with **The Client**. In the event of a Contravention Notice being issued during the inspection, the Contractor shall provide documented proof in the form of a "Close Out Report" that the Contravention Notice has been closed out as per the remedial action recommended by **NCC**, within the stipulated time frame of the inspection report.

Contractor's Audits and Inspections: The Contractor is to conduct their own monthly internal audits to verify compliance with his own OH&S Management system as well as with this specification and is further required to conduct monthly audits of each of his sub-contractors to verify compliance with their OH&S Plans as well as with this specification and retain documented proof thereof. Such audit reports must be made available to **NCC** upon request. Audit scores and major findings are to be communicated to **The Client & NCC** during site meetings.

Inspections by OH&S Representatives and other Appointees: The Principal Contractor's OH&S Representatives are to conduct monthly inspections of their areas of responsibility and report thereon to their foreman or supervisor whilst other appointees must conduct inspections and report thereon as specified in their appointments.

Recording and Review of Inspection Results: Individual Contactors shall be responsible to ensure that all the results of abovementioned inspections are recorded in writing, reviewed at OH&S meetings, endorsed by the chairman of the meeting and placed on the OH&S file.

Reporting of Inspection Results: The Principal Contractor shall be required to provide **NCC** with the documented findings of the contractor's inspections as well as any remedial actions implemented, in a concise monthly report.

12.12 Accident and Incident Recording, Reporting, and Investigation

Accident and Incident Recording: The Principal Contractor shall open and maintain an Accident and Incident Register for the duration of the project, in which the contractor shall record all accidents and incidents.

This register shall be structured to identify accident and incident trends by recording the type and location of injury and the cause of injury.

Reportable incidents: Referencing Section 24 of the OHS Act and General Administrative Regulation 8, the contractor must report all incidents where an employee is injured on duty to the extent that he/she:

- Dies
- Becomes unconscious
- Loses a limb or part of a limb
- Is injured or becomes ill to such a degree that he/she is likely either to die or to suffer a permanent physical defect or likely to be unable for a period of at least 14 days either to work or continue with the activity for which he/she is employed

Or where;

- A major incident occurred
- The health or safety of any person was endangered
- Where a dangerous substance was spilled
- The uncontrolled release of any substance under pressure took place
- Machinery or any part of machinery fractured or failed resulting in flying, falling or uncontrolled moving object
- Machinery ran out of control

Where any of the abovementioned reportable incidents has occurred, the Contractor shall report to **The Client, NCC** and the Provincial Director of the Department of Labour immediately by telephone and fax or email.

The Contractor is required to provide **The Client** and **NCC** with copies of all statutory reports required in terms of the OHS Act within 7 days of the incident occurring.

The Contractor is required to provide **The Client** and **NCC** with copies of ALL internal and external accident/incident investigation reports including the reports contemplated above and below, within 7 days of the incident occurring.

Accident and Incident Investigation: Referencing General Administrative Regulation 9, the Contractor is responsible for the investigation of all accidents/incidents where employees and non-employees are injured

to the extent that they must be referred for medical treatment by a doctor, hospital or clinic. Results of such investigations are to be entered into the Accident/Incident register mentioned above.

The contractor is responsible for the investigation of all major and non-injury incidents as described in Section 24(1)(b),(c) of the OHS Act and keeping a record of the results of such investigations including the steps taken to prevent similar accidents in future.

The contractor is required to investigate and record all high potential near miss incidents in order to implement proactive preventative measures.

The Contractor in conjunction with the Site Manager is responsible for the investigation of all construction related road traffic accidents and keeping a record of the results of such investigations including the steps taken to prevent similar accidents in future.

The Client and **NCC**, reserve the right to hold its investigation into any incident or to call for an independent external investigation as deemed necessary. All minor incidents and accidents are to be reported on a weekly basis to **NCC**.

13 SPECIAL REQUIREMENTS

Taking into consideration the nature of the work to be performed, the specific identified high-risk activities and the existing working environment, the following requirements must be complied to by the contractor:

13.1 Health & Safety Management Personnel

Having taken into consideration the size and complexity of the project at hand, the following requirements are set for the Construction management team:

13.1.1 Construction Manager

- Experience and project CV detailing years worked in construction and projects of a similar nature to this.
- Legal liability training.
- Diploma or Degree in Construction or Building Management.

13.1.2 Construction Safety Officer

- Registered as CHSO or higher (Only fully registered persons will be accepted on this project, no candidates).
- Experience CV detailing projects worked on of a similar nature must be provided to the OHS Agent for approval.

13.1.3 Risk Assessor:

- HIRA Certificate issued in accordance to SAQA unit standard 120330.
- Experience CV detailing projects worked on of a similar nature.

13.1.4 Fall Protection Plan Developer:

- Fall Protection Plan Developer certificate formal training course to SAQA unit standard 229994 (Only SAQA registered, Not SAQA aligned).

13.1.5 Incident Investigator:

- Formal training course to SAQA unit standard 259617 or 120335.

13.1.6 Fire Fighting And Emergency Preparedness:

- Attendance of a course on firefighting.

13.1.7 Electrical Installations

- Electrical contractors' registration with DoEL (or equivalent legal registration) as an Electrical Installation Contractor.
- Electrician (responsible for all new and temporary installations) registered with DoEL as an Electrician with a valid yellow or red card.

13.1.8 Roof Erectors

- Attendance of a course on firefighting.

13.1.9 Hazardous Chemical Agent Controller

- The appointed Hazardous Chemical Agents Controller to be trained in Hazardous Chemicals Agents training by an accredited service provider and training on the SDS.
- Attend Hazardous Chemical Agents Training by all employees who may be exposed to Hazardous Chemical Agents as well and training on the SDS.

13.1.10 Temporary Works

Temporary Works Designer:

- Temporary Works Designers, even if an Engineer, must have received additional training for the specific task both in terms of SAQA accredited Unit Standards AND SANS 10085.
- A Client or Contractor may require the supplier of the temporary works materials / components to only undertake the Design and have another competent Temporary Works Designer perform the final inspection and declare it safe to use. In both cases the appointments must include specific mandates in relation to the requirements expected from the appointees.

Temporary Works Inspector:

- Temporary Works Inspectors, even if an Engineer, must have received additional training for the specific task both in terms of SAQA accredited Unit Standards AND SANS 10085.
- This need not be the Designer of the Temporary Works. There are instances where **The Client** or Contractor requires the appointed Designer to conduct a final inspection and declare a Temporary Works Structure "safe to Use" and thereafter appoint another competent inspector to conduct the daily and / or weekly inspections. This is permitted however competence is to be verified and appoint letters must specify the individual responsibilities.

Temporary Works Supervisor:

- CR 12(2) requires that a Contractor legally appoints a Temporary Works Supervisor in writing to supervise all work in relation to Temporary Works Operations. This does not include other work being done on or from such temporary works.
- These operations are not limited to erection/construction and dismantling. They also include the stacking and storage of components when not in use, the loading, transporting and offloading thereof, etc. This is of utmost importance as damage to components could result in catastrophic failure.
- If supervising stacking and storage operations, such supervisor must also be competent in terms of General Safety Regulation 8 and SANS 10085 16.2.5.

13.1.11 Demolition Supervisor

- Experience and project CV detailing years worked in construction and projects of a similar nature to this.
- Attendance of a course on Demolition.

13.2 Permit to Work

The contractor shall be required to provide a procedure for control and coordination of operational work using a permit to work system that must be approved by **NCC** Health & Safety prior to the commencement of work. For this project, the permit to work system must be used to control all work / the following activities:

- Hot work
- Working at heights (Roof work)
- Work in confined space
- Work in areas with public access

The minimum requirements that the Permit to work procedure must cover include:

- Definitions of the different types of work,
- The types of permits that may be issued,
- The relevant positions that will be permit issuers and approvers,
- Roles and responsibilities of all persons involved in the process,
- Communication and coordination requirements, and
- Training and instruction on the issuing, use and close out of permits.

14 OPERATIONAL CONTROLS

14.1 Site Establishment and Seclusions

If site establishment is deemed necessary for the project, adequate hoarding of the site and relevant work areas is imperative, adhering to minimum standards. This entails erecting 1.8m high ready fence panels, securely positioned to prevent displacement, in accordance with the traffic management plan. Should the approved Bill of Quantities allows for more robust hoarding structures, these must remain in place from project commencement to completion.

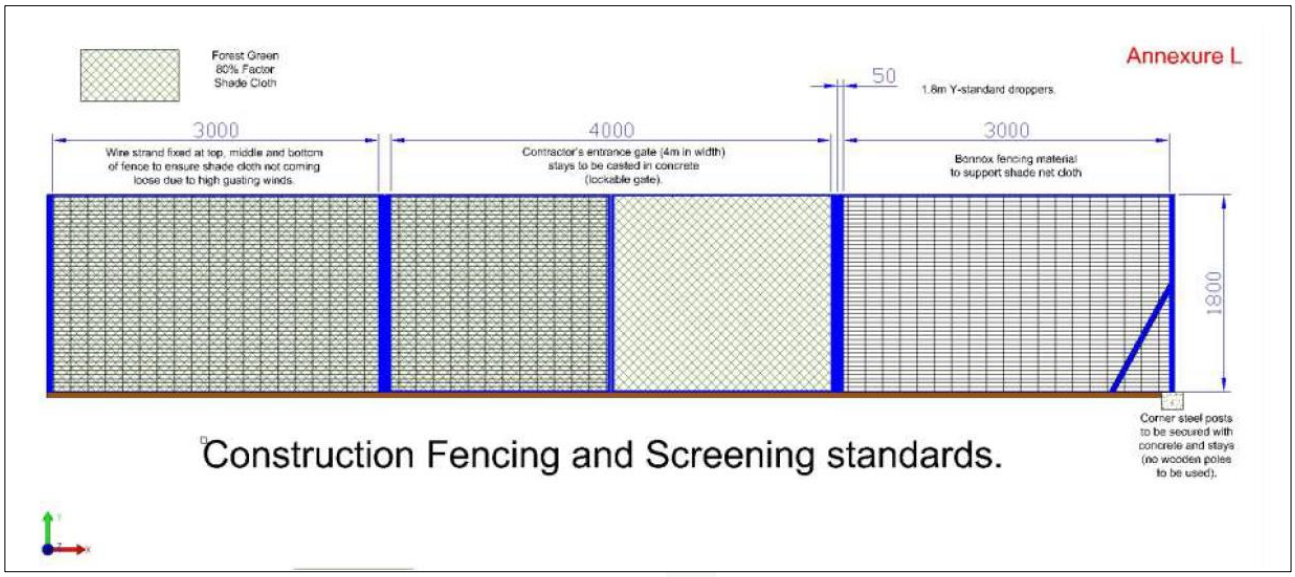


Figure 2: Site Fencing and Hoarding Specifications

Distinct access gates and pathways for vehicles and pedestrians must be provided to ensure their segregation. Furthermore, all work and storage zones must be effectively barricaded from public access.

Electrical hazards related to site establishment require careful consideration. Only certified electricians are permitted to undertake power supply connections, ensuring compliance with relevant regulations, and accompanied by valid Certificates of Compliance.

The Principal Contractor holds the responsibility of obtaining necessary hoarding permits, wayleaves, and road closure permits from the local authority. Additionally, a site-specific Traffic Management Plan must be formulated and endorsed by the local authority. This plan should incorporate a visual representation of the project layout, including barricades, delineators, and signage placements.

14.2 Security and Access Control (GSR2C)

Referencing General Safety Regulation 2C and Construction Regulation 27, the Principal Contractor or Site Manager will develop and establish an Access Management Plan outlining the procedures to be taken to prevent unauthorised access to site and site access rules and shall further ensure that the access management plan is effectively implemented and maintained throughout the construction period.

The active working areas shall be adequately protected on all sides to prevent unauthorised access to the construction activities. The site office and laydown area shall be adequately hoarded with a controlled access point and any additional gates where no access control measures are in place are to be kept locked at all times.

In the event that a portion of the hoarding is temporarily removed, or an access gate is unlocked for temporary access, for whatever reason, the Contractor shall ensure that suitable access control is maintained at such opening by deploying security/authorised personnel, pending the closure/locking of such temporary access area. The hoarding shall be maintained and kept in good condition for the duration of the project.

The access management plan is to make provision for visitors and non-employees to report at the site office prior to accessing the construction site. No visitors or non-employees will be allowed on site unaccompanied and without good reason and provision shall be made for the induction of visitors to the site.

The Principal Contractor or Construction Manager shall develop a set of Site Security Rules and Procedures and maintain these throughout the construction period.

All required mandatory and information signage in respect of construction sites to be displayed at the site entrance. These include inter alia mandatory PPE requirements, current hazards on the site such as work overhead, deep excavations, open edges etc., site rules and other relevant signage.

14.3 Traffic Accommodation and Management

The Principal Contractor shall be responsible for the safe and easy passage of pedestrian and vehicular traffic past and/or over sections of roads of which he has occupation. The Principal Contractor shall at all times in his entire operations take the necessary care to protect the public and to facilitate the traffic flow.

The Principal Contractor may not commence with any part of the works before he has made adequate provision for the accommodation of traffic. The safety and convenience of the travelling public is to be considered of utmost importance and every effort must be made to ensure that no work may proceed on any public road until such time as the relevant road signs, flagmen, speed controls, barricades, delineators, cones etc. are in place and maintained, and that courtesy is extended to the public at all times.

The Principal Contractor shall ensure that his employees wear high visibility safety clothing when working alongside public traffic. The safety jackets shall be of an approved Level 2 type, bright/fluorescent orange, red-orange or yellow in colour with retro-reflective strips as indicated in Chapter 13 of Volume 2 of the South African Traffic Signs Manual (SARTSM). When work is carried out between the hours of sunset and sunrise, the Level 2 safety jackets shall be replaced by Level 3 jackets. The travelling public shall have the right of way on public roads, and the Principal Contractor shall apply suitable methods for controlling the movement of his vehicles, plant and equipment that they will not constitute a hazard on the road.

Access to Properties must be Maintained at all Times:

The Principal Contractor shall nominate a knowledgeable employee on site who shall be the Traffic Safety Officer responsible for the arrangements and maintenance of all accommodation of traffic measures required for the duration of the work. He shall exercise control in terms of traffic safety over the safe movement of personnel, visitors and plant on site including the wearing of high visibility clothing, the operation of amber flashing lights and for keeping all roads signs and traffic cones clean and visible. He shall attend to the training and performance of flagmen and other personnel involved in the control of traffic. The Principal Contractor shall liaise with and co-operate with the relevant traffic authorities wherever the work affects existing roads.

Temporary Traffic-Control Facilities

The Principal Contractor shall provide, erect and maintain the necessary traffic-control devices, road signs, channelization devices, barricades, warning devices and road markings (hereinafter referred to as traffic control facilities), as shown in the South African Road Traffic Signs Manual (SARTSM), and shall remove them when no longer required. It shall be incumbent upon the Principal Contractor to see to it that the above-mentioned traffic-control facilities are present at all times and are functioning properly. Work, including the erection and removal of traffic control facilities, shall be executed between sunrise and sunset on Monday to Saturday, inclusive. Occupation of existing traffic lanes will only be allowed during daylight hours on normal working days, which are defined as Monday to Saturday, inclusive. The existing number of lanes for each traffic movement affected by infrastructure maintenance shall not be reduced without the written authorisation of the Engineer. The Principal Contractor shall determine the particular accommodation of traffic layout(s) on the drawings suitable to the roadwork activities planned.

The Principal Contractor shall submit the layout proposals for signage and accommodation of traffic to the Engineer for approval. The Principal Contractor shall indemnify the employer against all proceedings, claims, actions, damages and costs which may arise from or be related to the absence or improper functioning or placement of traffic-control facilities. No claims will be considered for delays or inconvenience caused by the accommodation of traffic requirements. The type of infrastructure maintenance, spacing and placement of traffic-control facilities shall be in accordance with the prescriptions and recommendations of the latest edition of SARTSM. The Traffic shall be accommodated on the existing surfaced carriageway and shoulders. No bypasses or temporary deviations shall be constructed.

Accommodation of traffic will generally be carried out by closing off one lane of traffic at a time and accommodating the traffic on the other lane(s).

Traffic-Control Devices

Traffic-control devices include the use of flagmen and portable STOP and GO-RY signs, and traffic signals, whichever may be the most suitable method under the prevailing circumstances. Traffic signals shall only be erected if approved by the Engineer.

If a road is partially closed and one-way traffic only is allowed over a section of road of which the length exceeds 250 m, the traffic shall be regulated by flagmen and STOP and GO-RY signs at both ends of such section. If it is necessary for effective communication between the flagmen, an approved two-way communication system shall be in operation at the control points.

Flagmen shall have a working knowledge of the road regulations. Temporary traffic-control facilities shall be provided with portable stands adequately ballasted with sandbags to prevent the signs from being blown over by wind or wind turbulence from moving traffic.

Road Signs and Barricades

Road signs shall include all the statutorily required road signs in the permanent or temporary series, which shall also include delineators and moveable barriers (the barrier/sign combination type), or an appropriate combination thereof.

Channelization Devices and Barricades

Channelization devices shall include delineators, cones, barricades, guardrails, barriers, road studs or road markings or any appropriate combination of these devices.

Warning Devices

Vehicles and plant operating on the works shall be equipped with rotating amber flashing lights. All lights shall be visible at all times and from all sides. The flashing lights shall be on at all times when the vehicles and plant are used on the site.

Accommodation Of Traffic Layout Categories

The Principal Contractor shall comply with all the Accommodation of Traffic Layout Categories listed in the South African Road Traffic Signs Manual Volume 2 Chapter 13 - Roadworks Signing not limited to the complete manual when implementing accommodation of traffic measures.

14.4 Public Health and Safety (OHSAct. Sec 9)

Referencing OHS Act Section 9, all Contractors will be responsible for ensuring that all non-employees, consulting team members and their visitors, all visitors and all Client employees who wish to gain entry onto site in addition to all non-employees working on this project and are affected by the construction work are made aware of the dangers likely to arise from said construction work as well as the precautionary measures to be observed to avoid or minimise those dangers.

Examples of non-employees are: Non-employees entering the site for whatever reason, the surrounding community, passers-by to the site (pedestrians and road users) and the general public.

Appropriate signage warning of construction related hazards must be posted in prominent positions in and around the construction site and all employees on site must be instructed to ensure that non-employees are protected at all times.

The construction site area shall be fenced as a minimum with a diamond mesh fence of at least 1.8 meters in height and covered with shade netting. The contractor will ensure that all access to the construction area is controlled and enforced.

All non-employees on entering the site must receive induction on the hazards and risks and the control measures to mitigate these and shall be accompanied to the site office by a person designated thereto.

Adequate dust suppression measures must be implemented to minimise the exposure of the surrounding community and general public to excessive levels of airborne dust.

All truck loads must be covered or adequately secured to prevent the fall of material onto public roads.

The traffic management plan referred to below is to be implemented and maintained in respect of ensuring the health and safety of public road users and pedestrians associated with the access and egress of site by construction vehicles and mobile plant.

Noise levels are to be managed during construction to minimise disturbance to neighbouring properties and the general public in proximity to the construction site.

14.5 Health and Safety Signage (GSR 2B)

The principal contractor must ensure that all notices and signs are prominently displayed at all entrances to the site and throughout the premises, in strict accordance with regulatory requirements and industry

standards. This comprehensive signage strategy encompasses a range of critical safety information, including, but not limited to:

- Construction work restrictions.
- Unauthorized entry prohibitions.
- Construction warnings.
- Prescribed personal protective equipment (PPE) requirements.
- Identification of men at work areas.
- Cautionary signage regarding construction vehicle movement.
- Instructions to report to the site office.
- Emergency contact details for the principal contractor.
- Clear indications of emergency equipment locations.
- Etc.

14.6 Personal Protective Equipment

The Contractor is required to identify the hazards in the workplace and deal with them appropriately. He must either eliminate hazards or, where impracticable take steps to protect workers and make it possible for them to work safely and without risk to health and safety under the hazardous conditions.

Personal Protective equipment (PPE) should, however, be the last resort and there should always first be an attempt to apply engineering and other solutions to mitigate hazardous situations before the issuing of PPE is considered.

Where it is not possible to create an absolutely safe and healthy workplace the Contractor is required to inform employees regarding this matter and to issue, free of charge, suitable PPE to protect them from any hazards.

It is a further requirement that the Contractor maintain this PPE and that he instructs and trains the employees in the correct use and maintenance of the PPE as required in GSR 2(5). PPE shall be fit for purpose at all times and provide the required and intended protection.

No person shall be permitted to work on the site if the correct PPE is not used. The Contractor shall ensure that the prescribed, required and correct PPE is used by the employees as per GSR 2(6) at all times.

Employees shall comply to OHS Act Section 14(b) and (c) and do not have the right to refuse to utilise or wear the equipment prescribed by the employer and, if it is impossible for an employee to use or wear

prescribed protective equipment through health or any other reason, the employee may not be allowed to continue working under the hazardous condition/s for which the equipment was prescribed.

The Contractor may not charge any fee for protective equipment prescribed by him/her but may charge for equipment under the following conditions:

- Where the employee requests additional issue above what is prescribed
- Where the employee has blatantly abused or neglected the equipment leading to early failure
- Where the employee has lost the equipment

All employees, visitors and non-employees shall, as a minimum, be required to wear the following PPE on any of **The Client's** construction sites:

- Protective overalls (employees only)
- Protective (steel toe) footwear
- Protective headwear
- Eye protection
- Hearing protection
- High visibility vests/jackets
- Fall arrest equipment when working in elevated positions i.e. double lanyard shock absorbing safety harness
- Chin straps on protective headwear when working in elevated positions

All PPE Shall conform to the relevant SANS Code.

14.7 Certificates of fitness

The Principal Contractor, along with subcontractors, must ensure that all employees possess a valid medical certificate of fitness specific to the construction work they will undertake, issued by an Occupational Health Practitioner as detailed in Annexure 3, which should be included in their Health and Safety files.

14.8 Compensation of Occupational Injuries and Diseases (COID) Act 130 of 1993

The Principal Contractor must submit proof of registration as an employer, and proof of Good Standing with the COIDA Commissioner in the H&S File and prior to starting the work. A copy of the Letter of Good Standing with the COIDA Commissioner must be included in the H&S File.

14.9 Emergency Preparedness and Response

The Principal Contractor must develop a site emergency preparedness and response plan, accompanied by a site layout, detailing the appropriate appointments for the firefighting team, bulk first aid and the emergency coordination team. In addition to which, emergency escape routes throughout the site and emergency assembly points are to be identified and depicted by the use of appropriate symbolic signage.

The emergency preparedness and response plan must be approved by **NCC** in consultation with the Principal Contractor. Instances where **The Client** has existing emergency plans in place, the Principal Contractor's emergency preparedness and response plan must be aligned with the existing client emergency plan. Should the early warning fire alarm system not be integrated alternate adequate means of notification must be implemented i.e. Sirens, each zone/area must by definition be accommodated in the site evacuation plan. (Refer to Environmental Regulation 9 and Construction Regulation 29).

The Site Manager shall conduct regular **emergency identification inspections** and establish what emergencies could potentially develop. He/she must then develop a detailed contingency plan and emergency procedure, taking into account any emergency plans that may already be in place. Such inspections and revision of the contingency plan and emergency procedures shall be conducted as the project progresses and the construction site changes.

The Principal Contractor shall conduct emergency drills at least quarterly to test their efficiency and to familiarise employees with them. Records of such drills will be kept in writing on the OH&S file.

The Principal Contractor and each sub-contractor shall appoint a competent person to act as their Emergency Controller/Coordinator, supported by an appointed team of first aiders/ fire fighters / marshals.

A site-specific contact list of all **emergency service providers** (Fire Department, Ambulance, Police, Medical and Hospital, etc.) must be maintained and readily available to site personnel. Emergency contact lists are to be prominently displayed in the site office laydown area. An emergency situation, which is likely to require outside emergency assistance, may attract mass circulation, written media or electronic media attention and be harmful to **The Client's** reputation. No person may comment on any incidents on site without prior approval from **The Client.**

The contractor is required to take daily attendance of staff working on-site to facilitate a roll call in case of an emergency.

The following services have been identified within the vicinity of the project. However, it is incumbent upon the contractor to formulate a project-specific Emergency Plan:

Medical Services, Life Groenkloof Hospital, which is +- 8 min (5,5km) away.

- Address: 696 5th Ave, Les Marais, Pretoria, 0084
- Tel: 012 424 3600

SAPS Brooklyn police station situated +- 8 min (4,6 km) away.

- Address: 119 Duxbury Rd, Hillcrest, Pretoria, 0083
- Tel: 012 366 1700

Fire Department, Hatfield fire station situated +- 8 min (5 km) away.

- Address: Park St &, Hill St, Arcadia, Pretoria, 0007
- Tel: 012 358 2205

14.10 Fire Prevention

The Contractors must provide adequate, regularly serviced fire-fighting equipment located at strategic points on site such as at their stores and during hot work activities. Such extinguishers should be suitable for all classes of fire foreseen. The appropriate notices and signs must be posted up as required. The principal contractor will need to conduct a preliminary fire risk assessment of the site and office/stores compound before starting work as part of this 'completion project'. Should any questions arise as to the validity of such fire risk assessment conducted by the Principal Contractor, the local Fire Department's fire prevention division must be consulted for assistance with such site fire risk assessments to ensure that the necessary fire-fighting equipment is adequate during the construction phase. Such fire risk assessment will have to be reviewed at least monthly and after any incident and/or before any new hot work activity. Wherever *'hot work' is taking place, additional fire extinguishers must be on hand. Contractors are responsible for ensuring compliance with hot work procedures and must be in possession of method statements detailing the safe working procedures.

*'Hot work' includes all work that generates a spark or flame.

14.11 First Aid

The Principal Contractor must provide First Aid equipment and if necessary, a stretcher and have as a minimum one qualified, full time, First Aider/s and further required as per General Safety Regulation 3 of the OHS Act.

The Contingency Plan of the Contractor must include the arrangements for speedily and promptly transporting injured/ill person/s to a medical facility or of securing emergency medical aid to person/s that may require it. All contractors on site shall wherever possible assist other contractor's injured employees as the need arises.

14.12 Excavations (CR 13)

All excavation operations shall be conducted with close reference and compliance to Construction Regulation 13 and the recommendations contained in the geotechnical report as issued. Where excavations will exceed 1m in depth, the Contractor will be required to submit a Method Statement and Risk Assessment to **The Client** and **NCC** for assessment before commencing with excavations, and **The Client** will issue a permit to proceed once the Risk Assessment and Method Statement are verified as suitable and sufficient.

The contractor must ensure thorough consideration of all pertinent information, including Geotechnical reports, prior to commencing excavations.

Every excavation must be provided with a safe means of access and egress that must be within 6 metres of any worker within the excavation and extend a minimum of 900mm above the ground.

Warning signage to that effect is to be prominently displayed next to any excavations within which or where persons are working or carrying out inspections or tests. Where such excavations in which persons are working are in proximity to construction vehicle and mobile plant thoroughfares, demarcation shall be placed at least 1.5 m away from the edges of such excavation to ensure that no vehicle or plant moves near the edge of such excavation and may cause its collapse.

The location and nature of any existing services such as water, electricity, gas etc. must be established before any excavation is commenced with, and any service that may be affected by the excavation must be protected and made safe before workers enter the excavation.

Where excavations are done in close proximity to any existing structure where the foundations of buildings will be exposed, the Contractor shall ensure that the stability of the structures is not affected, by installing adequate support measures to the structures and sufficient shoring or bracing of such excavations.

The contractor shall ensure that no load, material, plant or equipment is placed or moved near the edge of any excavation where it may cause its collapse and endanger the safety of persons. Where excavations are in proximity to construction vehicle roadways, the contractor shall make provision for the erecting of barricading at a distance from the edge of the excavation that will ensure the stability of such excavations is not compromised, but not less than 1.5m from the edge.

Taking into account soil conditions on the site as contained in the geotechnical report, all excavations deeper than 1.3 metres shall require dewatering during the rainy season and an upslope temporary berm will be required during construction to ensure surface runoff is diverted away from excavations to ensure safe working conditions.

As far as is reasonably practicable, excavated material is to be placed at a distance equal to the depth of the excavation away from the edges of the excavation. Where this is not possible, the contractor is required to ensure sufficient shoring or bracing of such excavations.

Every excavation including the shoring and bracing or any other method to prevent collapse must be inspected by the appointed competent person as follows:

- Daily before work commences and before every shift,
- After every blasting operation
- After an unexpected collapse of the excavation
- After substantial damage to any supports or after rain, high winds or any other adverse weather condition.
- The results of all inspections must be recorded in a register kept on site.
- Upon entering any excavation deeper than 1.5m the precautionary measures contained in General Safety Regulation 5 – Work in confined spaces must be observed and complied with at all times.
- Procedures for co-ordination of construction related infrastructure on new projects and other projects under construction, as well as existing infrastructure must be implemented, safeguarding the integrity of existing and completed infrastructure, to ensure such infrastructure is not compromised by excavations.

14.13 Construction Vehicles and Mobile Plant

Construction vehicles and mobile plant may be inspected by **The Client** or **NCC Health & Safety** prior to being allowed on the project site and suppliers of hired vehicles, plant and equipment will be required to comply with this specification as well as the OHS Act and Regulations.

The Contractor shall develop and implement a site-specific traffic management plan and procedure, accompanied by a schematic site plan to comply to the requirements of CR23(1)(f) and CR23(2)(b). Such traffic management plan is to include the procedure and signalling arrangements for construction vehicles and mobile plant accessing into and egressing from the site into public and campus roadways, as well as the management and control of movement of construction vehicles and mobile plant on the site.

In addition to the above, the traffic management plan shall include the procedure and arrangements for safeguarding the public from stationary construction vehicles on public roads, including mobile plant and supplier's vehicles.

All signallers (flag men) appointed to ensure compliance to the traffic management plan, shall be adequately trained to ensure the safety of the public and construction personnel. Proof of such training is to be available in the site safety file.

Compliance to the requirements and provisions of Construction Regulation 23 shall be enforced by **NCC** and the Contractor shall ensure that all construction vehicles on site are used and organised in accordance with CR 23 to ensure their continued safe operation.

Any construction vehicle left unattended at any time shall have stop blocks and the wheels chocked on either side of the vehicle to prevent uncontrolled movement.

14.14 Demolition

All demolition work shall be done with close reference to the requirements of Construction Regulation 14 and all necessary precautionary measures as outlined in CR 14 to safeguard persons from controlled and uncontrolled collapse of the structure and fall of material from demolition and/or disposal of material shall be stringently applied.

A detailed structural engineering survey of the structure to be demolished shall be carried out and a method statement for the procedure to be followed for the demolition of the structure or part thereof, to be developed by a competent person, prior to any demolition work commencing.

A detailed Risk Assessment shall be compiled from the Method Statement and reviewed by **NCC** prior to the commencement of any demolition work.

Demolition work shall only be carried out under the constant supervision of a competent person who has been appointed in writing.

As the demolition progresses, the integrity of the structure shall be checked at intervals as determined in the method statement, by the appointed competent person, in order to prevent any premature and/or unplanned collapse.

Steps shall be taken to ensure that where a structure is being demolished, no floor, roof or any other part of the structure is overloaded with debris or material that would make it unsafe. It is a prerequisite that the floor and roof load bearing capacity be established prior to any storage or accumulation of tools and equipment, building rubble and materials. **The established load capacity may under no circumstances be exceeded**.

14.15 Concrete Works

The contractor must ensure that concrete works are conducted in accordance with prescribed procedures and quality standards. Competent personnel with expertise in concrete mixing, pouring, and finishing must be engaged. Before concrete placement, thorough site preparation, including excavation and levelling, is mandatory. Subsequently, formwork installation provides the necessary framework for pouring. Quality checks, such as slump tests for workability and cube tests for compressive strength, must be conducted regularly. Proper curing methods, including moist or membrane curing, are essential for optimal concrete strength and durability. Compliance with industry standards, regulatory requirements, and project specifications is mandatory throughout the process to guarantee the structural integrity and safety of the concrete. Furthermore, the contractor is responsible for maintaining records of test results and must ensure that these records are available upon request.

14.16 Hand Tools

All tools present on the construction site, irrespective of ownership, are required to be maintained in optimal condition consistently. Supervisors are responsible for conducting regular inspections of all tools to ensure their functionality and safety. Additionally, it is strictly prohibited for anyone to utilize homemade or defective hand tools, emphasizing the importance of using only tools that meet proper standards to uphold safety and efficiency on the site.

14.17 Portable Electrical Tools and Equipment (EMR 10)

Portable electrical tools and equipment include every unit that draws electrical power and is moved around for use in the workplace i.e. drills, saws, grinders, portable lights, etc. and the Contractor shall comply with the requirements and provisions of Electrical Machinery Regulation 10 for the standards, maintenance and inspection of portable electrical tools and equipment.

In addition, electrical appliances such as fridges, hotplates, heaters, etc. must be inspected and maintained to the same standards as portable electrical tools and equipment.

Extension cords are deemed to be portable electrical equipment and must be inspected and maintained to the same standards as portable electrical tools. All extension cords and cords on electrical equipment are to be fully insulated and the earth wires connected at all times.

Portable electric lights when used as an additional source of light in work areas with inadequate natural light, shall be constructed, insulated, safeguarded and used in compliance to Electrical Machinery Regulation 11. The contractor is to ensure that wherever work is performed where the lighting conditions are less than the minimum requirement as defined in Environmental Regulation 3 and relative schedules, that this is supplemented with additional lighting to ensure that all works contemplated can be conducted safely.

The Principal Contractor and any sub-contractor shall not undertake any night work without written permission from **The Client** or its Principal Agent. **NCC** is to be notified in all instances when night work occurs. The principal contractor shall ensure that adequate lighting is provided for all night work and failure to do so shall result in the work being stopped.

14.18 Hot Work (GSR 9)

The Principal Contractor shall ensure that all employees and all contractors doing hot work, which includes steel cutting, grinding, welding, operating generators or other fuel driven equipment, shall do so in strict compliance to General Safety Regulation 9 and Construction Regulation 29(f). It is a requirement of **The Client** that a dedicated fire extinguisher is available at each hot work site, regardless of proximity to other hot works taking place.

Specific PPE for hot work shall be provided, including fire resistant overalls, leather chaps and/or aprons, leather gloves, face shields and adequate eye protection. Such PPE shall be regularly inspected, maintained and replaced when necessary. Use of PPE provided for hot work activities to be enforced as per the requirements of GSR 2(6).

14.19 Pressure Equipment and Gas Cylinders (PER)

The Principal Contractor shall ensure that all employees and contractors shall comply with the requirements of the Pressure Equipment Regulations, including:

- Providing competency and awareness training for operators and/or users
- Providing relevant and adequate PPE and clothing and enforcing the use of such PPE and clothing. PPE issued for the use of pressure equipment shall be regularly inspected and replaced when necessary.
- Inspect equipment on a monthly basis and keep records of inspections
- Provide appropriate firefighting equipment on hand
- Gas cutting and welding gas cylinders to be secured on a trolley in an upright position, must not show any signs of corrosion or damage and must have flashback arrestors fitted to both the cylinders and torches.
- Where LPG cylinders are used in elevated positions, such cylinders shall be securely attached on a trolley for safe movement to the work area. No LPG or any other gas cylinders or pressure equipment are to be manually handled to any work areas.

When not in use, all gas cylinders shall be stored in a dedicated storage facility in an upright position and for oxy-acetylene cylinders, secured at all times. Such storage facility shall be kept locked at all times and under the control of an appointed person, trained in the safe handling and storage of pressure equipment.

Where pressure equipment is utilised on the site, the Contractor shall keep a register of such equipment as well as valid pressure test certificates not older than 36 months, and an inspection checklist for each item of equipment in the site safety file.

14.20 Electrical Installations and Machinery

The installation, use and inspection of temporary electricity installations for the construction project shall be in strict accordance with Construction Regulation 24 and Electrical Installation Regulations.

The Contractor shall appoint in writing a Temporary Electrical Installation Controller, who shall keep all temporary DB's locked and under his control at all times. Main switches shall be accessible through a cut-out in the door of the housing cabinet.

The Contractor shall further appoint a master electrician, registered with the Department of Labour to conduct weekly inspections as well as a monthly earth leakage test of all temporary DB's, including any DB's in temporary containers and site offices.

A copy of the certificate of compliance for each temporary electrical installation shall be kept in a weatherproof sleeve on the inside of the door of the housing cabinet and a copy to be retained in the Contractor's site safety file.

Electrical and Mechanical Lock Out

The Principal Contractor shall develop an Electrical and Mechanical Lockout Procedure referencing Driven Machinery Regulations, General Machinery Regulations and Electrical Machinery Regulations, which lockout procedures shall be submitted to **The Client** and **NCC** Health & Safety for approval prior to commencing construction. This lockout procedure must be communicated to and adhered to by all contractors on site.

14.21 Confined Space

Work in confined spaces shall be deemed to be any work in an enclosed, restricted or limited space where a hazardous substance may accumulate or an oxygen deficient atmosphere may occur, including any chamber, tunnel, pipe, pit, sewer, container, deep excavation or similar construction in which a dangerous liquid or dangerous concentration of gas, vapour, dust or fumes may be present.

The contractor shall ensure that all the requirements of general safety regulation 5 are strictly complied with and that such confined space shall only be entered by an employee or any other person after the air therein has been tested and evaluated by a person competent to pronounce the safety thereof.

The contractor shall develop a procedure for work in confined spaces and such procedure shall outline the requirements of general safety regulation 5 as well as the safety requirements and rescue procedure for the retrieval of employees if required.

Where required, effective breathing apparatus shall be provided to any and all persons entering a confined space and the contractor shall keep available apparatus for resuscitation where work is conducted in confined spaces.

14.22 Working in Elevated Positions

Referencing Construction Regulation 10 and General Safety Regulation 6, a pre-emptive Risk Assessment and Fall Protection Plan will be required for any work to be carried out above one metres from the ground or any

floor level, such work being classified as Work in Elevated Positions/Working at Height. The fall protection plan shall contain all the requirements of Construction Regulation 10(2) and in addition a procedure addressing the review of the fall protection plan and a documented disciplinary process for non-compliance to the fall protection plan. Employees working in elevated positions must be trained to do this safely and without risk. It will be required that all employees will undergo a basic working at heights training programme aligned to US 229998 before they will be allowed to commence work. Proof of training must be maintained on the contractors site safety file.

The Principal Contractor's fall protection plan must detail the following safety measures: Protection of decking edges; finished floor slab edges; stairways; floor penetrations; lift shafts; and all other openings and areas from where a person may fall.

The Principal Contractor and contractors' fall protection plans must include the strategies for management of edge protection and penetrations.

As far as is practicable, any person working in an elevated position will work from a platform, ladder or other device that is at least as safe as if he/she is working at ground level and whilst working in this position be wearing and using a **double lanyard, full body harness with shock absorbers** that will be worn to prevent the person falling from the platform, ladder or other device utilised.

This safety harness will be, as far as is possible, secured to a point away from the edge over which the person might fall and the double lanyard must be of such a length that the person will not be able to move over the edge. Where work is conducted in close proximity to edges, work positioning belts/lanyards shall be utilised to prevent persons from falling.

Medical fitness:

Medical certificates of fitness for all employees working in elevated positions must be available on site. All medical certificates must be issued by a registered Occupational Health Practitioner. In addition, every employee working in elevated positions shall complete an assessment questionnaire to ascertain their physical and psychological suitability to work at heights.

14.23 Roof work

Where work on roofs is carried out, the Risk Assessment must take into account the possibility of persons falling through fragile material, skylights, soffits and openings in the roof, steel support work trusses and purloins so designed to support the roof structure.

The Risk Assessments shall place specific emphasis on the placing and handling of roofing materials such as Inverted Box Rib Sheeting (IBR sheeting) or similar materials, (including contingency safety measures), which when exposed to windy conditions represent a serious safety hazard.

Lifelines:

All lifelines and secure/anchor points must be designed and signed off by a competent appointed person or Design Engineer. Anchors must comply with SANS 50795:1996, in particular: "Anchors must comply with SANS 50795:1996

Persons that select, install and test anchors classified as "basic anchors" must be competent to perform that work. {Basic anchors are limited to class "A1" anchors as defined in SANS50795:1996 set into not less than C20/25 quality concrete}."

Lifelines, fall arrest equipment and fall prevention equipment must have a SWL displayed and the SWL certificate must be kept on site. All fall arrest and fall prevention equipment shall be subject to inspections and tests as required by the Regulations and SANS standards and records of such inspections and tests kept in the site health and safety file.

14.24 Edge protection and barricading

Referencing the requirements and provisions of Construction Regulation 10, the Principal Contractor must ensure that all exposed edges and openings are guarded and demarcated at all times until permanent protection has been erected. All temporary guarding and edge protection shall be of sufficient, height, strength, and stability to prevent the fall of persons.

The Contractor has the following options when contemplating the protection of openings, slabs and edges:

- A physical barrier at the edge of the opening/slab, which must be of sufficient strength to support the weight of a person in the event of a fall (wire and/or orange netting will not be deemed sufficient fall prevention).
- External façade scaffold complete with a fully boarded platform at the same level as the slab with a handrail and knee rail.
- A visual barrier in the form of orange webbing, at a distance of at least 1.5 metres from the actual edge of such slab, opening.

Regardless of the edge protection provided, any employee working in proximity to edges or openings shall attach a double shock absorbing lanyard full body harness to a stable structure, able to support the weight of the employee and any equipment he may be working with in the event of a fall.

Should none of the above be achieved, as a last resort, the Contractor must endeavour to gain exemption from Construction Regulation 10(4)(a), as contained in Section 40 of the OHS Act and obtainable in writing from the Department of Labour.

Site management team will need to undertake daily inspections of all areas to ensure that drop-off edges and openings are guarded and protected adequately. Such inspections must be logged on an inspection register(s). The formwork contractor must do the same in areas under its control.

14.25 Scaffolding

Broadly speaking, scaffolding is considered as a structure whereas mobile access towers is deemed to be equipment used by trained individuals for the purpose of gaining access to elevated work positions to carry out light-duty, short duration maintenance type of activities.

If steel scaffolding is to be erected on any premises for the purpose of carrying out "alterations, renovations, repairs, demolition or dismantling of or addition to a building or any similar structure" {see full definition of construction work in Construction Regulations 2014} then such scaffolding must comply with both Regulations 12 and 16.

Scaffolding must be erected, used and maintained safely in accordance with Construction Regulation 16 and SA Bureau of Standards Code of Practice, SANS 10085-1 entitled, "The Design, Erection, and Use & Inspection of Access Scaffolding".

Detailed consideration must be given to all scaffolding to ensure that it is properly planned to meet the working requirements, designed to carry the necessary loadings and maintained in a sound condition. It must also be ensured that there is sufficient material available to erect the scaffolding properly.

Scaffolding may only be erected, altered or dismantled by a person who has the appropriate training and experience in this type of work or under the supervision of such a person, who has been appointed in writing.

Specific attention must be given to the appointment of Scaffolding Inspectors and Scaffolding Erectors who shall not be the same person. The continuous inspection of each scaffolding structures must be recorded and kept up to date on the applicable scaffold inspection register.

Tags/Signs reflecting the status of the scaffold must be used and fixed to the structure at all times. These tags will reflect either 'Safe to use' or 'Scaffold not Safe' on both sides of the tag/sign, to avoid confusion regarding the status of the scaffolding structure. Scaffolding with no tags attached will be deemed to be non-compliant.

On completion of the erection of scaffolding, the appointed scaffold inspector will inspect the structure and will ensure it is in sound working order and complies with all statutory regulations. In the event that the scaffolding is erected by a supplier, the supplier will then issue a handover certificate to the Contractor as the user of the scaffolding. Drawings, design and specifications shall be signed by a registered professional engineer.

The completed scaffold shall also be inspected by the registered professional engineer for approval prior to use. Should any additional load i.e. a hoist or advertising banners be added to the scaffold at a later stage, the professional engineer must approve the modification.

14.26 Ladder work

Referencing General Safety Regulation 13A, The Principal Contractor must ensure that all ladders are fit for purpose, compliant to the requirements as set out in the regulation, are noted on a register, are visually inspected daily prior to use, with monthly checklists maintained and kept up to date.

All extension ladders are to be maintained in good safe working order; the correct height for the task being performed; extend at least 900mm above the landing being accessed; fastened and secured against any movement and placed at a safe angle.

Stepladders are to be maintained in a good state of repair, safe for use, must be the correct height for the task and the top two rungs may not be used. All spreaders and locking devices provided for safety are to be in place, undamaged and maintained in good working order.

Records of inspections must be kept in a register on site. Contractors using their own ladders shall comply with the provisions of General Safety Regulation 13A.

14.27 Lifting Operations

Referencing Construction Regulation 22, Construction Regulation 27, Driven Machinery Regulation 18 and SANS 12480-1, cranes and lifting equipment must be designed and constructed in accordance with generally

accepted technical standards and operated, used, inspected and maintained in accordance with the requirements of the Driven Machinery Regulation.

The requirements of Construction Regulation 22 and Driven Machinery Regulation 18 are to be stringently applied and maintained in respect of all mobile cranes, lifting tackle and lifting operations.

In addition to the required legal appointment of operators, supervisors and inspectors in respect of cranes and lifting machines, appointments shall also be made for Slingers and Banksmen/Signallers, with the required proof of competency and experience. All persons so appointed and trained must be registered with an LMI.

Furthermore, all training providers in respect of operators of lifting machines and cranes are required to be accredited by the Transport Seta as contained in notice R.910 of 2015 (G.G. 39252 of 02/10/2015). Proof of such accreditation by the Transport Seta is to be attached to any certification issued by such training provider.

The Principal Contractor shall be responsible for ensuring that the necessary inspections and performance tests by a competent registered LMI as outlined in the Driven Machinery Regulations for lifting equipment are conducted, and documented proof of such inspections and performance tests retained in the health and safety file.

- DMR 18(5): Annual inspection and performance test of the whole installation and all working parts;
- DMR 18(6): Ropes, chains, hooks or other attaching devices, sheaves, brakes and safety devices at intervals not exceeding six (6) months;
- DMR 18(10)(e): Lifting tackle at intervals not exceeding three (3) months.

All lifting operations are to have a clearly defined and demarcated safe operating area below the lifting area, with warning signage strategically placed and a watcher/spotter shall be deployed to prevent unauthorised access to the lifting operations area.

Where the lifting arc shall cause loads to be moved above public roadways and pedestrian walkways and thoroughfares, such areas shall have barricading erected to prevent persons from passing below suspended loads. Where barricading is not practicable, the Principal Contractor shall provide dedicated enclosed safe walkways, constructed in such a way and utilising material able to adequately protect pedestrians from any potential falling load.

As per the requirements of SANS 12480-1, guide ropes or steady lines shall be fitted to the slings of cranes and lifting equipment to eliminate manual handling of suspended loads.

Worn and damaged steel wire ropes, slings and lifting tackle must be discarded (not used any further for lifting purposes, regardless of the load) when excessive wear and corrosion is evident. Furthermore under normal operating conditions the ropes must be examined by a competent person every three months for this purpose and the results recorded.

14.28 Structures

The Contractor will ensure that in terms of Construction Regulation 11:

- That the structure on/in which work is to be performed has been inspected by a certified structural Engineer declaring the structure to be safe for use for the intended work processes.
- Steps are taken to ensure that no structure becomes unstable or poses a threat of collapse due to demolition and construction work being performed on it, or in the vicinity of it, including excavations and blasting operations.
- No structure is overloaded to the extent where it becomes unsafe. If uncertainty arises then the structural engineer is to be consulted.
- He/she has received from the designer the following information:
- Information on known or anticipated hazards relating to the construction/demolition work and the relevant information required for the safe execution of the construction/demolition work.
- A geotechnical report (where applicable)
- The loading of the structure is designed to bear.
- The methods and sequence of the construction/demolition process

All drawings pertaining to the design are on site and available for inspection. The structural engineer shall carry out inspections at appropriate and sufficient intervals of the construction work involving the design of the relevant structure, to ensure compliance with the design and record the results of these inspections in writing. These records shall be maintained on the relevant site safety files as per Construction regulation 11(2).

14.29 Temporary Works

The placement of edge protection at deck edges must be coordinated so as to minimise the time that such edge protection is not in place through communication between the Principal Contractor and Temporary Works Supervisor.

The Temporary Works Contractor and other relevant Contractors must ensure that the provisions of the Construction Regulations are adhered to. These provisions must include but not be limited to ensuring that all design drawings are available on site, that all formwork and support work equipment used is examined for suitability before use (by the supplier) with proof of these inspections forwarded to the hirer/user, that all formwork and support work (including back-propping) is inspected by a competent person appointed in writing, immediately before, during and after placement of concrete or any other imposed load and thereafter on a daily basis until the formwork and support work has been removed. Records of all inspections must be kept in a register on site held by the Temporary Works Contractor. The inspection records must be suitably sequenced and filed for easy reference by the H&S Agent and other interested party. The necessary edge protection guard rails must be fitted before any trade begins work on a formwork deck or related structure. Such guard rail system must be of a recognised/acceptable design and must be suitably strong to carry the lateral force of a person.

In addition any platform, slab, deck or surface forming an edge over which a person may fall must be fitted with guard rails at two different heights as prescribed in SANS 10085-1 Code of Practice for the Design, Erection, Use and Inspection of Access Scaffolding, and such guard rails shall be of adequate strength and stability to prevent the fall of persons.

The removal of edge protection from temporary works decks and the subsequent replacement thereof at the finished floor edge must be systematically coordinated by the Principal Contractor, as soon as practicable after the casting of concrete slabs.

During the erection of temporary works, warning signage shall be prominently displayed at the access landing point of temporary works decks as well as at any openings in the temporary works deck not safeguarded by edge protection.

The edges of all decking must be provided by edge protection fence panels preventing the chance of objects falling under or through such panels.

In order to ensure compliance to the requirements of CR12, the Contractor shall **have a separate file available for audit** that contains the requirements of CR 12, specifically as outlined below:

CR 12(1)

A contractor must appoint a temporary works designer in writing to design, inspect and approve the erected temporary works on the site before use: Each contractor to appoint a competent (proof of competency to be available) temporary works designer. In the event that the temporary works is contracted out to a sub-

contractor, in addition to the 7(1)(c) sub-contractor appointments, the competent persons must be appointed as the Temporary Works designer by the Principal Contractor.

Such person appointed as the Temporary Works Designer, shall further be conversant with and comply with the requirements contained in CR 6 Duties of designer, section (2) outlining the duties of the temporary works designer, in respect of ensuring the integrity and safety of temporary works at all times.

CR 12(3)(b); CR 6(2)(b)

All temporary works structures are done with close reference to the structural design drawings, and where any uncertainty exists the structural designer should be consulted;

CR 12(3)(c); CR 6(2)(c)

Detailed activity specific drawings and calculations pertaining to the design of temporary works structures are kept on the site and are available on request to an inspector, other contractors, **The Client**, **The Client**'s agent, **NCC** Health & Safety or any employee: Temporary works design drawings and calculations to be kept and maintained (latest available drawings) in the temporary works file as mentioned above.

CR 12(3)(f)

All temporary works structures are inspected by a competent person immediately before, during and after the placement of concrete, after inclement weather or any other imposed load and at least on a daily basis until the temporary works structure has been removed and the results have been recorded in a register and made available on site: Competent temporary works inspector (proof of competency to be available) to be appointed. Inspection checklist to be compiled and maintained, allowing for inspections as per the required schedule contained in above sub-regulation. In addition, proof to be available of demarcation & isolation of the area below concrete pour as well as spotters in safe, strategic positions during concrete pour, below the pour area to monitor integrity of temporary works during pouring operations.

CR 12(3)(g)

No person may cast concrete, until authorization in writing has been given by the competent person contemplated in paragraph (a); CR 12(3)(a) refers: all temporary works structures are adequately erected, supported, braced and maintained by a competent person so that they are capable of supporting all anticipated vertical and lateral loads that may be applied to them, and that no loads are imposed onto the structure that the structure is not designed to withstand; Competent person to be appointed and written permission to be documented and filed prior to the casting of concrete.

CR 12(3)(n)

A temporary works drawing, or any other relevant document includes construction sequences and method statements: Temporary works drawings are to be available for all sections of temporary works, including construction sequence and method statements for erecting, supporting and bracing temporary works structure.

CR 12(3)(q)

The temporary works drawings are approved by the temporary works designer before the erection of any temporary works: All temporary works drawings as contemplated in CR 12(3)(n) are to be available and signed off by the appointed temporary works designer before any construction of temporary works begins.

14.30 Storage and Disposal of Hazardous Chemical Agents

The Contractor shall ensure that hazardous chemical agents are stored in strict compliance with the requirements and provisions of Construction Regulation 25, General Safety Regulation 4 and the Regulations for Hazardous Chemical Agents, 2021.

The use and storage of hazardous chemical agents shall be under the control of an appointed person, trained in the correct use and storage of hazardous substances and conversant with the necessary safety precautions to be taken to ensure the safety of persons at all times.

All users of hazardous chemical agents shall receive the necessary information, training and personal protective equipment to be able to safely use and store hazardous chemical substances.

A hazardous chemical agents register and SDS's (safety data sheets) for each hazardous chemical agent used on site shall be implemented and maintained for the duration of the construction.

Disposal of Hazardous Chemical Agents (Recommended but not limited to):

An employer / contractor shall, as far as is reasonably practicable

- Recycle all HCA waste.
- Ensure that all collectable HCA waste is placed into containers that will prevent the likelihood of exposure during handling.

- Ensure that all vehicles, re-usable containers and covers which have been in contact with HCA waste are cleaned and decontaminated after use in such a way that the vehicles, containers or covers do not cause a hazard inside or outside the premises concerned.
- Ensure that all HCA waste which can cause exposure, is disposed of only on sites specifically designated for this purpose in terms of the Environmental Conservation Act, 1989 (Act No. 73 of 1989), in such a manner that it does not cause a hazard inside or outside the site concerned.
- Ensure that all employees occupied in the collection, transport and disposal of HCA waste, who may be exposed to that waste, are provided with suitable personal protective equipment.
- Ensure that if the services of a waste disposal contractor are used, a provision is incorporated into the contract stating that the contractor shall also comply with the provisions of these regulations.

14.31 Use and Temporary Storage of Flammable Liquids (CR 25 & GSR 4)

The contractor is to ensure that all flammable liquids are used and stored in strict compliance to Construction Regulation 25 and General Safety Regulation 4.

Flammable liquids stores are to be constructed/positioned away from general storage areas, containers and eating areas, and away from any combustible materials, including natural flora retained on the site.

In particular, it is a requirement of **The Client** that all flammable liquids left on site are stored in a flammable liquids store and the requirements of General Safety Regulation 4(10) in respect of flammable liquids stores are to be stringently followed.

Where it is not practicable to construct a flammable liquids store with a bund adequate to contain 110% of the anticipated maximum volume of flammable liquids to be stored, excess flammable liquids are to be stored in a compliant off-site facility and brought to the site as and when required in quantities that will not exceed the flammable liquids store maximum volume.

No combustible material, gas cylinders or other pressure equipment such as compressors are to be stored inside or in proximity to the flammable liquid store.

A suitable number of fire extinguishers commensurate to the volume of the flammable liquids store are to be positioned so as to be easily accessible and a safe distance from a potential fire originating in the flammable liquids store. There is to be no risk to any fire marshal when accessing fire extinguishers for use in the event of a fire.

A register of flammable liquids together with material safety data sheets (MSDSs) for each type of flammable liquids which is stored on the site must be retained in the safety file. Any specialised first aid treatment or first aid equipment required for the treatment of exposure to flammable liquids is to be available in the first aid box and appointed first aiders informed and trained (where necessary) in the correct use of such treatment and/or equipment.

No flammable liquids and hazardous substances may be kept in general unventilated storage containers of the principal contractor or any sub-contractor. In the event that a sub-contractor is not able to provide a suitable flammable liquid store compliant with GSR 4(10), it shall be the responsibility of the principal contractor to make the necessary arrangements to provide such sub-contractor with a compliant flammable liquids store.

14.32 Site Conditions

Housekeeping:

The requirements of Construction Regulation 27 shall be implemented by Contractors on the site and always maintained.

Work and access areas and walkways shall be kept clear of materials and equipment for use at all times and scrap, waste and debris removed at appropriate intervals.

The Contractor shall ensure that the construction site is adequately hoarded with controlled access points to prevent unauthorised access.

Stacking and storing:

The Contractor shall ensure that the requirements of Construction Regulation 28 and General Safety Regulation 8 are implemented and maintained for all stacking operations for the duration of the construction.

Stacking and storage areas to be clearly defined and demarcated and kept under control so as not to encroach onto roadways and walkways.

Brick pallets are preferably to be stacked in single layers. In the event that space for stacking and storage is limited, brick pallets are not to be stacked more than two tiers high under any circumstances and the stability of such stacked tiers to be monitored and maintained.

Where piping is stacked, adequate chocks are to be utilised to prevent the movement of pipes.

Stacks are to be dismantled from the top and employees are to be trained by all contractors in the correct and safe dismantling of stacks. Unstable or unsafe stacks are to be dismantled and re-stacked immediately.

14.33 Waste Management

The contractor shall include in their health and safety file a comprehensive waste management plan, outlining the methodology for ensuring effective management and disposal of waste, eliminating as far as possible all impact on the environment. The waste management plan should include, as a minimum:

- Planned waste stream management to ensure removal of waste is effective and timeous;
- Appointment of a sub-contractor to collect recyclable material, who shall issue certificates of safe disposal where required and proof of delivery of waste to an approved recycling facility (oil, chemicals, fluorescent tubes, contaminated containers etc.);
- The separation of waste on site pending collection for recycling;
- Ensure recyclable materials are stored safely before removal from site.
- Allow sufficient space for waste skips and bins, ensuring removal at appropriate intervals to reduce the risk of exposure to hazardous biological agents from general waste;
- Procedure in the event of spills to prevent environmental impact;
- Proof of communication of waste management plan to all employees and sub-contractors.

14.34 Occupational Health

Noise induced hearing loss:

Noise induced hearing loss is a highly underrated occupational condition. Occupational noise emitted by construction machinery and power tools must be controlled as far as possible by implementing engineering solutions such as noise dampening, regular maintenance, servicing and inspection, screening off the noise, and reducing the number of persons exposed. Personal protective equipment such as earmuffs and earplugs must also be used in conjunction with engineering controls so as to reduce noise exposure to below the acceptable levels. Each and every contractor is required to identify sources of noise which could impact on its personnel, to then assess the levels of noise, followed by implementing the necessary control measures to reduce the noise to acceptable levels. This must be clearly set out in the Contractor's hearing conservation programme contemplated in the NIHL Regulations.

Ergonomics:

Employers must establish a training program, in consultation with the health and safety committee, covering ergonomic risk factors for all employees and contractors. This program, integrated into the standard health and safety management system, should include regular refresher training. Ergonomic risk factors, which may lead to musculoskeletal injuries, must be assessed every two years by a competent person. This assessment considers physical, cognitive, organizational, and environmental factors, with strategies proposed to mitigate risks. If high ergonomic risks are identified, affected employees must undergo medical surveillance. Employers are also required to maintain records of training, risk assessments, and medical surveillance for specific periods as outlined in Regulation 10.

Dust control:

Dust control (silica dust) – The Contractors must ensure that dust control measures are implemented and enforced in order to minimise the levels of exposure to below the legal limits.

14.35 Welfare Facilities

The Principal Contractor shall provide, construct where necessary and maintain on the construction site, the necessary facilities as required by Construction Regulation 30 and Facilities Regulations.

In the event that the Principal Contractor appoints other contractors as contained in CR 7(1)(c)(v), the principal contractor shall ensure that any contractor so appointed provides welfare facilities for his employees as contained in CR 30. In the event that such appointed contractor is unable to make provision for the required facilities, it shall be incumbent on the Principal Contractor to provide such facilities for the employees of his sub-contractors and number such employees with his own to maintain the ratios as specified in Construction Regulation 30.

Sanitary facilities are to be cleaned on a daily basis and free toilet paper as well as hand washing facilities provided. In the instance of hired chemical toilets, the supplier shall be mandated by the Contractor to service and thoroughly clean the toilets on a bi-weekly (twice a week) basis, regardless of the ratio. The maximum ratio of employees to sanitary facilities is 30:1 and separate facilities for each gender.

In the event that the Contractor/s is required to hire chemical toilets on a Hot Site / Brownfields site, it's important that the placement / location thereof is planned and approved by **The Client** in order to assure serviceability and to minimise public exposure to unpleasant odours.

Where required, separate facilities for changing, for each gender are to be provided.

Eating areas are to be constructed in such a manner that they provide shelter from sun, wind, rain and other inclement weather and shall be large enough for all workers employed by the Contractor. Such eating areas shall be constructed taking into account the employees of sub-contractors in the event that the sub-contractor is unable to provide adequate facilities.

14.36 Alcohol and Drugs

Referencing General Safety Regulation 2A, Contractors shall develop a Drug and Alcohol Policy and communicate such policy to their employees and sub-contractors, proof of such policy and communication to be retained in the health and safety file.

No alcohol and drugs will be allowed on site. No person may be under the influence of alcohol or any drug or have in his/her possession any alcohol or drug while on the construction site. Any person appearing to be under the influence of alcohol, or any drug shall not be permitted to remain on site or be granted entry onto the site.

Any person on prescription medication must inform his/her superior, who shall in turn report this to the Principal Contractor forthwith. Any person suffering from any illness/condition requiring medication that may have a negative effect on his/her/anyone else's health or safety performance must report this to his/her superior.

Any person suspected of being under the influence of alcohol or other drugs shall be removed from site and sent home immediately.

14.37 Hazardous Biological Agents

Biological agents shall be classified as per The Regulations for Hazardous Biological Agents, 2022 by a competent person. A Detailed Risk assessment must be conducted by a competent person. Information and Training pertaining to the controls and requirements must be done. Duties and responsibilities as per legislation must be communicated. Exposure monitoring must be done as per legislation controlled by a suitable procedure. Medical surveillance must be ensured for all parties exposed or likely to be exposed. If not reasonably practical to prevent exposure PPE specific to the hazard must be used. Legal prohibitions as per the Regulations for Hazardous Biological Agents regulations must be complied with Records to be maintained for auditing purposes.

14.38 COVID – 19 SARS-CoV-2/HBA

The contractor shall undertake a SARS-COV-2 / HBA risk assessment and develop a plan to determine the risk of exposure and applicable control measures to limit infection, transmission and mitigate the risk of serious illness or death on the part of employees or persons that may be affected directly by the activities of the construction site.

The risk assessment and plan must be compiled in accordance with the most recent code of practice on managing exposure to SARS-Cov-2 in the workplace and the Regulations for Hazardous Biological Agents

The Principal contractor shall make all its employees, visitors, affected and interested parties familiar with the details contained in the risk assessment and the plan. Proof of communication and training to be retained in the health and safety file.

14.39 Working Hours

Work done outside of normal working hours; Contractors must adhere to the designated working hours established by the Project Manager. Considering potential local regulations and community considerations, any construction activities generating noise levels exceeding 85 dB(A) should be limited to the hours of 08:00 to 17:00 on weekdays. Should there be a need to conduct such work outside of these hours, approval from the Project Manager is required, and nearby communities must be notified in advance.

The Principal Contractor is tasked with ensuring the provision of adequate supervision, lighting, security, and first aid measures at all times to facilitate safe working conditions. Regular reviews of risk assessments are necessary to address any potential risks associated with nighttime or solitary work.

14.40 Management of Unexpected Hazards

The Principal Contractor is required to promptly inform the pertinent Contractors, the Health and Safety Agent, and **The Client**, both verbally and in writing, of any hazardous or potentially hazardous circumstances that may occur during construction activities. These situations may not have been previously identified within the specifications or may have emerged unexpectedly during the construction process. This information will facilitate a reassessment and potential modification of the design or processes to ensure that appropriate precautions are identified and implemented accordingly.

15 SPECIFICATION CHANGES

In instances where it becomes necessary for **The Client** to implement substantial alterations to the design and project requirements, such modifications may warrant an addendum to the site Health and Safety Specification.

Upon the final selection of the Principal Contractor, said contractor is obligated to furnish **NCC** with their project construction Methodology. After this submission, the Health and Safety Specification can be adjusted to exclude any elements irrelevant to the Contractor's construction procedures.

These supplementary documents will be prepared by **NCC** and distributed as necessary, either independently or integrated into the original specification. Each amendment will be clearly labelled with a Revision/Number/Date designation.

The Contractor is mandated to present revised or modified H&S Plans to **NCC** for review and approval. This process is mandatory for any adjustments or updates to the H&S Plan aimed at adhering to the updated Health and Safety Specification. This includes modifications to accommodate alterations in design, processes, construction methods, or the integration of new machinery or equipment.

16 CONCLUSION

In conclusion, this health and safety specification establishes a robust framework essential for ensuring the secure execution of this project. Aligned with pertinent legislation, regulations, and industry standards, it underscores the paramount importance of legal compliance, thorough hazard identification, effective risk management, and the cultivation of a strong safety culture. Compliance with the health and safety specification is imperative; it does not exempt **The Client** from their health and safety obligations. Therefore, it is of high importance that **The Client**'s agent participates in audits as part of the oversight process. The support and cooperation of all stakeholders in this process are highly valued, as they collectively contribute to maintaining a safe and healthy work environment throughout the project's lifecycle.

Kind Regards

Gerben Maritz

SACPCMP: CHSO/3664/2020

E · gerbenm@ncc -group.co.za

17 ACKNOWLEDGEMENT AND RECEIPT

I/We, _____

(Representing the Principal Contractor/Contractor)

have familiarised myself with the contents of the Health and Safety Specification and shall ensure that the Contractor and all its employees comply with all obligations/requirements in respect hereof.

Signature: _____ Date: _____

ANNEXURE 1

Health and Safety BOQ (Guide)

T · +27 21 702 2884
E · info@ncc-group.co.za

26 Bell Close, Westlake Business Park
Westlake 7945, Cape Town

NCC Health and Safety (Pty) Ltd. | Reg No: 2023/135636/07

18 ANNEXURE 1 - HSE BILL OF QUANTITIES

Note to Principal Contractor

Prior to pricing the principal contractor must familiarize him/herself with the Occupational Health and Safety Act No. 85 of 2014, Construction Regulations 2014, the National Environmental Act No. 107 of 1998 and its Regulations, other relevant Regulations and Standards as well as project specific Safety, Health & Environmental specifications.

After pricing of the health and safety bill of quantities, the **Contractor** must sign the **Certificate of Acquaintance** as evidence that he is informed regarding the contents, obligations and demands of the **Occupational Health and Safety Act No. 85 Of 2014**, **Construction Regulations 2014, the National Environmental Act No. 107 of 1998 and its Regulations, other relevant Regulations and Standards as well as project specific Safety, Health &Environmental Specifications.** Failure, by the Tenderer, to sign the Certificate of Acquaintance may result in the Tender being deemed non-responsive.

	DESCRIPTION	UNIT	QTY	RATE	TOTAL
	Allow for the necessary Workman's Compensation Fund or FEM contributions for the duration of the project with and including renewals	item			
	Allow for liability insurance (All Risk & Public Liability)	item			
	Allow for the preparation and approval of project-specific H&S Plan & File [CR 7(1)(a)]	item			
	Allow for the implementation and maintenance of project-specific H&S Plan & File. [CR 7]	Months			
	Allow for the appointment of a Part-Time Competent Construction Health & Safety Officer to assist in the control of all health and safety related aspects on site as per [CR 8(5)] - Minimum of 5 years or more experience in a similar role	Months			
	Provide for appointment of responsible and competent person/s to manage and supervise the works and administer and enforce health and safety on site as per [CR 8(1),(2), &(7)	Months			
	Allow for provision of telecommunication facilities for the appointed Construction Health & Safety Officer	Months			
	Allow for provision of Basic Emergency Preparedness and Response equipment & at least Level 2 First Aider/s	Months			

	Provide, supply and maintain for each worker the following SANS-approved personal protective equipment & clothing as per the site-specific risk assessments:				
	Hard Hats (High Density polyethylene, & 6-point lining)	No.			
	Overall/work suit (100% Cotton)	No.			
	Rain suits	No.			
	Safety boots/shoes (Steel-Toe)	No.			
	Safety Gumboots (Steel-Toe)	No.			
	Safety gloves	No.			
	Ear Plugs/Muffs	No.			
	Dust Mask (at least FF2 type)	No.			
	Respiratory Protective Equipment	No.			
	Safety goggles/ Eye Protective Equipment	No.			
	High-visibility reflective vests and/or bibs	No.			
	Personal Fall arrest and rescue equipment with and including lifelines and associated equipment	No.			
	Temporary handrails, toe boards other than for access scaffolding	Meters			
	Temporary warning signs and symbols, all signage as required by law: regulatory and warning, information	No.			
	SANS approved safety netting (orange color with a minimum of 1,2 meters high)	Meters			
	Provision for the supply and maintenance of Road Traffic Signs as in terms of the South African Road Traffic Signs Manual complete	Item			
	Allow for Pre-employment medical examinations	item			
	Allow for exit medical examinations	item			
	HEALTH AND SAFETY EDUCATION				
	Allow for all compulsory health and safety awareness programs (e.g. Inductions, toolbox Talks, Safety Promotions, Risk Assessment, First Aid, Fire Fighting, H&S related training, Scaffold erectors, Scaffold inspectors, Scaffold team leader and Scaffold supervisor	Item			
	ENVIRONMENTAL				
	Provide for adequate handling and storage of materials to minimize contamination of ground, air or water.	Item			

	Provide for the adequate and safe collection and disposal of waste material from the site by an approved method.	Item			
	Provide Ablution Facilities and Eating Area for workers.	Item			
	Service and maintenance of ablution facilities	Item			
	Security arrangements - Hoarding At least 1.8 meters in height minimum	Item			
	Provide for rehabilitation on completion of site areas and temporary access routes not covered by construction or landscaping specifications.	Item			
	Provide adequate dust control measures, including regular watering of the access route	Item			
	Provide for stockpiling of topsoil for re-use	Item			
	FIRE FIGHTING & PRECAUTION				
	Fire extinguishers	Item			
	Training	Item			
	Surveys	Item			
	Other	Item			
	FIRST AID & EMERGENCY EQUIPMENT				
	First aid boxes	Item			
	Emergency and Rescue equipment and stretchers	Item			
	Replenishment of boxes and other supplies	Item			
	Other				
	LIFTING MACHINERY AND EQUIPMENT				
	Annual inspections and load testing as per legal requirement	Item			
	Certification of all lifting gear during the course of the project	Item			
	Third-party inspections	Item			
	COMPULSORY BREAKDOWN FOR THE ADJUSTMENT OF PRELIMINARIES				
	Value Related	Item			
	Fixed Value Related	Item			
	Time Related	Item			
	CARRIED TO FINAL SUMMARY				

CERTIFICATE OF ACQUITANCE WITH TENDER DOCUMENTS

I/We_____,

Hereby certify that I/we acquainted ourselves with the Health and Safety Act 85 Of 2014 as well as the Construction Regulations, 2014 and all conditions contained herein as laid down by the State for the carrying out of construction work for which I/We submit our response.

I/We further agree that the State shall recognize no claim from me/us for relief based on allegations that I/We overlooked any tender requirements or failed to consider the purpose of completing the documentation as required.

Signed at:_____, On this the:_____, Day Of_____,20__

_____ _____

WITNESS NAME IN BLOCK LETTERS