

PARRY'S QUARRY WASTE TRANSFER STATION, ALLTAMI, FLINTSHIRE

Environmental Permit Application

Fire Prevention Plan

Prepared for: Mold Investments Limited

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1.0 Introduction

1.1 Report Context

Mold Investments Limited (Mold) has retained SLR Consulting Limited (SLR) to prepare a Fire Prevention & Mitigation Plan (FPMP) in support of an Environmental Permit Application for the Parry's Quarry associated Waste Transfer Station (WTS) under the Environmental Permitting (England and Wales) Regulations 2016.

This report follows the Natural Resources Wales (NRW) guidance for FPMPs¹ and details the required mitigation and management methods to prevent a fire of combustible materials stored on site.

The information contained within this FPMP aims to satisfy NRW that the following factors are equivalent or less than would be incurred if the site followed the minimum standards in the regulatory guidance:

- Likelihood of fire;
- Impact from emissions during or after a fire on the local community, critical infrastructure and the environment;
- Resources required by NRW and other emergency responders during an incident; and
- Post incident clean-up and remediation costs.

Under current fire safety legislation², a responsible person must carry out, or appoint a competent person to carry out, a suitable and sufficient Fire Risk Assessment (FRA) of the risks of fire to employees and others who may be affected by the site. The FRA will be undertaken once the WTS becomes operational.

1.2 Site Location

The site is situated within the existing Parry's Quarry in Alltami, Flintshire and bounded by the A494 to the south, A55 to the north and Pinfold Road to the west. The National Grid Reference (NGR) for the entrance to the site is SJ 27478 66278.

The remaining land use immediately surrounding the proposed site is predominately agricultural land, with scattered residential and commercial / industrial premises. Access to the site will be via Pinfold lane. The site's location is illustrated on Drawing ESID1, and the site layout on Drawing ESID2.

All surrounding land uses and receptors within 1km are identified on Drawing ESID3 and all cultural and natural heritage is illustrated on Drawing ESID4.

A summary of the site's immediate surrounding land uses is identified in Table 1-1 below.

Table 1-1
Surrounding Land Uses

Boundary	Description
North	Ewloe Wood House and commercial/industrial properties are located adjacent to the northern boundary beyond which lies the A55 and a service station (eastbound on the A55) including a petrol station, hotel and restaurant. Also, to the north of the site beyond the immediate surrounding is the residential conurbation of Northop Hall and the Northop Hall Country House Hotel. The outskirts of Northop Hall are located approximately 600m to the north.

¹ Fire Prevention & Mitigation Plan Guidance, August 2017

² Regulatory Reform (Fire Safety) Order 2005

Boundary	Description
East	To the east of the site is the westbound A55 Service Station, including an unnamed residential property, beyond which lies the A55 and agricultural land. The small town of Ewloe Green and the larger conurbation of Ewloe are located 550m and 1km respectively to the east.
South	<p>Adjacent to the south of the site is an area of small woodland beyond which lies the A494. Beyond the A494 is a large building supply merchant and other commercial/industrial premises. The further surrounding land is predominately agricultural land with scattered residential buildings (farm houses) including Parrys Cottage and the Pottery Cottages.</p> <p>A further large commercial / industrial estate is located within 1km to the south.</p> <p>The south eastern edge of the site encompasses part of multi designated Buckley Claypits and Commons Site of Special Scientific Interest (SSSI) / Deeside and Buckley Newt Site Special Area of Conservation (SAC).</p>
West	<p>Pinfold Lane is located immediately to the west. A disused quarry is located off Pinfold Lane, beyond which lies predominately agricultural land and scattered residential/agricultural buildings, including Pinfold Cottage and Alltami House. The town of Alltami is located approximately 640m to the southwest.</p> <p>Also adjacent to the west and southwest of the site is numerous commercial/industrial premises.</p>

The immediate surrounding land uses are described in further detail below.

1.2.1 Residential Properties

The closest residential properties and farms are detailed in Table 1-2 below:

Table 1-2
Residential Properties within 1km of the Site Boundary

Property Reference or Name	Direction from site	Approximate Distance from Boundary
Parrys Cottages	SE	20m
Pottery Cottages	SE	200m
Properties off Smithy Lane	SE	400m
Properties off A494	SE	550m
Unnamed property accessed via the service station	E	55m
The Box	N	80m
Ewloe House	N	120m
Pinfold House	NW	130m
Old Farm Cottages	N	360m
Penfold Cottage	NW	400m

Property Reference or Name	Direction from site	Approximate Distance from Boundary
Gell Farm	N	300m
Oak Farm	S	350m
Ewloe Green Farm	E	750m
Brook Park Farm	N	500m

1.2.2 Farm and Farm Buildings

There are several farms and associated farm buildings located within 1km of the site's boundary. The closest of these is Oaks Farm 260m south of the site.

1.2.3 Recreational Premises

One recreational facility has been identified within a 1km radius from the site's boundary. Approximately 850m to the north is the Northop Hall Bowling Club.

1.2.4 Industrial and Commercial Premises

There are numerous industrial and commercial properties surrounding the site as illustrated on Drawing ESID3.

The nearest industrial site is immediately to the north and consists of a truck depot, manufacturing and warehouse facilities.

Further commercial / industrial premises are located approximately 20m west of the EP boundary (including a council depot) and a mixed use commercial and industrial estate which consists of several building material supplier. To the south a manufacturing facility is located, approximately 75m from the site's boundary.

A disused quarry is located approximately 20m to the west.

1.2.5 Service Station

The westbound A55 Northop Services lies 20m from the site's eastern boundary whilst the eastbound A55 Northop Services are located 450m to the north.

1.2.6 Public Transport Network

The A494 (Mold Road) is located adjacent to the south and the A55 North Wales Expressway is located approximately 40m to the east. Pinfold Lane runs adjacent to the western boundary. The greater local road network is shown on Drawing ESID3.

1.2.7 Surface Water Features

There are numerous surface water features surrounding Parry's Quarry Landfill. The closest surface water feature is the Alltami Brook which is located approximately 250m to the west of the site's boundary at its closest point. The Alltami Brook converges with Wepre Brook approximately 700m to the north of the site.

1.2.8 Areas of Open Space, Woodland and Agricultural Land

The site is located within a semi-rural setting with agricultural land and open ground surrounding the site in all directions.

Adjacent to the south of the site's boundary is a small area of woodland.

The south eastern edge of the site encompasses part of multi designated Buckley Claypits and Commons SSSI / Deeside and Buckley Newt Site SAC.

1.3 Ecology

The following information has been assessed to determine the ecological site setting:

- MAGIC Mapping Website³;
- NRW;s Designated Sites Tool⁴; and
- Woodland Trust's Ancient Tree Inventory⁵.

1.3.1 European/International Sites

Searches on the MAGIC website confirm that there are no Special Protection Areas (SPA) or RAMSAR sites within 2km of the site's proposed EP boundary.

1.3.2 Multi-Designated Site

An area of land located adjacent to the southern boundary of the site is designated as both a SAC and a SSSI. The SAC is known as the Deeside and Buckley Newt Site and the SSSI is known as the Buckley Claypits and Common. The reasons for these designations are detailed below:

- Deeside and Buckley Newt SAC supports a population of over 1000 adult great crested newts in 100 breeding ponds, a protected species under the Wildlife and Countryside Act 1981 and EC Habitats Directive 1994. The mixed mosaic of neutral and acid grasslands, lowland dry and wet heath and mature broad-leaved woodland provide the ideal habitat for various life stages of amphibians and other priority species. The SAC is primarily acidic oak woodland, dominated by Oak *Quercus spp.*, Ash *Fraxinus excelsior* and Sycamore *Acer pseudoplatanus*.
- Buckley Claypits and Commons SSSI has been designated for its; assemblage of amphibian species (newts), Great Crested Newt population; and its mixed mosaic of habitats including marshy, acidic and neutral grassland with a variety of wet heath, tall herb and scrub which provides an ideal range of habitats for amphibians to forage, shelter and overwinter at all life stages.

1.3.3 Sites of Special Scientific Interest

There are a further two SSSI's within 1km of the site. The Connahs Quay Ponds and Woodlands SSSI is situated north east of the site at an approximate distance of 760m, whilst Maes y Grug SSSI is located 950m to the west.

- Connahs Quay Ponds and Woodland SSSI has been designated for its assemblage of amphibian species (newts), Great Crested Newt population and semi-natural broadleaved woodland.
- Maes y Grug SSSI has been designated for its populations of Great Crested Newts and mosaic of habitats including broadleaved woodland, mixed grassland, scrub and a range of hedgerows and waterbodies.

1.3.4 Other Ecological Receptors

Searches on the MAGIC website have not identified any of the following ecological receptors within 1km of the

³ Multi-Agency Information for the Countryside – Available at: <http://www.magic.gov.uk>, accessed January 2018.

⁴ Natural Resource Wales Designated Sites Tool , Available at <https://naturalresources.wales/guidance-and-advice/environmental-topics/wildlife-and-biodiversity/find-protected-areas-of-land-and-seas/designated-sites/?lang=en>, Accessed in June 2017

⁵ Woodland Trust Ancient Tree Inventory - <http://www.ancient-tree-hunt.org.uk/discoveries/interactivemap/>, Accessed in June 2017

permit boundary:

- Area of Outstanding Natural beauty (AONB);
- Registered Parks and Gardens;
- Local Nature Reserves;
- National Nature Reserves;
- Ancient Woodland;
- Biosphere Reserves; and
- National Parks.

1.4 Cultural and Heritage

Information provided by National Resources Wales indicates numerous Scheduled Monuments within 1km of the site. The closest to the site is shown below:

- Scheduled Monument: Site of Pinfold Lane Pottery, 740m south.

1.5 Receptors

Tables 1-2, 1-3 and Drawings ESID3 and ESID4 identify the receptors which are considered to be potentially sensitive and could reasonably be affected by activities at the site.

**Table 1-3
Identified Receptors**

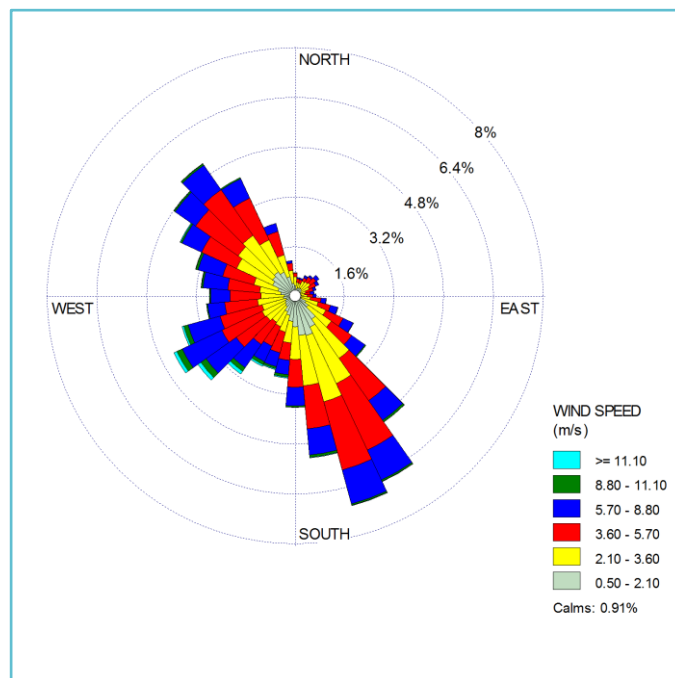
Receptor Name	Receptor Type	Direction from Site	Approximate Distance from Site Boundary (in metres)
Environmental Site Setting within 1km of the EP boundary as shown on Drawing ESID3			
A494	Public Transport Network	South	Adjacent
Pinfold Lane	Public Transport Network	West	Adjacent
Commercial properties including Deeside Truck Services	Commercial	North	Adjacent
Woodland	Woodland	South	Adjacent
A55 Northop Services including Costa Coffee, UK Diner, McDonalds, Shell and Holiday Inn	Service station	East	20
Disused Quarry	Industrial	West	20
Commercial/Industrial area including AH Plant Hire and Fire Doors	Commercial/Industrial	West	20

Receptor Name	Receptor Type	Direction from Site	Approximate Distance from Site Boundary (in metres)
Flintshire County Council Offices and Depot	Council	West	20
A55 North Wales Expressway	Road Network	North, East	40
Thornclyffe Building Supplies	Commercial	South	75
Alltami Brook	Surface Water	Southwest, West, Northwest	250
Oaks Farm	Farm/Agricultural	South	260
Northop Services	Service Station	North	450
Werpe Brook	Surface Water	North	700
Northop Hall Bowling Club	Recreational	North	850
Cultural and Natural Heritage identified receptors located within 1km of the EP boundary as shown on Drawing ESID4			
Deeside and Buckley Newt SAC	SAC	South	Adjacent
Buckley Claypits and Commons SSSI	SSSI	South	Adjacent
Site of Pinfold Lane Pottery	Scheduled Monument	South	740
Connahs Quay Ponds and Woodlands SSSI	SSSI	Northeast	760
Maes y Grug SSSI	SSSI	West	950

1.6 Windrose

A windrose from Harwenden Meteorological Station for the period of 2012 to 2016 providing the frequency of wind speed and direction is presented in Figure 1-1 below. The windrose shows that winds from the south eastern and north western quarters are more frequent and winds from the south west and north east least frequent.

Figure 1-1
Harwenden Meteorological Station 2012 - 2016



1.7 Site Type

The proposed site will accept a wide range of different waste types. The site will be permitted to accept up to 400,000 tonnes per annum (tpa) of predominantly non-hazardous waste for storage, treatment, transfer to the landfill for disposal (if waste conforms with the landfill waste acceptance procedure) or transfer off site for further recovery.

The site layout, including waste storage locations have been identified on Drawing FPP1.

All waste is stored in designated storage bays as illustrated on Drawing FPP1.

1.8 Waste Types

The EP will allow for the following wastes to be accepted on site which are defined as 'combustible materials' in the FPMP Guidance¹:

- Plastic;
- Metal;
- Paper;
- Cardboard;
- Rags/textiles; and
- Mixed waste.

The full waste list is included within Appendix 01-1 of this FPMP.

Waste pre-segregated upon acceptance is stored immediately in the relevant storage bays indicated on Drawing FPP1. Mixed or bulked waste will undergo further processing and separation in the recycling building, prior to being stored in the appropriate bays.

After processing, wastes are stored on site for the durations indicated in Table 2-1 prior to removal off site for further recovery or for disposal into the Parry's Quarry landfill.

1.9 Site Access

The site is accessed via Pinfold Lane, which is located off Mold Road (A494) to the south.

The closest fire station is Buckley Fire Station, to the south of the site. Using Google directions and mapping⁶, the drive time is approximately 7 minutes and it is approximately 2.0 miles between the site and the Fire Station.

The site entrance is located approximately 50m from the A494. As such, the Fire Rescue Service (FRS) will be able to reach the site easily with minimal use of small roads. Within the site, there is sufficient space for Fire Engines to manoeuvre and access all corners of the site.

The site is currently secured by a mixture of fencing and walling. The access road to the site is gated and locked outside of operational hours. In the event of fire outside operational hours, the site operator can be contacted by the emergency contact number found on the site identification board, positioned prominently at the entrance of the site. A complete list of emergency contact numbers is included as Appendix 01-2.

1.10 Operating Techniques and Management Plan

The site will operate its own Operating Techniques and Management Plan (OTMP), included in Section 12 of this EP application, that governs all operations at this facility.

Consequently, operational procedures for the management of the facility will ensure that all appropriate pollution prevention and control techniques are delivered reliably and on an integrated basis.

⁶ Google Maps, Accessed in April 2018

2.0 Fire Prevention Measures

The following measures are implemented on site to minimise the causes of fires.

2.1 Fire Detection and Alarm System

Mold will have suitable procedures in place to detect a fire in its early stages, in order to reduce its impact. Appropriate automated systems will be implemented, and all design, installation and maintenance will be covered in accordance with BS5839-1 2013.

The fire detection system will likely include the following types of detection systems;

- Infra-red camera flame detectors;
- Smoke & heat detectors;
- Manual call points; and
- 24 hours, 7 days a week monitoring.

These detection systems are in the process of being considered and the most appropriate system for the site will be chosen once the design of the facility is confirmed.

2.2 Waste Acceptance Procedures

The site will follow strict waste acceptance and rejection procedures, specially designed for the WTS and separate to the landfill, to ensure that no non-conforming waste is accepted on site. The procedure to be adopted by all site operatives is included in the Waste Acceptance Procedures document submitted with this EP application in Section 12.

The procedure includes the following key points:

- Each incoming load will be visually inspected as it is deposited. Particular attention will be given to the identification of batteries and non-conforming waste;
- If safe to do so, non-conforming waste will be moved to the quarantine area. The site management will be informed and, if required, a specialist contractor will be contacted to remove the waste from site within 24 hours;
- Any non-conforming waste deemed to be unsafe to move to the quarantine area will be cordoned off and site operations/traffic movements in that area will be suspended; and
- All details will be recorded in the site diary and an incident report form is completed.

2.3 Inspections and Amenity Monitoring

The site will be continuously inspected by operatives throughout the working day. Staff will be trained in how to identify fires and fire hazards on site. Staff will also receive training on the use and selection of fire extinguishers, site evacuation and shut down procedures, fire safety and all relevant emergency procedures.

All waste storage areas will be visually inspected throughout the day and all findings will be logged in the site diary as a minimum.

The site will undergo daily cleaning using the appropriate equipment, including but not limited to, hand sweep/brush, mobile plant or wash down hoses/jet wash to prevent a build-up of debris and dust on site.

Daily and weekly monitoring will be recorded in line with the requirements of the EP and detailed in the OTMP.

2.4 Waste Storage Arrangements

It is likely that waste storage will take place within the areas illustrated on Drawing FPP1. All waste will be stored in bays constructed from Legioblock walls with the following fire resistance properties:

- Class A1 fire resistance in accordance with clause 4.3.4.4 of EN 13369;
- Concrete specification of RC40/50XF equivalent with a minimum cement content of 360kg/m³, cement type CEM1 52.5N;
- Walls have a designed work life of 100 years as defined in BS EN 1990:2002 + A1: 2005; and
- Are 0.8m thick.

A freeboard space of 1m will be maintained at the top, sides and front of each bay. Lines drawn on the inside of each bay will mark the maximum height and width of each stockpile ensuring the maximum volumes are adhered to.

Separation distances have been calculated in accordance with guidance from WISH, WASTE 28: Reducing fire risk at waste management sites, issue 2, April 2017.

The maximum stockpile dimensions and storage times are detailed in Table 2-1 below.

2.4.1 Indicative Storage Bays

The final internal design of the WTS building has not been completed. However, to ensure that NRW are confident that Mold will operate the facility with due regard to the FPMP guidance, an indicative layout has been prepared and is presented on Drawing FPP1.

A worst-case scenario has been taken in this approach, in terms of the amount of waste which will be stored at any one time – which entails storage bays that are 7m long, 5m wide and 5m high, with bay walls that are 80cm thick. The bays will maintain a 1m freeboard at all times which will result in the total bay waste height being capped at 4m. The freeboard is designed to prevent sparks or flames spreading from one bay to another in the event of fire.

Table 2-1
Maximum Stockpile Dimensions and Storage Time

Waste Type	Max Storage Time	Bay Length (m)	Bay Width (m)	Bay Height (m)	Max Bay Volume (m ³)
All waste storage bays illustrated on Drawing FPP1	1 week, but likely to be up to 48 hours	7	5	4	140

2.4.2 Non-Waste Materials

The site is likely to store non-waste materials, relating to the WTS, that are not covered by the FPMP Guidance but are considered in this FPMP due to the potential for them to cause or increase the impact of a fire on the site. The materials and their storage arrangements are shown in Table 2-2 below and illustrated on Drawing FPP1.

Table 2-2
Non-Waste Materials: Storage Arrangements

Material Type	Storage Location	Storage Arrangement
Gas Bottles	To be confirmed during detailed design stage but will be located 6m from any combustible waste.	Locked gas cylinder cage
Fuel	To the south of the WTS building, existing tanks relating to the operation of the quarry, with a minimum of 6m to any combustible waste.	Tanks surrounded by a leakage containment bund capable of containing at least 110% of the volume of the largest tank within the bund.
Oils	To be confirmed during detailed design stage but will be located 6m from any combustible waste.	Tanks/containers surrounded by a leakage containment bund capable of containing at least 110% of the volume of the largest tank within the bund.

2.5 Management of Hotspots

As detailed in this FPMP, suitably qualified site personnel will carry out daily checks of the site to identify the risks and in particular inspect the storage bays and stockpiles. This ensures that the site will not reach a level of overcapacity in respect to storage.

In order to ensure waste is sufficiently rotated and storage times are minimised, it will be rotated with every new waste deposit and when it is then transferred to onsite plant for treatment. Outgoing waste will be removed from the back of the bay or stockpile which ensures the first in first out principle. Following removal of waste from site, the remaining waste will be pushed back or up the bay allowing incoming wastes to be deposited at the front.

Wastes will not be driven over by on site plant to avoid compaction, which may contribute to a build-up of heat within the pile. Additionally, Mold will operate a first-in first out procedure to ensure that waste that has been stored the longest is removed first.

Storage bays will be visually inspected throughout the day and the findings logged within the site diary at the start and end of each working day as a minimum.

To summarise, stockpiles are managed as follows to minimise self-combustion:

- Stockpile storage times are minimised;
- Risk factors (e.g. mixing of materials and heat generated during treatment) are reduced;
- Stockpile sizes are minimised;
- Stored materials are rotated, on a first in and first out basis; and
- Hotspots are detected and controlled within stockpiles by:
 - Routinely visually monitoring stockpiles; and
 - Routinely turning stockpiles.

2.6 Plant and Equipment on Site

The following items of plant and equipment are held on site from time to time dependant on the waste stream being processed on site. This is not a fixed list of plant:

- 1 x hopper, trommel, shredder and picking station (fixed plant);
- 1 x 360 excavator with grapple;
- 1 x 360 excavator with bucket; and
- 1 x forklift or tele-handler.

Daily checks will be carried out on all mobile plant and any findings are recorded in the site diary. All mobile and fixed plant servicing and maintenance will be carried out as per the manufacturer's instructions.

All mobile plant will be fitted with fire extinguishers.

Any mobile plant not in use will be temporarily stored within a specific area. The indicative location is illustrated on Drawing FPP1. The storage area will be located over 6m from any combustible waste.

Plant and equipment will be visually inspected prior to every use to ensure it is fit for purpose.

2.7 Training

Staff will receive training in the use and selection of fire extinguishers, site evacuations, fire safety and all relevant emergency procedures.

All staff and contractors working on site will be made aware of the contents of the FPMP and the procedures that will be in place in the event of a fire on site during their induction. Staff training will be regularly refreshed particularly in the event of non-compliance.

The procedures for fires discovered on site will be provided both in the site's EMS and on-site notice boards.

Mold will conduct a test of the FPMP once a year, or in the event of any significant changes to site operations, to ensure that the contents are still relevant and that all staff members' knowledge is current and up to date.

2.8 Security Measures

As the site is already an active quarry, the site is enclosed with a mixture of perimeter fencing and walls, designed to prevent unauthorised access. Access to staff members and authorised visitors will be provided during operational hours, and the site gates will be securely locked outside of operational hours. At all times visitors and staff will keep to the designated walkways to provide a secure route around the site.

The gates, fencing and walls are already inspected weekly to identify any weaknesses or defects, and this will continue once the site is operational as a WTS and landfill. Any defects identified will be repaired with a temporary solution within 24 hours, with a permanent fix implemented within 7 days, unless a timescale is otherwise agreed with NRW.

The site will benefit from CCTV which will be monitored 24 hours a day, 7 days a week. The doors to the WTS will be locked when the site is not in use.

2.9 Fire Sources and Prevention Measures

Table 2-3 below provides a summary of the potential causes of fire on site and associated preventative measures and is taken from the FPMP guidance.

Table 2-3
Fire Sources and Preventative Measures

Cause	Preventative Measure
Arson and Vandalism	<p>The site will have a number of security measures in place to limit the likelihood of arson or vandalism including:</p> <ul style="list-style-type: none"> • A perimeter of mixed walling and fencing with a gated entrance which will be locked during non-operational hours; • Lockable doors on the office and welfare facilities; • A CCTV system, monitored 24 hours a day, 7 days a week; • Inspection and maintenance procedures; and • A visitor sign in system. <p>In the event of a breach of security at the site, the cause will be investigated and appropriate mitigation measures implemented. This will be recorded in the Daily Site Log and Incident Management System. Records maintained will include inspections and maintenance of doors and locks, breaches of security, investigations and actions taken.</p>
Self-Combustion	<p>Effective stock management will limit the likelihood of the self-combustion of materials stored on site. As such, the site will have waste acceptance and stock management procedures which are upheld by all employees at the site, as detailed in Section 2.2.</p> <p>Only wastes included in Appendix 01 of this FPMP will be accepted at the WTS.</p> <p>Non-waste materials that pose a risk of self-combustion will be stored as indicated in Table 2-2.</p>
Plant or equipment failure	<p>Plant and equipment will be maintained in accordance with the manufacturer's recommendations. All new plant on site will be fitted with telematics, which will automatically highlight any faults.</p> <p>Plant and equipment will be operated in accordance with the manufacturer's instruction manuals. Instruction manuals for plant and equipment will be held either on site or online if a hardcopy is not available from the manufacturer.</p> <p>No industrial heaters will be utilised on site. Wall mounted convection heaters will be provided in the office and welfare areas. The Site Manager will ensure the heaters are switched off when an area is not in use. There is no heating provided in the WTS building.</p> <p>Induction training and refresher training will be provided to staff in the safe operation of plant and equipment relevant to their role, in accordance with the OTMP.</p> <p>Inspection of plant and equipment will be undertaken on a daily basis to check for faults and ensure appropriate safeguards are in place. The procedure will also cover general housekeeping and cleaning of plant and all equipment on site.</p> <p>Storage of mobile plant is detailed in Section 2.6 above.</p> <p>In the event of a failure or suspected fault with an item of plant or piece of equipment, the operator will ensure that the equipment is shut off in a safe manner and not used until the equipment can be repaired or replaced.</p>

Cause	Preventative Measure
Electrical faults (including damaged or exposed electrical cables)	All electrics on site will be fully certified by a qualified electrician and regular safety inspections will be carried out in accordance with the OTMP. Records of faults and/or daily electrical maintenance will be recorded in the site diary.
Naked lights	All ignition sources will be kept a minimum of 6m away from the storage of combustible and flammable wastes. No naked lights will be permitted on site.
Discarded materials Smoking	A designated smoking shelter will be provided outside the welfare facility. The shelter will be located a minimum of 6m from any combustible waste. No smoking outside of the designated shelter will be permitted on site.
Hot works	All hot works will be undertaken under a permit to work system which will include a 60-minute fire watch by a competent person at the end of the works. No hot works will be undertaken by staff unless they are trained and have the relevant permit to work. All hot works will be conducted in a cleared area of the site at least 6m from any combustible wastes. A site operative will perform a continuous fire watch during the hot work and for a minimum of 60 minutes after the work is completed.
Hot Exhausts	Vehicles will be turned off when not in use. Consideration will be given to the high-risk time for hot exhausts (one hour after switching off when dust can settle on hot surfaces) and wherever possible vehicles will be given time to cool down prior to site staff leaving site at the end of a shift. Plant will be parked a minimum of 6m from waste storage, minimising potential for exhausts to result in ignition of wastes when left unattended following the end of the shift.
Open Burning	Burning is not permitted on site.
Reactions between incompatible materials	To ensure that incompatible materials or reactions do not take place, waste will be offloaded at the site supervised by suitably qualified site operatives. Only vehicles that are accompanied by the correct documentation will be accepted onto site. Waste will undergo a visual inspection at the point of deposit into the building. Tanks containing fuel will be constructed so that any leaks/spillages are contained. Tanks will be integrally bunded with a leakage containment bund capable of containing at least 110% of the volume of the tank. Bunds will be impermeable and resistant to the stored materials.
Neighbouring sites	The site is located within an area dominated by open ground, commercial premises, the local road network and no immediate neighbours will pose a risk of fire Employees will remain aware at all times and report activities or behaviour which could represent a fire risk from neighbouring sites to the Site Manager. The manager will then take action as appropriate to address the risk.
Incompatible Wastes (Including reactions between incompatible materials)	All wastes arriving onsite will be checked in accordance with the waste acceptance procedure, details of which are included within Section 2.2 of this FPMP, to ensure no non-conforming materials will be accepted at the site.

Cause	Preventative Measure
	<p>Any identified non-conforming materials will be safely moved to the quarantine area and removed from site as soon as reasonably practicable.</p> <p>Spillages and leakages of fuels and oils will be handled in accordance with the Accident Management Plan.</p>
Hot loads deposited at site	<p>No burning, reactive / reacting or visibly hot (producing steam or heat) loads will be accepted on site. In accordance with the waste acceptance procedure detailed within Section 2.2 of this FPMP, each load will be visually inspected at the site entrance to ensure compatibility with accompanying delivery notes, therefore minimising prohibited wastes and the acceptance of hot loads.</p> <p>Instructions will be given to customers to ensure no hot loads are accepted on site.</p> <p>Should a hot load be deposited on site, it will immediately be removed to the flexible quarantine area and removed from site the same day to a suitably licenced facility for disposal.</p>

3.0 Fire Management

3.1 Containing and Mitigating Fires

The WTS building will be designed in accordance with BS9999:2008 – 'Fire Safety in the design, management and use of buildings'. This standard gives recommendations and guidance on the design, management and use of buildings to achieve reasonable standards of fire safety for all people in and around them. It also provides guidance on the on-going management of fire safety within a building throughout its entire life cycle.

The automatic water-based fire suppression on site will likely comprise of one or more of the following:

- Wet roof installed sprinkler systems; or
- Deluge systems covering the storage bays and fixed plant.

The exact fire suppression system will be confirmed during the detailed design phase of the WTS, to ensure compliance with the FPMP guidance.

3.1.1 Manual Fire suppression

The locations of all fire extinguishers on site will be provided once the WTS building design has been confirmed. It is likely that foam, carbon dioxide and powder extinguishers will be provided across the site. The extinguishers will be inspected annually.

Hose reels will be located around the WTS. The hose reels will either be fed by a mains water supply, a fire hydrant or onsite waste storage tanks.

The WTS building will be constructed to the appropriate standards. Should fire compromise the stability or integrity, the buildings and site will be immediately evacuated.

3.1.2 Site Plans

Up-to-date site plans will be on display in the site office and detail:

- Site layout;
- Waste storage arrangements;
- Firefighting equipment locations (Pollution Control Equipment);
- Fire detection and suppression equipment; and
- Personal Protection Equipment (PPE).

In addition, all procedures relating to emergencies on site, including fires, will be held within the site office and can be easily found and are readily available.

3.2 Fire Drills on Site

A fire drill will be carried out and documented on a 6 monthly basis.

This FPMP will be implemented across the site and all fire management equipment will be tested on an annual basis.

If any issues are found during these fire drills, the FPMP will be updated or amended accordingly and site operatives will be re-trained.

Regular checks will be made of all escape routes and equipment.

3.3 Emergency Contact Details

An emergency contact sheet is included in Appendix 02. In the event of a fire the following procedure will be followed:

- The Site Manager or individual nominated by the Site Manager will locate the emergency contact list included in Appendix 01-2;
- In the event of a large fire, 999 will be dialled first;
- The Site Manager or individual nominated by the Site Manager will phone each of the local receptors included in Appendix 01-2, followed by the sewage service if appropriate to do so; and
- Finally, the NRW incident hotline will be dialled once the situation is under control.

3.4 Site Procedures

3.4.1 Small fire

A small fire or area of smouldering waste will be dealt with as follows:

- A fire or area of smouldering waste will not be dealt with in-situ, mobile plant will be utilised to pull the affected waste into the open and away from any further waste that could become a light on contact; and
- Depending on the size / nature of the fire the waste will either be:
 - Extinguished immediately⁷ utilising the fire extinguishers or hose reels; or
 - Moved to the flexible quarantine area and extinguished⁸.

Depending on the size, location and nature of the fire the burning waste will be pulled into the flexible fire prevention quarantine area following the procedures detailed in Section 3.7.1.

Once a small fire is dealt with the remaining area will be visually inspected immediately by site operatives for any signs that a fire / smouldering waste still remains. The same procedure, detailed in this section, will be implemented should this be the case.

3.4.2 Uncontainable Small Fire or Large Fire

The following procedure will be in place on site that will be followed in the event of a small fire becoming uncontainable or in the event of a major fire onsite:

- The Site Manager and FRS will be contacted immediately. The local sewerage service and NRW will be notified at the first opportune moment.
- Following arrival of the FRS, all site staff will take instructions from them which may include any of the following:
 - If possible, waste that is unburnt will be dampened down to prevent the fire from spreading further;
 - If possible, unburned material will be separated from the fire using heavy plant;

⁷ Should a single item of the waste stream be alight, and the fire is well contained, then the waste will be doused via use of an extinguisher/hose reel as it is pulled from the waste pile. The burned / fire- damaged portion will then be removed to the quarantine area and the remaining waste returned to the pile.

⁸ If the fire is not easily contained to a single item, then the obviously alight portion of the waste will be removed to the quarantine area.

- The burning area will be isolated, and attempts will be made to extinguish the fire utilising the onsite fire extinguishers/hose reels if safe to do so; and
- The site and buildings will be evacuated.

3.5 Fire Waters

3.5.1 Site Drainage

Under normal operating conditions there will be runoff produced and any clean down runoff will be contained within the building.

Once the design of the WTS is finalised this FPMP will be updated.

3.5.2 Firewater Calculations

Based upon the FPMP guidance firewater calculations a 300m³ stockpile of combustible material will require an average water supply of at least 2,000 litres a minute for a minimum of 3 hours. This equates to approximately 360m³ of water.

Based on this calculation and the largest stockpile on site, it is estimated that approximately 168,840 litres (169m³) of water would be required to manage a worst-case scenario incident on site.

Sources of water available onsite are:

- The on-board water supply from FRS vehicles;
- Fire hydrant located at the entrance to the site; and
- The surface water management lagoon (if operational).

The FRS will collect and reuse firewater run off as part of normal operating procedures.

3.5.3 Firewater Containment

The primary means of containment detailed below provides sufficient containment for all likely firewater arising from an incident.

Bunding Building Doorways

As a primary means of containment on site, the doorways to the building will be banded to ensure all firewater is kept within the building. The indicative location of the bunding is shown on Drawing FPP1. Bunding is not required at the western entrance to the loading bay as the area is accessed via a ramp sloping down to the loading bay approximately 6m below the surrounding surface.

In the event of a fire, the building can contain 210,000 litres⁹ of firewater up to 10cm in depth and is considered to be the primary means of firewater containment. The building can contain a much larger volume of water if the overall depth increased over 10cm. In the event of the worst-case scenario occurring, the largest combustible stockpile on site catching fire, 168,840 litres of firewater would need to be contained which is well within the building's containment capacity.

Any firewater contained within the buildings will be removed via tanker to a suitably authorised facility.

⁹ Fire water containment calculation: Area of building (2,100m²) * depth of water (0.10m) = Volume of water to be contained (2,984m³).
Volume of water to be contained (2,984m³) * 1000 = 2,984,1000litres.

3.6 Management after a Fire Event

After a fire event, the following procedure will be implemented depending on the severity of the fire:

1. A small and containable fire that can be safely dealt with in-house using suitably trained staff and firefighting equipment located on site: The fire will be recorded in the site diary, including the causes of the fire and methods used to manage the fire. An assessment will be carried out to determine whether further mitigation measures could have prevented the fire. Any outcomes to be implemented onsite will be incorporated within this FPMP and the site's OTMP as required.
2. A larger fire that requires the presence of the FRS: If the site operatives have been told to evacuate or cease operations by NRW and/or FRS, the site will wait until told safe to re-enter site and resume operations. Any closure of the site will be followed by informing customers and the regulatory authorities. The fire will be recorded in the Daily Site Log and in an online incident report and will detail the causes of the fire and methods used to manage the fire. An assessment will be carried out to determine whether further mitigation measures could have prevented the fire. Any outcomes to be implemented onsite will be incorporated within this FPMP and the site's OTMP as required.

Should damage be sufficient to prevent the site from being able to store waste, the site will cease accepting waste and will divert to a suitably licensed facility.

The Site Manager will liaise with NRW to determine a plan-of-action to introduce normal operations at the site, and the timescales involved to achieve this.

3.7 Fire Damaged Waste

A visual assessment will be carried out by the Site Manager to determine whether the waste can be treated on site. Wherever possible, unburnt wastes will be separated from fire damaged piles. If waste piles have become mixed, then it is likely that the waste will be removed from site to a suitably permitted facility.

The Site Manager will determine what decontamination measures will be required to be carried out proportionately to the impact caused by the fire. The period of time taken to restore the site or affected part of the site to operational status will be determined by the nature and extent of the fire. If the affected area does not impact the rest of the sites operation, operations will re-start as and when appropriate.

After a significant incident, an assessment will be undertaken by a suitably qualified individual. Technically competent managers and/or engineers will assess the degree of damage caused by a fire and the residual risk from fire damaged waste, emissions or equipment. Burnt waste material will be kept on site for a short period of time if required for a subsequent internal investigation. Following this, the material will be transferred off site to a suitably licensed disposal facility.

3.7.1 Quarantine Area

The site benefits from both a dedicated and flexible fire management quarantine area and a non-compliant waste quarantine area.

The location of the quarantine areas is illustrated on Drawing FPP1. Further details are shown in Table 3-1 below.

Table 3-1
Quarantine Area Dimensions

Quarantine Area	Primary Use	Length (m)	Width (m)	Height (m)	Volume (m ³)
Fire Management (Dedicated)	Separation of unburnt waste to prevent fire spread	5	4	4	80
Non-compliant Waste	Temporary storage of non-compliant waste (14 yard skip)	4.1	1.75	1.8	10.3

The fire management quarantine areas benefit from a 6m separation distance from any combustible materials. The non-compliant waste quarantine area is located within the WTS building and the dedicated fire management quarantine area is located externally, as illustrated on Drawing FPP1.

Drawing FPP1 clearly defines each quarantine area, indicating the required minimum 6m separation buffer that will be maintained during a fire event.

The dedicated fire management quarantine area will, during normal operation of the site, be kept clear. The quarantine area will be used to store unburnt waste that has been separated from any burning waste to prevent any further fire spread. The area will not be used to douse burning waste therefore no containment measures for firewater are required.

The dedicated fire management quarantine area is large enough to hold 50% of the largest stockpile (i.e. 80m³ of combustible waste).

4.0 Conclusion

This FPMP is considered to be a 'working' document that is reviewed and updated annually or as required should any of the following occur:

- A fire on site;
- A change or review of legislation; or
- If the site is instructed to do so by NRW.

It is the responsibility of the Site Manager or nominated person to maintain this FPMP and to ensure it is adhered to in the event of a fire on site.

APPENDIX 01-1

Waste List

Waste Code	Description
01	WASTES RESULTING FROM EXPLORATION, MINING, QUARRYING, AND PHYSICAL AND CHEMICAL TREATMENT OF MINERALS
01 01	Wastes from mineral excavation
01 01 01	Wastes from mineral metalliferous excavation
01 01 02	Waste from mineral non-metalliferous excavation
01 03	Wastes from physical and chemical processing of metalliferous minerals
01 03 06	Tailings other than those mentioned in 01 03 04 and 01 03 05
01 03 08	Dusty and powdery wastes other than those mentioned in 01 03 07
01 04	Wastes from physical and chemical processing of non-metalliferous minerals
01 04 08	Waste gravel and crushed rocks other than those mentioned in 01 04 07
01 04 09	Waste sand and clays
01 04 10	Dusty and powdery wastes other than those mentioned in 01 04 07
01 04 11	Wastes from potash and rock salt processing other than those mentioned in 01 04 07
01 04 12	Tailings and other wastes from washing and cleaning of minerals
01 04 13	Wastes from stone cutting and sawing other than those mentioned in 01 04 07
01 05	Drilling muds and other drilling wastes
01 05 04	Freshwater drilling muds and wastes
06	WASTES FROM INORGANIC CHEMICAL PROCESSES
06 03	Manufacture, Formulation, Supply and use of Salts and their Solutions and Metallic Oxides
06 03 14	Solid salts and solutions other than those mentioned in 06 03 11 and 06 03 13
06 03 16	Metallic oxides other than those mentioned in 06 03 15
06 13	Wastes from inorganic chemical processes not otherwise specified
06 13 03	Carbon black
10	WASTES FROM THERMAL PROCESSES
10 01	Wastes from power stations and other combustion plants (except 19)
10 01 01	Bottom ash, slag and boiler dust (excluding boiler dust mentioned in 10 01 04)
10 01 02	Coal fly ash
10 01 03	Fly ash from peat and untreated wood
10 01 05	Calcium-based reaction wastes from flue-gas desulphurisation in solid form
10 01 15	Bottom ash, slag and boiler dust from co-incineration other than those mentioned in 10 01 14
10 01 17	Fly ash from co-incineration other than those mentioned in 10 01 16
10 01 19	Wastes from gas cleaning other than those mentioned in 10 01 05, 10 01 07 and 10 01 18
10 01 24	Sands from fluidised beds
10 02	Wastes from the iron and steel industry
10 02 01	Wastes from the processing of slag

10 02 02	Unprocessed slag
10 03	Wastes from aluminium thermal metallurgy
10 03 20	Flue-gas dust other than those mentioned in 10 03 19
10 03 22	Other particulates and dust (including ball-mill dust) other than those mentioned in 10 03 21
10 03 24	Solid wastes from gas treatment other than those mentioned in 10 03 23
10 03 26	Filter cakes from gas treatment other than those mentioned in 10 03 25
10 03 30	Wastes from treatment of salt slags and black drosses other than those mentioned in 10 03 29
10 05	Wastes from zinc thermal metallurgy
10 05 04	Other particulates and dust
10 06	Wastes from copper thermal metallurgy
10 06 04	Other particulates and dust
10 07	Wastes from silver, gold and platinum thermal metallurgy
10 07 04	Other particulates and dust
10 07 05	Filter cakes from gas treatment
10 08	Wastes from other non-ferrous thermal metallurgy
10 08 04	Particulates and dust
10 08 13	Carbon-containing wastes from anode manufacture other than those mentioned in 10 08 12
10 08 16	Flue-gas dust other than those mentioned in 10 08 15
10 09	Wastes from casting of ferrous pieces
10 09 03	Furnace slag
10 09 06	Casting cores and moulds which have not undergone pouring other than those mentioned in 10 09 05
10 09 08	Casting cores and moulds which have undergone pouring other than those mentioned in 10 09 07
10 09 10	Flue-gas dust other than those mentioned in 10 09 09
10 09 12	Other particulates other than those mentioned in 10 09 11
10 09 14	Waste binders other than those mentioned in 10 09 13
10 09 16	Waste crack-indicating agent other than those mentioned in 10 09 15
10 10	Wastes from casting of non-ferrous pieces
10 10 06	Casting cores and moulds which have not undergone pouring, other than those mentioned in 10 10 05
10 10 08	Casting cores and moulds which have undergone pouring, other than those mentioned in 10 10 07
10 10 10	Flue-gas dust other than those mentioned in 10 10 09
10 10 12	Other particulates other than those mentioned in 10 10 11
10 10 14	Waste binders other than those mentioned in 10 10 13
10 10 16	Waste crack-indicating agent other than those mentioned in 10 10 15
10 11	Wastes from manufacture of glass and glass products
10 11 03	Waste glass-based fibrous materials
10 11 05	Particulates and dust
10 11 10	Waste preparation mixture before thermal processing, other than those mentioned in 10 11 09

10 11 12	Waste glass other than those mentioned in 10 11 11
10 11 16	Solid wastes from flue-gas treatment other than those mentioned in 10 11 15
10 11 20	Solid wastes from on-site effluent treatment other than those mentioned in 10 11 19
10 12	Wastes from manufacture of ceramic goods, bricks, tiles and construction products
10 12 01	Waste preparation mixture before thermal processing
10 12 03	Particulates and dust
10 12 05	Filter cakes from gas treatment
10 12 06	Discarded moulds
10 12 08	Waste ceramics, bricks, tiles and construction products (after thermal processing)
10 12 10	Solid wastes from gas treatment other than those mentioned in 10 12 09
10 12 12	Wastes from glazing other than those mentioned in 10 12 11
10 13	Wastes from manufacture of cement, lime and plaster and articles and products made from them
10 13 01	Waste preparation mixture before thermal processing
10 13 04	Wastes from calcination and hydration of lime
10 13 06	Particulates and dust (except 10 13 12 and 10 13 13)
10 13 07	Filter cakes from gas treatment
10 13 11	Wastes from cement-based composite materials other than those mentioned in 10 13 09 and 10 13 10
10 13 14	Waste concrete
11	WASTES FROM CHEMICAL SURFACE TREATMENT AND COATING OF METALS AND OTHER MATERIALS; NON-FERROUS HYDRO METALLURGY
11 01	Wastes from chemical surface treatment and coating of metals and other materials (for example galvanic processes, zinc coating processes, pickling processes, etching, phosphatising, alkaline degreasing, anodising)
11 01 10	Filter cakes other than those mentioned in 11 01 09 only if moisture content is <10% unless otherwise agreed with NRW
12	WASTES FROM SHAPING AND PHYSICAL AND MECHANICAL SURFACE TREATMENT OF METALS AND PLASTICS
12 01	Wastes from shaping and physical and mechanical surface treatment of metals and plastics
12 01 02	Ferrous metal dust and particles
12 01 15	Machine sludges other than those mentioned in 12 01 14 only if moisture content is <10% unless otherwise agreed with NRW
12 01 21	Spent grinding bodies and grinding materials other than those mentioned in 12 01 20
15	WASTE PACKAGING, ABSORBENTS, WIPING CLOTHS, FILTER MATERIALS AND PROTECTIVE CLOTHING NOT OTHERWISE SPECIFIED
15 01	Packaging (including separately collected municipal packaging waste)
15 01 07	Glass packaging
15 02	Absorbents, filter materials, wiping cloths and protective clothing
15 02 03	Absorbents, filter materials, wiping cloths and protective clothing other than those mentioned in 15 02 02

16	WASTES NOT OTHERWISE SPECIFIED IN THE LIST
16 01	End-of-life vehicles from different means of transport [including off-road machinery] and wastes from dismantling of end-of-life vehicles and vehicle maintenance (except 13, 14, 16 06 and 16 08)
16 01 12	Brake pads other than those mentioned in 16 01 11
16 01 19	Plastic
16 01 20	Glass
16 01 22	Light and heavy vehicle fragmentiser wastes
16 03	Off-specification batches and unused products
16 03 04	Inorganic wastes other than those mentioned in 16 03 03
16 11	Waste linings and refractories
16 11 02	Carbon-based linings and refractories from metallurgical processes others than those mentioned in 16 11 01
16 11 04	Other linings and refractories from metallurgical processes other than those mentioned in 16 11 03
16 11 06	Linings and refractories from non-metallurgical processes others than those mentioned in 16 11 05
17	CONSTRUCTION AND DEMOLITION WASTES (INCLUDING EXCAVATED SOIL FROM CONTAMINATED SITES)
17 01	Concrete, bricks, tiles and ceramics
17 01 01	Concrete
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 02	Wood, glass and plastic
17 02 02	Glass
17 03	Bituminous mixtures, coal tar and tarred products
17 03 02	Bituminous mixtures other than those mentioned in 17 03 01
17 04	Metals (including their alloys)
17 04 11	Cables other than those mentioned in 17 04 10
17 05	Soil (including excavated soil from contaminated sites), stones and dredging spoil
17 05 04	Soil and stones other than those mentioned in 17 05 03
17 05 06	Dredging spoil other than those mentioned in 17 05 05
17 05 08	Track ballast other than those mentioned in 17 05 07
17 06	Insulation materials and asbestos-containing construction materials
17 06 04	Insulation materials other than those mentioned in 17 06 01 and 17 06 03
17 09	Other construction and demolition wastes
17 09 04	Mixed construction and demolition wastes
19	WASTES FROM WASTE MANAGEMENT FACILITIES, OFF-SITE WASTE WATER TREATMENT PLANTS AND PREPARATION OF WATER INTENDED FOR HUMAN CONSUMPTION/INDUSTRIAL USE
19 01	Wastes from incineration or pyrolysis of waste

19 01 12	Bottom ash and slag other than those mentioned in 19 01 11
19 01 14	Fly ash other than those mentioned in 19 01 13
19 01 16	Boiler dust other than those mentioned in 19 01 15
19 01 18	Pyrolysis wastes other than those mentioned in 19 01 17
19 01 19	Sands from fluidised beds
19 02	Wastes from physico/chemical treatments of waste (including dechromatation, decyanidation, neutralisation)
19 02 03	Premixed wastes composed only of non-hazardous wastes
19 03	Stabilised/Solidified Wastes
19 03 05	Stabilised wastes other than those mentioned in 19 03 04
19 03 07	Solidified wastes other than those mentioned in 19 03 06
19 04	Vitrified waste and wastes from vitrification
19 04 01	Vitrified waste
19 10	Shredding or Metal Containing Wastes
19 10 01	Iron and steel waste
19 10 02	Non-ferrous waste
19 10 04	Fluff-light fraction and dust other than those mentioned in 19 10 03
19 10 06	Other fractions other than those mentioned in 19 10 05
19 12	Wastes from the mechanical treatment of waste (for example sorting, crushing, compacting, pelletising) not otherwise specified
19 12 04	Plastic and rubber
19 12 05	Glass
19 12 09	Minerals (for example sand, stones)
19 12 12	Other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11
19 13	Wastes from soil and groundwater remediation
19 13 02	Solid wastes from soil remediation other than those mentioned in 19 13 01
20	MUNICIPAL WASTES (HOUSEHOLD WASTE AND SIMILAR COMMERCIAL, INDUSTRIAL AND INSTITUTIONAL WASTES) INCLUDING SEPARATELY COLLECTED FRACTIONS
20 01	Separately collected fractions (except 15 01)
20 01 02	Glass
20 01 40	Metals
20 01 41	Wastes from chimney sweeping
20 02	Garden and park wastes (including cemetery waste)
20 02 02	Soil and stones

APPENDIX 01-2

Emergency Contact Sheet

Fire Service (in the event of a major fire)

- 999 or 112

Natural Resources Wales Hotline (24 hour service)

- 0300 065 3000

Local Receptors (with associated directions)

- Costa Coffee (East): 01244 545319;
- OK Diner (East): 01244 548297;
- McDonald's (East): 01244 541920;
- Shell (East): 01244 548123;
- Holiday Inn A55 Chester West (East): 01244 550011;
- Peers Garden Supplies (South): 01244 543955;
- Thorncliffe Building Supplies (South): 01244 545907;
- Flintshire Steel & Timber Supplies (South): 01244 546620;
- Thorncliffe Skip Hire (South): 01244 549899;
- Flintshire Council Alltami Depot (South-West): 01352 701234;
- AH Plant Hire (West): 01244 549711;
- Fire Doors (West): 01244 551360;
- Deeside Truck Services (North): 01244 547202;
- Hunter Storage & Handling Ltd (North): 01244 541177; and
- Premier Home Care North Wales Ltd (North): 01244 544442.

Sewage Service – Welsh Water Emergency Number (24-hour service)

- 0800 085 3968

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