NON-TECHNICAL SUMMARY

Unit 1009, Caerwent Army Training Estate, Caerwent

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Date:	10/02/16	10/02/16	12/02/16
Signature:			

Contents

Introduction

Crownhill Topsoil (the trading name for Sole Trader Simon Stone) is a recycling company undertaking the following activities:

The production of soils and aggregates from inert wastes.

The processing of treated and untreated timber into wood chip.

The sorting and segregation of skip wastes into waste streams which can then be recycled or sent for further recovery.

The undertaking of these activities requires that an Environmental Permit application be submitted to Natural Resources Wales in order to obtain a Tier 3 bespoke permit based on the following Standard Rule Sets:

- SR2010_No12 – Treatment of Waste to produce Soil, Soil Substitutes and Aggregates;
- SR2015 No21_75kte – Materials Recycling Facility;
- SR2015 No22 – Materials Recycling Facility (no buildings);
- SR2015 No23 – Treatment of Waste Wood for Recovery.

As part of this application, NRW require a Non-Technical summary of the business, which must include;

- An explanation of exactly what is being applied for;
- A summary of the regulated facilities; and
- A summary of the key technical standards and control measures arising from the risk assessment.

Site Description

Crownhill's current base of operations is at Unit 21 within the Army Training Estate at Caerwent, Caldicot. The company would like to move their operations to another site at Unit 1009 on the same estate. This site is a combination of covered and non-covered areas, hard covered and permeable areas within the secure confines of the Army Training Estate. The site is secure against unauthorised access with all traffic entering and leaving the site passing through a manned security barrier.

The company would like to undertake this move as the new unit offers additional space and will allow them to bring the majority of their operations within buildings.

Please refer to Appendix A for a Site Location Plan.

Proposed Activities

The following subsections outline the activities desired to be undertaken by Crownhill Topsoil at the proposed location:

Topsoil and Recycled Aggregates:

Crownhill Topsoil's principal activity is the processing of inert construction excavation wastes to provide recycled topsoil and aggregates to the construction industry. They provide a range of different quality soils, sands and aggregates to private and commercial customers.

The key aspects of the activities undertaken are:

- Sourcing and collecting aggregates;
- Assessment of sourced material;
- Inspection of sourced material for possible contaminants;
- Grading the soil and aggregate using a screen;
- Testing soils and aggregates produced;
- Storage of graded aggregates, soil;
- Loading and delivery of processed material to customers;

The table below outlines the Waste Codes for all materials intended to be processed under this activity:

Inert Construction and Demolition Waste processing into Topsoil and Recycled Aggregates

LOW Number	Description	Notes
17 01 01	Concrete	Accepted as part of the inert waste operation and as part of the skip operation, with this waste stream sorted and processed as part of the aggregate production process.
17 01 02	Bricks	
17 01 03	Tiles and ceramics	
17 01 07	Mixtures of concrete, bricks, tiles and ceramics other than those mentioned in 17 01 06	
17 03 03	Bituminous mixtures other than those mentioned in 17 03 01	Limited volumes accepted, these will be screened and returned to the aggregate market.
17 05 04	Soil and stones, other than those mentioned in 17 05 03	Accepted as part of the inert waste operation and as part of the skip operation, with this waste stream sorted and processed as part of the aggregate production process.
17 05 08	Track ballast other than those materials mentioned in 17 05 07	
19 12 09	Minerals (for example sand, stones)	

Process

Most of the raw materials for the process are construction and demolition wastes and excavated soils sourced through construction works. A key control in the process is a duty of care check on the site from which wastes are received. This includes a site inspection for indicators of contamination, a review of any ground investigations undertaken for the site and additional ground investigation, sampling and testing if required.

Once a duty of care check has been undertaken and materials have proven to be clear of contamination, the materials are imported to the facility and stored in managed stockpiles to a maximum volume of 25,000 tonnes. All waste storage and processing occurs within the large sheds present on site.

Crushing and screening equipment is then used to grade and blend the materials to form the end products, which are stored in defined stockpiles. These are tested to BS5228 for Topsoil and to ensure compliance with the Specification of Highway Works.

This material will then be sold back into the construction industry, either collected from the facility by the client or delivered directly using our own fleet of vehicles.

The Processing of Treated and Untreated Timber into Wood Chip:

Crownhill would like to process treated and untreated timber. This includes sorting it to remove non timber items and then shredding it to form wood chip of various grades for sale to the biomass industry.

Wood processing into Biomass or Other Suitable Products

LOW Number	Description	Notes
17 02 01	Wood	Segregated wood, received as part of the wood processing. Also received as part of the skip operation. Wood will be segregated and processed into biomass or other suitable products through shredding and screening.
19 12 07	Wood other than those mentioned in 19 12 06	

Process:
Wood will be bought onto site, either as segregated wood skips or as a waste fraction within mixed waste skips. Wood will be segregated and stored on site. Due to the low risk nature of this waste stream it will be stored in the open.

Once a sufficient volume of wood has been stockpiled on site, a shredder will be bought to site and will shred all wood into bulker wagons for transport to

Materials Recovery through the sorting and segregation of skip wastes:

Crownhill would also like to receive mixed waste from household and industrial clients. This waste would be sorted and segregated into their individual waste streams. The resulting segregated waste will then be removed from site and sent to the appropriate processing facilities.

The table below outlines the types of waste to be accepted for this site activity:

Skip Processing and Sorting

LOW Number	Description	Notes
17 02 01	Wood	Segregated wood, received as part of the wood processing. Also received as part of the skip operation. Wood will be segregated and processed into biomas or other suitable products through shredding and screening.
17 02 02	Glass	Small volumes of glass received as part of other wastes i.e. old windows.
17 02 03	Plastic	Segregated and recycled.
17 04 01	Copper, bronze, brass	This would be segregated into scrap bins by metal type.
17 04 02	Aluminium	
17 04 03	Lead	
17 04 05	Iron and steel	
17 04 07	Mixed metals	
17 08 02	Gypsum-based construction materials other than those mentioned in 17 08 01	Segregated into quarantine cell for disposal via Gypsum skip.
17 09 04	Mixed construction and demolition wastes other than those mentioned in 17 09 01, 17 09 02 and 17 09 03.	Segregated and included within the inert aggregate section of the business.
19 12 01	Paper and Cardboard	Segregated and recycled.
19 12 02	Ferrous Metal	This would be segregated into scrap bins by metal type.
19 12 03	Non-ferrous metal	
19 12 04	Plastic and rubber	Segregated and recycled.
19 12 05	Glass	Small volumes of glass received as part of other wastes i.e. old windows.

LOW Number	Description	Notes
19 12 07	Wood other than those mentioned in 19 12 06	Segregated and included within the wood treatment process.
19 12 08	Textiles	If clean, segregated and recycled. If not clean, included within the wastes for onward disposal and further treatment stream.
19 12 09	Minerals (for example sand, stones)	Segregated and included within the inert aggregate section of the business.

Process

Skips are received onto site and are then tipped onto the processing floor within one of the buildings at the unit. Wastes are then sorted into various waste fractions in line with the Waste Hierarchy as defined in Article 4 of the Waste Framework Directive. Segregated wastes are transported to quarantine bays within buildings at the unit. Any materials which cannot be readily segregated are placed into skips / bins, which are then sent to a permitted facility for further recovery.

Segregated materials are sent to relevant recovery facilities.

All tipping and sorting of materials is undertaken within buildings present on site. These buildings are covered and have an impermeable concrete floor. All segregated wastes are stored within buildings with impermeable concrete floors.

Empty skips are stored on an impermeable concrete surface in the open.

The key aspects of the activities undertaken are:

- The tipping of full skips within a building with an impermeable concrete floor;
- The sorting of wastes into various segregated waste streams stored in quarantine bays appropriate to the volume and nature of the waste to be stored. All sorting and storage carried out and stored all under cover;
- The reloading of wastes and removal to facilities permitted to accept and recovery them;
- Storage of empty skips;
- Delivery and receipt of skips;

Assessment

In support of this application, a number of technical assessments and reports have been prepared to demonstrate that the proposed activities will not give rise to unacceptable impact on human health and the environment.

Environmental Management System

This sets out the environmental controls required to ensure the facility is operated without detriment to the environment. This includes:

- A description of the operations undertaken at the facility;
- Roles and responsibilities for the Management Team;
- An Impact Identification Matrix, which assesses risks associated with the operation of the facility and references the section of the EMS which deals with these risks;
- Procedures to be implemented to mitigate environmental impacts;
- Emergency Preparedness and Response Plan. This defines what constitutes an environmental incident and near miss and outlines actions to be taken in the event of an environmental incident.

Waste Management Plan

A Waste Management Plan has been drafted in accordance with Environment Agency guidance EPR6.14 How to comply with your environmental permit. The objectives of the WMP are to prevent or reduce waste production and its harmfulness and to ensure short and long term safe disposal of the extractive waste. The SWMP can be found in Appendix 1 of the Environmental Management System.

Environmental Risk Assessment

An environmental risk assessment has also been prepared, which assesses the risks posed by the following hazards:

- Hydrogeology (groundwater);
- Hydrology (surface water);
- Particulate matter (dust);
- Mud (on roads);
- Odour;
- Noise and vibration; and
- Accidents and their consequences.

This forms Sections 4 and 6 of the Environmental Management System.

Site Specific Risk Assessment

A site specific risk assessment has been prepared to set out the risks posed to the environment and local human population, and outlines the measures undertaken to reduce these risks. This assessment uses the industry standard Source-Pathway-Receptor model.

Site Condition Report

The Site Condition Report reviews the history of the site and activities undertaken there. Much of the history of the site is unknown as it forms part of the Caerwent Army Training Base, but it is believed that it was previously used for the storage of vehicles and equipment. The facility is located on a concrete slab or within buildings but the condition report considers recent activities at the site and the potential legacy effect of these.

Fire Prevention and Mitigation Plan

A Fire Prevention and Mitigation Plan has been produced, which identifies potential fire risks, actions to be implemented to prevent fires and actions to be untaken in the event of a fire to control the fire. This includes the control of runoff as a result of water used for fire suppression.

Odour Management Plan

An Odour Management Plan has not been deemed necessary as the Site Specific Risk Assessment did not identify any receptors which could be impacted by odours from the operation of the site.

Management

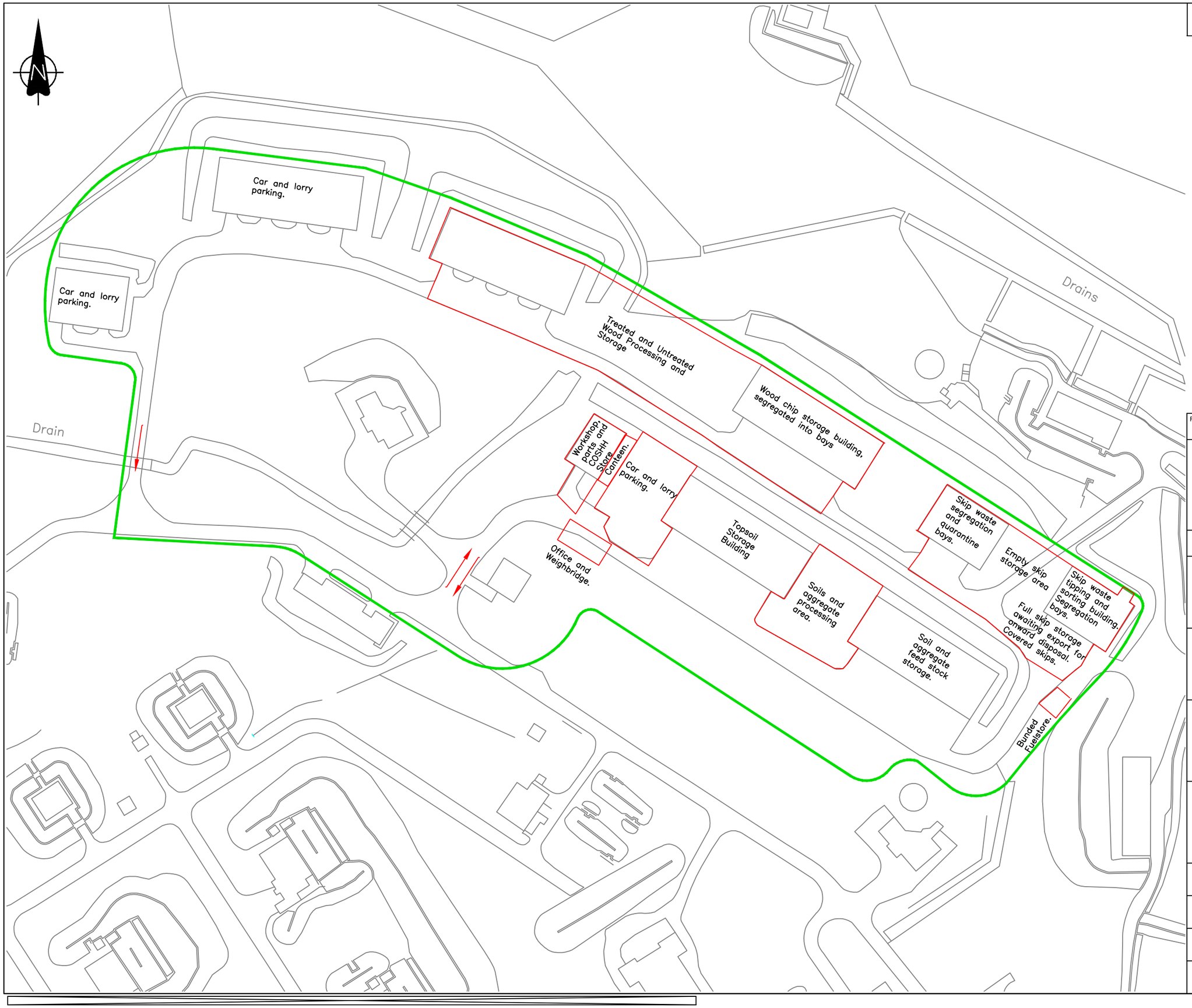
Operation of the site will be managed by Simon Stone, who holds an Environmental Permitting Operators Certificate, endorsed by the Chartered Institute of Waste Management. This is a competency certificate for operating a permitted waste and resources facility for "low risk tier" sites, e.g. inert waste transfer / treatment, in house storage, WEEE storage, or MRS (dry scrap - no free flowing liquid). Simon will be responsible for ensuring that all practices outlined in the Environmental Management System and Site Waste Management Plan are adhered to by all on site personnel. Simon will also monitor the works to ensure that all relevant health and safety requirements and quality standards are met.

Conclusion

The studies undertaken as part of this application indicate that there is unlikely to be a significant environmental impact as a result of the waste management activities at CrownHill Topsoils site.

CrownHill are fully committed to ensuring the highest standards are met and will undertake its activities in a manner consistent with best industrial practices and in accordance with the company's management systems.

Appendix A – Site Location Plan



KEY:

SITE BOUNDARY

REV	DATE	DESCRIPTION	DRWN	CHKD
		REVISIONS		
-	-	-	-	-

STATUS: INFORMATION

CLIENT:
CROWNHILL
UNIT 1009 CAERWENT
ARMY TRAINING ESTATE
CALDICOT
NP26 5XL

PROJECT: CROWNHILL TOPSOIL

TITLE: SITE LAYOUT

SCALE: NTS	DESIGNED: G. WILLIAMS
PROJECT NUMBER: GW/13/1201	DRAWN: G. WILLIAMS
DATE: AUGUST 2016	CHECKED: J. GREGORY
DRAWING NUMBER: EV/13/0901/104	REVISION: REVISION REF. -

DRAWING NUMBER: EV/13/0901/104

REVISION: -