

CONTENTS

1.	EXECUTIVE SUMMARY.....	3
2.	PROJECT DESCRIPTION	3
3.	ENVIRONMENTAL CONTROL MEASURES	5
3.1	Dust Control Measures.....	5
3.2	Noise & Vibration	6
3.3	Soil, Geology & Hydrogeology	6
3.4	Flora & Fauna	7
3.5	Air Quality	7

1. EXECUTIVE SUMMARY

The Construction Environmental Management Plan provides the specific measures that are in place and procedures to be followed for the scope of the construction works. This document will remain a live document which will be subject to change as the plan evolves during the project. This Construction Environmental management plan will also detail how waste materials will be managed during works on the EDCDUB05 Project. The plan describes how waste management practices will be addressed on a day-to-day basis and details the different waste streams generated, where they will arise and how they will be recycled, re-used, recovered or disposed.

The plan considers the requirements of the following:

- Noise Consideration
- Dust Management
- Archaeology
- Pollution (Griffioen River)
- Current waste management legal and regulatory requirements.
- Current environmental best practice in the waste and construction industry.
- Relevant national, regional and local waste policies and plans
- "Best Practice Guidelines on the Preparation of Waste Management Plans for Construction and Demolition Projects"

2. PROJECT DESCRIPTION

Winthrop Engineering & Contracting Ltd. have been engaged by the client, EdgeConnex to service to fulfil construction project as detailed below:

The scope of works in the contract provides for the construction of.

- Civil Works
- Completion of the site access road
- Architectural & Structural Works
- Groundwork's
- Mechanical & Electrical Installation
- Soft finishes

Civil, Structural & Building Works

The following construction & civil engineering works will be required.

- Ground disturbance works for new underground services, foundations and piles
- New structural steel supports within the building footprint
- Formation of roof penetrations
- Installation of Plant support systems
- Steel works to generator yard
- Installation of external stairs
- External Fencing
- Installation of external car park furniture, bollards, kerbing-
- external cladding and building envelope
- Internal Building partitions
- External Glazing to Admin areas
- Car Park Marking
- Excavation for underground services
- Hard standing and road finishes

Mechanical & Electrical Works

The following mechanical and electrical engineering works will be required.

Electrical

- Installation of Electrical EHouses
- Installation of Electrical generators
- Installation of MV Equipment
- Installation of Primary Plant containment, subfloor and above ceiling containment
- Installation of Remote Power Panels, Distribution boards and PDU's
- Primary & Secondary Cabling
- Lighting cabling & fittings
- Security controls, sensors and services
- Data cabling
- Testing & Commissioning of Systems

- Installation of internal power distribution and telecoms services with associated controls
- Construction of 3No 2-storey buildings containing 60No permanent natural gas fired generators

Mechanical

- Installation of Air Handling Plant and associated ductwork both external and internal as detailed on the project drawings
- Installation of mechanical pipework, process and humidification
- Condensate Drainage pipework as required
- Supply & Installation of water treatment plant
- Position and Install External Plant
- Ventilation and Fire Dampers as required
- Installation of insulation and cladding to internal/external pipework/ductwork
- Mains/ hot & cold-water services
- Installation of fire protection/ sprinkler services and associated storage

3. ENVIRONMENTAL CONTROL MEASURES

3.1 Dust Control Measures

The following measures are to be implemented on site to minimise dust emissions:

- Where soil stripping occurs the resulting soil fraction should be separated into topsoil and subsoil stockpiles
- The temporary storage of spoil is to be managed in terms of spoil height and location to prevent release of windblown dust
- All construction trafficked areas are to be dampened down by water spraying etc
- A wheel wash will be installed. This will be used during wet weather to prevent the drag of material on the under carriage of vehicles
- Local roads used by construction traffic will be continuously monitored, cleaned and maintained as appropriate to ensure that any excess material carried off site is removed immediately
- Any unsurfaced roads within the site will be restricted to essential site traffic only

- A site speed limit of 15 kph will be in place on site. Adherence to this speed limit will prevent the unnecessary generation of fugitive dust emissions.
- Bowers or mist generators shall be used during dry weather or other periods at potential dust sources

3.2 Noise & Vibration

Winthrop will ensure construction works shall be carried out, such that no noise nuisance is caused to local neighbours and facilities. Winthrop will adhere to the noise and vibration monitoring and mitigation measures outlines in the Environmental Impact assessment. It is not anticipated that any activity at the site will result in significant vibration nuisance. Noise monitoring will be conducted on site against the following limits (National Roads 2004)

Any activity that is known to result in a significant increase in ambient noise levels or increase vibration shall notify the HSE manager in advance. To minimise noise, equipment specification will include (for example):

- Stringent equipment sound power levels (the noise level at full load shall not exceed 85dBA when measured at a distance of three feet from the equipment surface in any direction)
- Acoustic cladding, enclosures and barriers

Any noisy or malfunctioning vehicles and equipment shall be repaired in a timely manner or removed from the site as early as possible. No equipment or machinery (to include pneumatic drills, construction vehicles, generators etc) shall operate on or adjacent to the construction site before 07.00 hours on weekdays and 09.00 hours on Saturdays nor after 19.00 hours on weekday and 13.00 on Saturdays, nor at any time on Sunday.

3.3 Soil, Geology & Hydrogeology

Site Management recognise the site is in close proximity to the Griffeen River and will take the necessary measures to prevent the release of pollution or silt into the river.

Site management will ensure the following control measures are put in place

- Winthrop will acquire a specialist archaeologist and Arborist where required.
- A methodology and control measures will be taken to prevent the release of silt and pollution during the construction stage such as a silt fence etc.
- In order to minimise the alteration of the site topography, the site to be graded in order to promote run off and reduce ponding of water.

- To prevent contamination of surface water and ground water, uncontrolled surface water run off from soil stockpiles will be prevented through the use of bunds, mounds and drainage where required
- Refuelling and minor servicing of plant and machinery to be confined to designated and suitable protected areas
- Major servicing of plant and machinery to be conducted off site to prevent any contamination of surface and ground water
- All oils, solvents and paints used during construction to be stored within temporary bunded area
- Excavated soil will be separated into topsoil and subsoil stockpiles to prevent loss of fertility of topsoil. The topsoil will be reused during landscaping operations

3.4 Flora & Fauna

- During Construction, care will be taken to protect the trees on site from both direct and indirect disturbance
- In the event of any identified habitats on site, site management will consult with specialist and take the appropriate actions such as fencing off the area etc
- Standard engineering measures will be employed to prevent potential pollutants from entering the water course in close proximity to site
- Cutting, grubbing etc of vegetation growing on uncultivated land in hedges or ditches during the nesting and breeding. If required, the removal of hedgerows will be completed outside of breeding season (1st March to 31st August) unless the site qualifies for an exemption under Section 40 of the Wildlife Act 1976 as amended by Section 46 of the Wildlife (Amendment) Act 2000 and agreed with the National Parks and wildlife services

3.5 Air Quality

- Implement a Dust Management Programme
- Soil to be separated into topsoil and subsoil stockpiles
- Temporary storage of spoil to be managed (in terms of spoil height and location) to prevent release of windblown dust
- All Construction trafficked area to be dampened down by water spraying as required
- Wheel washes to be installed to prevent the drag out of material on the under carriage of vehicles

- Local roads used by construction traffic to be continuously monitored, cleaned and maintained as appropriate to ensure that any that any excess material carried off site is removed immediately
- On-site speed restrictions (15kph) will be implemented in order to prevent the unnecessary generation of fugitive dust emissions