



Non-Technical Summary

Hartcliffe Way Depot

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1. Introduction

This document forms the application for a new bespoke environmental permit for a waste treatment site under the Environmental Permitting Regulations 2016. The applicant and operator of the waste facility is ETM Recycling Ltd and their site is located at 77 Hartcliffe Way, Bristol, England BS3 5SB.

This non-technical summary outlines the details of the application and the proposed activities to be carried out by ETM Recycling Ltd on site.

In addition to this non-technical summary, the following documents have been produced and reviewed to support this bespoke permit application:

- The relevant Environment Agency application forms (Parts A, B2, B4 and F1)
- Supporting drawings (Site Layout Plan and Site Location Plan)
- Site Condition Report – a document detailing the current condition of the area of land to be included in the permit boundary
- Environmental H1 Risk Assessment
- Dust Management Plan
- Environmental Management System
- Fire Prevention Plan
- Quality Protocol
- Flood Risk Assessment

2. Application

2.1 Permit Application

ETM Recycling Ltd seek to apply for a new Bespoke Environmental Permit under the Environmental Permitting Regulations 2016. ETM Recycling Ltd currently hold an S2 exemption that allows the storage of metal on site, the new proposed activities require a new bespoke environmental permit. The site benefits from having an active foul sewer connection forming a positive drainage system on site.

2.2 Permitted Activities

The proposed activities are 1.16.13 Physical treatment of hazardous waste (for metal and WEEE recycling) and 1.16.14 Physical and chemical treatment of waste (for gully waste treatment). The site will be used for metal and WEEE treatment and recovery, and gully waste dewatering. Activities will include the storage, treatment and recovery of metals, WEEE and gully waste. The waste will then be removed off site for further processing.

The facility has been designed and will be operated to ensure compliance with all relevant requirements of the Environment Agency and the Environmental Permitting Regulations 2016.

The proposed activities covered by the Environmental Permitting (England and Wales) Regulations 2016 are provided in Table 1 below.

Table 1 – Proposed list of waste activities on site at Hartcliffe Way Depot

Description of Activities	Limits of Activities
<p>R13: Storage of wastes pending any of the operations numbered R1 to R12 (excluding temporary storage, pending collection, on the site where it is produced)</p> <p>R3: Recycling/reclamation of organic substances which are not used as solvents</p> <p>R4: Recycling/reclamation of metals and metal compounds</p> <p>R5: Recycling/reclamation of other inorganic materials</p> <p>D9: Physico-chemical treatment not specified elsewhere which results in final compounds or mixtures which are discarded by means of any of the operations numbered D1 to D12</p> <p>D15: Storage pending any of the operations numbered D1 to D14 (excluding temporary storage, pending collection, on the site where it is produced)</p>	<p>Treatment consisting only of sorting, dismantling, separation, shredding, screening, grading, baling, shearing, compacting, crushing, drying, granulation, repair or refurbishment, or cutting of waste for recovery.</p> <p>There shall be no treatment of WEEE containing ozone depleting substances.</p> <p>There shall be no treatment of batteries except for sorting.</p> <p>There shall be no mechanical treatment of cooling equipment or display equipment.</p> <p>The maximum quantity of non-hazardous waste subjected to a shredding operation shall not exceed 75 tonnes per day.</p> <p>The maximum quantity of hazardous waste treated for disposal or recovery shall not exceed 10 tonnes per day. This does not include the manual sorting, manual dismantling, repair or refurbishment of WEEE.</p> <p>Physical treatment consisting of manual sorting, separation, mineral drying, screening or crushing of waste into different components for disposal (no more than 50 tonnes per day).</p> <p>Secure storage of waste pending treatment.</p> <p>Wastes shall be stored for no longer than 1 year prior to disposal or 3 years prior to recovery.</p>

2.3 Accepted Waste Streams

As part of this permit application, ETM Recycling Ltd seek to obtain all codes listed in Table 2 below, these codes are based on the SR2015 No 3 Environmental Permit plus a number of additional codes

for the proposed activities. The materials would be imported in bulk by ETM Recycling Ltd from their Materials Recovery Facility located at Ashton Gate.

Table 2 – Proposed list of waste codes on site at Hartcliffe Way Depot

Waste Code	Description
02 01 10	Waste metal
09 01 11	Single-use cameras containing batteries included in 16 06 01, 16 06 02 or 16 06 03
09 01 12	Single-use cameras containing batteries other than those mentioned in 09 01 11
12 01 01	Ferrous metal filings and turnings
12 01 03	Non-ferrous metal filings and turnings
15 01 04	Metallic packaging
15 01 06	Mixed packaging
16 01 06	End-of-life vehicles containing neither liquids nor other hazardous components
16 01 17	Ferrous metal
16 01 18	Non-ferrous metal
16 01 22	Discarded components not otherwise specified
16 02 09*	Transformers and capacitors containing PCBs
16 02 10*	Discarded equipment containing or contaminated by PCBs other than those mentioned in 16 02 09
16 02 11*	Discarded equipment containing chlorofluorocarbons, hydrochlorofluorocarbons and hydrofluorocarbons
16 02 12*	Discarded equipment containing free asbestos
16 02 13*	Discarded equipment containing hazardous components other than those mentioned in 16 02 09 to 16 02 12
16 02 14	Discarded equipment other than those mentioned in 16 02 09 to 16 02 13
16 02 15*	Hazardous components removed from discarded equipment
16 02 16	Components removed from discarded equipment other than those mentioned in 16 02 15
16 06 01*	Lead batteries
16 06 02*	Ni-Cad batteries
16 06 03*	Mercury-containing batteries
16 06 04	Alkaline batteries (except 16 06 03)
16 06 05	Other batteries and accumulators
17 04 01	Copper, bronze, brass

17 04 02	Aluminium
17 04 03	Lead
17 04 04	Zinc
17 04 05	Iron and steel
17 04 06	Tin
17 04 07	Mixed metals
17 04 11	Cables other than those mentioned in 17 04 10
19 01 02	Ferrous materials removed from bottom ash
19 10 01	Iron and steel waste
19 10 02	Non-ferrous waste
19 12 02	Ferrous metal
19 12 03	Non-ferrous metal
19 12 12	Other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11
20 01 21*	Fluorescent tubes and other mercury-containing waste
20 01 23*	Discarded equipment containing chlorofluorocarbons
20 01 33*	Batteries and accumulators included in 16 06 01, 16 06 02 or 16 06 03 and unsorted batteries and accumulators containing these batteries
20 01 34	Batteries and accumulators other than those mentioned in 20 01 33
20 01 35*	Discarded electrical and electronic equipment other than those mentioned in 20 01 21 and 20 01 23 containing hazardous components
20 01 36	Discarded electrical and electronic equipment other than those mentioned in 20 01 21, 20 01 23 and 20 01 35
20 01 40	Metals
20 03 03	Street-cleaning residues

2.4 Waste Operations

2.4.1 The activities shall be operated using the techniques and, in the manner, described in Table 3 below.

Table 3 – Operating Techniques

Operating Techniques
<p>1. The Operator will follow the Fire Prevention Plan approved by the Environment Agency.</p>
<p>2. Treatment:</p> <p>a) All treatment shall be carried out on an impermeable surface with sealed drainage system with provision of spillage collection facilities and, where appropriate, decanters and cleanser degreasers.</p> <p>b) Treatment of WEEE shall be carried out within a building provided with a weatherproof covering.</p>
<p>3. Storage:</p> <p>a) All WEEE, disassembled spare parts, components, materials and residues shall be stored on an impermeable surface with sealed drainage system with provision of spillage collection facilities and, where appropriate, decanters and cleanser degreasers.</p> <p>b) Batteries, lamps, PCB/PCT containing capacitors and disassembled parts/components containing liquids or hazardous wastes must be stored in dedicated, labelled, sealed containers. Either the containers must provide weatherproof covering, or the containers must be stored in areas with a weatherproof covering.</p> <p>c) The following shall be stored in areas with a weatherproof covering or in sealed containers providing weatherproof covering:</p> <p>i) WEEE, disassembled spare parts and components that may be re-used or may be used to provide spare parts</p> <p>ii) Residues from any shredding or granulating operation</p> <p>iii) Any WEEE containing liquids or hazardous waste which is damaged to the extent that the liquid or hazardous waste could be released.</p> <p>d) Uncontaminated ferrous metal wastes or alloys and uncontaminated non-ferrous metal wastes shall be stored on hard standing or an impermeable surface.</p> <p>e) All other wastes shall be stored on an impermeable surface with sealed drainage system.</p>
<p>4. Buildings, covered areas or containers shall meet the following requirements:</p> <p>a) Buildings, covered areas or containers shall be designed, constructed and maintained to prevent ingress of rain and surface water.</p> <p>b) Rain and uncontaminated surface water shall be kept separate from contaminated water and other liquids.</p> <p>c) Containers shall be stored on an impermeable surface with sealed drainage system.</p>

2.4.2 WEEE materials will be stored and treated in accordance with the WEEE Directive and BATRRT Guidance. They will be treated in the covered building on the site and the resulting materials stored inside.

2.4.3 Separately collected WEEE will be processed and the appropriate risk-associated substances, preparations and components will be removed and treated in accordance with the requirements of the environmental permit in Table 4.

Table 4 – Processing of separately collected WEEE

Substances, preparations and components to be removed from separately collected WEEE
<ul style="list-style-type: none">• Capacitors containing Polychlorinated biphenyls (PCB)• Mercury-containing components, such as switches or backlighting lamps• Batteries• Printed circuit boards of mobile phones generally, and of other devices if the surface of the printed circuit board is greater than 10 square centimetres• Toner cartridges, liquid and paste, as well as colour toner• Plastic containing brominated flame retardants• Asbestos waste and components which contain asbestos• Cathode ray tubes• Hydrofluorocarbons (HFC), or hydrocarbons (HC)• Gas discharge lamps• Liquid crystal displays (together with their casing where appropriate) of a surface greater than 100 square centimetres and all those back-lighted with gas discharge lamps• External electric cables• Components containing refractory ceramic fibres• Components containing radioactive substances with the exception of components that are below the exemption thresholds set in Article 3 of and the Annex I to Council Directive 96/29/Euratom of 13 May 1996 laying down basic safety standards for the protection of the health of workers and the general public against the dangers arising from ionising radiation• Electrolytic capacitors containing “substances of concern” (height > 25mm, diameter > 25 mm or proportionately similar volume)

2.5 Expected Annual Waste Throughput Tonnages

Total volumes will not exceed standard rules permit limits of 75,000 tonnes annually. Of which, typically 50,000 tonnes a year of metal WEEE will be accepted and less than 5,000 tonnes of haz WEEE will be accepted. Possibly 5000 tonnes of gully waste will be de-watered. It is estimated that the approximate throughput of material on site annually will be ~60,000 tonnes.

3. Site Location

The site is located at 77 Hartcliffe Way, Bristol, England, BS3 5SB (Figure 1). The approximate

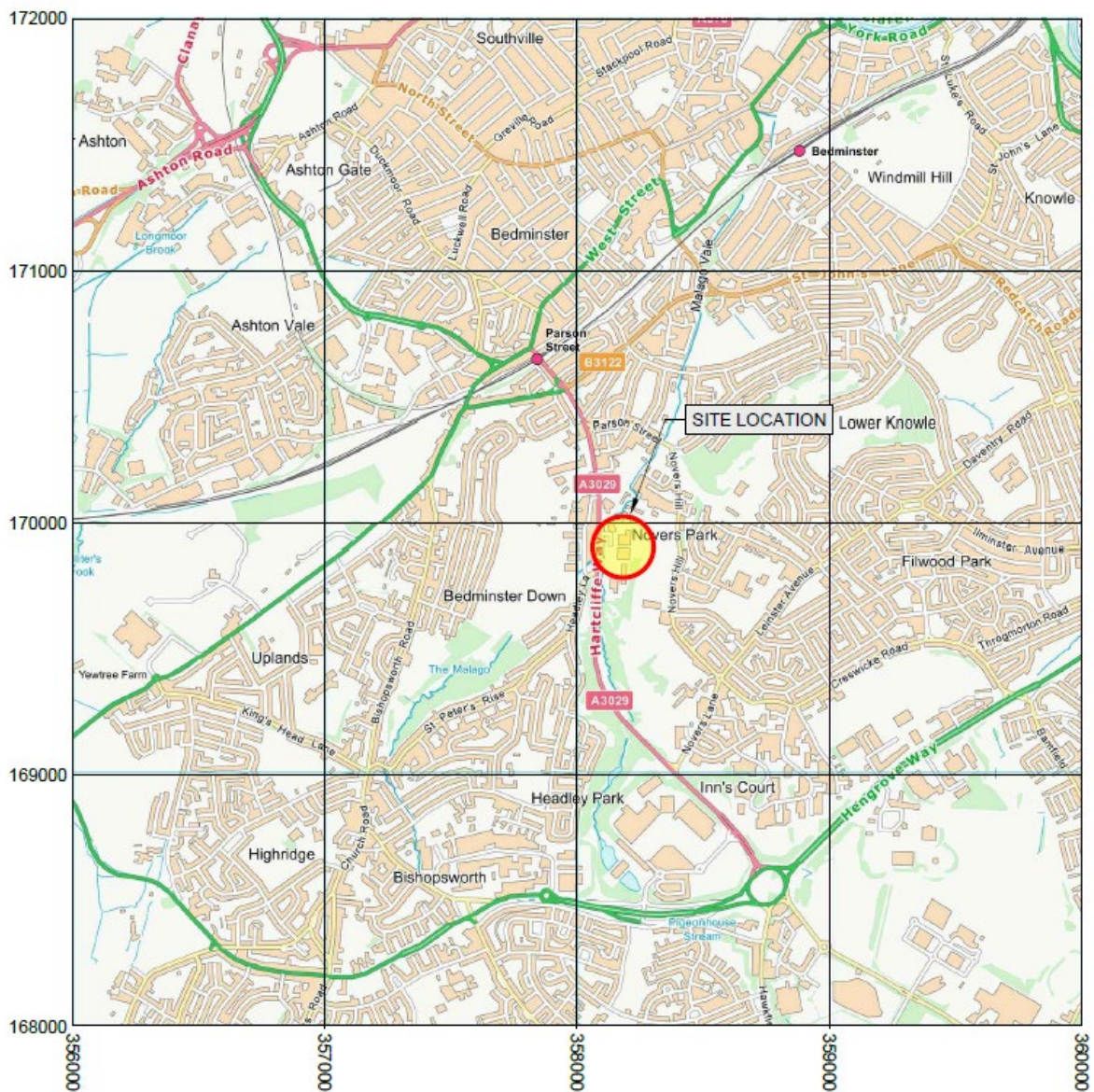
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national grid reference for the site is ST 58177 69942. The site is predominantly surrounded by industrial and commercial buildings with the nearest residential building sitting ~180 m away from the northern site boundary.

Figure 1 – Site Location Plan for Hartcliffe Way



4. Site Management

A Technically Competent Manager is on site for at least 1 full day per week and a site supervisor, who will be responsible for daily operations will continue to be on site during working hours.

The Environmental H1 Risk Assessment submitted as part of this application will be used to identify any risks and opportunities at the site, arising from this permit and operations. Additional control measures will be implemented to prevent or reduce risks.

Operational procedures will be implemented that consider the location of waste processing and storage areas.

All employees will receive environmental training that incorporates the site activities and waste streams accepted onsite.

As identified in the Environmental H1 Risk Assessment carried out as part of the permit application, specific management plans, covering emissions and fire have been created and these will be implemented as part of the Environmental Management System (EMS). These management plans account for the waste types, and quantities of waste to be treated and stored on site.

5. Environmental Setting

5.1 Potential Receptors

The site is predominantly surrounded by industrial and commercial infrastructure, including Avon Fire & Rescue service, Luckwell Garage, Dulux Decorator Centre paint shop, Appeal Conservatory Blinds shop and Tiley Motors. The nearest residential property is located on Wimborne Road, 177 m to the north of the site. There are other surrounding properties in this cul-de-sac. Another area of residential properties is found on Novers Hill to the east of the site, the nearest property in this location is located 210 m from the eastern site boundary.

There are five schools and three nurseries located within 1 km of the site with Knowle DGE Learning Centre being the closest, located 400 m from the southeast of the site.

There are no hospitals within 1 km of the site, but there is a care home (Osborne Court Care Home) located 950 m to the north and Knowle West Healthy Living Park located 460 m to the east of the site.

All receptors within 1 km of the site are located on the Sensitive Receptor Plan.

5.2 Groundwater

The site is not within a source protection zone, it is located in flood zone 1 meaning it has a low probability of flooding. The underlying geology has a slightly acid loamy texture and clayey soils with impeded drainage.

6. Application Site Condition Report

An Application Site Condition Report has been prepared for the land proposed as part of this new bespoke environmental permit application.

7. Monitoring

7.1 Air

Visual inspections will be carried out daily during operational hours, especially when carrying out activities that are dust producing. Best practicable means will be applied to minimise dust emissions and to ensure compliance with the Dust Management Plan. The site will not be carrying out high dust producing processing activities.

7.2 Groundwater

No monitoring of groundwater is proposed as fugitive releases to groundwater will be prevented by conducting all operations, including the unloading of waste, sorting and storage of waste streams in areas sealed with an impermeable concrete surface to prevent a pathway for migration of pollutants to groundwater. The site also has a positive sealed drainage system with a connection to a foul sewer to prevent emissions to groundwater.

7.3 Fire Prevention

Some combustible wastes will be stored on site, so a detailed Fire Prevention Plan is supplied in support of this permit application. Measures outlined in the Fire Prevention Plan and Environmental H1 Risk Assessment will be applied to mitigate the chance of fire.

7.4 Emissions

There will be no point source emissions to water or land associated with this new bespoke permit.

The potential sources of fugitive emissions to air have been identified and a Dust Management Plan (ref) has been prepared to prevent any potential dust emissions from reaching any nearby receptors.

Fugitive emissions to groundwater have been considered and all operational areas and quarantine points are surfaced with impermeable concrete. Proposed operational and storage areas will be surfaced with concrete prior to any waste storage taking place. Fuel is stored in a fully bunded tank above ground store, away from waste operational areas.

All waste is loaded, unloaded, and stored on impermeable surfacing with sealed drainage which is connected to the foul sewer on the entrance road off Hartcliffe Way. In the event of a spill, leak or fire, surface water from the site will be collected in interceptors and contained in the holding tank. The valves in the tank will be shut off to prevent the migration of contaminated water into the foul water system. The fire/spill water in the tank will be removed from site to a treatment facility.

Fugitive releases to the groundwater will be prevented by carrying out all operations, including the unloading of waste, sorting and storage of waste streams on impermeable concrete surfacing to prevent a pathway for migration to the ground.

Any potentially polluting spillages at the site will be subject to the procedures detailed in the site EMS.



8. Compliance with Best Available Techniques

ETM Recycling Ltd will work under the Best Available Techniques (BATs) Requirements taken from the EA's Sector Guidance Note IPPC S5.06 Guidance for the Recovery and Disposal of Hazardous and Non-Hazardous Waste (Issue 5, Date 2013; updated October 2018). BATs will be applied to the proposed activities at the ETM Recycling Ltd site to ensure all potential health and safety and environmental risks posed by these activities are considered and appropriately managed.