

NANTYCAWS LANDFILL
PPC APPLICATION

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APPLICATION FORM
PART A



**ENVIRONMENT
AGENCY**

**Pollution Prevention and Control Act, 1999, Pollution Prevention and
Control (England and Wales) Regulations 2000 – For Part A(1) Installations**

This form is available in both paper and electronic versions.

Introduction

When to use this form

Use this form if you are sending an application to the Environment Agency under the Pollution Prevention and Control (England and Wales) Regulations 2000 ('the PPC Regulations').

The form is to be used for applications made in respect of both 'installations' and 'mobile plant' (and in the rest of the form, the term 'installation' also covers 'mobile plant' where appropriate).

Before you start to fill in this form

Please read the notes we have produced to help you with your application, called Part A (1) Installations: Guide for applicants. You will also need to read the relevant technical guidance to which the Guide refers.

The Guide contains a list of other documents you may need to refer to when you are preparing your application, and explains some of the technical terms we use.

In particular, you should make sure that you refer to the explanation of 'installation' in the Guide. For example, there may be two or more operators in a single installation. Each operator will need a permit, each obtained by a separate application. Your applications will principally relate to the part of the installation under your control, but will also need to include some information on the rest of the installation. This will help us to assess the operation of the whole installation. The term 'installation', when used in this application form (and elsewhere) may refer to either the whole or part of the installation, depending on the nature of the information we are seeking to obtain.

Which parts of the form to fill in

The form is in six parts but we usually only send you the parts you need to fill in. Everyone has to fill in Part A, and complete and sign Part F at the end of their application. The other parts you need to fill in depends on the type of application you are making.

- To apply for a new permit – fill in Parts A and B then Part F
- To vary an existing permit – fill in Parts A and C then Part F
- To transfer all or part of an existing permit to someone else – fill in Parts A and D then Part F. This should be a joint application by the transferor and the transferee.
- To surrender all or part of an existing permit – fill in Parts A and E then Part F.

Other documents you send us

There are a number of other documents you will need to send us with your application. Each time a request for documents is made in the application form you will need to record a document reference number for the document or documents that you are submitting in the box provided on the form for this purpose.

Please also mark the document(s) clearly with this reference number and either the application reference number (if you have one, it is at the top right of this page) or your existing permit number. If you do not have either of these, please use the name of the installation.

If you need help and advice

We have made the application form as straightforward as possible, but please get in touch with us if you need any advice on how to set out the information we need. Please get in touch with us on 0845 933 3111.

Form IPPC 1 Part A

About your application

A1 About your application

A1.0.1	If you know your Application Reference Number, please enter it	Application reference number CP3735PB
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A1.0.2	What type of application are you making?	☒ New permit ☐ Variation of an existing permit ☐ Transfer of an existing permit ☐ Surrender of an existing permit
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A1.0.3	Name of the installation?	Nantycaws Landfill Site
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Please tell us if this name is	☒ already agreed with the Agency ☐ one that you are proposing
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A1.0.4	Please give the address of the site of the installation	Building name or number Nantycaws Landfill Site Street Llanddarog Road Locality Nanty Caws Town Carmarthan County Carmarthenshire Postcode SA32 8BG Ordnance Survey national grid reference 10 characters, for example SJ 1234 5678 SN470173
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A1.0.5	Give details of any existing permit(s) for the installation.	<i>Please give details of any applicable IPC authorisations, LAPC authorisations, waste management licences or water discharge consents. [Click the 'add a row' button if you have more than one to list.]</i>
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Permit number	Type	Date of issue
See attached Folder 1	Supporting Information Q A1.0.5	

A1.0.6	Do you consider that the installation meets the criteria for a 'low impact installation' as defined by the Environment Agency?	<i>Please note that this definition does not apply to installations containing activities that are defined in the PPC Regulations by reference to a numerical threshold.</i> ☒ No ☐ Yes
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A2 Authorised contacts

It will help us to have someone who we can contact directly with any questions about your application. The person you name should have the authority to act on your behalf.

A2.0.1 Who can we contact about your application?

This could be an agent rather than the operator.

Title, for example Mr, Ms, Dr

Dr.

First name

Alan

Surname

Edwards

Position

Principal

Address

Building name or number

SLR Consulting

Street

Treenwood House

Locality

Rowden Lane

Town

Bradford on Avon

County

Wiltshire

Postcode

BA15 2AU

Phone number

01225 309400

Fax number

01225 309401

Email address

aedwards@slrconsulting.co.uk

A2.0.2 Is there a different person we should contact to discuss operational matters on an ongoing basis?

- ☐ No: contact the person above
☒ Yes: contact the person below

Operational contact

If different to the person above, please identify the person we should contact to discuss operational matters on an ongoing basis.

Title, for example Mr, Ms, Dr

Mr

First name

Philip

Surname

Rees

Position

Environment and Quality Manager

Address

Building name or number

CWM Environmental Ltd, Nantycaws Landfill site

Street

Llanddarog Road

Locality

Nantycaws

Town

Carmarthen

County

Carmarthenshire

Postcode

SA32 8BG

Phone number

01267 275536

Fax number

01267 275779

Email address

phil.rees@cwmenvironmental.co.uk

A3 About the operator

Please provide the information requested below about the 'operator', which means:

- for applications for a new permit – the person who it is proposed will have control over the installation in accordance with the permit (if granted)
- for applications for a variation, transfer or surrender – the person who currently has control over the installation in accordance with the permit.

If you are applying for a transfer, we will ask for more information relating to the proposed new operator (transferee) in Part D.

A3.1 Legal status of operator

A3.1.1 **Is the operator an individual, a group of individuals, a partnership or a company/corporate body**

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

☐ Individual (sole trader) or group of individuals

Where more than one person is applying (other than as a partnership) we need details of each person. Click the 'add a person' button if you have more than one to list.

Trading name (if any)

Title, for example Mr, Ms, Dr

First name

Surname

Date of birth

Address

Building name or number

Street

Locality

Town

County

Postcode

Phone number

Fax number

Email address

▲ End of the repeatable answer fields.

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

☐ Partnership

We can only issue permits to named individuals, not to a partnership name. We therefore need details of each person in the partnership. Click the 'add a person' button if you have more than one to list.

A3.1.2 Person

Title, for example Mr, Ms, Dr

First name

Surname

Date of birth

A | About the operator | Legal status of operator

Address

Building name or number

Street

Locality

Town

County

Postcode

Phone number

Fax number

Email address

▲ End of the repeatable answer fields.

A3.1.3 Please give us the following details about the partnership

Name of partnership (if there is one)

Address

Building name or number

Street

Locality

Town

County

Postcode

Phone number

Fax number

Email address

☒ Company or corporate body

Full name of company or corporate body

Trading business name if different

Registered office address

Building name or number

Street

Locality

Town

County

Postcode

Principal business address if different

Building name or number

Street

Locality

Town

County

Postcode

Company registration number

Date of company formation

For applications from companies, please provide a copy of the certificate of incorporation and any certificates of subsequent name changes.

Document reference number(s)

For applications from other corporate bodies, please provide evidence of status.

Document reference number(s)

A3.1.4 Is the operator a subsidiary of a holding company within the meaning of Section 736 of the Companies Act 1985?

☒ No

☐ Yes

name of ultimate holding company

Registered office address

Building name or number

Street

Locality

Town

County

Postcode

Principal business address if different

Building name or number

Street

Locality

Town

County

Postcode

Company registration number

Date of company formation

APPLICATION FORM
PART B

Form IPPC 1 Part B

Applies if **New permit** on page 4 is ticked

Notes to the applicant

This Part B form should only be used for an application to operate a landfill site.

Where the installation includes the landfill and other listed activities:

- *if the de-coupling provision in Schedule 3 part 1 paragraph 2(12) and (13) of the PPC Regulations does not apply, or a request that it does not that has been agreed by the Agency, the application for the landfill should be made on this form and a generic (non-landfill) Part B form (or the Part B for that sector) should be completed for the other non-landfill listed activities;*
- *if de-coupling applies there will be an application for the landfill in accordance with the notice served under the Landfill Regulations using this landfill Part B application form, and an application for the non-landfill listed activities in accordance with the 'relevant period' in Schedule 3 using the generic Part B application form (or the Part B for that sector);*
- *a generic Part B application form should be used for all directly associated non-listed activities.*

This Part B form is designed so that you can provide the necessary information from your current and/or your proposed programme of risk-based design, construction and operation for your installation. The form tells you the information we need and the way in which we need it to be provided.

Before you complete the form

- *You must determine what the boundary of the installation is by reference to the Agency's "Guidance on Defining Installations for the Purposes of Landfill Permitting", "Landfill Regulatory Guidance Note 16: Establishing the area to be covered by the PPC permit for a landfill" and "IPPC Regulatory Guidance Series No 5, Interpretation of installation in the PPC Regulations".*
- *You should have developed a conceptual model of the site in relation to its environment, on the basis of a desk study, site investigation and report.*
- *The conceptual model should have been developed through risk assessments (e.g. hydrogeological, stability, landfill gas) into a detailed design for the construction and operation of the installation.*
- *This design should have been reviewed until you are confident that the design and operation of the installation will satisfy the emission standards you have identified for the site against the relevant benchmarks.*
- *You should then complete the form in draft, and use this to discuss your conceptual model, risk assessments, detailed design and emission benchmarks in pre-application discussions with the Agency. Before arranging a pre-application meeting you should refer to the Agency's "Preapplication Process Note for Operators required to make an Application for a Landfill Permit."*
- *You should refer to the Landfill (England and Wales) Regulations 2002 ("the Landfill Regulations") as you complete the form.*

You will be asked to provide specified drawings and risk assessments with the completed form.

If you have already submitted some or all of these drawings and assessments to the Agency under your existing licence or another application, then provided that they meet the specifications and do not require revision for this application, you do not have to create them again but will be asked to provide further copies. You are required to answer the relevant questions in the form, though, and to provide the relevant cross-references to the drawings and assessments you have already submitted.

During pre-application discussions with your relevant Agency officer further information may be identified as being required based on site-specific circumstances.

Your completed application

Your completed application will consist of

- the completed application form and any other Part B used
- the plans and drawings that are specified in the form, and
- the conceptual model, site report, hydrogeological, stability and landfill gas risk assessments on which the design, construction, operation and monitoring of the installation are based. These must follow the formats in the risk templates which are provided on the application CD
- completed amenity risk assessment including risk matrices. These should be based on the **Procedure for identifying risks from landfills** on page 128.
- waste acceptance procedures
- waste types to be accepted
- fit and proper person information
- copy of your conditioning plan
- other technical or procedural documents as agreed with the Agency.

The permit

If your application results in the issue of a permit, then the permit conditions will incorporate the Regulatory Specification (Section 2) of the completed Part B application into the permit. This defines the standards within which the installation will be designed, operated and maintained.

Your Regulatory Specification will be enforceable under the permit, and will be supported by:

- the risk assessments submitted with the application,
- the detailed design of the control and monitoring systems, which may not be submitted with the application, but which, for key engineering elements, will be submitted for each new cell before it is constructed and the construction of which will be subject to validation and Agency approval prior to operation of each new cell, and
- the documented management systems, which may not need to be submitted to the Agency with the application, but which must be implemented and maintained to keep the installation within the Regulatory Specification, and which may be inspected at any time by the Agency during compliance assessment.

The permit conditions will allow for the phased development of your installation provided that it continues to meet the regulatory specification, and will require that

- detailed design and CQA documents meeting the relevant parts of the regulatory specification are submitted for defined parts of the engineering for each new cell prior to construction for approval by the Agency; and
- the CQA validation report for each new cell is approved by the Agency prior to it becoming operational.

Provided it continues to meet the regulatory specification your detailed operational documentation may be changed by informing the Agency of the change and the date of its implementation unless such change would otherwise amount to a 'substantial change' as defined by the Pollution Prevention and Control Regulations 2000 "the PPC Regulations".

There may be improvement conditions in your permit which will allow reasonable time for you to introduce higher standards than you may be currently operating to on an existing site.

Completing the form electronically

This form is designed to respond to your input. To make your job as simple as possible, we try to show only questions which are relevant to your situation. Depending on the answers you give to some questions, other questions will be shown or hidden. Please pay particular attention to the 'Filter questions' on the next page.

In some cases, where you are asked to provide multiple inputs (for example 'add a section for each receptor') the button at the bottom of a group of questions will add another group of questions for you to complete. In the print version of the form, these groups are enclosed by 'Repeatable group starts here' and 'Repeatable group ends here'.

Likewise, some single-answer responses can be repeated as many times as required with the 'Add a row' button.

Please remember to save your data before closing the form.

You can view the completed or part-completed form in a printer-friendly format by opening the file 'formdata.xml' in a web browser such as Internet Explorer.

Completing the form by hand

This form contains questions which are not applicable to every type of site. Look out for filter statements before questions, for example, the statement may look like this 'applies if hazardous landfill is ticked'.

B0.1 Filter questions

B0.1.1 Type of site

Existing sites applying for a permit for a non-hazardous or inert landfill site should tick those options and ignore 'hazardous landfill'.

☐ Hazardous landfill

Is your site

☐ a new hazardous landfill?

☐ an existing hazardous landfill?

☒ Non-hazardous landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes)

Is your site

☒ a new non-hazardous landfill?

☐ an existing non-hazardous landfill?

☐ Inert landfill

Is your site

☐ a new inert landfill?

☐ an existing inert landfill?

*See glossary for definitions of **new (installation)** on page 114 and **existing (installation)** on page 113*

B0.2 Non-technical summary

Please keep responses as brief as possible, typically a paragraph on each, while conveying a reasonable summary of the activities. It is your opportunity to tell us how well you are doing and the improvements you have made and intend to make.

Explanation

See attached Folder 1 Supporting Information QB0.2

B0.3 Checklist for Part B of your application

Check that you have included the items in the following list.

- ☒ A signed printout of this application form when it is completed, *If you use the electronic version of the form (recommended) please also send the ppclandfill.xml data file created by the form. Use the 'View print version' to access the print-friendly version of your completed form.*
- ☒ The appropriate fee Application form Part F
- ☒ Conceptual model
- ☒ Your site report
- ☒ Scale plans and drawings
- ☒ The environmental risk assessments
- ☐ A copy of any previous information relating to the Habitats Regulations provided in support of a planning application or any other purpose
- ☒ List of waste types to be accepted
- ☒ Fit and proper persons information
- ☒ Diagram showing your management structure
- ☒ A completed EOPRA spreadsheet

Applies if an **existing hazardous landfill?** on page 15 is ticked Applies if an **existing non-hazardous landfill?** on page 15 is ticked Applies if an **existing inert landfill?** on page 15 is ticked

- ☒ A copy of the conditioning plan for your installation, as required by Schedule 4, Paragraph 1(9) of the Landfill Regulations
- ☒ Any other items where you are providing copies of your own information

Please list

See Folder 1 Supporting Information - Contents Page

B1 About the installation

We need details of all the activities and operators at the whole installation, even if you are applying for a permit for part of the installation.

Under 'Activities in the stationary technical unit' please identify all activities listed in Schedule 1 of the PPC Regulations that are proposed.

Under 'Directly associated activities' please identify all directly associated activities proposed on the same site which:

- *have a technical connection with the activities in the stationary technical unit, and*
- *could have an effect on pollution.*

B1.1 Installation table for new permit application

B1.1.1 Installation table for new permit application

Under 'Schedule 1 references', please quote the Section number, Part A(1) or A(2) or B, then paragraph and sub-paragraph number as shown in Part 1 of Schedule 1 of the PPC Regulations for each activity listed.

Under 'Operator' give the name of the operator for each activity (if it is you, enter 'Applicant').

Add a row to the appropriate table for each activity

Activities in the stationary technical unit

You can import information from the EPOPRA spreadsheet for this table.

Description of the activity	Schedule 1 reference	Operator	Complexity
Disposal of Waste by Landfill	Section 5.2, Part A (1) a)	Carmarthen Waste Management Ltd	C
Combustion Activities ENGINES	Section 1.1, Part A (1) b)(iii)	Carmarthen Waste Management Ltd	B

Directly associated activities

Description of the activity	Schedule 1 reference	Operator	Complexity
Flare	N/A	Carmarthen Waste Management Ltd	N/A

B1.2 Why is the application being made?

B1.2.1 Installation type

- ☐ the installation is new
☐ it is an existing installation and you have our agreement to make this application now.
 Please attach proof, such as a letter from the Agency

Document reference number for proof:

- ☒ it is an existing installation and you are applying in accordance with the notice served on you under Schedule 4 paragraph 1(9) of the Landfill (England and Wales) Regulations

Part A(1).

(b) Burning any of the following fuels in an appliance with a rated thermal input of 3 MW or more but less than 50 MW unless the activity is carried out as part of a Part A(2) or B activity.

(iii) any fuel manufactured from, or comprising, any other waste

2002

☐ it is an existing installation and a 'substantial change' is proposed

Document reference number for proof:

B1.3 Conceptual model, environmental setting and installation design (ESID) (site maps and reports)

You must provide a conceptual model for your installation. The conceptual model should provide an understanding of the installation in its environmental setting and consideration of the design and operation of the site at the time of the application. The conceptual model should address the source terms of the risk (e.g. waste), all pathways and receptors and must meet the specification set out in this section. The conceptual model must be based on the drawings listed in the template conceptual model (see below) some of which will be "as built" and some will be proposals. One drawing can provide the information for more than one of the following, providing the drawing is clear. Identification numbers must be included for each monitoring point.

The conceptual model must include a site report for those parts of a landfill installation where waste will not be permanently deposited (waste reception areas, leachate treatment plants etc.). This will be used to provide a benchmark against which future land quality can be measured. As with other 'specified waste management activities' the surrender assessment will take account of potential pollution arising from previously licensed activities.

In consultation with Industry, the Agency has developed a template conceptual model as guidance to assist you in making your application. This is available from the Agency website and the application CD. All the information required by the Agency for a conceptual model is detailed in the template.

B1.3.1 ESID report

Document reference

Environmental Setting and Installation Design (ESID) SLR Ref: 4B/610/002/ESID

B1.4 Technical description of the activities

The PPC application has to be accompanied by a series of detailed risk assessments covering impacts on the environment and human health from the landfill site. These assessments will take the initial environmental setting and installation design (ESID) of the landfill and validate it through its construction, operational and aftercare phases and will detail technical precautions that should be taken in order for the landfill to operate to appropriate standards and without detriment to the environment or harm to human health.

The prevention of harm to human health is an important part of the regulation of landfill sites. The definition of pollution in the PPC Regulations includes emissions which may be harmful to human health (Regulation 2 (1)). It is therefore important to ensure that the risk assessments for the landfill explicitly address the human health risk.

Given that the environmental setting of the landfill and its final design will have been presented in the ESID report there is no need to repeat this information in each of the assessments. The assessments need to identify the engineering, operational and monitoring procedures that will have to be undertaken in order for the landfill to operate.

Templates have been produced for the following required risk assessments

- *Hydrogeological risk assessment*
- *Stability risk assessment*
- *Landfill gas risk assessment*
- *Amenity risk assessments (linked to the procedure for identifying risks from landfills).*

All the information required by the Agency for each of these risk assessments is detailed in the templates.

Hydrogeological risk assessment

The hydrogeological risk assessment must demonstrate compliance with the Groundwater Regulations 1998 ("the Groundwater Regulations") over the lifetime of the installation and establish the technical measures necessary to comply with the Landfill Regulations 2002 and the Groundwater Regulations. There are differences between this hydrogeological risk assessment and the risk assessment which you may have submitted in accordance with Regulation 15 of the Waste Management Licensing Regulations 1994 and you are therefore advised to consult the guidance referenced above. The installation must be designed and operated such that substances in List I are prevented from entering groundwater and the discharge of List II substances is limited so as to avoid groundwater pollution. The Groundwater Regulations define List I and List II substances.

B1.4.1 Hydrogeological risk assessment

Document reference

Hydrogeological Risk Assessment (HRA) SLR Ref: 4B/610/002/HRA

Stability risk assessment

In constructing a landfill liner the operator should ensure that:

- *the placement of the waste should ensure its stability and the stability of associated structures and in particular must avoid slippages; and*
- *when an artificial barrier is used, the geological substratum must be sufficiently stable, taking into account the morphology of the installation to prevent settlement that may cause damage to the barrier.*

To aid in the assessment of the stability of the system, it is advised that you consider the 5 different components as identified in Figure 1 below.

Guidance on this assessment can be found in Environment Agency R&D Technical Report P1-385/TR1 and TR2 on Stability of Landfill Lining Systems.

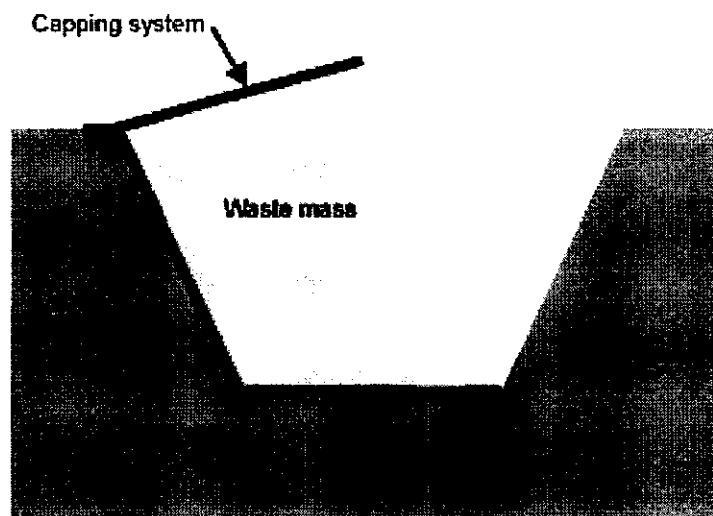


Figure 1: The various components of a landfill that should be considered in the stability risk assessment

As a landfill is a complex structure, damage can occur as a result of large and small movement/forces. You should consider the following within this risk assessment:

- the likelihood that slippage of the landfill or lining system occurs, and as such it should be designed in such a way to ensure that such a slippage does not occur or is controlled. For the purpose of this risk assessment this is the stability; and
- the stresses, and hence deformations, in both mineral and geosynthetic lining materials are controlled to ensure preferential flow paths are not formed (e.g. shear zones in clay liners and tears in geomembranes). For the purpose of this risk assessment this is integrity.

B1.4.2 Stability risk assessment

Document reference

Stability Risk Assessment (SRA) SLR Ref: 4B/610/002/SRA

Landfill gas generation and risk assessment

The landfill gas risk assessment must establish that appropriate measures have been taken in order to control the accumulation and migration of landfill gas; and that the collection, treatment and use of landfill gas is being carried out in a manner that minimises damage to or deterioration of the environment and risk to human health.

Your landfill gas management plan should be based on estimates of the rates of gas production on an annual basis (e.g. using GasSim or another appropriate model). These estimates need to take into account the types and quantities of wastes to be accepted and, if appropriate, the characteristics of the wastes already deposited at the installation (e.g. moisture content). Please refer to the Agency's 'Guidance for the management of landfill gas' when completing this section.

B1.4.3 Landfill gas risk assessment

Document reference

Landfill Gas Risk Assessment (LFGRA) SLR Ref: 4B/610/002/LFGRA

Amenity risk assessment

The Agency has produced a screening methodology for considering amenity risk assessments, **Procedure for identifying risks from landfills** on page 128. This should be used in conjunction with the amenity risk template and enables operators to identify where a more detailed level of risk assessment is required. This assessment should cover the following hazards associated with landfilling operations:

- Noise and vibration
- Odour
- Particulate matter
- Litter
- Birds, vermin and insects
- Mud on the road.

B1.4.4 Amenity risk assessment

Document reference

Nuisance and Health Risk Assessment (NHRA) SLR Ref: 4B/610/002/NHRA

Habitats risk assessment carried out under the Habitats Regulations

The Conservation (Natural Habitats etc.) Regulations 1994, referred to as 'the Habitats Regulations', require the Agency, as the 'competent authority', to assess landfill activities and ensure that they do not cause an adverse effect on the integrity of any European sites. Whether your site is affected by the Habitats Regulations is determined by its proximity to a European Site. European sites have been specifically designated to protect rare and significant habitats or species. These assessments are known as 'appropriate assessments' and will be carried out for all PPC permit applications. In general the specified distance is 2km unless the site could attract gulls and falls within 5km of an SPA or other vulnerable site – the buffer zones are explained within Appendix 6 of the Habitats Directive Handbook, which is available on the EA web site – www.environment-agency.gov.uk.

Guidance on the regulations and how the Agency are implementing them is provided within the Habitats Directive Handbook. Appendix 6 of this Handbook is specifically for the waste management sector and provides guidance relevant to this assessment.

Information on specific European sites is available on the Joint Nature Conservation Committee's website – www.jncc.gov.uk. Further information on the European site may be available from the local conservation officers at a local English Nature or Countryside Council for Wales (CCW) office.

B1.4.5 Is the landfill within the specified distance of any European site?

- ☐ No
☒ Yes

What is the distance from the landfill boundary to any European Site?

3000m

B1.4.6 European sites

Please add a section for each relevant European site

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Name of site

Afon Tywi

What are the designated features of the European site?

Response or document reference

HABRA Report Section 2.2

If there is a relevant European site, you will need to address relevant issues in the risk assessments provided in support of this application, for groundwater and surface water, leachate, landfill gas, particulate matter, birds/vermin/insects, litter, and disturbance (noise & vibration).

English Nature and CCW will be able to provide information relating to the specific European sites.

Appendix 6 of the Habitats Directive Handbook provides detailed guidance on the specific issues that should be considered for each of the hazards, for example toxic contamination includes landfill gas, leachate, surface water and toxic dust.

Please ensure that for each hazard you consider all relevant activities/emissions

- B1.4.7 For each of the following hazards, determine whether the proposed activity could be responsible for any adverse effects on the integrity of the European site?**

Toxic contamination

What are the designated species or habitats of the European site that are of relevance to this hazard?

Response or document reference

HABRA Report Section 2.3.2 and Table HABRA2

Determine whether the hazard, when considered alone, has an adverse effect on the integrity of the European site and its relevant features.

Response or document reference

HABRA Report Section 2.3.2 and Table HABRA2

Are you aware of other activities that may be impacting on the integrity of the European site e.g. sewage treatment works, quarrying or an airport? Identify any such activities that are relevant to this hazard.

Response or document reference

HABRA Report Section 2.3.2 and 3.0

Can adverse affects be avoided by modifying the landfill activity, or imposing restrictions on how the activity is undertaken?

Response or document reference

HABRA Report Section 2.3.2 and 3.0

Nutrient enrichment

What are the designated species or habitats of the European site that are of relevance to this hazard?

Response or document reference

HABRA Report Section 2.3.2 and Table HABRA2

Determine whether the hazard, when considered alone, has an adverse effect on the integrity of the European site and its relevant features.

Response or document reference

HABRA Report Section 2.3.2 and Table HABRA2

Are you aware of other activities that may be impacting on the integrity of the European site e.g. sewage treatment works, quarrying or an airport? Identify any such activities that are relevant to this hazard.

Response or document reference

HABRA Report Section 2.3.2 and 3.0

Can adverse effects be avoided by modifying the landfill activity, or imposing restrictions on how the activity is undertaken?

Response or document reference

HABRA Report Section 2.3.2 and 3.0

Habitat loss or physical damage

What are the designated species or habitats of the European site that are of relevance to this hazard?

Response or document reference

HABRA Report Section 2.3.2 and Table HABRA2

Determine whether the hazard, when considered alone, has an adverse effect on the integrity of the European site and its relevant features.

Response or document reference

HABRA Report Section 2.3.2 and Table HABRA2

Are you aware of other activities that may be impacting on the integrity of the European site e.g. sewage treatment works, quarrying or an airport? Identify any such activities that are relevant to this hazard.

Response or document reference

HABRA Report Section 2.3.2 and 3.0

Can adverse effects be avoided by modifying the landfill activity, or imposing restrictions on how the activity is undertaken?

Response or document reference

HABRA Report Section 2.3.2 and 3.0

Siltation

What are the designated species or habitats of the European site that are of relevance to this hazard?

Response or document reference

HABRA Report Section 2.3.2 and Table HABRA2

Determine whether the hazard, when considered alone, has an adverse effect on the integrity of the European site and its relevant features.

Response or document reference

HABRA Report Section 2.3.2 and Table HABRA2

Are you aware of other activities that may be impacting on the integrity of the European site e.g. sewage treatment works, quarrying or an airport? Identify any such activities that are relevant to this hazard.

Response or document reference

HABRA Report Section 2.3.2 and 3.0

Can adverse effects be avoided by modifying the landfill activity, or imposing restrictions on how the activity is undertaken?

Response or document reference

HABRA Report Section 2.3.2 and 3.0

Smothering

What are the designated species or habitats of the European site that are of relevance

to this hazard?

Response or document reference

HABRA Report Section 2.3.2 and Table HABRA2

Determine whether the hazard, when considered alone, has an adverse effect on the integrity of the European site and its relevant features.

Response or document reference

HABRA Report Section 2.3.2 and Table HABRA2

Are you aware of other activities that may be impacting on the integrity of the European site e.g. sewage treatment works, quarrying or an airport? Identify any such activities that are relevant to this hazard.

Response or document reference

HABRA Report Section 2.3.2 and 3.0

Can adverse affects be avoided by modifying the landfill activity, or imposing restrictions on how the activity is undertaken?

Response or document reference

HABRA Report Section 2.3.2 and 3.0

Disturbance

What are the designated species or habitats of the European site that are of relevance to this hazard?

Response or document reference

HABRA Report Section 2.3.2 and Table HABRA2

Determine whether the hazard, when considered alone, has an adverse effect on the integrity of the European site and its relevant features.

Response or document reference

HABRA Report Section 2.3.2 and Table HABRA2

Are you aware of other activities that may be impacting on the integrity of the European site e.g. sewage treatment works, quarrying or an airport? Identify any such activities that are relevant to this hazard.

Response or document reference

HABRA Report Section 2.3.2 and 3.0

Can adverse affects be avoided by modifying the landfill activity, or imposing restrictions on how the activity is undertaken?

Response or document reference

HABRA Report Section 2.3.2 and 3.0

Predation

What are the designated species or habitats of the European site that are of relevance to this hazard?

Response or document reference

HABRA Report Section 2.3.2 and Table HABRA2

Determine whether the hazard, when considered alone, has an adverse effect on the integrity of the European site and its relevant features.

Response or document reference

HABRA Report Section 2.3.2 and Table HABRA2

Are you aware of other activities that may be impacting on the integrity of the European

B | About the installation | Technical description of the activities

site e.g. sewage treatment works, quarrying or an airport? Identify any such activities that are relevant to this hazard.

Response or document reference

HABRA Report Section 2.3.2 and 3.0

Can adverse affects be avoided by modifying the landfill activity, or imposing restrictions on how the activity is undertaken?

Response or document reference

HABRA Report Section 2.3.2 and 3.0

▲ End of the repeatable answer fields.

B2 Regulatory specification (techniques)

B2.1 Installation details (in process controls)

B2.1.1	Maximum total capacity of installation including, if appropriate, wastes already deposited in existing areas covered by this application:	m ³ post settlement
		843,548.25
		tonnes (state conversion factors used)
		717,016.01 (0.85)

B2.1.2	Complete the following area designation table with reference to the appropriate drawing required by the ESID. This table will detail all areas of infilling at the site and future areas separately identified, for example Cell 1, Phase A	Applies if an existing hazardous landfill? on page 15 is ticked	Applies if an existing non-hazardous landfill? on page 15 is ticked	Applies if an existing inert landfill? on page 15 is ticked
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Area designation	Status	Wastes that have been and are intended to be deposited in this area of the installation			
		Hazardous	Stable and non-reactive hazardous	Non-hazardous	Inert
Cells 1-3	☒ Closed	Y	Y	Y	Y
Cell 4	☒ Operational			Y	Y
	☐ Pre-operational – engineering of liner				
Cell 5	☒ Pre-operational – engineering design			Y	Y

Waste types and quantities

Regulation 9 of the Landfill Regulations 2002 defines the types of wastes that are prohibited from being accepted at landfills. Regulation 10 defines the types of waste that may be accepted in the different classes of landfill, with reference to the relevant waste acceptance criteria set out in Schedule 1 of the 2002 Regulations. Schedule 1 also describes general principles for the acceptance of waste into the various classifications of landfill. The risk assessments in Section 1 will also affect the waste types which may be accepted at your installation and you will be required to make reference to this as part of the description of the waste.

Applies if an existing hazardous landfill? on page 15 is ticked

Co-disposal

If you are classified as a landfill for hazardous waste and you wish to continue to co-dispose hazardous and non-hazardous wastes until 16 July 2004 then you must first tell us about all of the wastes you propose to accept up to 16 July 2004 in this section. You must also provide a document reference of the details of the loading rates which currently apply at your landfill site.

You should also tell us about wastes you propose to accept after 16 July 2004. In your improvement plan you must provide details of how you will manage the change in waste types and waste acceptance criteria to accept the wastes listed in response to Question 2.2.5.

Lists of waste types

You must refer to the Hazardous Waste Directive and to the European Waste Classification system. Guidance on the use of EWC has been provided with this form. The appropriate version of the EWC will be the one in force at the point that the application is accepted as being Duly made.

Wastes for disposal

Waste for disposal is any incoming waste being brought onto the installation to be placed in the landfill (not for capping, engineering or restoration).

B2.1.3 Do you intend to accept hazardous wastes (other than stable non-reactive hazardous waste) after 16 July 2004?

- ☒ No
☐ Yes

B2.1.4 List the waste types you propose to accept for disposal at your installation up to 16 July 2004.

Use the supplied list of EWC codes to guide you.

For each waste type you must show:

- The full EWC code
- Description including physical description e.g. solid, sludge, nuisance risk
- Waste classification i.e. hazardous, non-hazardous, stable, non reactive hazardous waste.

Document reference

See attached Folder 1 Supporting Info QB2.1.4

B2.1.5 List the waste types you propose to accept for disposal at your installation after 16 July 2004.

Use the supplied list of EWC codes to guide you.

For each waste type you must show:

- The full EWC code
- Description including physical description e.g. solid, sludge, nuisance risk
- Waste classification i.e. Hazardous, non-hazardous, stable, non reactive hazardous waste.

In your improvement plan you must provide details of how you will manage the change in waste types and waste acceptance criteria

Document reference

See attached Folder 1 Supporting Info QB2.1.5

Wastes for restoration

Waste for restoration or on-site engineering, for the purposes of this section, is any incoming waste being brought onto the installation for the purposes of engineering, capping and restoration.

B2.1.6 List the waste types that will be used for capping, engineering and restoration

Use the supplied list of EWC codes to guide you.

For each waste type you must show:

- The full EWC code
- Description including physical description e.g. solid, sludge, nuisance risk
- Waste classification

Document reference

See attached Folder 1 Supporting Info QB2.1.6

B2.1.7 What is the maximum quantity of waste that you propose to deposit in the Installation in any year?

Annual waste input limits		
Category	Limit tonnes/ year	Comments
Hazardous waste		
Stable, non-reactive hazardous waste		
Non-hazardous waste	130,000	
Inert waste including inert waste used for daily/intermediate cover material		
Inert waste for restoration of closed areas	20,000	
Total	150,000	

Waste acceptance criteria and procedures

Regulation 12 of the Landfill Regulations 2002 requires you to ensure that wastes delivered to your installation can be accepted according to the permit conditions and the waste acceptance criteria. This must be shown by documented waste acceptance procedures that cover a basic characterisation of the waste prior to delivery to the installation, and compliance testing and on-site verification on arrival at the installation.

An outline of the interim waste acceptance criteria is set out in Schedule 1 of the Landfill Regulations 2002. Further guidance on best practice is provided in Environment Agency 'Guidance on national interim waste acceptance procedures' and Environment Agency "Waste Treatment Requirements of Article 6a of the Landfill Directive (January 02)."

B2.1.8 Your waste acceptance procedures must include the following information and must be in place before any waste can be accepted under the permit

- The waste acceptance criteria for the installation
- Level 1 basic characterisation of wastes: quality assured procedures and method of recording the results
- Level 2 compliance testing of wastes: quality assured procedures and method of recording the results
- Level 3 On-site Verification of wastes: quality assured procedures and method of recording the results
- Sampling plan, including quality assured methods and procedures for sampling and testing of wastes and method of recording the results
- Method for checking that the waste has been treated before delivery to the installation and recording the results
- Method for ensuring that waste is stored and handled properly prior to final deposit
- Method for ensuring that wastes that have been rejected during the acceptance procedures are removed from the installation within 24 hours of the quarantine container becoming full, and in any event within 5 days of receipt at the installation
- Method for ensuring that the Agency is notified as soon as reasonably possible if a waste delivery is rejected

Document reference of waste acceptance procedures

See Folder 1 Supporting Information EMS

↑
not included

B2.2 Emissions control and abatement

All landfills will require sufficient monitoring to be carried out to check

- *that the processes within the landfill proceed as desired;*
- *that environmental protection systems are functioning fully as intended; and*
- *that the conditions of the permit are fulfilled.*

To successfully complete this part of the application, you will need to have prepared an environmental monitoring plan for your installation. Your environmental monitoring plan must be developed from the conceptual model of the installation and will be refined as knowledge of the hydrogeological and environmental setting of the installation increases.

Main technical guidance

The following current technical and regulatory guidance should be consulted:

- **Monitoring of landfill leachate, surface water and groundwater on page 128**
- **Guidance for the management of landfill gas on page 128**
- **Hydrogeological risk assessment for landfills and the derivation of groundwater trigger levels on page 128**
- **LFD Regulatory guidance note 1: Classification of sites on page 128**
- **LFD Regulatory guidance note 3: Groundwater protection: locational aspects of landfills in planning consultation responses & permitting decisions after 16 July 2001 on page 128**
- **LFD Regulatory guidance note 6: Interpretation of the engineering requirements of Annex 1 of the Landfill Directive on page 128**
- **Guidance for monitoring landfill gas surface emissions on page 128**
- **Guidance for monitoring landfill gas engine emissions on page 128**
- **Guidance for monitoring enclosed landfill gas flares on page 128**
- **Technical guidance document (monitoring) M17: Monitoring of particulate matter in ambient air around waste facilities on page 128**
- **Guidance on landfill gas flaring on page 128**
- **LFD Regulatory guidance note 11: The disposal in landfills for non-hazardous waste of: stable, non-reactive wastes; asbestos wastes; wastes with high sulphate or gypsum contents on page 128**
- *Internal guidance for the regulation of noise at waste management facilities*
- *Internal guidance for the regulation of odour at waste management facilities*

Landfill containment engineering

Engineered control systems include both the basal areas and side slopes of the landfill void and the capping and restoration of the final waste profiles.

Use this section to

- *describe the containment engineering for each area of the landfill and to*
- *demonstrate that the containment engineering and leachate management and collection systems you provide will ensure compliance with the Groundwater Regulations and Landfill Regulations 2002.*

The specifications in this section should have been generated during the risk assessment process (hydrogeological, landfill gas, stability etc.). Provide specifications for

- *the base of all pre-operational areas*
- *side slopes for all pre-operational and*
- *capping for all areas as yet capped.*

You may have already provided as-built drawings for constructed areas as part of the conceptual model.

Provide plans and schematic cross-sections through the containment engineering to illustrate the specifications in each area, including any differences between basal areas and side slopes; you may refer to plans prepared for the risk assessments.

Landfill containment engineering

If you intend to use the same engineering design for all subsequent cells/areas then you only need to complete this section of the form once. However, within a cell/area, you will need to repeat the section if the containment engineering is different for base, sides and/or cap.

If you envisage the design changing (due to site geology etc.) then you must repeat this section of the form for each cell/area.

Provide references to the appropriate risk assessment and section/page number or drawing which provides justification for each critical specification

B2.2.1 Will the same engineering design be used for all cells?

- ☒ Same engineering design for all subsequent cells
☐ Engineering design will change

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Name of cell this description applies to

Cell 5

B2.2.2 What part of the containment engineering does this specification apply to?

Select all that apply

- ☒ Basal engineering
☐ Side slope engineering
☒ Cap

B2.2.3 Give details of the sub-grade

Material

SRA Report Sections 1.2.1 & 1.2.2

Strength

SRA Report Table SRA7

Other relevant/critical design parameters

SRA Report Table SRA7

Reference of the appropriate risk assessment and section/page number or drawing which provides justification for each critical specification

ESID Report Section 2

B2.2.4 Is there a natural geological barrier?

- ☐ No
☒ Yes

Material

insitu glacial till (boulder clay)

Minimum thickness (m)

0-1m

Reference of the appropriate risk assessment and section/page number or drawing which provides justification for each critical specification

ESID Report Section 2.2.2

B2.2.5 Is there an artificially established mineral barrier?

This is required where the natural geological barrier does not provide sufficient attenuation capacity

☐ No

Reference of the appropriate risk assessment and section/page number or drawing which provides justification for each critical specification

☒ Yes

B2.2.6 What materials are used?

Add a section for each material used

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Name of material

Engineered Clay (Cells 1-5)

Minimum thickness (mm)

500 (Cell 5)

Maximum hydraulic conductivity (m/s)

1 x 10⁻⁹

Range of consistency limits (%)

As detailed in Appendix HRA2

Minimum shear strength (kN/m²)(specify drained or undrained)

>50 (undrained)

Attenuation capacity (e.g., CEC, foc, K_D)

As detailed in Appendix HRA2

Other relevant/critical design parameters

As detailed in Appendix HRA2

Relevant design document

ESID Report Section 2.2.2

Relevant drawing including cross-section

Drawing No. ESID6

▲ End of the repeatable answer fields.

B2.2.7 Is there an artificial sealing liner?

☐ No

☒ Yes

B2.2.8 What materials are used?

Select all that apply

- ☒ Flexible membrane liner (e.g., HDPE, VLDPE etc.)

Description (type of FML to be used)

HDPE

Design life (years)

As detailed in Appendix HRA2

Minimum thickness (mm)

2

Confirm that installers are third-party accredited for welding & installation

Yes

Will a geophysical survey be carried out post-installation?

Yes

Relevant design document

ESID Report Section 2.2.2 (Basal) & 2.2.4 (Cap)

Relevant drawing including cross-section

Drawing No. ESID6

- ☐ Dense asphaltic concrete

Minimum thickness (mm)

Maximum hydraulic conductivity (m/s)

Strength

Materials

Mix composition (bitumen type & grade, aggregate and filler properties)

Thermal stability

Physical stability (flow resistance)

Chemical resistance (of bitumen, filler & aggregate)

Longevity

Maximum acceptable deformation (differential settlements)

Compatibility with adjacent materials

Relevant design document

Relevant drawing including cross-section

☐ Compacted clay liner

Minimum thickness (mm)

Maximum hydraulic conductivity (m/s)

Range of consistency limits (%)

Minimum shear strength (specify drained or undrained) kN/m²

Attenuation capacity (e.g. CEC, foc, K_D)

Other relevant/critical design parameters

Relevant design document

Relevant drawing including cross-section

☒ Geosynthetic clay liner (GCL)

Maximum hydraulic conductivity (m/s)

5 x 10⁻¹¹

Minimum thickness (unhydrated, mm)

6

Minimum index flux (m³/m²/s)

approx. 5 x 10⁻⁹

Internal shear strength (kN/m² and factor of safety)

c'=0, Phi'=16

Minimum montmorillonite content (mg/g)

> 70%

Other relevant/critical design parameters

As detailed in Appendix HRA2

Relevant design document

ESID Report Section 2

Relevant drawing including cross-section

Drawing No. ESID6

☐ Bentonite enhanced sand (BES)

Maximum hydraulic conductivity (m/s)

Minimum thickness (mm)

Minimum montmorillonite content of bentonite (mg/g)

Range of consistency limits (%)

Minimum shear strength (specify drained or undrained) (kN/m²)

Attenuation capacity (e.g. CEC, foc, K_D)

Other relevant/critical design parameters

Relevant design document

Relevant drawing including cross-section

B2.2.9 Provide details of the leachate collection layer

This is required where there is an artificial sealing liner

Basal gradients

Material used & grading if appropriate

Minimum thickness (mm)

Maximum hydraulic conductivity (m/s)

Minimum strength (kN/m²)

Chemical compatibility

Leachate collection extraction pipework and wells

B2.2.10 Provide details of the leachate collection pipework

This is required where there is a leachate collection layer

Pipework layout & spacing

ESID Report Section 2.3.2

Minimum pipework strength

ESID Report Section 2.3.2

Perforation layout

ESID Report Section 2.3.2

Bedding material & thickness

ESID Report Section 2.3.2

Will a maintenance schedule be provided?

Yes

Relevant design document

ESID Report Section 2.3.2

Relevant drawing including cross-section

Drawing No. ESID7A

B2.2.11 Provide details of the leachate extraction wells

Type & location of well. *It may be sufficient to reference the drawings named in Section 1*

Drawing No. ESID7A

Will you retrodrill, and if so, when?

Yes, in the unlikely event of failure

Type & design of foundation

Will be agreed with Agency at time

Pipework material

HDPE

Minimum pipework diameter

590 OD

Minimum pipework strength

ESID Report Section 2.3.2

Pipework surround material

Drawing No. ESID7A

Relevant design document

ESID Report Section 2.3.2

Relevant drawing including cross-section

Drawing No. ESID7A

B2.2.12 Is there a surface water drainage layer?

☐ No

Provide the justification and reference to the relevant section/page number of the risk assessment

☒ Yes

Give specifications

ESID Report Section 2.2.4

Relevant design document

ESID Report Section 2.2.4

Relevant drawing including cross-section

Drawing No. ESID6

B2.2.13 Is there a groundwater management system?

Applies if **Hazardous landfill** on page 15 is ticked Applies if **Non-hazardous landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes)** on page 15 is ticked Applies if **an existing inert landfill?** on page 15 is ticked

☐ No

Provide the justification and reference to the relevant section/page number of the risk assessment

☒ Yes

Give specifications

ESID Report Section 2.2.1

Relevant design document

ESID Report Section 2.2.1

Relevant drawing including cross-section

Drawing No. ESID6

B2.2.14 Is there a leakage detection system?

Applies if **Hazardous landfill** on page 15 is ticked Applies if **Non-hazardous landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes)** on page 15 is ticked Applies if **an existing inert landfill?** on page 15 is ticked

☒ No

Provide the justification and reference to the relevant section/page number of the risk assessment

HRA Report Section 2.5.6

☐ Yes

Give specifications

Relevant design document

Relevant drawing including cross-section

B2.2.15 Is there leachate storage and treatment?

Applies if **Hazardous landfill** on page 15 is ticked Applies if **Non-hazardous landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes)** on page 15 is ticked Applies if **an existing inert landfill?** on page 15 is ticked

☐ No

Provide the justification and reference to the relevant section/page number of the risk assessment

☒ Yes

Give specifications

Leachate Storage - ESID Report Section 2.3.2

Relevant design document

ESID Report Section 2.3.2

Relevant drawing including cross-section

Drawing No. ESID7A

▲ End of the repeatable answer fields.

Leachate management and monitoring

Applies if **Hazardous landfill** on page 15 is ticked Applies if **Non-hazardous landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes)** on page 15 is ticked Applies if **an existing inert landfill?** on page 15 is ticked

Leachate is defined by the Landfill Regulations 2002 as any liquid percolating through the deposited waste and emitted from or contained within a landfill. Leachate composition is dependant on the waste types accepted and the age of the waste and thus landfills for hazardous waste will produce different leachate to landfills for non-hazardous waste. This section of the form should be completed with reference to your hydrogeological risk assessment.

All emissions to surface water require consent to discharge from the Agency which may be incorporated into the PPC permit

Where leachate is treated by pumping to an off-site sewage treatment works, a trade effluent consent or agreement is required from the water utility company.

Leachate management

B2.2.16 Are documented systems, procedures and work instructions in place for leachate management for your landfill that include the following:

water balance calculations for each cell and the overall installation?

☐ No

Justification and/or date when they will be in place – which must be prior to the acceptance of any waste under the permit

☒ Yes

B | Regulatory specification (techniques) | Emissions control and abatement

extraction and collection?

☐ No

Justification and/or date when they will be in place – which must be prior to the acceptance of any waste under the permit

☒ Yes

details of leachate treatment methods?

☐ No

Justification and/or date when they will be in place – which must be prior to the acceptance of any waste under the permit

☒ Yes

details of leachate disposal and discharge methods and routes?

☐ No

Justification and/or date when they will be in place – which must be prior to the acceptance of any waste under the permit

☒ Yes

temporary leachate management systems?

☐ No

Justification and/or date when they will be in place – which must be prior to the acceptance of any waste under the permit

☒ Yes

details of system monitoring (including telemetry), during pre-operational, operational, closure and after care phases (volume, meteorological conditions and quality)?

☐ No

Justification and/or date when they will be in place – which must be prior to the acceptance of any waste under the permit

☒ Yes

details of control strategies, including phasing of operations and re-circulation?

☐ No

Justification and/or date when they will be in place – which must be prior to the acceptance of any waste under the permit

☒ Yes

operation, appropriate inspection and maintenance procedures?

☐ No

Justification and/or date when they will be in place – which must be prior to the acceptance of any waste under the permit

☒ Yes

Dissolved gas content control?

☐ No

Justification and/or date when they will be in place – which must be prior to the acceptance of any waste under the permit

☒ Yes

B2.2.17 Do these documented systems, procedures and work instructions ensure that the leachate collection, treatment and disposal system will have sufficient capacity to handle the maximum predicted rate of leachate generation for the installation, and maintain leachate levels in each separately engineered cell below those specified in the leachate monitoring programme from the date that waste is accepted under the permit?

☐ No

Justification and/or date when they will be in place – which must be prior to the acceptance of any waste under the permit

☒ Yes

Leachate treatment techniques

Use this section to describe any leachate treatment techniques and performance parameters. If or when the leachate is disposed of off site, specify where it will go to.

B2.2.18 Is leachate treated

☐ on-site

☒ off-site

Leachate treatment on-site

Applies if on-site on page 39 is ticked

B2.2.19 Which of the following applies to the leachate treatment plant at your installation?

Select all that apply

☐ Disposal of hazardous waste

☐ in a facility with a capacity of less than 10 tonnes per day

☐ in a facility with a capacity of more than 10 tonnes per day. *This is above the threshold and you must complete a separate Part B for your leachate treatment activities. You should skip the following questions and go to Leachate monitoring on page 42*

☐ Disposal of non-hazardous waste

☐ in a facility with a capacity of less than 50 tonnes per day

☐ in a facility with a capacity of more than 50 tonnes per day *This is above the threshold and you must complete a separate Part B for your leachate treatment activities. You should skip the following questions and go to Leachate monitoring on page 42*

Primary treatment

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

B2.2.20 Type of plant

Name or description of plant

B2.2.21 Performance parameters

Average daily flow (m³/d)

Peak hourly maximum (m³/h)

Will you monitor turbidity/suspended solids on-line

Suspended solids (mg/l) on screen effluent

Suspended solids (mg/l)

Other performance parameters

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

▲ End of the repeatable answer fields.

▲ End of the repeatable answer fields.

Name of parameter

N/A

Measure and units

N/A

Secondary treatment

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

B2.2.22 Type of plant

Name or description of plant

N/A

B2.2.23 Performance parameters

Influent BOD/COD (mg/l)

N/A

Effluent BOD/COD (mg/l)

N/A

Mixed liquor suspended solids (mg/l)

N/A

Metals (mg/l)

N/A

Percent dry solids in influent and effluent

N/A

Other performance parameters

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

▲ End of the repeatable answer fields.

▲ End of the repeatable answer fields.

Name of parameter

N/A

Measure and units

N/A

Tertiary treatment

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

B2.2.24 Type of plant

Name or description of plant

N/A

B2.2.25 Performance parameters

Suspended solids (mg/l)

N/A

Turbidity

N/A

Conductivity

N/A

Transmissivity (for UV)

N/A

Coliform count

N/A

Pathogenic analysis

N/A

Other performance parameters

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

▲ End of the repeatable answer fields.

▲ End of the repeatable answer fields.

Name of parameter

N/A

Measure and units

N/A

B2.2.26 Can any of the stages be bypassed?

- ☐ No
☐ Yes

How often does it happen?

N/A

What steps are taken to reduce emissions

N/A

Leachate treatment off-siteApplies if **off-site** on page 39 is ticked

How leachate is treated is the operator's commercial decision and the operator must ensure that the treatment option chosen demonstrates appropriate preventative measures are taken against pollution, whether it is treated on site or a third party is paid to treat it on their behalf. Note also that dilution is not a factor that can be claimed as a contribution to minimising pollution.

B2.2.27 Provide details of the treatment provided at the sewage treatment works or similar off-site merchant treatment facility

The treatment at the sewage works must be equivalent to that achieved if the leachate were treated on-site, based on reduction of load (not just concentration) of each substance to the receiving water. Justify where it will not: in general this can be answered generically e.g. if the indicative BAT would be settlement followed by aerobic treatment and the STW has both these steps (noting that a sewage treatment works will normally have a greater retention time than an on site plant) it can be concluded that the sewage treatment works is potentially at least as good as a dedicated plant. You may need to discuss these issues with your treatment provider.

Document reference

See attached Folder 1 Supporting Info QB2.2.27

B2.2.28 Provide details of sewage treatment plant bypass and protection:

The probability of sewer bypass, via storm/emergency overflows or at intermediate sewage pumping stations must be acceptably low (you may need to discuss this with your sewerage operator)

% of the time the sewage treatment works is bypassed

See attached Folder 1 Supporting Info QB2.2.28

An estimate of the increased annual load of metals and persistent substances which will result from bypassing

See attached Folder 1 Supporting Info QB2.2.28

Summarise the action plans in the event of bypass, such as knowing when bypass is occurring, or even shutting down. Justify if there is no action taken

See attached Folder 1 Supporting Info QB2.2.28

What events could cause a release which could adversely effect the sewage treatment works and what actions (e.g. holding tanks, monitoring, batch release etc.) are taken to prevent this.

See attached Folder 1 Supporting Info QB2.2.28

Leachate monitoring

This section of your regulatory specification must be justified by the hydrogeological risk assessment you provided in Section 1

*The Agency has published **Monitoring of landfill leachate, surface water and groundwater** on page 128 to which applicants should refer for guidance on best practice, and for assessment criteria and compliance limits.*

The risk assessments (hydrogeological, stability, landfill gas) described in section 1 will have determined the leachate levels and quality necessary to ensure protection of the environment. Leachate quality monitoring is required to check that processes within the landfill are proceeding as expected (e.g. waste degradation).

Leachate level monitoring is necessary to ensure that leachate collection systems are performing as designed, and to confirm that the containment engineering will protect the environment.

***Assessment criteria** are used to determine whether an installation is performing as designed and are intended to draw the attention of installation management and the Agency to the development of adverse trends in the monitoring data (e.g. leachate levels). If breached, they indicate that the installation may not be performing as predicted. They should be regarded, therefore, as an early warning system to enable appropriate investigation or corrective measures to be implemented, rather than as an indication that pollution has occurred.*

***Compliance limits** are regulatory values and a breach of these limits is expected to give rise to pollution. The compliance limits will be laid down in your permit.*

***Contingency action plans** must specify the action to be taken in the event that assessment criteria and/or compliance limits are exceeded; these actions will include notification of the Agency.*

B2.2.29 Are leachate monitoring procedures (for quality and levels as appropriate) in place to ensure that assessment criteria and compliance limits are not exceeded?

☐ No

Date by which they will in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

Reference of procedures

B2.2.30 Are contingency action plans in place in case assessment criteria and/or compliance limits are exceeded?

☐ No

For more information on contingency action plans, refer to "Guidance on monitoring of landfill leachate, groundwater & surface water" (Environment Agency, 2003).

Date by which they will in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Reference of contingency action plans

See Folder 1 Supporting Information, EMS

B2.2.31 Leachate level monitoring

This question can be used for multiple monitoring locations if appropriate.

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Cell or phase number

HRA Report Tables HRA7A & 8

Leachate level compliance point (e.g. LM1) *This should be remote from the leachate abstraction sump*

HRA Report Tables HRA7A & 8

Control level (e.g. 0.5 metre above liner or 74m AOD)

HRA Report Tables HRA7A & 8

Compliance limit (e.g. 1 metre above liner or 74.5m AOD)

HRA Report Tables HRA7A & 8

Frequency of monitoring

HRA Report Tables HRA7A & 8

Relevant section & page number of hydrogeological risk assessment and any comments

HRA Section 3.2

▲ End of the repeatable answer fields.

B2.2.32 Leachate quality monitoring

This question can be used for multiple sampling locations if appropriate.

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Cell or phase number

HRA Report Tables HRA7A & 8

Leachate sampling point (e.g. LSP1)

HRA Report Tables HRA7A & 8

Leachate monitoring determinands* (e.g. ammonium, chloride, Mecoprop) *Note that you will not need to determine assessment criteria and compliance limits for every contaminant at your installation.*

HRA Report Tables HRA7A & 8

Assessment criteria (e.g. ammonium = 400 mg/l), detection limit and accuracy

HRA Report Tables HRA7A & 8

Compliance limit (e.g. ammonium = 800 mg/l) detection limit and accuracy

HRA Report Tables HRA7A & 8

Frequency of monitoring

HRA Report Tables HRA7A & 8

Relevant section & page number of hydrogeological risk assessment and any comments

HRA Report Section 3.2

▲ End of the repeatable answer fields.

Surface water management and monitoring

Surface water management plan

B2.2.33 Are documented systems, procedures and work instructions in place for surface water management at your installation which include the following:

the designs and CQA plan?

☐ No

Justification and/or date by which they will in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

precipitation and flood risk calculations?

☐ No

Justification and/or date by which they will in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

details of engineered drainage systems including quarantine areas?

☐ No

Justification and/or date by which they will in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

B | Regulatory specification (techniques) | Emissions control and abatement

connection pipework configurations and alignments?

☐ No

Justification and/or date by which they will in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

details of the mechanical control systems (e.g. weirs, penstocks)?

☐ No

Justification and/or date by which they will in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

details of collected surface water treatment methods?

☐ No

Justification and/or date by which they will in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

details of system monitoring, during pre-operational, operational, closure and after care phases (volume, meteorological conditions and quality)?

☐ No

Justification and/or date by which they will in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

details of control strategies, including phasing of operations?

☐ No

Justification and/or date by which they will in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

operation, inspection and maintenance procedures?

☐ No

Justification and/or date by which they will in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

B2.2.34 Does the surface water management plan ensure that the surface water collection, drainage and discharge system will have sufficient capacity to handle the maximum predicted rate of rainfall for the installation from the date that waste is accepted under the permit?

☐ No

Justification and/or date by which they will in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

Discharges direct to controlled waters

Under the Water Resources Act 1991 (as amended) you need permission from the Environment Agency if you want to discharge effluent to

- rivers and streams
- estuaries or coastal water
- groundwaters
- land

B2.2.35 Do you need to apply for permission (a Consent) to discharge effluent?

- ☒ No
☐ Yes

Submit your completed Section E 'Discharges of Trade Effluent' of Environment Agency form WQP1 'Consent to Discharge' and provide the document reference

Surface water monitoring

This section of your regulatory specification must be supported by the hydrogeological and other risk assessments.

The Agency has published "Guidance on the monitoring of landfill leachate, groundwater and surface water for the Landfill Directive" (Environment Agency, 2002) which applicants should refer to for best practice.

B2.2.36 Is surface water monitoring being provided for your landfill?

- ☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

- ☒ Yes

Give brief description of means and reference of monitoring plan

HRA Report Section 3.2 & Table HRA7C

Surface water monitoring plan

B2.2.37 Is a surface water monitoring plan in place for the installation which provides the following information?

surface water monitoring locations and schedules?

- ☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

- ☒ Yes

monitoring schedules which specify:

- the surface quality determinands to be monitored?
- the assessment criteria?
- the surface water flows to be measured?
- the frequency of sampling?
- the units, accuracy and detection limits for each determinand?

- ☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

- ☒ Yes

monitoring and sampling of surface water is carried out under quality controlled procedures in the field and the laboratory?

- ☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

- ☒ Yes

a contingency action plan, including possible corrective measures, if the relevant assessment criteria are exceeded?

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be before the date waste can be accepted under the permit

☒ Yes

the recording and secure keeping of surface water monitoring and sampling data and results

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

the periodic submission (at least annually) of an interpretative report of surface water monitoring results

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

Surface water monitoring points

This section can be used for multiple sampling locations if appropriate, and should be reproduced for each location where the criteria are different.

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

B2.2.38 Surface water monitoring point(s)

Name of monitoring point (e.g. SW 1, 2)

HRA Report Table HRA7C

Surface water monitoring determinands. Note that you will not need to determine assessment criteria and compliance limits for every contaminant at your installation.

HRA Report Table HRA7C

Assessment criteria (e.g. ammonium = 0.25 mg/l), detection limit and accuracy

HRA Report Table HRA7C

Frequency of monitoring

HRA Report Table HRA7C

Relevant section & page number of hydrogeological risk assessment and any comments

HRA Report Section 3.2 & Table HRA7C

▲ End of the repeatable answer fields.

Groundwater management and monitoring

*This section of your regulatory specification must be justified by the hydrogeological risk assessment you describe in your answers to Section 1. See **Hydrogeological risk assessment for landfills and the derivation of groundwater trigger levels on page 128 and Monitoring of landfill leachate, surface water and groundwater on page 128.***

Groundwater monitoring and level management

B2.2.39 Is groundwater monitoring being provided for your landfill?

☐ No

Date by which it will be in place which must be prior to the acceptance of waste under the permit

☒ Yes

Give brief description of means (e.g. groundwater monitoring boreholes, geophysical methods) and reference of groundwater monitoring plan.

HRA Report Section 3.2 & Table HRA7B

B2.2.40 Is management of groundwater levels being provided for your landfill?

Applies if **Hazardous** landfill on page 15 is ticked Applies if **Non-hazardous** landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes) on page 15 is ticked Applies if an existing inert landfill? on page 15 is ticked

☒ No

☐ Yes

Give brief description of means, and reference to groundwater management plan.

Groundwater monitoring plan

B2.2.41 Is a groundwater monitoring plan in place for the installation which provides the following information?

monitoring locations

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

monitoring schedules which specify:

- the groundwater quality determinands to be monitored
- the groundwater control and trigger levels
- the groundwater levels to be measured
- the frequency of sampling
- the units, accuracy and detection limits for each determinand

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

quality controlled procedures in the field and the laboratory for monitoring and sampling groundwater

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

B | Regulatory specification (techniques) | Emissions control and abatement

vertical cross-section(s) showing constructional details and depth(s) of each groundwater monitoring point

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

borehole logs from the construction of the monitoring boreholes (note: you can include them in the hydrogeological risk assessment report instead).

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

a contingency action plan, including possible corrective measures, if the relevant control and/or trigger levels are exceeded

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

recording and secure keeping of groundwater monitoring and sampling data and results

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

periodic submission (at least annually) of an interpretative report of groundwater monitoring results

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be prior to the acceptance of waste under the permit

☒ Yes

Groundwater monitoring

The following section should be used to summarise your groundwater monitoring programme, and identify the groundwater control and trigger levels that were derived in your hydrogeological risk assessment (Section 1).

It can be used for multiple sampling locations if appropriate, and should be repeated for each location where the criteria are different.

B2.2.42 Groundwater monitoring point(s)

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Name of monitoring point (e.g. BH 1, 2)

HRA Report Tables HRA7B & 9

Groundwater monitoring determinands (e.g. ammonium, chloride, mecoprop) You will not need to determine assessment criteria and compliance limits for every contaminant at your installation.

HRA Report Tables HRA7B & 9

Control level (e.g. ammonium = 0.25 mg/l), detection limit and accuracy

HRA Report Tables HRA7B & 9

Trigger level (e.g. ammonium = 0.5 mg/l) detection limit and accuracy

HRA Report Tables HRA7B & 9

Frequency of monitoring

HRA Report Tables HRA7B & 9

Relevant section & page number of hydrogeological risk assessment and any comments

HRA Report Section 3.2

▲ End of the repeatable answer fields.

Landfill gas management and monitoring

To successfully answer the questions under this section, you will need to have prepared a landfill gas generation assessment and a landfill gas risk assessment for your installation, and provided them in support of your answers to 'Landfill gas generation and risk assessment' in Section 1.2.

*Please refer to the Agency's **Guidance for the management of landfill gas** on page 128 before completing this section. Other specific guidance issued by the Agency, is also referred to in this section.*

Applies if **Hazardous landfill** on page 15 is ticked Applies if **Non-hazardous landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes)** on page 15 is ticked Applies if an **existing inert landfill?** on page 15 is ticked

B2.2.43 Is there a need to collect landfill gas?

☐ No need to collect landfill gas

Provide the justification and reference to the relevant section/page number of the landfill gas risk assessment

☒ Yes, there is a need to collect landfill gas

Section/page number of landfill gas risk assessment

LFGRA Report Section 1.2.1

B2.2.44 Which of the following technical measures are required?

☒ Enclosed landfill gas flaring

Reference of the appropriate risk assessment and section/page number and any comments

LFGRA Report Section 2.4.2

☒ Landfill gas utilisation

Reference of the appropriate risk assessment and section/page number and any comments

LFGRA Report Section 2.4.2

B2.2.45 Are the gas engines a listed activity?

☐ No

☒ Yes you must submit a generic Part B form (or sector specific form when available) for the gas engines.

The gas engine is subject to a separate PPC application by UUGE Environmental

Landfill gas collection

Applies if Yes, there is a need to collect landfill gas on page 50 is ticked

Landfill gas management plan

B2.2.46 Is a documented landfill gas management plan in place for the installation that includes the following?

Gas production for installation life

Gas production calculations and assumptions.

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Phased development Plans for gas collection, treatment and utilisation (including extraction from operational cells, capping etc.).

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Collection efficiency calculations and assumptions, throughout life of installation.

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

System capacity of utilisation and flaring plant (to ensure that sufficient capacity exists to handle maximum predicted gas generation).

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Gas system design and specification

Gas pre-treatment (if applicable).

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

B | Regulatory specification (techniques) | Emissions control and abatement

Gas extraction wells.	☐ No	Justification and/or date by which it will be in place meeting the relevant standard which must be within 12 months of the issue of the permit
	☒ Yes	
Connection pipe-work and configuration.	☐ No	Justification and/or date by which it will be in place meeting the relevant standard which must be within 12 months of the issue of the permit
	☒ Yes	
Facilities for condensate removal.	☐ No	Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit
	☒ Yes	
Control systems (e.g. valves, telemetry, alarm systems, interlock)	☐ No	Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit
	☒ Yes	
Enclosed gas flares, e.g. design specification: to include design capacity, turndown range, method of combustion control, proposed minimum retention time (s ⁻¹) and minimum temperature (°C); function: to include capacity (%) of utilisation system if flare function is to back up the utilisation system, excess gas combustion	☐ No	Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit
	☒ Yes	
Utilisation plant, e.g. specification, gas flow rate	☐ No	Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit
	☒ Yes	
Temporary and emergency provisions.	☐ No	Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit
	☒ Yes	

Construction quality assurance

Roles and responsibilities.	☐ No	Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit
	☒ Yes	

B | Regulatory specification (techniques) | Emissions control and abatement

Quality assurance principles.

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

As built documentation.

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Validation report

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Operational techniques

Management responsibilities (e.g. utilisation plant)

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Routine operational procedures for extraction and collection (e.g. balancing of system)

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Start up and shut down procedures for flare and utilisation plant

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Measures to collect and control landfill gas where there is insufficient methane to support combustion

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Management of odour and lateral migration while maintaining utilisation, e.g. separate systems

Applies if Yes, there is a need to collect landfill gas on page 50 is ticked

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

B | Regulatory specification (techniques) | Emissions control and abatement

Measures additional to collection and flaring or utilisation, e.g. methane oxidation, gas barriers

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Engine by-pass procedures following mechanical failure or non-routine situation.

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Emergency control features for flares (for example, flame arrestors)

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Maintenance

Inspection programme.

☐ No

Justification and/or date by which it will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Planned and unplanned maintenance procedures.

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Landfill gas monitoring

Landfill gas monitoring must be provided at the installation. The Agency has produced guidance, listed in the references section of this form, to which applicants should refer for guidance on best practice.

The following provides the regulatory specification for your landfill gas monitoring programme which must be justified by the landfill gas risk assessment you describe in your answers to section 1.2. You should use this section to demonstrate that documented systems, procedures and work instructions will be in place for all cells or areas generating landfill gas.

Landfill gas monitoring plan

B2.2.47 Are documented systems, procedures and work instructions for landfill gas monitoring in place for the installation, that include the following:

Design and construction of gas monitoring installations

including, as appropriate

- *In-waste boreholes and wells.*
- *Perimeter boreholes.*
- *Location of monitoring installations*
- *Location of all in-waste, gas monitoring installations and perimeter boreholes*

☐ No

Justification and/or date by which the system will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Construction quality assurance

- *Roles and responsibilities.*
- *Quality assurance principles.*
- *As built documentation.*
- *Validation report.*

☐ No

Justification and/or date by which the system will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Monitoring measurements and schedules

including, as appropriate

- *Installation reference (In-waste, perimeter, gas flares, utilisation plants)*
- *Monitoring frequency*
- *Parameters (including trace components of landfill gas)*

☐ No

Justification and/or date by which the system will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Monitoring techniques

including, as appropriate

- *In-waste and perimeter boreholes.*
- *Gas flares*
- *Utilisation plants*
- *Surface emissions*
- *Aerial emissions*
- *Off-site monitoring in the event of migration*

☐ No

Justification and/or date by which the system will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Compliance limits and action plan

- *Control and trigger levels.*
- *Procedures to be followed when levels of emissions exceed control and trigger levels*

☐ No

Justification and/or date by which the system will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Data management and reporting procedures

- *Methods of recording and maintaining monitoring data.*
- *Reporting routine data to the Environment Agency*
- *Annual reporting of monitoring data*
- *Reporting in the event of a trigger event*
- *Records of complaints*
- *Inspection and maintenance records*

☐ No

Justification and/or date by which the system will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Do the documented systems, procedures and work instructions for landfill gas monitoring ensure that:

Applies if **Hazardous landfill** on page 15 is ticked Applies if **Non-hazardous landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes)** on page 15 is ticked Applies if **an existing inert landfill?** on page 15 is ticked

- *gas quality and quantity from each section of installation be identified and controlled*
- *perimeter monitoring is adequate to cover the pathways of migration to identified off-site receptors*
- *high permeability sections of the cap can be located*
- *leaks in the gas collection system will be identified*
- *volume of landfill gas sent to utilisation/disposal system*
- *ingress of air into installation can be detected and located*
- *sufficient balancing of the landfill gas collection system will be undertaken*
- *performance of boreholes will be maintained to design specification*
- *the concentration and composition of the trace gas components will be measured so that appropriate management can be undertaken*
- *the monitoring from flares and utilisation plant sufficient to determine the quality and quantity of emissions*

☐ No

Justification and/or date by which the system will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

In-waste landfill gas monitoring

B2.2.48 Is routine monitoring to be undertaken for:

Methane

☐ No

Provide justification

☒ Yes

B | Regulatory specification (techniques) | Emissions control and abatement

Carbon dioxide

☐ No

Provide justification

☒ Yes

Hydrogen

☐ No

Provide justification

☒ Yes

Hydrogen sulphate

☐ No

Provide justification

☒ Yes

Oxygen

☐ No

Provide justification

☒ Yes

Provide proposed control level / trigger level

Temperature

☒ No

Provide justification

LFGRA Section 3.3.1

☐ Yes

Provide proposed control level / trigger level

Carbon monoxide

☒ No

Provide justification

LFGRA Section 3.3.1

☐ Yes

Provide proposed control level / trigger level

Trace components

B2.2.49 Is monitoring being undertaken for trace component compounds in accordance with the Agency's Guidance for monitoring trace components in landfill gas on page 128?

Applies if Hazardous landfill on page 15 is ticked Applies if Non-hazardous landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes) on page 15 is ticked Applies if an existing inert landfill? on page 15 is ticked

See Agency document "Guidance for monitoring trace compounds in landfill gas"

☒ No

Provide justification

LFGRA Report Section 3.1.1

☐ Yes

Monitoring flare emissions

B2.2.50 Is flare emissions monitoring being undertaken in accordance with the Agency's Guidance on landfill gas flaring on page 128?

☒ No

Provide justification

LFGRA Section 3.3.5

☐ Yes

Monitoring utilisation system emissions

Applies if Yes, there is a need to collect landfill gas on page 50 is ticked

B2.2.51 Is landfill gas engine emissions monitoring being undertaken in accordance with the Agency's Guidance for monitoring landfill gas engine emissions on page 128?

☒ No

Provide justification

Not applicable - engine subject to separate PPC application

☐ Yes

Perimeter landfill gas monitoring – sub-surface emissions

Applies if **Hazardous** landfill on page 15 is ticked Applies if **Non-hazardous** landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes) on page 15 is ticked Applies if an existing inert landfill? on page 15 is ticked

B2.2.52 Is perimeter landfill gas monitoring being undertaken in accordance with the Agency's Guidance for the management of landfill gas on page 128?

☒ No

Provide justification

LFGRA Section 3.3.2

☐ Yes

Landfill gas monitoring – surface emissions

Applies if **Hazardous** landfill on page 15 is ticked Applies if **Non-hazardous** landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes) on page 15 is ticked Applies if an existing inert landfill? on page 15 is ticked

B2.2.53 Is surface monitoring being undertaken in accordance with the Agency's Guidance for monitoring landfill gas surface emissions on page 128?

☒ No

Provide justification

LFGRA Report Section 3.3.1

☐ Yes

Perimeter and receptor landfill gas monitoring – aerial emissions

Applies if an existing **hazardous** landfill? on page 15 is ticked Applies if an existing **non-hazardous** landfill? on page 15 is ticked Applies if an existing **inert** landfill? on page 15 is ticked

In some cases it will be appropriate to extend monitoring of potential installation impacts to sensitive receptors, where there is particular concern with the air quality impacts of the installation.

B2.2.54 Are there reasons for undertaking new boundary/receptor monitoring based on the following

complaints received

☒ No

Provide the justification and reference to the relevant section/page number of risk assessment

LFGRA Section 2.5.3

☐ Yes

Reference to relevant section/page number of the risk assessment

proximity of sensitive receptors

☒ No

Provide the justification and reference to the relevant section/page number of risk assessment

LFGRA Section 2.5.3

☐ Yes

Reference to relevant section/page number of the risk assessment

risk of exceeding recognised air-quality standards

☒ No

Provide the justification and reference to the relevant section/page number of risk assessment

LFGRA Section 2.5.3

☐ Yes

Reference to relevant section/page number of the risk assessment

B2.2.55 Do you have existing monitoring of aerial emissions in boundary/receptor situations?

☒ No

Provide the justification and reference to the relevant section/page number of risk assessment

Will be undertaken in response to complaints or part of action plan

☐ Yes

What do the results indicate?

B2.2.56 Do you intend to undertake boundary/receptor monitoring?

Applies if **Hazardous landfill** on page 15 is ticked Applies if **Non-hazardous landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes)** on page 15 is ticked Applies if an existing inert landfill? on page 15 is ticked

☒ No

Provide the justification and reference to the relevant section/page number of risk assessment

LFGRA Section 3.3.3 & 3.3.4

☐ Yes

compounds to be monitored

number and location of monitoring stations

frequency and duration of monitoring

control and action levels

Data management and recording

Methods of maintaining system records.

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Gas composition and volume records

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Inspection and maintenance records

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Monitoring records including those received by telemetry

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Landfill gas monitoring action plan

B2.2.57 Do you have a landfill gas monitoring action plan drafted in accordance with the Agency's Guidance for the management of landfill gas on page 128 which covers the elements listed below?

Appropriate actions to be taken if

- abnormal changes are observed in collected monitoring data
- a reported event occurs, e.g. an odour complaint?
- migration and release of landfill gas
- impact to local air quality, e.g. sub-surface fire

☐ No

Provide justification and/or date by which measures will be specified which must be within 12 months of the issue of the permit.

☒ Yes

Procedures and protocols to manage

- emergency actions to counter identified events e.g. evacuation of buildings
- changes to gas management techniques and other operational control measures that are required to redefine the control of gas on the installation e.g. installation of additional gas collection wells
- changes to the strategy for routine monitoring using identified monitoring protocols to provide improved data to evaluate the event e.g. increased perimeter monitoring?

☐ No

Provide justification and/or date by which measures will be specified which must be within 12 months of the issue of the permit.

☒ Yes

For each identified event do the emergency procedures define

- the name of the person responsible for managing the emergency actions
- emergency notification and contact procedures e.g. Agency and emergency services
- phone number and contact names
- assessment parameters for each emergency scenario
- description of emergency actions for each emergency scenario (what actions are to be taken and who will undertake them)
- monitoring requirements for each emergency scenario
- reporting parameters (what should be reported to the parties or persons involved)
- completion parameters (what criteria identifies that the emergency action can be considered as complete)
- procedures for reviewing emergencies and the performance of the gas management plan?

☐ No

Provide justification and/or date by which measures will be specified which must be within 12 months of the issue of the permit.

☒ Yes

Installation infrastructure

B2.2.58 Describe the security arrangements on your installation

in terms of:

- *type of security,*
- *design standards for physical security, detailing design and specification, including access,*
- *operational standards for security, including operational and out-of-hours provisions, and*
- *maintenance and repair schedules.*

Description or document reference

See Folder 1 Supporting Information Q B2.2.58

Sub-surface structures (excluding landfill containment engineering)

B2.2.59 For all subsurface pipework, sumps and storage vessels secondary containment or continuous leakage detection must be in place prior to the acceptance of any waste under the permit.

Please indicate which method you will use

- ☐ Secondary containment
- ☒ Continuous leakage detection

B2.2.60 Is there an inspection and maintenance programme, e.g. pressure tests, leak tests, material thickness checks or CCTV which are completed for all such equipment and repeated at least every 3 years?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be prior to the acceptance of any waste under the permit

☒ Yes

B2.2.61 Installation surfacing (excluding landfill containment engineering): has the following been applied to the areas of the installation listed below?

For each area where there is potential for the activities to pollute the ground or controlled waters, confirm that it is surfaced and that the surfacing complies with each of the requirements in the section below.

The design quality assurance and inspection and maintenance programme must cover, for each area,

- *capacities*
- *thicknesses*
- *falls*
- *material*
- *hydraulic conductivity*
- *strength/reinforcement*
- *resistance to chemical attack*
- *inspection and maintenance procedures and quality assurance of construction*

Waste reception area

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 6 months of the issue of the permit

☒ Yes

Waste storage area

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 6 months of the issue of the permit

☒ Yes

B | Regulatory specification (techniques) | Emissions control and abatement

Fuel store area

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 6 months of the issue of the permit

☒ Yes

Other areas

Please tell us about other areas where there is potential for the activities to pollute the ground or controlled waters. You can repeat this question as many times as are required.

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Name of area:

Confirm that the area is surfaced and that the surfacing complies with each of the requirements

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 6 months of the issue of the permit

☒ Yes

▲ End of the repeatable answer fields.

Bunds

For each tank containing liquids whose spillage could be harmful to the environment confirm that it is bunded and that the bunding complies with each of the requirements in the section below within 6 months of the date of the issue of the permit.

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

B2.2.62 Bunding details

Name or location of tank

Leachate Lagoon

Drawing reference

Drawing No. ESID4

B2.2.63 Type of tank

- ☐ Fuel storage
☐ Waste oil from on site maintenance
☒ Leachate storage tanks
☐ Other

Please specify

Is the tank impermeable and resistant to the stored materials?

☐ No

Justification and/or date by which it will be in place meeting the relevant standard

☒ Yes

Does the tank drain to a blind collection point and have no outlet (i.e. no drains or taps)?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard

☒ Yes

Is the pipework routed within bunded areas with no penetration of contained surfaces?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard

☒ Yes

Is the bund designed to catch leaks from tanks or fittings?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard

☒ Yes

Does the bund have a capacity of 110% of the largest tank or 25% of the total tankage, whichever is the greater?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard

☒ Yes

Is the bund subject to regular visual inspection and any contents pumped out or otherwise removed under manual control after checking for contamination?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard

☒ Yes

Where not frequently inspected, will the bund be fitted with a high-level probe and an alarm as appropriate?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard

☒ Yes

Does the tank have fill points within the bund where possible or otherwise provide adequate containment?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard

☒ Yes

Is there a routine programmed inspection of bunds, (normally visual but extending to water testing where structural integrity is in doubt)?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard

☒ Yes

▲ End of the repeatable answer fields.

Particulate matter management and monitoring

This section provides the regulatory specification for your particulate matter management and monitoring programme.

*Guidance on best practice can be found in the Agency's **Technical guidance document (monitoring) M17: Monitoring of particulate matter in ambient air around waste facilities** on page 128*

B | Regulatory specification (techniques) | Emissions control and abatement

B2.2.64 Is particulate matter management required at the installation?

☐ No

Justification and reference to the relevant section/page of the particulate matter risk assessment

☒ Yes

Are all appropriate measures in place to minimise any particulate matter escaping beyond the installation boundary?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are the waste streams with a high risk from particulate matter clearly identified (as identified in the risk assessment)?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are the criteria (e.g. wind speed and direction) for closing the installation to the high risk particulate matter waste streams clearly specified?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

For those waste streams identified as a high litter risk in the risk assessment are there measures requiring sources to have it appropriately treated or bagged?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are the criteria for using an emergency tipping area clearly identified?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

B2.2.65 Is particulate matter monitoring required at the installation?

☐ No

Justification and reference to the relevant section/page of the particulate matter risk assessment

☒ Yes

What types of particulate matter are being generated and emitted?

for example, metal powder, ash, bioaerosols from waste deposits

Repeat this section for each type of particulate matter

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

▲ End of the repeatable answer fields.

Particulate matter being generated and emitted

Dust

Monitoring method

Visual

Control level

See Folder 1 Supporting Information, EMS (MW1 300)

Is particulate matter monitoring undertaken in accordance with the Agency's **Technical guidance document (monitoring) M17: Monitoring of particulate matter in ambient air around waste facilities** on page 128?

☒ No

provide justification and reference to the relevant page/section of the particulate matter Risk Assessment

NHRA Section 2.2.4

☐ Yes

Is onsite monitoring of particulate matter taking place at identified hazard locations?

☐ No

provide justification and reference to the relevant page/section of the particulate matter Risk Assessment

☒ Yes

State frequency of monitoring and provide justification and reference to the relevant section/page of the particulate matter risk assessment

Daily - See Folder 1 Supporting Information, EMS (MW1 300)

Are measures in place to monitor particulate matter escaping the installation boundary?

☐ No

provide justification and reference to the relevant page/section of the particulate matter Risk Assessment

☒ Yes

State frequency of monitoring and provide justification and reference to the relevant section/page of the particulate matter risk assessment

See Folder 1 Supporting Information, EMS

Are measures in place to monitor particulate matter at specific locations, for high sensitivity receptors identified in the particulate matter risk assessment?

☐ No

provide justification and reference to the relevant page/section of the particulate matter Risk Assessment

☒ Yes

State frequency of monitoring and provide justification and reference to the relevant section/page of the particulate matter risk assessment

See Folder 1 Supporting Information, EMS

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

▲ End of the repeatable answer fields.

B2.2.66 Details of particulate matter monitoring points

Repeat this section for each monitoring point

Name of monitoring point

NHRA Report Section 2.2.4 & Drawing No. ESID13

Determinand

Frequency of monitoring

Units and accuracy

Control level

Odour management and monitoring

This section provides the regulatory specification for your odour monitoring programme.

*See the Agency document **Odour guidance, internal guidance for the regulation of odour at waste management facilities** on page 129 for guidance on best practice.*

B2.2.67 Is odour management required at the installation?

☐ No

Justification and reference to the relevant section/page of the odour risk assessment

☒ Yes

Is odour management undertaken in accordance with the Agency's **Odour guidance, internal guidance for the regulation of odour at waste management facilities** on page 129?

☒ No

Justification and reference to the relevant section/page of the odour risk assessment

NHRA Report Section 2.2.4

☐ Yes

Are all appropriate measures in place to minimise any odour escaping beyond the installation boundary?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are the high odour risk waste streams (as identified in the risk assessment) clearly specified?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

B | Regulatory specification (techniques) | Emissions control and abatement

Are the criteria (e.g. wind speed and direction) for closing the installation to high odour risk waste streams clearly identified in the risk assessment?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

For those waste streams identified as a high odour risk in the risk assessment are there measures requiring sources to have it appropriately treated?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are the criteria for using an emergency tipping area clearly identified?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

B2.2.68 Is odour monitoring required at the installation?

☐ No

Justification and reference to the relevant section/page of the odour risk assessment

☒ Yes

B2.2.69 Is odour monitoring undertaken in accordance with the Agency's Odour guidance, internal guidance for the regulation of odour at waste management facilities on page 129?

☒ No

Justification and reference to the relevant page/section of the odour risk assessment

NHRA Report Section 2.2.4

☐ Yes

Is routine monitoring of odour undertaken at identified hazard locationst?

☐ No

Justification and reference to the relevant page/section of the odour risk assessment

☒ Yes

State frequency of onsite monitoring and provide justification and reference to the relevant section/page of the odour risk assessment

See Folder 1 Supporting Information, EMS

Are measures in place to monitor odour escaping at the installation boundary?

☐ No

Justification and reference to the relevant page/section of the odour risk assessment

☒ Yes

State frequency of boundary monitoring and provide justification and reference to the relevant section/page of the odour risk assessment

See Folder 1 Supporting Information, EMS

Are measures in place to monitor odour at sensitive receptors identified in the odour risk

assessment?

☐ No

Justification and reference to the relevant page/section of the odour risk assessment

☒ Yes

State frequency of monitoring and provide justification and reference to the relevant section/page of the odour risk assessment

See Folder 1 Supporting Information, EMS

B2.2.70 Details of odour monitoring points

Repeat this section for each monitoring point

Name of monitoring point

See NHRA Report Section 2.2.4 and Drawing No. ESID13

Determinand

Frequency of monitoring

Units and accuracy

Control level

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

▲ End of the repeatable answer fields.

Dirt and mud management and monitoring

This section provides the regulatory specification for your dirt and mud management monitoring programme.

B2.2.71 Is dirt and mud management required at the installation?

☐ No

Justification and reference to the relevant section/page of the dirt and mud risk assessment

☒ Yes

Are all appropriate measures in place to minimise dirt and mud being carried beyond the installation boundary?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

In the event that dirt and mud is carried beyond the installation boundary are measures in place to ensure that the dirt and mud is cleared as soon as practicable i.e. without

delay?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are the criteria (e.g. mud on a highway) for closing the installation to the acceptance of waste clearly specified?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are measures in place to ensure that the priorities for clearing dirt and mud are related to the meteorological conditions and the high sensitivity receptors identified in the risk assessment?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

B2.2.72 Dirt and mud clearance

What is the maximum period for clearing dirt and mud accumulations within the installation?

Specify the time period and provide the justification and reference to the relevant page/section of the Dirt and mud Risk Assessment

What is the maximum period for clearing dirt and mud accumulations outside the boundary of the installation?

Specify the time period and provide the justification and reference to the relevant page/section of the Dirt and mud Risk Assessment

B2.2.73 Is dirt and mud monitoring required at the installation?

☐ No

Justification and reference to the relevant section/page of the dirt and mud risk assessment

☒ Yes

Are measures in place to monitor dirt and mud within the installation boundary at the locations identified in the risk assessment?

☐ No

provide justification and reference to the relevant page/section of the dirt and mud Risk Assessment

☒ Yes

State frequency of monitoring and provide justification and reference to the relevant section/page of the dirt and mud risk assessment

Are measures in place to monitor dirt and mud being carried outside the installation

boundary?

☐ No

provide justification and reference to the relevant page/section of the dirt and mud Risk Assessment

☒ Yes

State frequency of monitoring and provide justification and reference to the relevant section/page of the dirt and mud risk assessment

See Folder 1 Supporting Information, EMS (ENV 005)

Are measures in place to monitor dirt and mud at specific locations identified as high sensitivity receptors identified in the dirt and mud risk assessment?

☐ No

provide justification and reference to the relevant page/section of the dirt and mud Risk Assessment

☒ Yes

State frequency of monitoring and provide justification and reference to the relevant section/page of the dirt and mud risk assessment

See Folder 1 Supporting Information, EMS (ENV 005)

Litter management and monitoring

This section provides the regulatory specification for your litter management and monitoring programme.

B2.2.74 Is litter management required at the installation?

☐ No

Justification and reference to the relevant section/page of the litter risk assessment

☒ Yes

Are all appropriate measures in place to minimise litter escaping beyond the installation boundary?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

In the event that litter does escape beyond the installation boundary are measures in place to ensure that the litter is retrieved as soon as practicable i.e. without delay?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are the criteria (e.g. wind speed and direction) for closing the installation to the high

litter risk waste streams clearly specified?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are the high litter risk waste streams (as identified in the risk assessment) clearly specified?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

For those waste streams identified as a high litter risk in the risk assessment are there measures requiring sources to have it appropriately treated, bagged or baled?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are the criteria for using an emergency tipping area clearly identified?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are measures in place to ensure that the priorities for clearing litter are related to the meteorological conditions and the high sensitivity receptors identified in the risk assessment?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

B2.2.75 Litter collection

What is the maximum period for clearing litter accumulations within the installation?

Specify the time period and provide the justification and reference to the relevant page/section of the litter Risk Assessment

See Folder 1 Supporting Information, EMS (SW1 009)

What is the maximum period for clearing litter escaping the boundary installation?

Specify the time period and provide the justification and reference to the relevant page/section of the litter Risk Assessment

See Folder 1 Supporting Information, EMS (SW1 009)

B2.2.76 Is litter monitoring required at the installation?

☐ No

Justification and reference to the relevant section/page of the litter risk assessment

☒ Yes

Are measures in place to monitor litter within the installation boundary at the hazard

location for litter identified in the risk assessment?

☐ No

provide justification and reference to the relevant page/section of the litter Risk Assessment

☒ Yes

State frequency of monitoring and provide justification and reference to the relevant section/page of the litter risk assessment

See Folder 1 Supporting Information, EMS (SW1 009)

Are measures in place to monitor litter escaping outside the installation boundary?

☐ No

provide justification and reference to the relevant page/section of the litter Risk Assessment

☒ Yes

State frequency of monitoring and provide justification and reference to the relevant section/page of the litter risk assessment

See Folder 1 Supporting Information, EMS (SW1 009)

Are measures in place to monitor litter at specific locations, for high sensitivity receptors identified in the litter risk assessment?

☐ No

provide justification and reference to the relevant page/section of the litter matter Risk Assessment

☒ Yes

State frequency of monitoring and provide justification and reference to the relevant section/page of the litter risk assessment

See Folder 1 Supporting Information, EMS (SW1 009)

Birds, vermin and insect management

This section provides the regulatory specification for your bird, vermin and insect management and monitoring programme.

B2.2.77 Is bird, vermin and insect management required at the installation?

☐ No

Justification and reference to the relevant section/page of the bird, vermin and insect risk assessment

☒ Yes

Are all appropriate measures (e.g. bird deterrent techniques, physical barriers) in place to minimise the presence of birds, vermin and insects at the installation?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

In the event that birds, vermin and insects are causing annoyance at the installation are

measures in place to manage their presence as soon as practicable i.e. without delay?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

In the event that birds, vermin and insects are causing annoyance outside the boundary of the installation are measures in place to manage their presence as soon as practicable i.e. without delay?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are the criteria for closing the installation to the high birds, vermin and insects risk waste streams clearly specified?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are the high birds, vermin and insects risk waste streams (as identified in the risk assessment) clearly specified?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

For those waste streams identified as a high birds, vermin and insects risk in the risk assessment are the sources required to take appropriate measures?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are measures in place to ensure that the priorities for birds, vermin and insects management are related to the meteorological conditions and the high sensitivity receptors identified in the risk assessment?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

B2.2.78 Bird, vermin and insect control

How often are visual inspections of the installation carried out for the presence of birds, vermin and insects?

Specify the frequency and provide the justification and reference to the relevant page/ section of the bird, vermin and insect Risk Assessment

Are measures in place to visually inspect at specific locations, for high sensitivity

receptors identified in the Bird, vermin and insect risk assessment?

Specify the time period and provide the justification and reference to the relevant page/section of the bird, vermin and insect Risk Assessment

See Folder 1 Supporting Information, EMS (SW1 008)

How often do pest control contractors visit the installation?

Specify the frequency and provide the justification and reference to the relevant page/section of the bird, vermin and insect Risk Assessment

See Folder 1 Supporting Information, EMS (SW1 008)

What is the maximum period for taking measures to control birds, vermin and insects following identification of nuisance within the boundary of the installation?

Specify the time period and provide the justification and reference to the relevant page/section of the bird, vermin and insect Risk Assessment

See Folder 1 Supporting Information, EMS (SW1 008)

What is the maximum period for taking measures to control birds, vermin and insects following identification of nuisance outside the boundary of the installation?

Specify the time period and provide the justification and reference to the relevant page/section of the bird, vermin and insect Risk Assessment

See Folder 1 Supporting Information, EMS (SW1 008)

Meteorological monitoring plan

Applies if **Hazardous landfill** on page 15 is ticked Applies if **Non-hazardous landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes)** on page 15 is ticked Applies if **an existing inert landfill?** on page 15 is ticked

*It is important to obtain information on meteorological conditions at times of gas and air-pollutant monitoring in order to help to interpret these data and further guidance is contained within **Guidance for the management of landfill gas** on page 128. Meteorological data are relevant to interpreting all types of monitoring (i.e. sub-surface, surface, boundary and receptor monitoring), for example in terms of:*

- *how representative the gas/pollutant measurements are*
- *whether surface monitoring is at times of ingress or egress caused by changes in atmospheric pressure*
- *which source(s) are contributing to ambient pollutant concentrations*
- *emission rates associated with measured ambient concentrations*
- *modelled impacts on downwind receptors*
- *any special factors causing particular events e.g. wind-raised dust.*

B2.2.79 Does the meteorological monitoring plan specify the following measurements and frequencies in accordance with Guidance for the management of landfill gas on page 128?

Volume of precipitation

- *Operational phase: daily*
 - *Aftercare phase: daily, added to monthly values*
- ☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of date of issue of the permit

☒ Yes

Temperature

- *Operational phase: daily*
- *Aftercare phase: monthly average*
- ☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of date of issue of the permit

☒ Yes

Direction and force of prevailing wind

- *Operational phase: daily*
- ☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of date of issue of the permit

☒ Yes

Evaporation

- *Operational phase: daily*
- *Aftercare phase: daily, added to monthly values*
- ☒ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of date of issue of the permit

☐ Yes

Atmospheric humidity

- *Operational phase: daily*
- *Aftercare phase: monthly average*
- ☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of date of issue of the permit

☒ Yes

B2.2.80 How does the averaging period relate to the determinands being monitored and their interpretation? i.e. rainfall and wind direction would require different averaging periods

Response or document reference

See Folder 1 Supporting Information, EMS

Meteorological monitoring points

B2.2.81 For each monitoring point provide the following information

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Meteorological monitoring point reference number

Response or document reference

Drawing No. ESID13

Is data obtained from a local meteorological station or from site monitoring?

- ☐ Local meteorological station
- ☒ Site monitoring

B | Regulatory specification (techniques) | Emissions control and abatement

Is this location the same as where monitoring is undertaken?

☒ No
☐ Yes

Specify the height above ground at which meteorological data are measured?

Response or document reference

3-4 Metres

Is the measuring equipment mounted on the side or top of a building?

☐ No
☒ Yes

Describe the monitoring position relative to the supporting building and the extension above it

Response or document reference

Drawing No. ESID13

Describe the relative position of all buildings of comparable height within 200m of the monitoring location

Response or document reference

No buildings of comparable height

Describe the topography adjacent to the monitoring location; include a description of land relief relative to the monitoring position

Response or document reference

LFGRA Report Section 2.4.2

Describe the position of the monitoring location relative to any boundary monitoring

Response or document reference

Drawing No. ESID13

Describe the position of the monitoring location relative to identified sensitive receptors

Response or document reference

Drawing No. ESID13

▲ End of the repeatable answer fields.

Landfill body monitoring

You are required to record the structure and composition of the landfill body annually.

B2.2.82 Are documented systems, procedures and work instructions in place to record the structure and composition of the landfill body using the following parameters?

Annual recording of the structure and composition of the landfill body?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Surface occupied by waste

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit

☒ Yes

Volume and composition of the waste	☐ No Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit ☒ Yes
Methods of depositing	☐ No Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit ☒ Yes
Time and duration of depositing	☐ No Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit ☒ Yes
Calculation of remaining capacity	☐ No Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit ☒ Yes
Annual surveying of the settling behaviour of the landfill during the operating and after-care phases	☐ No Justification and/or date by which they will be in place meeting the relevant standard which must be within 12 months of the issue of the permit ☒ Yes
B2.2.83 Specify any other techniques	Technique

B2.3 Management

For guidance [click here](#)

The holder of the permit must be a 'Fit and proper person'. This includes a component whereby the management of the specified waste management activity that is or is to be carried out is in the hands of a technically competent person. The qualifications and experience that demonstrate technical competence are prescribed by the Secretary of State. The Landfill Regulations 2002 have introduced the requirement for ongoing technical and professional development for both the technically competent person and staff employed at the installation.

In addition to this requirement, an effective system of management is a key technique for ensuring that all appropriate pollution prevention and control techniques are delivered reliably and on an integrated basis. The Agency strongly supports the operation of environmental management systems (EMSs).

The Agency recommends that the ISO 14001 standard is used as the basis for an environmental management system. Certification to this standard and/or registration under EMAS (EC Eco Management and Audit Scheme) (OJ L168, 10.7.93) are also strongly supported by the Regulator. Both certification and registration provide independent verification that the EMS conforms to an assessable standard. EMAS now incorporates ISO 14001 as the specification for the EMS element. For further details about ISO 14001 and EMAS contact British Standards Institute (BSI) and the Institute of Environmental Management and Assessment (IEMA) respectively. An operator with such a system will find it easier to complete not only this section but also the technical/regulatory requirements in the following sections.

The steps required in this section may help you to make good any shortfalls in your management system. An effective EMS will help you to maintain compliance with regulatory requirements and to manage other significant environmental impacts. The techniques listed below are the same as those required in a formal EMS and are also capable of delivering wider environmental benefits. However, it is information on their applicability to PPC that is primarily required in this application.

Description of site management

If you are not certified or registered or the certification body is not UKCAS accredited or

if your system does not cover all of the installation or all of the elements listed below then you will need to provide us with further information about how you intend to manage the site.

If you do intend to have a documented system or amend the one you currently have to meet the necessary standards, you must provide a description of how you manage each of the listed issues and the date by which your documented system will be in place.

If you do not intend to have a documented system, you must provide an overview of the management systems for each of the listed issues.

B2.3.1 Provide a management organogram with your application (give posts, not names).

Give the reference of the attached document here

See attached Folder 1 Supporting Information QB.2.3.1

Management system details

B2.3.2 Operations and maintenance systems

Effective operational and preventative maintenance shall be employed on all aspects of the process where any failure could impact on the environment.

Do you have documented procedures to control operations that may have an adverse impact on the environment?

☐ No

Date by which systems will be in place

☒ Yes

Document reference

Site Inspection Form

Post or group responsible for this programme

All personnel

B | Regulatory specification (techniques) | Management

Is there a defined procedure for identifying, reviewing and prioritising items or elements of the installation for which a preventative maintenance regime is appropriate?

☐ No

Date by which systems will be in place

☒ Yes

Document reference

Plant Matrix / Site Inspection

Post or group responsible for this programme

Site Management

Do you have documented procedures for monitoring emissions or impacts?

☐ No

Date by which systems will be in place

☒ Yes

Document reference

Monitoring Procedure

Post or group responsible for this programme

Site Management

Does a preventative maintenance programme exist covering all plant, whose failure could lead to impact on the environment, including regular inspection of major 'non productive' items such as tanks, pipework, retaining walls, bunds ducts and filters?

☐ No

Date by which systems will be in place

☒ Yes

Document reference

Site Inspection Form

Post or group responsible for this programme

Site Management

Does the maintenance system include auditing of performance against requirements arising from the above and reporting the result of audits to top management?

☐ No

Date by which systems will be in place

☒ Yes

Document reference

Audit Form

Post or group responsible for this programme

Site Management

B2.3.3 Competence and training

The operator shall ensure that all relevant management and operational staff (including contractors and those responsible for purchasing equipment and materials) receive adequate training with regard to their responsibilities under the Permit. Particular attention should be given to the following:

- *minimisation of all potential environmental effects from operations under normal or abnormal circumstances;*
- *prevention of accidental emissions and action to be taken when accidental emissions occur; and*
- *need to report deviation from the permit.*

Has an assessment of training needs been carried out which identifies the posts for which specific environmental awareness training is needed and the scope and level of such training?

☐ No

Date by which assessment will be in place

☒ Yes

Document reference

Company training needs form

Post or group responsible for this programme

Management

Are training systems in place for all relevant staff which cover the following:

- awareness of the regulatory implications of the permit for the activity and staff activities
- awareness of all potential environmental effects from operation under normal and abnormal circumstances
- awareness of the need to report deviation from the permit
- prevention of accidental emissions and action to be taken if they occur.

☐ No

Date by which systems will be in place

☒ Yes

Document reference

Induction Form

Post or group responsible for this programme

Management

Are the skills and competencies necessary for key posts documented and are records of training needs and training received for these posts maintained?

☐ No

Date by which systems will be in place

☒ Yes

Document reference

Competence Matrix

Post or group responsible for this programme

Management

Do the key posts, include contractors and those purchasing equipment and materials?

☐ No

Date by which systems will be in place

☒ Yes

Document reference

Contractor Evaluation

Post or group responsible for this programme

Management

Are the potential environmental risks posed by the work of contractors assessed and instructions provided to contractors about protecting the environment while working on site?

☐ No

Date by which systems will be in place

☒ Yes

Document reference

Induction Form

Post or group responsible for this programme

Management

Do industry standards or codes of practice for training exist (e.g. WAMITAB)?

☐ No

☒ Yes

What are they and to what degree do you conform with these

Certificates of Technical Competence - See Folder 1 Supporting Information Q B7.4.1

B2.3.4 Accidents/incidents/non-compliance

The operator shall maintain an accident management plan which identifies potential events or failures which might lead to an environmental impact. The plan shall identify:

- *the likelihood of, and the actions to be taken to minimise, these potential occurrences;*
- *the environmental consequences and an action plan to deal with such occurrences;*
- *the operator shall have a written procedure for handling, investigating, communicating and reporting incidents of actual or potential non-compliance including taking action to mitigate any impacts caused and for initiating and completing corrective action; and*
- *in the case of abnormal emissions the operator shall: investigate and undertake remedial action immediately; and promptly record the events and actions taken; and ensure the Regulator is made aware, as soon as practicable.*

Do you have an accident plan?

☐ No

Date by which systems will be in place

☒ Yes

Document reference

See Folder 1 Supporting Information, EMS

Post or group responsible for this programme

Site Management

Does the plan identify the likelihood and consequence of accidents?

☐ No

Date by which systems will be in place

☒ Yes

Document reference

See Folder 1 Supporting Information, EMS

Does the plan identify actions to prevent accidents and mitigate any consequences?

☐ No

Date by which systems will be in place

☒ Yes

Document reference

See Folder 1 Supporting Information, EMS

Do you have written procedures for handling, investigating, communicating and reporting actual or potential non-compliance with operating procedures or emission limits?

☐ No

Date by which systems will be in place

☒ Yes

Document reference

Incident Reporting

Post or group responsible for this programme

All Personnel

Do you have written procedures for handling, investigating, communicating and reporting environmental complaints?

☐ No

Date by which systems will be in place

☒ Yes

Document reference

Incident Reporting

Post or group responsible for this programme

All Personnel

Do you have written procedures for investigating incidents, (and near misses) including identifying suitable corrective action and following up implementation of that action?

☐ No

Date by which systems will be in place

☒ Yes

Document reference

Incident Reporting

Post or group responsible for this programme

All Personnel

B2.3.5 Organisation

The following aspects of organisational controls and site management procedures may not be in permit conditions but are likely to have an impact on the Agency resources required to apply the PPC regulations.

Do you operate an externally audited environmental management system?

☒ No

Has your company adopted a suitable environmental policy and programme?

This must

- include a commitment to continual improvement and prevention of pollution
- include a commitment to comply with relevant legislation, and with other requirements to which the organisation subscribes
- identify, set, monitor and review environmental objectives, independently of the permit.

☐ No

Date by which systems will be in place

☒ Yes

Document reference

Company Policy

Post or group responsible for this programme

Senior Management

Are there procedures that incorporate environmental issues into the following areas (as supported by demonstrable evidence e.g. written procedures)?

- the control of process change on the installation
- design and review of new facilities (including provision for their decommissioning), engineering and other capital projects
- capital approval
- purchasing policy

☐ No

Date by which systems will be in place

☒ Yes

Document reference

Company Environmental Management System

Post or group responsible for this programme

Senior Management

☐ Yes

Document reference

Company Environmental Management System

Post or group responsible for this programme

Senior Management

How is your environmental management system externally assessed?

☐ EMAS registered

☐ Certified to ISO 14001

☐ subject to external audit through a third party audit programme with a published methodology (this excludes in house company audit programmes)

Are there audits, at least annually, to check that all activities are being carried out in conformity with the above requirements?

☒ No

Date by which systems will be in place

2005

☐ Yes

Name the auditing body

B | Regulatory specification (techniques) | Management

Are there reports annually on environmental performance, objectives and targets, and future planned improvements?

☒ No

Date by which systems will be in place

2005

☐ Yes

Does your company produce a public environmental statement?

☒ No

☐ Yes

Comment or further information

B2.3.6 Managing documentation and records

Give details for each of the following elements of your management system.

Policies

Where kept

All Sites

How identified

Environmental Management System

Who responsible

Senior Management

Responsibilities

Where kept

All Sites

How identified

Personnel File

Who responsible

Senior Management

Targets

Where kept

to be supplied by CWM Environmental

How identified

to be supplied by CWM Environmental

Who responsible

to be supplied by CWM Environmental

Maintenance records

Where kept

All Sites

How identified

Filing Systems

Who responsible

Site Management

Procedures	Where kept	All sites
	How identified	Company EMS
	Who responsible	Senior Management
Monitoring records	Where kept	All sites
	How identified	Company EMS
	Who responsible	Senior Management
Results of audits	Where kept	All sites
	How identified	Company EMS
	Who responsible	Senior Management
Results of reviews	Where kept	All sites
	How identified	Company EMS
	Who responsible	Senior Management
Complaints and incident records	Where kept	All sites
	How identified	Company EMS
	Who responsible	Senior Management
Training records	Where kept	All sites
	How identified	Company EMS
	Who responsible	Senior Management
Explain what targets you will be aiming at for improving the performance figures	Give details	Certification to ISO14001

B2.4 Raw materials

This section looks at the selection and minimisation of the raw and auxiliary materials used in the operation of the installation. It is understood however that nearly all of these materials are required to minimise the adverse effects on the environment and therefore the minimisation of them may be inappropriate. It is therefore suggested that, although consideration should be given to minimising the use of materials required for abatement techniques, the operator should ensure that the integrity and ability of the abatement systems are not compromised.

B2.4.1 Raw materials

Use this section to supply a list of the principal materials used, and any others that have the potential for significant environmental impact, for example vermin control, fuels, leachate treatment and raw materials required for engineering. Repeat for each material used.

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Raw material/function

See attached Folder 1 Supporting Information QB2.4.1

Chemical nature/composition

Addition rate

Fate

% to product

See attached Folder 1 Supporting Information QB2.4.1

% to water

% to sewer

% to waste/land

% to air

Environmental impact where known e.g. degradability, bioaccumulation potential, toxicity to relevant species

See attached Folder 1 Supporting Information QB2.4.1

Practical alternatives for those with significant impact potential and reasons why they are not used

See attached Folder 1 Supporting Information QB2.4.1

Could the material be a significant accident risk by virtue of nature or quantity stored?

See attached Folder 1 Supporting Information QB2.4.1

▲ End of the repeatable answer fields.

B2.5 Waste handling

B2.5.1 Are waste deposit and emplacement procedures in place for the installation, which ensure the following?

The first layers of waste in a new cell are selected and inspected during placement to ensure that these do not cause damage to the installed barriers and liners.

☐ No

Justification and/or date when they will be in place meeting the relevant standard – which must be prior to the acceptance of any waste under the permit

☒ Yes

Waste is emplaced in each cell in such a way as to ensure stability of the mass of waste and associated structures, particularly in respect of avoidance of slippages.

☐ No

Justification and/or date when they will be in place meeting the relevant standard – which must be prior to the acceptance of any waste under the permit

☒ Yes

The maximum and minimum gradients are specified and complied with for the working face, intermediate slopes and the final slopes of the landform.

☐ No

Justification and/or date when they will be in place meeting the relevant standard – which must be prior to the acceptance of any waste under the permit

☒ Yes

Waste is emplaced in each cell in such a way as to prevent damage to the engineering of the barriers and liners, and, if present, the leachate and landfill gas management systems.

☐ No

Justification and/or date when they will be in place meeting the relevant standard – which must be prior to the acceptance of any waste under the permit

☒ Yes

Waste is discharged prior to placement in the appropriate operational areas, in a manner that prevents the releases to the environment of particulate matter, litter, odour and other nuisances.

☐ No

Justification and/or date when they will be in place meeting the relevant standard – which must be prior to the acceptance of any waste under the permit

☒ Yes

Waste is not discharged in adverse weather conditions that may give rise to the production of airborne materials such as litter or particulate matter.

☐ No

Justification and/or date when they will be in place meeting the relevant standard – which must be prior to the acceptance of any waste under the permit

☒ Yes

Waste is placed and compacted in the appropriate operational areas, to ensure stable surfaces and slopes.

☐ No

Justification and/or date when they will be in place meeting the relevant standard – which must be prior to the acceptance of any waste under the permit

☒ Yes

The final layers of waste are selected and inspected during placement to ensure that these do not cause damage to the final capping.

☐ No

Justification and/or date when they will be in place meeting the relevant standard – which must be prior to the acceptance of any waste under the permit

☒ Yes

Appropriate handling and compaction plant and techniques are used.

☐ No

Justification and/or date when they will be in place meeting the relevant standard – which must be prior to the acceptance of any waste under the permit

☒ Yes

The size of the operational area is limited while accommodating the placement of the waste.

☐ No

Justification and/or date when they will be in place meeting the relevant standard – which must be prior to the acceptance of any waste under the permit

☒ Yes

B2.6 Waste recovery and disposal

*For landfill this is covered in **Installation details (in process controls)** on page 26 and **Emissions control and abatement** on page 29*

B2.7 Energy

The principle that energy should be used efficiently is only a requirement for landfills covered by Section 5.2(1)(a) of Schedule 1 to the PPC Regulations. The landfill sector is not considered to be a significant energy user and the opportunity for significant energy efficiency will be limited. However, an operator will be expected to have basic, low cost, physical techniques in place to avoid gross inefficiencies.

Further guidance on appraisal methodology can be found in "Environment Agency H2 Horizontal Guidance Note: Energy Efficiency" (Version 3 – Jan 02)

Basic energy requirements

Annual energy consumption of the activities must be presented in Table 1 below, broken down by energy source. Where energy is exported from the installation, the operator should also provide this information. An example of the format in which this information should be presented is given in below.

B2.7.1 Annual energy consumption

Table 1

Energy source	Energy consumption		
	Delivered, MWh	Primary, MWh	% of total
Electricity from public supply	See attached Folder 1 Supporting Info. QB2.7.1		
Electricity from other source*			
Gas	N/A		
Oil	N/A		
Coal	N/A		
Other (operator to specify)			

* specify source and conversion factor from delivered to primary energy
(Note that the Permit will require energy consumption information to be submitted annually)

B2.7.2 Energy efficiency measures

What energy efficiency techniques are applicable to the activities authorised by the permit?

- List those which are applicable to the activities but have not yet been implemented.
- State the CO₂ savings achievable by that technique over the technique or the installation's lifetime.

Where other appraisal methodologies have been used, state the method, and provide evidence that appropriate discount rates, asset life and expenditure (£/t) criteria have been employed.

Add rows if necessary

Energy efficiency measure	CO ₂ savings (tonnes)	
	Annual	lifetime
The operator considers that all energy efficiency measures will be employed at the facility wherever practicable.		

B2.8 Accidents and their consequences

B2.8.1 Accident management plan

Complete this section for any event which could have significant environmental consequences.

Flooding based on Agency Indicative Floodplain Maps

Likelihood of occurrence

See Folder 1 Supporting Information, EMS

Consequences of occurrence

See Folder 1 Supporting Information, EMS

Actions taken or proposed to minimise the chances of it happening

See Folder 1 Supporting Information, EMS

Actions planned if the event does occur

See Folder 1 Supporting Information, EMS

Subsidence	Likelihood of occurrence
	See Folder 1 Supporting Information, EMS
	Consequences of occurrence
	See Folder 1 Supporting Information, EMS
	Actions taken or proposed to minimise the chances of it happening
Landslides	See Folder 1 Supporting Information, EMS
	Consequences of occurrence
	See Folder 1 Supporting Information, EMS
	Actions taken or proposed to minimise the chances of it happening
	See Folder 1 Supporting Information, EMS
Fires	Actions planned if the event does occur
	See Folder 1 Supporting Information, EMS
	Likelihood of occurrence
	See Folder 1 Supporting Information, EMS
	Consequences of occurrence
Explosions	See Folder 1 Supporting Information, EMS
	Actions taken or proposed to minimise the chances of it happening
	See Folder 1 Supporting Information, EMS
	Actions planned if the event does occur
	See Folder 1 Supporting Information, EMS
Major breach of installation liner	See Folder 1 Supporting Information, EMS
	Consequences of occurrence
	See Folder 1 Supporting Information, EMS
	Actions taken or proposed to minimise the chances of it happening
	See Folder 1 Supporting Information, EMS
	Actions planned if the event does occur
	See Folder 1 Supporting Information, EMS
	Likelihood of occurrence
	See Folder 1 Supporting Information, EMS
	Consequences of occurrence
	See Folder 1 Supporting Information, EMS
	Actions taken or proposed to minimise the chances of it happening
	See Folder 1 Supporting Information, EMS
	Actions planned if the event does occur
	See Folder 1 Supporting Information, EMS

Others (please specify)	Repeat this section as required
▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.	Type of accident or abnormal release
	Likelihood of occurrence
	Consequences of occurrence
	Actions taken or proposed to minimise the chances of it happening
	Actions planned if the event does occur
▲ End of the repeatable answer fields.	

B2.8.2	Which of the above do you consider to pose the most critical risks to the environment from your installation?	Name of critical risk Liner Failure
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B2.9 Noise and vibration management and monitoring

This section provides the regulatory specification for your noise and vibration management and monitoring programme programme and is linked to the relevant section in your amenity risk assessment.

B2.9.1	Is noise and vibration management required at the installation?	☐ No Justification and reference to the relevant section/page of the noise and vibration risk assessment ☒ Yes
B2.9.2	Is noise and vibration management undertaken in accordance with the Agency's Noise guidance, internal guidance for the regulation of noise at waste management facilities on page 129?	☒ No Justification and reference to the relevant section/page of the noise and vibration risk assessment See Folder 1 Supporting Information, EMS (MWI 300) ☐ Yes Are all appropriate measures in place to avoid adverse impact due to noise and vibration beyond the installation boundary? ☐ No Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit ☒ Yes In the event that noise and vibration is perceived beyond the installation boundary are measures in place to ensure that appropriate remedial action is taken as soon as

practicable i.e. without delay?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

Are measures in place to ensure that the remedial action is related to the meteorological conditions (e.g. wind direction) and the high sensitivity receptors identified in the risk assessment?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 3 months of the issue of the permit

☒ Yes

B2.9.3 Is noise and vibration monitoring required at the installation?

☐ No

Justification and reference to the relevant section/page of the noise and vibration risk assessment

☒ Yes

B2.9.4 Is noise and vibration monitoring undertaken in accordance with the Agency's Noise guidance, internal guidance for the regulation of noise at waste management facilities on page 129?

☒ No

Justification and reference to the relevant section/page of the noise and vibration risk assessment

See Folder 1 Supporting Information, EMS (MW1 300)

☐ Yes

State frequency of monitoring and provide justification and reference to the relevant section/page of the noise and vibration risk assessment

Are measures in place to monitor noise and vibration within the installation boundary?

☐ No

provide justification and reference to the relevant page/section of the noise and vibration risk assessment

☒ Yes

State frequency of monitoring and provide justification and reference to the relevant section/page of the noise and vibration risk assessment

See Folder 1 Supporting Information, EMS (MW1 300)

Are measures in place to monitor noise and vibration at the installation boundary?

☐ No

provide justification and reference to the relevant page/section of the noise and vibration risk assessment

☒ Yes

State frequency of monitoring and provide justification and reference to the relevant section/page of the noise and vibration risk assessment

See Folder 1 Supporting Information, EMS (MW1 300)

Are measures in place to monitor noise and vibration at specific locations, for high

sensitivity receptors identified in the noise and vibration risk assessment?

☐ No

provide justification and reference to the relevant page/section of the noise and vibration risk assessment

☒ Yes

State frequency of monitoring and provide justification and reference to the relevant section/page of the noise and vibration risk assessment

See Folder 1 Supporting Information, EMS (MW1 300)

B2.9.5 Details of noise and vibration monitoring points

Repeat this section for each monitoring point

Name and location of monitoring point

See Folder 1 Supporting Information, EMS (MW1 300)

Parameters, reference time periods and monitoring times

Frequency of monitoring

Measurement and reporting protocol

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

▲ End of the repeatable answer fields.

B2.10 Monitoring emissions and environmental impact

Covered where applicable in **Emissions control and abatement** on page 29.

B2.11 Closure, restoration, aftercare and completion

An installation or part of it may only be considered as definitively closed after the Agency has carried out a final on-site inspection, has assessed all the reports submitted by the Operator and has communicated to the Operator its approval for closure. This shall not in any way reduce the responsibility of the Operator under the conditions of the Permit which will continue until the surrender of the permit has been accepted by the Agency. After an installation has been definitively closed, the Operator shall continue to be responsible for the maintenance, monitoring and control in the aftercare phase for as long as may be required by the Agency, taking into account the time during which the installation could present hazards. Closure should be considered at the design stage of any new or existing development to increase the ease and security of the closure.

The Operator's Closure, restoration, aftercare and completion plan will need to cover the proposed measures, upon definite closure, to avoid any pollution risk and return the installation to a satisfactory state. This includes measures relating to the design and construction of the installation as specified in Section 1 – Conceptual Model.

*You should refer to the Agency's **Guidance on landfill completion** on page 128*

B2.11.1	How often will you monitor waste levels in each cell?	Frequency Void Audit (Quarterly)
B2.11.2	Specify the accuracy of the monitoring method	Vertical measurements in mm 10mm Horizontal measurements in mm 10mm
B2.11.3	Specify the frequency that the result will be reported to the Agency	Frequency Annually

Restoration and aftercare

An aftercare plan should be developed to ensure that the installation can be maintained to avoid any pollution risk up to the point of the Agency accepting the surrender of the permit when it is no longer likely to cause a hazard to the environment.

B2.11.4	Are procedures in place for existing closed cells and existing operational cells, and will they be in place for new cells, to ensure that:	
	final pre-settlement waste levels are achieved and are not exceeded?	☐ No Justification and/or date by which they will be in place meeting the relevant standard which must be within 6 months of date of issue of the permit ☒ Yes
	all above ground management systems are adequately protected from damage (including vandalism) to ensure their continued suitability for use throughout the aftercare phase?	☐ No Justification and/or date by which they will be in place meeting the relevant standard which must be within 6 months of date of issue of the permit ☒ Yes
	all environmental management and monitoring infrastructure is maintained (and where necessary replaced) to ensure their continued suitability for use throughout the aftercare phase?	☐ No Justification and/or date by which they will be in place meeting the relevant standard which must be within 6 months of date of issue of the permit ☒ Yes
	the security measures are in place and are maintained (and where necessary replaced) to ensure their continued effectiveness in controlling access to the installation and to detect and discourage illegal dumping at the installation throughout the aftercare phase?	☐ No Justification and/or date by which they will be in place meeting the relevant standard which must be within 6 months of date of issue of the permit ☒ Yes

B | Regulatory specification (techniques) | Closure, restoration, aftercare and completion

the landfill gas management systems, including gas treatment, utilisation plant or flares, are operated and maintained (and where necessary replaced) such that they remain suitable for use throughout the aftercare phase?

Applies if **Hazardous landfill** on page 15 is ticked Applies if **Non-hazardous landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes)** on page 15 is ticked Applies if an **existing inert landfill?** on page 15 is ticked

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 6 months of date of issue of the permit

☒ Yes

the leachate management systems, including extraction, treatment, and disposal, are operated and maintained (and where necessary replaced) such that they remain suitable for use throughout the aftercare phase?

Applies if **Hazardous landfill** on page 15 is ticked Applies if **Non-hazardous landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes)** on page 15 is ticked Applies if an **existing inert landfill?** on page 15 is ticked

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 6 months of date of issue of the permit

☒ Yes

the long and short term stability of the proposed landform including the waste deposits and associated structures such as the capping layer, drainage layer, soil cover and leachate and landfill gas management structures, as appropriate?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 6 months of date of issue of the permit

☒ Yes

the proposed after-use and restoration does not conflict with access requirements for monitoring and maintenance of environmental management and monitoring systems, for example the required re-drilling of landfill gas extraction boreholes?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 6 months of date of issue of the permit

☒ Yes

post-closure settlement surveys are carried out?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 6 months of date of issue of the permit

☒ Yes

the estimated costs of the closure and after-care of the installation for the predicted period over which the installation is likely to present a hazard are covered by the price to be charged for the disposal of waste at the installation?

☐ No

Justification and/or date by which they will be in place meeting the relevant standard which must be within 6 months of date of issue of the permit

☒ Yes

B2.11.5 What features will you monitor to prove that you are ready to go into closure

Refer to Regulation 15(1) of the Landfill Regulations

Leachate and landfill gas volume and quality, settlement

B3 Emission benchmarks

B3.1 Emissions inventory and benchmark comparison

In accordance with the development programme for your installation and as described in the Regulatory Specification in Section 2 of this form you must now identify the emissions you are expecting to release from point sources and from fugitive sources. These values will be included within permit conditions. You must also identify when the measures you are proposing will be in place. This should also take account of relevant improvement programmes to reduce emissions agreed at the time of the determination of your application, for example, emission standards for gas engines will depend on the age of the engine and replacement of an engine will lead to reduced emissions.

The emissions limits in this section must be expressed in terms of annual capacity limits of the relevant emission to the receiving medium. These can be based either:

- *on an estimate of the relevant concentration limit x volume emitted annually;*
- or*
- *on a more accurate assessment based on the operating profile of the relevant emissions.*

The emission levels you specify must be supported by and consistent with the relevant assessments you describe in Section 1, and with the regulatory specifications for control measures and monitoring that you set out in section 2.

Emissions to sewer

Applies if Hazardous landfill on page 15 is ticked Applies if Non-hazardous landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes) on page 15 is ticked Applies if an existing inert landfill? on page 15 is ticked

B3 1.1 Emission limits into sewer

- ▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Sewer emission monitoring point number, e.g. S1

N/A

Determinand

N/A

Frequency monitored

N/A

Units and accuracy

N/A

Control level

N/A

▲ End of the repeatable answer fields

Emissions to surface water

B3.1.2 Emission limits into surface water

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet

Surface water emissions monitoring point number, e.g. W1

See Appendix ESID6

Determinand

See Appendix ESID6

Frequency monitored

See Appendix ESID6

Units and accuracy

See Appendix ESID6

Control level

See Appendix ESID6

▲ End of the repeatable answer fields.

Emissions to air

Applies if Hazardous landfill on page 15 is ticked Applies if Non-hazardous landfill (this includes sites which will also accept hazardous stabilised non-reactive wastes) on page 15 is ticked Applies if an existing inert landfill? on page 15 is ticked Applies if Yes, there is a need to collect landfill gas on page 50 is ticked

Gas engines

Applies if Landfill gas utilisation on page 50 is ticked

Repeat this section for each engine unless emissions are envisaged to be identical for each one.

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Identification of gas engine

N/A - subject to separate PPC application

B3.1.3 NO_x emissions

Best practice for minimisation: combustion control

Frequency of monitoring

N/A - subject to separate PPC application

Proposed emission figures including units *Can be drawn from existing data or manufacturer's specification if not available*

N/A - subject to separate PPC application

Proposed trigger levels including units

N/A - subject to separate PPC application

B3.1.4	CO emissions	<i>Best practice for minimisation: combustion control</i>
		Frequency of monitoring
		N/A - subject to separate PPC application
		Proposed emission figures including units <i>Can be drawn from existing data or manufacturer's specification if not available</i>
		N/A - subject to separate PPC application
		Proposed trigger levels including units
		N/A - subject to separate PPC application
B3.1.5	VOC emissions	Frequency of monitoring
		N/A - subject to separate PPC application
		Proposed emission figures including units <i>Can be drawn from existing data or manufacturer's specification if not available</i>
		N/A - subject to separate PPC application
		Proposed trigger levels including units
		N/A - subject to separate PPC application
B3.1.6	Non-methane VOC emissions	<i>Best practice for minimisation: combustion control</i>
		Frequency of monitoring
		N/A - subject to separate PPC application
		Proposed emission figures including units <i>Can be drawn from existing data or manufacturer's specification if not available</i>
		N/A - subject to separate PPC application
		Proposed trigger levels including units
		N/A - subject to separate PPC application
B3.1.7	Additional compounds based on site specific risk assessment	<i>Compound</i>
		Frequency of monitoring
		N/A - subject to separate PPC application
		Proposed emission figures including units
		N/A - subject to separate PPC application
		Proposed trigger levels including units
		N/A - subject to separate PPC application
B3.1.8	Noise emissions	<i>Best practice for minimisation: control at source</i>
		Frequency of monitoring
		N/A - subject to separate PPC application
		Proposed noise limits, including units, at specific points or sensitive receptors. <i>Can be drawn from existing data or manufacturer's specification if not available</i>
		N/A - subject to separate PPC application
		Proposed trigger levels including units, for example within x dB(A) of the limit
		N/A - subject to separate PPC application

▲ End of the repeatable answer fields

Gas flares

Applies if Enclosed landfill gas flaring on page 50 is ticked
Repeat this section for each gas flare.

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Identification of gas flare

Flare

B3.1.9 NOx emissions

Best practice for minimisation: combustion control

Frequency of monitoring

LFGRA Report Section 3.3.5

Proposed emission figures including units *Can be drawn from existing data or manufacturer's specification if not available*

LFGRA Report Section 3.3.5

Proposed trigger levels including units

LFGRA Report Section 3.3.5

B3.1.10 CO emissions

Best practice for minimisation: combustion control

Frequency of monitoring

LFGRA Report Section 3.3.5

Proposed emission figures including units *Can be drawn from existing data or manufacturer's specification if not available*

LFGRA Report Section 3.3.5

Proposed trigger levels including units

LFGRA Report Section 3.3.5

B3.1.11 VOC emissions

Frequency of monitoring

LFGRA Report Section 3.3.5

Proposed emission figures including units *Can be drawn from existing data or manufacturer's specification if not available*

LFGRA Report Section 3.3.5

Proposed trigger levels including units

LFGRA Report Section 3.3.5

B3.1.12 Non-methane VOC emissions

Frequency of monitoring

LFGRA Report Section 3.3.5

Proposed emission figures including units *Can be drawn from existing data or manufacturer's specification if not available*

LFGRA Report Section 3.3.5

Proposed trigger levels including units

LFGRA Report Section 3.3.5

B3.1.13 Additional compounds based on site specific risk assessment

Compound

Frequency of monitoring

LFGRA Report Section 3.3.5

Proposed emission figures including units *Can be drawn from existing data or manufacturer's specification if not available*

LFGRA Report Section 3.3.5

Proposed trigger levels including units

LFGRA Report Section 3.3.5

B3.1.14 Noise emissions

Best practice for minimisation: combustion control

Frequency of monitoring

LFGRA Report Section 3.3.5

Proposed noise limits, including units, at specific points or sensitive receptors *Can be drawn from existing data or manufacturer's specification if not available*

LFGRA Report Section 3.3.5

Proposed trigger levels including units

LFGRA Report Section 3.3.5

▲ End of the repeatable answer fields.

B4 Impact on the environment

For landfills, this is covered by **Hydrogeological risk assessment** on page 19, **Emissions control and abatement** on page 29 and **Noise and vibration management and monitoring** on page 92

B5 Environmental statements

B5.0.1 Has the development of the installation (or any subsequent change or extension of the development) required an environmental statement under Council Directive 85/337/EEC on the assessment of the effects of certain public and private projects on the environment?

☒ No
☐ Yes

Please supply a copy of the environmental statement submitted and details of any decision made and provide the document reference here:

--

B6 Statutory consultees

We will use the information in this section to identify who we must consult about your proposals.

B6.1 Local authorities

B6.1.1 In which local authority area(s) is the installation located?

Please give the names of all district, borough and/or unitary authorities who have responsibility for all or part of your installation. If there is more than one, please mark the main planning authority by ticking the 'Main authority' box for that row.

Name of local authority

Main authority

Carmarthenshire County Council

☒

Please name the county council(s) unless there is a unitary authority.

B6.2 Health authorities

B6.2.1 In which Primary Health Care Trust or Health Board area is the installation located?

Name

Carmarthenshire NHS Trust and Local Health Board

B6.3 Sewerage undertakers

B6.3.1 Could the installation involve the release of any substance into a sewer vested in a sewerage undertaker?

☒ No
☐ Yes

Please name the sewerage undertaker.

B6.4 SSSIs within 2km

B6.4.1 Are there any sites of special scientific interest (SSSIs) which are within 2 kilometres of the installation?

☐ No
☒ Yes

B6.5 Other affected SSSIs

Are there any other SSSIs which may be affected by emissions from the installation?

☐ No
☒ Yes

B6.6 European sites

B6.6.1 Are there any European sites, as defined by regulation 10 of the Conservation (Natural Habitats etc.) Regulations 1994, which may be affected by emissions from the installation?

☒ No
☐ Yes

B6.7 Harbours

B6.7.1 Could the installation involve the release of any substance into a harbour managed by a harbour authority?

☒ No
☐ Yes

Please name the harbour authority.

B6.8 Fisheries

B6.8.1 Could the installation involve the release of any substance directly into relevant territorial waters or coastal waters within the sea fisheries district of a local fisheries committee?

☒ No
☐ Yes

Please name the local fisheries committee.

B6.9 Nuclear and COMAH

B6.9.1 Is the installation on a site for which a nuclear site licence is required under section of the Nuclear Installations Act 1965?

☒ No
☐ Yes

B6.9.2 Is the installation on a site for which a major accident prevention policy document is required under Regulation 5 of the Control of Major Accident Hazards Regulations 1999 or a safety report is required under Regulation 7 of those regulations?

☒ No
☐ Yes

B7 Specified waste management activities

If there is a specified waste management activity (other than the landfill) taking place within or technically connected to the installation, please discuss with your local Agency contact.

B7.1 Relevance

B7.1.1 Are you applying to operate any 'specified waste management activities' other than landfill?

☒ No
☐ Yes

Please give details:

B7.2 Planning status

B7.2.1 Which of the following applies to the specified waste management activities?

We cannot issue a permit unless one of the following applies. We will need to see a copy of the relevant documents.

☒ You have planning permission.

Document reference number

See attached Folder 1 Supporting Information QB7.2.1

☐ You have a certificate of lawful existing use or development.

Document reference number

☐ You have an established use certificate.

Document reference number

☐ The General Permitted Development Order 1995 applies.

Please give details

☐ Planning permission is not required

Please say why and provide written confirmation from the planning authority.

Document reference number

☐ You have submitted an application for planning permission which has not yet been determined.

Please provide a copy of the application.

Document reference number

B7.3 Fit and proper person

We need to make sure that whoever holds the permit is a 'fit and proper person' in relation to any specified waste management activities. This includes consideration of relevant offences, technical competence and financial provision.

B7.3.1 Has the operator, or any other 'relevant person', been convicted of any 'relevant offence'?

Relevant offences

A 'relevant person' includes each partner, director, manager, company secretary or any similar officer or can be an employee.

☒ No

☐ Yes

Please give full information.

The details we need are:

- Full name of company or individual convicted.
- If an individual has been convicted please state their position at time of offence.
- Name of court.
- Date of conviction.
- Offence and penalty imposed.
- Date of any outstanding appeal lodged against conviction.
- Any additional information which the operator would like us to take into account in determining whether they are a 'fit and proper person'. For example, why the offence happened, and what has been done to prevent a similar event occurring.

Document reference number

see attached Folder 1 supporting information QB7.3.1

B7.4 Technical competence

B7.4.1 Are the specified waste management activities covered by the WAMITAB (Waste Management Industry Training Advisory Board) award scheme?

☐ No

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

B7.4.2 Who will be responsible for managing the specified waste management activities?

Please give details for each person

For each person named below, we need to see a statement of qualifying experience and will want to carry out our own assessment.

Title

First name

Last name

Position

Date of birth

Document reference number for copy of certificate

▲ End of the repeatable answer fields

☒ Yes

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

B7.4.3 Who will provide the technically competent management of the specified waste management activities?

Please give details for each person and provide a copy of the WAMTAB certificate.

Title

see attached Folder 1 supporting information QB7.4.1

First name

see attached Folder 1 supporting information QB7.4.1

Last name

see attached Folder 1 supporting information QB7.4.1

Position

see attached Folder 1 supporting information QB7.4.1

Level of WAMTAB certificate

see attached Folder 1 supporting information QB7.4.1

Certificate date

see attached Folder 1 supporting information QB7.4.1

Date of birth

see attached Folder 1 supporting information QB7.4.1

Document reference number for copy of certificate

see attached Folder 1 supporting information QB7.4.1

▲ End of the repeatable answer fields.

B7.4.4 Are any of these 'Responsible people' already providing the technically competent management at other IPPC Installations or at sites licensed under Part II of the Environmental Protection Act 1990?

☐ No.

☒ Yes

For each person we need to know the site/installation name and address and licence/permit reference number:

please provide details of these people.

See attached Folder 1 supporting information QB7.4.4

Technical and professional development

B7.4.5 How will you demonstrate ongoing technical and professional development for both the technically competent person and staff employed at the installation?

Summary of proposals or document reference

See attached Folder 1 supporting information QB7.4.5

B7.5 Financial provision

B7.5.1 How does the operator intend to make financial provision for the specified waste management activities?

- ☒ Renewable bonds
- ☐ Bonds
- ☐ Escrow account
- ☐ Trust fund
- ☐ Lump sum
- ☐ Other

Please specify

--

B7.6 Expenditure plan

B7.6.1 Provide a plan of the estimated expenditure for each phase of the installation.

This must show expenditure for each year for at least 30 years after the closure of each phase. For sites where stabilisation is not likely for 30 years then a period of 60 years should be used.

The plan should include the likely costs of:

- *monitoring*
- *restoration - landfill only*
- *aftercare - landfill only*
- *clearing the installation (including drainage systems) of all wastes - non-landfill*
- *remedial action in the event of the failure of pollution control systems*

We recognise that this plan may need to be revised before the issue of final permit.

Document reference number for accounts

See attached Folder 1 Supporting Information QB7.6.1

B8 BAT assessment – [not applicable for landfill]

B9 Improvement plan

B9.0.1 Give a summary of the improvement plans at the time of your application

This section should be kept as brief as possible, typically a paragraph for each, while conveying a reasonable summary of the improvements planned. It is your opportunity to describe what you are doing to protect the environment, how well you are doing and any improvements you intend to make. You are advised to complete this section after the rest of the application as you will then know what you are summarising.
Repeat this section for each action.

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Action

See attached Folder 1 Supporting Information QB9.0.1

Date

▲ End of the repeatable answer fields.

B10 Glossary of terms

Term	Meaning
bentonite	a group of clay minerals that swell on wetting.
borehole	a hole drilled outside wastes for the purposes of monitoring or sampling.
capping material	a landfill covering, usually having a low permeability to water. Permanent capping is part of the final restoration following completion of landfill/disposal. Temporary capping is an intermediate cap which may be removed on resumption of disposal.
cell	the compartment within a landfill in which waste is deposited. The cell has physical boundaries which may be a low permeability base, a bund wall and a low permeability cover.
completion	the point when aftercare maintenance and monitoring is completed to such a level that the surrender test is met.
COMAH	Control of Major Accident Hazards Regulations 1999 S.I. 1999/No 743
cover	material used to cover solid wastes deposited in landfills. Daily cover may be used at the end of each working day to minimise odours, wind blown litter, insect or rodent infestation and water ingress. Final cover is the layer, or layers, of materials placed on the surface of the landfill prior to its restoration.
construction quality assurance (CQA)	A planned and systematic application and recording of methods and actions designed to provide adequate confidence that items or services meet contractual and regulatory requirements and will perform satisfactorily in service.
Definitive closure	The point at which the Agency inspects the site and approves closure (normally when the landfill has stopped taking waste for disposal).
emission	The direct or indirect release of substances, vibrations, heat or noise from individual or diffuse sources in an installation into the air, water or land.
European Waste Catalogue	A list of wastes pursuant to Article 1(a) of Directive 75/442/EEC on waste and Article 1(4) of Directive 91/689/EEC on hazardous waste.
existing (installation)	landfill sites which were operational on 15 June 2002 or not brought into operation but the relevant authorisation had been granted.
FAPP – fit and proper person	In accordance with Regulation 4 of the Pollution Prevention and Control Regulations 2000 (as amended), a person shall be treated as not being a fit and proper person if it appears to the regulator that – • he or another relevant person has been convicted of a relevant offence; • he has not made, or will not before commencement of the specified waste management activity make adequate financial provision (either by way of financial security or its equivalent) to ensure that – • the obligations (including after-care provisions) arising from the permit in relation to that activity are discharged; and • any closure procedures required by the permit in relation to that activity are followed; • he and all staff engaged in carrying out that activity will not be provided with adequate professional technical development and training; or • the management of that activity will not be in the hands of a technically competent person.
geomembrane/synthetic	an engineered polymeric material fabricated to a low hydraulic permeability.
geotextile	a geosynthetic material normally from man-made fibres which is fabricated to be permeable.
groundwater	all water which is below the surface of the ground and in direct contact with the ground or subsoil.
hazardous waste	any waste as defined in Article 1(4) of Directive 91/689/EEC(7)

Term	Meaning
inert waste	any waste which does not undergo significant physical, chemical or biological transformations. Inert waste will not dissolve, burn or otherwise physically or chemically react, biodegrade or adversely affect other matter with which it comes into contact in a way which is likely to give rise to environmental pollution or harm human health. The total leachability and pollutant content of the waste and the ecotoxicity of leachate must be insignificant, and in particular not endanger the quality of surface water and/or groundwater. (Regulation 7(4) of the Landfill (England and Wales) Regulations 2002).
installation	- a stationary technical unit where one or more activities listed in Part 1 of Schedule 1 are carried out; and - any other location on the same site where any other directly associated activities are carried out which have a technical connection with the activities carried out in the stationary technical unit and which could have an effect on pollution - and, other than in Schedule 3, references to an installation include references to part of an installation. Within the landfill sector, an installation is defined as the landfill and any associated process directly involved in the physical process of landfilling the waste.
landfill gas	any gas generated from the landfill waste. (Landfill (England and Wales) Regulations 2002)
landfill	a waste disposal site for the deposit of waste onto or into land, including: - internal waste disposal sites, and - a permanent site (i.e. more than 1 year) that is used for temporary storage of waste, but excluding: - facilities where waste is unloaded in order to permit its preparation for further transport for recovery, treatment or disposal elsewhere, and - storage of waste prior to recovery or treatment for a period less than three years as a general rule, or - storage of waste for a period less than one year prior to disposal
Landfill Permit	the permit which is required by the Pollution Prevention and Control Regulations 2000 for the carrying out of the disposal of waste in a landfill. (Regulation 6(2) of the Landfill Regulations 2002).
leachate	any liquid percolating through the deposited waste and emitted from or contained within a landfill. (Landfill Regulations 2002).
LEL (lower explosive limit)	the lowest percentage concentration by volume of a flammable substance in air which will allow an explosion to occur in a confined space at 25 °C and normal atmospheric pressure, and where an ignition source is present (units: %)
liner	a natural or synthetic membrane material, used to line the base and sides of a landfill site to reduce the rate of leachate and gas emissions
MAPP – major accident prevention policy	required for lower tier COMAH installations
monitoring	a continuous or regular periodic check to determine the on-going nature of the potential hazard, conditions along environmental pathways and the environmental impacts of landfill operations, to ensure the landfill is performing according to design. The general definition of monitoring includes measurements undertaken for compliance purposes and those undertaken to assess landfill performance.
new (installation)	landfill sites not operational before 15 July 2002 or not having the relevant authorisation by that date.
non-hazardous waste	any waste not covered by the 'hazardous waste' definition. (Regulation 7(3) of the Landfill (England and Wales) Regulations 2002).
operational phase	includes the installation of the engineering containment system, the active phase (i.e. when the site is accepting waste), and the installation of the capping system, up until the point of definite closure.
operator	the person who has control over the operation of the installation. (Regulation 2(1) and (2) of the Pollution Prevention and Control Regulations 2000).

Form IPPC 1 Part C

Applies if **Variation of an existing permit** on page 4 is ticked

If you wish to vary an existing permit please contact the Environment Agency for guidance.

Form IPPC 1 Part D

Applies if Transfer of an existing permit on page 4 is ticked

If you wish to transfer an existing permit please contact the Environment Agency for guidance.

Glossary of terms

Form IPPC 1 Part E

Applies if **Surrender of an existing permit** on page 4 is ticked

If you wish to surrender a permit please contact the Environment Agency for guidance.

APPLICATION FORM
PART F

Glossary of terms

Form IPPC 1 Part F

F1 Fees and charges

Calculate the application fee and provide the other information requested using the template below. In completing this, you should refer to the detailed charging scheme guidance.

F1.1 Type of application

F1.1.1 What type of new application are you making?	Applies if New permit on page 4 is ticked ☐ First application for mobile plant ☐ Subsequent application for mobile plant ☒ Neither: not an application for mobile plant
F1.1.2 What type of variation are you applying for?	Applies if Variation of an existing permit on page 4 is ticked ☐ Non-chargeable ☐ Standard ☐ Substantial
F1.1.3 What type of transfer are you applying for?	Applies if Transfer of an existing permit on page 4 is ticked ☐ Part of the permit Will a fit and proper person assessment be made by the Agency? ☐ No ☐ Yes <i>Remember to include the FAPP charge when completing Calculation of charge on page 121.</i> ☐ The whole of the permit Will a fit and proper person assessment be made by the Agency? ☐ No ☐ Yes <i>Remember to include the FAPP charge when completing Calculation of charge on page 121.</i>
F1.1.4 What part of the permit are you applying to surrender?	Applies if Surrender of an existing permit on page 4 is ticked ☐ Part of it ☐ All of it ☐ Special case: closure of a landfill site
F1.1.5 Is this a staged application?	☐ Yes ☒ No

F1.2 Type of installation

F1.2.1 Type of installation	☐ Low impact installation ☐ Standard farming: large ☐ Standard farming: small ☐ Directly Associated activity only <i>i.e. you do not undertake any listed activities</i> ☒ Other
-----------------------------	--

F1.3 Invoice address

F1.3.1 Contact name

Title, for example Mr, Ms, Dr

Mr

First name

Philip

Surname

Rees

Position

Environmental and Quality Manager

Address

Building name or number

Nantycaws Landfill Site

Street

Locality

Nantycaws

Town

Carmarthen

County

Carmarthenshire

Postcode

SA32 8BG

Phone number

01267 275536

Fax number

01267 275779

Email address

phil.rees@cwmnvironmental.co.uk

F1.4 EP OPRA summary

Applies if New permit on page 4 is ticked Applies if Variation of an existing permit on page 4 is ticked

This section contains results of the analysis which you completed using the supplied EPOPRA spreadsheet. Please ensure that you have completed the spreadsheet accurately as this information is used to calculate charges.

Press the button below to import the spreadsheet data.

F1.4.1 Complexity

Band	Number	Score
A	0	0
B	0	15
C	1	40
D	0	0
E	0	0

F1.4.2 Emissions

Type	Band	Score
Air	A	3
Water	-	0
Land	D	35
Sewer	-	0
Waste	-	0
Location factor	C	20
Operator performance	B	25

F1.5 Calculation of charge

Calculate the amount you must pay using the questions below. Some of the values you need can be imported from the EPOPRA spreadsheet by clicking the Import data button.

New applications and variations

Applies if **New permit** on page 4 is ticked Applies if **Variation of an existing permit** on page 4 is ticked

Total OPRA charging score

138.00

x Charge multiplier

= Amount £

£23,598.00

Transfer or surrender

Applies if **Transfer of an existing permit** on page 4 is ticked Applies if **Surrender of an existing permit** on page 4 is ticked

Appropriate fixed charge £

Low impact installation

Applies if **Low impact installation** on page 119 is ticked

Appropriate low impact charge £

F | Fees and charges | Calculation of charge

Standard farm permit

Applies if **Standard farming: large** on page 119 is ticked Applies if **Standard farming: small** on page 119 is ticked

Appropriate farm permit charge £

Standard farm permit

Applies if **Directly Associated activity only** i.e. you do not undertake any listed activities on page 119 is ticked

Appropriate directly associated activity charge £

F1.5.1 Do you undertake any Part A(2) or Part B activities?

☒ No
☐ Yes

How many?

Charge per activity

Total charge (charge x number of activities) £

F1.5.2 Total of charges in this section

Fee attached £

£23,598.00

F2 Commercial confidentiality and national security

F2.0.1 Is there any information in the application that you wish to justify being kept from the public register on the grounds of commercial confidentiality?

No ☐
Yes ☒

Document reference number for this information

See Folder 1 Supporting Information QF 2.0.1

F2.1 National security

If there is any information in the application that you believe should be kept from the public register on the grounds of national security, please attach

- full information on separate sheets
- a copy of the application to the Secretary of State for a Direction on the issue of national security.

Do not include anything about national security in this form nor give reference numbers to the relevant information/documents submitted.

F3 Data protection notice

The information you give will be used by the Environment Agency to process your application. It will be placed on the relevant public register(s), and used to monitor compliance with licence/permit conditions, or to process renewal applications.

We may also use and/or disclose any of the information you give us in order to:

- offer/provide you with our literature/services relating to environmental matters
- consult with the public, public bodies and other organisations (for example Health and Safety Executive, local authorities, emergency services, DEFRA on environmental issues
- carry out statistical analysis, research and development on environmental issues
- provide public register information to enquirers
- investigate possible breaches of environmental law and take any resulting action
- prevent breaches of environmental law
- assess customer service satisfaction and improve our service.

We may pass on the information to agents/representatives who we ask to do any of these things on our behalf.

Individuals have a right to see the information we hold about them. We will correct it if it is inaccurate.

You should ensure that any persons named on this form are informed of the contents of this data protection notice.

Disclosing information you give us in this application

The law says we must place your application on the public register unless you provide good reasons why it should stay confidential.

If you want any of the information in your application to remain confidential, enclose a letter with the completed application, giving your reasons in full.

We will let you know within 14 days if we agree that the information is confidential.

F4 Any other information

F4.0.1 Is there any other information that you wish to submit in support of your application?

No ☒
 Yes ☐

Please give a brief summary here and provide document reference numbers for supporting documents

Declaration and signatures

It is an offence under Regulation 32 of the PPC Regulations to

- make a statement which you know to be false or misleading in a material particular
- recklessly make a statement which is false or misleading in a material particular

for the purpose of obtaining a permit (for yourself or anyone else) or seeking the variation, transfer or surrender of a permit.

If you make a false statement

- we may prosecute you and
- if you are convicted, you are liable to a fine or imprisonment, (or both).

For information on the number of copies of your application you must submit, see the Submission document on the CD.

Declaration

F5.0.1 I/we certify that the information in this application is correct. I/we apply

- ☒ for a new permit
☐ to vary an existing permit
☐ for a transfer of an existing permit
☐ to surrender an existing permit

in respect of the particulars described in this application (including supporting documentation I/we have supplied).

Signatures

F5.0.2 Signature(s) of current operator

Please note that each individual operator must sign a paper copy of the declaration themselves, even if an agent is acting on their behalf.

For applications from

- more than one person – all persons should sign below
- a company or other corporate body – an authorised person should sign below

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Please complete details of the person who will sign. Signature box will appear when you print the completed form.

Title, for example Mr, Ms, Dr

MR

First name

LAUCE

Surname

JONES

Position or job title

MANAGING DIRECTOR

Date

3/5/04

▲ End of the repeatable answer fields.

Signature



F5.0.3 Signature(s) of proposed transferee(s)

Applies if Transfer of an existing permit on page 4 is ticked

▼ The answer fields between this dotted marker and the next can be repeated as needed either by printing them out or using separate sheets. Include the question number on each sheet.

Please complete details of the person who will sign. Signature box will appear when you print the completed form.

Title, for example Mr, Ms, Dr

First name

Surname

Position or job title

Date

▲ End of the repeatable answer fields.

References

For a full list of available Technical Guidance visit the Environment Agency website <http://www.environment-agency.gov.uk>. Many of the references below are being made available free of charge for viewing or download on the website.

Environment Agency guidance

Hydrogeological risk assessment for landfills and the derivation of groundwater trigger levels (LFTGN01 March 03)

GasSim IPPC H1 – Horizontal guidance note: environmental assessment and appraisal of BAT

IPPC H3 – Horizontal guidance for noise, Part 1 – Regulation and permitting, Part 2 – assessment and control (September 02)

IPPC H2 – Horizontal guidance note: energy efficiency (Version 3 – January 02)

IPPC Regulatory Guidance Series No. 3 – Understanding the Meaning of "Operator" under IPPC

IPPC Regulatory Guidance Series No.4 – Interpretation of Schedule 1 to the PPC Regulations

IPPC Regulatory Guidance Series No.5: Interpretation of "Installation" in the PPC Regulations

Interim national waste acceptance procedures (August 02)

Waste treatment requirements of Article 6a of the Landfill Directive (January 02)

Guidance for the implementation of the European Waste Catalogue

Procedure for identifying risks from landfills (out for external consultation January 04)

Guidance on landfill completion (external consultation February 2003)

Regulatory guidance note 14: the duty of care and the European Waste Catalogue

Revision of criteria and protocols of assessment and classification of hazardous waste

Monitoring of landfill leachate, surface water and groundwater (LFTGN 02, February 2003)

Guidance for the management of landfill gas (external consultation stage)

LFD Regulatory guidance note 1: Classification of sites (January 02)

LFD Regulatory guidance note 3: Groundwater protection: locational aspects of landfills in planning consultation responses & permitting decisions after 16 July 2001

LFD Regulatory guidance note 6: Interpretation of the engineering requirements of Annex 1 of the Landfill Directive

LFD Regulatory guidance note 16: Establishing the area to be covered by a pollution prevention and control permit for a landfill

LFD Regulatory guidance note 11: The disposal in landfills for non-hazardous waste of: stable, non-reactive wastes; asbestos wastes; wastes with high sulphate or gypsum contents

Guidance for monitoring landfill gas surface emissions (awaiting external consultation)

Guidance for monitoring landfill gas engine emissions (external consultation stage)

Guidance for monitoring enclosed landfill gas flares (awaiting external consultation)

Guidance for monitoring trace components in landfill gas (external consultation stage)

Technical guidance document (monitoring) M17: Monitoring of particulate matter in ambient air around waste facilities (awaiting external consultation)

Guidance on landfill gas flaring (awaiting publication)

Guidance on gas treatment technologies for landfill gas engines (awaiting external

consultation)

Noise guidance, internal guidance for the regulation of noise at waste management facilities (July 2002) Version 3.0

Odour guidance, internal guidance for the regulation of odour at waste management facilities (July 2002) Version 3.0

IPPC H4 Technical guidance note, horizontal guidance for odour, Part 1 – Regulation and Permitting (draft), Part 2 – Odour Assessment and Control (draft)

Other relevant Environment Agency documentation

Stability of landfill lining systems: Report no. 1 (P1-385/TR1 and TR2)

Indicative Flood Plain Maps – these may be obtained from the Agency's website and provide information on the 100 year or worst recorded flood line. If you are within this line you should contact the appropriate Area Customer Contact team who will be able to provide information on flood risk at the specific location.

BS noise standards

BS 5228 Noise and vibration control on construction and open sites. Part 1: 1997 Code of practice for basic information and procedures for noise and vibration control, BSI ISBN 0 580 26845 4; Part 2: 1997 Guide to noise and vibration control legislation for construction and demolition including road construction and maintenance, BSI ISBN 0 580 26866 7; Part 3: 1997 Code of practice applicable to surface coal extraction by opencast methods, BSI ISBN 0 580 268748; Part 4: 1992 Code of practice for noise and vibration control applicable to piling operations, BSI ISBN 0 58020381 6; Part 5. Code of practice applicable to surface mineral extraction (except coal) sites, BSI ISBN 0 580 28306 2

BS 4142: 1997 Method for rating industrial noise affecting mixed residential and industrial areas, BSI ISBN 0 58028300 3

Other relevant publications

Pollution Prevention and Control Act, 1999

Statutory Instrument No. 1973: The Pollution Prevention and Control (IPPC) (England and Wales) Regulations 2000

Statutory Instrument No. 1559: The Landfill (England and Wales) Regulations 2002
Integrated Pollution Prevention and Control, a practical guide, Edition 2 June 2002,
Department for Environment, Food and Rural Affairs

SUPPORTING INFORMATION

Nantycaws Landfill PPC Application Forms

Supporting Information Appendices

1.	Q A1.0.5	Summary Of Existing Permits
2.	Q A3.1.3	Certificates Of Incorporation
3.		Site Conditioning Plan
4.	Q B0.2	Non-technical Summary
5.	Q B2.1.4	Proposed Waste Types for Disposal pre July 2004
6.	Q B2.1.5	Proposed Waste Types for Disposal post July 2004
7.	Q B2.1.6	Waste For Restoration
8.	Q B2.2.27	Off Site Leachate Treatment
9.	Q B2.2.58	Site Security
10.	Q B2.3.1	Organogram
11.	Q B2.4.1	Raw Materials
12.	Q B2.7.1	Energy
13.		Environmental Management Systems
14.	Q B7.2.1	Copy Of Relevant Planning Permission
15.	Q B7.3.1	Relevant Offences/Convictions
16.	Q B7.4.1	Certificates Of Technical Competence
17.	Q B7.4.4	Management Of Other Installations
18.	Q B7.4.5	Company Training Plan and documentation
19.	Q B7.6.1	Expenditure Plan
20.	Q B9.0.1	Improvement Plan
21.	Q F2.0.1	Commercial Confidentiality Statement

NantyCaws Landfill PPC Application
Reference No. CP3735PB
Application Form Supporting Information

Q A.1.0.5 Summary of Existing Permits

TYPE	PERMIT REF.	PERMISSION FOR	DATE ISSUED
Waste Management Licence	EAWML34144 (SWW/160L)	Disposal of Waste	28/2/97
Discharge Consent	BP0266401	Trade Effluent Discharge	17/04/97

Nanty Caws Landfill PPC Application
Reference No. CP3735PB
Application Form Supporting Information

Q A3.13 Certificates of Incorporation



(2)

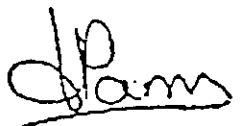
**CERTIFICATE OF INCORPORATION
ON CHANGE OF NAME**

Company No. 2640102

The Registrar of Companies for England and Wales hereby certifies that
CARMARTHEN DISTRICT WASTE DISPOSAL COMPANY LIMITED

having by special resolution changed its name, is now incorporated
under the name of
CWM ENVIRONMENTAL LTD.

Given at Companies House, Cardiff, the 8th May 1997


MRS. L. PARRY

For the Registrar of Companies



C O M P A N I E S H O U S E

HC006A
TOTAL P.02

Nanty Caws Landfill PPC Application
Reference No. CP3735PB
Application Form Supporting Information

Site Conditioning Plan


**ENVIRONMENT
AGENCY**

Landfill conditioning plan

Waste management

For Environment Agency use only

Conditioning plan reference number

34144

Date received

12/7/2002

Payment received?

No

Yes ☒ amount received

£ 675

Landfill classification

M2 → N2 M2 2004

PPC application?

No

Yes ☐ date required

Closure required?

No

Yes ☐

Format notification reference number

Pet cemetery?

No ☒Yes ☐

Habitats Regulations review pack(s)

copies

Please read through this form and the guidance notes that came with it before you start to fill it in. Please write clearly in the answer spaces.

Who needs to submit a conditioning plan

You need to prepare a conditioning plan if

- you are the operator of an existing landfill site and
- you propose to accept waste after 16 July 2002.

Please refer to the covering letter that came with this form for further details.

When you need to make your submission

You need to submit the plan to us by 16 July 2002.

If you do not do so then you must stop accepting waste for disposal immediately. Your licence will remain in force.

If you do not complete the form properly your plan may be rejected and your site closed.

What is a conditioning plan?

Before completing this form you are advised to read the 'General regulatory guidance to landfill operators/licence holders' that came in the landfill conditioning plan folder. You can discuss this with us if you need to.

A conditioning plan for your landfill will comprise

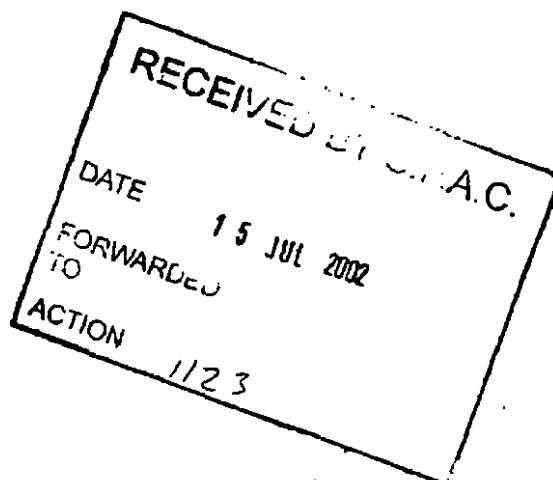
- the completed form
- 3 copies of the scale drawing question B1.1
- the correct fee we will advise you of this separately in March.

You must use this form when submitting your conditioning plan. The completed form should tell us about any corrective measures to your site that you propose.



Cheque No. 103053

Receipt No. 0086



What will it be used for

When we receive your plan we will decide if the site

- can continue to receive waste pending determination of the subsequent PPC permit application or
- should close.

There is more about this in 'Continued operation and any PPC application' on page 3.

Before you start to fill in the form

Please read through the questions and their guidance notes before you start as well as the other documents in the pack.

These are

- 1 *Landfill Directive: general regulatory guidance to landfill operators/licence/permit holders*
- 2 *Landfill Directive regulatory guidance note 1: classification of sites*
Outlines how we will undertake the process of classification, defines which sites will be affected by the Directive and describes the three classes of landfill.
- 3 *Landfill Directive regulatory guidance note 2: interim waste acceptance criteria and procedures*
Interim guidance on determining the types of waste your landfill will be able to accept, and the procedures for waste acceptance that you should provide.
- 4 *Landfill Directive regulatory guidance note 4: defining 'existing landfill sites'*
Defines
 - the area of land that constitutes a landfill site for the conditioning plan
 - the site as part of an installation for a PPC application.
- 5 *Landfill Directive regulatory guidance note 7: requirements for landfills that stop operating under the Landfill Directive.*
- 6 *Example of a scale drawing*
Shows you the type of details you need to include on the drawing, and how they should be shown.
You will be required to prepare a scale drawing of your landfill as part of your conditioning plan. This is explained in 'B1 Your landfill in relation to its local environment', page 7.

You may also have

- 7 *Landfill Directive regulatory guidance note 5: Habitats Regulations and the Landfill Directive*
- 8 *Habitats Regulations review pack*
The Agency has to review the impacts of existing landfills on certain vulnerable habitats.
The review pack details
 - any designated Habitats sites which may lie within the 5km 'buffer zone' around your landfill
 - the features of those sites which are at risk
 - the landfill-related hazards to which the features are vulnerable.

Before you fill the form in, we suggest you make a photocopy so you can prepare an initial draft. Once you have completed the 'good' copy, make sure you take a photocopy of it and your scale drawing to keep for your own records.

Continuation sheets

If you need more space for any of your answers, please use a continuation sheet. But make sure that you label each sheet clearly with the

- conditioning plan reference number, you can find this on page 1 of the form
- question number it applies to
- number of the sheet, for example 3 of 5.

How many conditioning plans you need to submit

You only need to submit one conditioning plan for your site, even if your landfill is subject to more than one licence or permit.

Fees

There will be a charge for processing and reviewing your conditioning plan.

We will write to you in March to let you know the fee.

Your plan must be accompanied by payment of the fees.

If you need help and advice

If you have any queries regarding the form, or the preparation of the relevant information, please contact the person named on the covering letter or your local Agency office. The address is stamped on the folder pocket.

Completing the form

A significant part of the effort in preparing your conditioning plan will be in providing the scale drawing of your site to the specification given in 'B1 Your landfill in relation to its local environment'. You may want to ask a land surveyor or mapping consultant to do this.

Parts of the form

There are 5 parts to the form.

Everyone has to fill in Parts A, B, E and C and/or D.

Part A – location and contact details

Part B – your landfill site

It comprises 7 sections

- 'B1 Your landfill in relation to its local environment'
- 'B2 Area covered by the conditioning plan'
- 'B3 Landfill classification'
- 'B4 Habitats at risk from your landfill'
- 'B5 Size of your landfill'
- 'B6 Wastes accepted on your site that are banned under the Landfill Directive'
- 'B7 The waste acceptance procedures and criteria for your landfill'

Part C – Areas taking hazardous or non-hazardous wastes: current standards and corrective measures

Complete this for any area of landfill covered by your conditioning plan which

- has received
- is currently receiving
- is intended to receive

hazardous or non-hazardous wastes, including hazardous waste that is stable and non-reactive.

Part D – Areas taking inert wastes: current standards and corrective measures

Complete this for any area of landfill covered by your conditioning plan which has received and will receive only inert wastes.

Part E – Checklist, data protection and declaration.

Continued operation and any PPC application

Continued operation

If we decide that your landfill has a reasonable prospect of meeting the standards in the Directive we will let you know

- that you can continue operating under current controls until you have a PPC permit
- the date by which you must make your PPC application.

The date will be based on the information you give in your conditioning plan.

PPC application timetable

Sites that pose the biggest environmental risk will generally need to apply earlier than those with a smaller risk. The Agency will assess risk according to the features of your landfill such as types of waste to be accepted, types of engineering required and location in relation to groundwater, surface water, dwellings and Habitats sites.

Most of this information should be contained in your conditioning plan.

In all cases we will give you at least 6 months notice of the date when your application is required.

Closure

If we consider that your site needs to close, we will discuss this with you as soon as possible.

A About the operator and site location

The primary responsibility for completing this form is on the operator. The operator is the legal entity (company/partnership or individual) who has day-to-day control of the operation of the landfill.

Where the operation of the landfill is authorised by a PPC permit, the operator and the holder of the permit will be the same person. However, this might not be the case where the landfill is authorised by a waste management licence. Where the operator and the licence holder are different both parties should complete the declaration in Part E.

A1 Contact details

A1.1 Please give us details of someone we can contact (who has the authority to act on your behalf) with questions about the conditioning plan

This can be someone acting as an 'agent' for the operator.

Name

Title	MR	First	PHILIP
Surname	REES		
Position	ENV. + QUALITY MANAGER		
Address	NANTYCAWS LANDFILL SITE		
	NANTYCAWS		
	CARMARTHEN		
	Postcode SA32 8BG		
Phone	01267 275536		
Fax	01267 275779		
Email	phil.rees@cwmenvironmental.co.uk		

A2 Operator details

A2.1 Is the operator

- ☒ a company or corporate body go to question A2.2
☐ a partnership go to question A2.3
☐ an individual (sole trader) or group of individuals go to question A2.4

A2.2 Please give us the following details.

Full name of company or corporate body

CWM ENVIRONMENTAL LTD
Trading/business name (if different)
Registered office address
NANTYCAWS LANDFILL SITE
NANTYCAWS
CARMARTHEN
Postcode SA32 8BG
Principal office address (if different)
Postcode

Company registration number

2640102

Date of formation of company

8-5-1997

- For companies, please provide a copy of the certificate of incorporation and any certificates of subsequent name changes.
- For other corporate bodies please provide evidence of status.

Now go to question A2.5

A2.3 Please give partnership details

We need details of each person in the partnership. Continue on separate sheets if you need to.

Partner 1

Full name
Date of birth
Principal place of business
Postcode

Contact numbers

Phone
Fax

Partner 2

Full name
Date of birth
Principal place of business
Postcode

Contact numbers

Phone
Fax

Now go to question A2.5

A About the operator and site location continued

A2.4 Please give individual or group of individuals details

Full name

Date of birth

Trading/business name (if any)

Business address

Postcode

Contact numbers

Phone

Fax

Now go to question A2.5

Licence holder

A2.5 Is the current operator also the licence/permit holder?

No ☐

Yes ☒ go to question A2.10

A2.6 Is the licence holder

☒ a company or corporate body go to question A2.7

☐ a partnership go to question A2.8

☐ an individual (sole trader) or group of individuals go to question A2.9

A2.7 Please give us the following details.

Full name of company or corporate body

Trading/business name (if different)

Registered office address

Postcode SA32 8BG

Principal office address (if different)

Postcode

Company registration number

Date of formation of company

- For companies, please provide a copy of the certificate of incorporation and any certificates of subsequent name changes.

- For other corporate bodies please provide evidence of status.

Now go to question A2.10

A2.8 Please give partnership details

We need details of each person in the partnership.

Continue on separate sheets if you need to.

Partner 1

Full name

Date of birth

Principal place of business

Postcode

Contact numbers

Phone

Fax

Partner 2

Full name

Date of birth

Principal place of business

Postcode

Contact numbers

Phone

Fax

Now go to question A2.10

A2.9 Please give individual or group of individuals details.

Where more than one person is applying (other than as a partnership) we need details of each person.

Continue on separate sheets if necessary.

Full name

Date of birth

Trading/business name (if any)

Business address

Postcode

Contact numbers

Phone

Fax

A About the operator and site location continued

A2.10 Will the current operator still be the operator on 16 July 2002?

No ☐ *please give the new operator's details below*

Yes ☒

Not known at present ☐

New operator: company or corporate body

Full name of company or corporate body

Trading/business name (if different)

Registered office address

Postcode

Principal office address (if different)

Postcode

Company registration number

Date of formation of company

New operator: individual, group of individuals or partnership

We need details of each person in a group or a partnership. Continue on separate sheets if you need to.

Person 1

Full name

Date of birth

Trading/business name, if any

Principal place of business

Postcode

Contact numbers

Phone

Fax

Person 2

Full name

Date of birth

Trading/business name, if any

Principal place of business

Postcode

Contact numbers

Phone

Fax

A3 Location of the landfill

A3.1 Address and location of site

Address

NANTYCAWS

CARMARTHEN

Postcode SA32 8BG

If the address is not clear, please give a description of the location of the site

A3.2 Please give one Ordnance Survey national grid reference for the site

You can find OSNGRs on an Ordnance Survey map.

For example, ST 123 456

OSNGR for the site entrance

or

OSNGR for the centre of the site

B About your landfill site

Before going any further please read

- *Regulatory guidance note 1: classification of sites*
- *Regulatory guidance note 4: defining 'existing landfill sites'*

These documents are included in the landfill conditioning plan folder. You can discuss their contents with us if you need to.

B1 Your landfill in relation to its local environment

B1.1 Please enclose 3 copies of the scale drawing with the form.

The purpose of the scale drawing is to identify the

- extent of the existing landfill site
- features of the local environment which may be impacted by your landfill.

This will help us to evaluate the rest of your conditioning plan.

The scale of your drawing should be 1:2500, or other recognised scale that is sufficient to show the following details, on one sheet of paper of maximum A0 size (840 x 1188mm).

You should follow the style and notation of the sample drawing that we have sent you.

Make sure the conditioning plan reference number is written on every copy of the scale drawing.

You can find this number in the first column of page 1.

What the drawing must include

The drawing label must include the

- site name 'Anytown landfill site'
- name and address of the operator 'Anytown Waste Management Ltd'
- date the drawing was made
- scale of the drawing.

Your drawing should follow the enclosed example site drawing and show the following

- 1 boundary of the whole site
- 2 all areas of infilling of the site separately identified, for example Cell 1, Phase A
- 3 boundaries of any areas that were covered by licence/permits or resolutions which have been surrendered/rescinded. *These are not covered by the conditioning plan, but are required on the scale drawing for clarity.*
- 4 licensed area boundary, including any parts of the site that may have closed and 'contours' of this boundary at distances of 50, 250 and 500 metres.
- 5 closed area boundaries *These are not covered by the conditioning plan, but are needed for clarity.*
- 6 existing operational area boundaries, as listed – including a note stating
 - whether there is an engineered liner for that cell or phase and its type, for example clay, clay/bentonite etc.
 - the category of waste that has been or is being deposited in that cell or phase (as listed in the table on page 8)
- 7 boundaries of any areas which are currently licensed or permitted but not yet operational – and stating
 - whether there is an engineered liner for that cell or phase and its type, for example clay, clay/bentonite etc.
 - the category of waste that will be deposited in that cell or phase (as listed in the table on page 8)
- 8 any areas that overlap one another

9 the location of

- the site entrance(s)
- the waste reception and storage areas, including any current or planned storage bays
- any surface water management discharge points to sewer or other route
- any leachate treatment plant and/or discharge points to sewer or other route
- any plant for the treatment, use (utilisation plant) and/or disposal (flaring) of landfill gas

10 the following environmental receptors, where they are within 500 metres of the boundary of the licensed area

- domestic dwellings
- schools and colleges
- hospitals
- sensitive habitats and environmental areas for example SSSIs
- beaches
- offices, industrial units and commercial premises
- public footpaths or bridleways
- major highways and minor roads
- open spaces, parks and farmland
- surface water bodies, including streams, rivers, canals, ponds, lakes.

These details will enable us to identify the environmental receptors that are at risk from your landfill.

Larger PPC installations

Where the landfill is part of a larger PPC 'installation', for example a cement works, then the conditioning plan must only cover the landfill site and associated infrastructure – not the whole 'installation'. You can show the extent of any such installation on your drawing but you must do this in a way that distinguishes it from the area covered by this conditioning plan.

Groundwater vulnerability

Please refer to the Agency's groundwater vulnerability maps posted on the Agency website

<http://www.environment-agency.gov.uk>

B1.2 Is your site on an aquifer?

No ☒

Yes ☐

- ☐ major aquifer
- ☐ minor aquifer

B1.3 Is your site within a source protection zone (SPZ)?

No ☒

Yes ☐

- ☐ SPZ1
- ☐ SPZ2
- ☐ SPZ3

B About your landfill site continued

B2 Area covered by the conditioning plan

When completing the table below, only include areas which have not been formally notified to us as having been closed by the time you submit your conditioning plan (16 July 2002 at the latest).

Identifying the landfill areas at licensed sites

There is an explanatory note on page 9 to help define the waste types. If you need more guidance, look at *Regulatory guidance note 4: defining 'existing landfill sites'* which came with this form.

You can photocopy this table or continue on separate sheets if you need to.

B2.1 Currently licensed and operational areas that will continue after 16 July 2002

Area identification as on scale drawing e.g. 'Cell 1', 'Phase A'	Licence/permit number	date issued	Wastes received tick all that apply per area					Expected date of final waste acceptance	
			hazardous	stable and non-reactive hazardous	non-hazardous	inert	bio-degradable	month	year
CELL 1	34144	28/2/97	☒	☒	☒	☒	☒	01	04
CELL 2	34144	28/2/97	☒	☒	☒	☒	☒	01	04
CELL 3	34144	28/2/97	☒	☒	☒	☒	☒	01	04
			☐	☐	☐	☐	☐		
			☐	☐	☐	☐	☐		
			☐	☐	☐	☐	☐		
			☐	☐	☐	☐	☐		
			☐	☐	☐	☐	☐		
			☐	☐	☐	☐	☐		
			☐	☐	☐	☐	☐		

B2.2 Currently licensed but not yet operational areas

Area identification as on scale drawing e.g. 'Cell 1', 'Phase A'	Licence/permit number	date issued	Wastes received tick all that apply per area					Expected date of final waste acceptance	
			hazardous	stable and non-reactive hazardous	non-hazardous	inert	bio-degradable	month	year
CELL 4	34144	28/2/97	☒	☒	☒	☒	☒	07	05
CELL 5	34144	28/2/97	☐	☐	☒	☒	☒	07	07
			☐	☐	☐	☐	☐		
			☐	☐	☐	☐	☐		
			☐	☐	☐	☐	☐		
			☐	☐	☐	☐	☐		
			☐	☐	☐	☐	☐		
			☐	☐	☐	☐	☐		
			☐	☐	☐	☐	☐		
			☐	☐	☐	☐	☐		

B2.3 Areas of the landfill that will be closed before 16 July 2002

This information is needed for clarity.

Resolution, licence or permit details

Area identification as on
scale drawing

e.g. 'Cell 1', 'Phase A'

number

date issued

date of closure

If you are not sure whether an area will be closed by 16 July 2002, include it in question B2.1.

If you do not, you will have to stop accepting waste in that area after 16 July 2002.

Explanatory note

Biodegradable waste is waste that undergoes anaerobic or aerobic decomposition, for example food, garden waste, paper. They produce landfill gas as well as leachate which will occur in non-hazardous wastes, particularly municipal wastes.

Hazardous waste is waste that is listed under a 6-digit code on the Hazardous Waste List established under the Hazardous Waste Directive.

Visit <http://europa.eu.int/comm/environment/impel/wastelst.htm>

For the European Union's consolidated legislation on hazardous wastes see

http://www.europa.eu.int/eur-lex/en/consleg/pdf/2000/en_2000D0532_do_001.pdf

It can only be deposited in a hazardous waste landfill.

Inert waste is non-hazardous waste that does not

- undergo any significant physical, chemical or biological transformations
- dissolve
- burn
- physically or chemically react
- biodegrade or
- adversely affect other matter it comes into contact with in a way likely to give rise to environmental pollution or harm human health

and its

- total leachability and pollutant content and
- leachate ecotoxicity

are insignificant and, in particular, do not endanger the quality of any surface water or groundwater.

Municipal waste is waste from households, as well as other waste which, because of its nature or composition, is similar to waste from households.

Non-hazardous waste is waste which is not listed on the Hazardous Waste List, and includes for example

- municipal waste
- inert waste.

Stable and non-reactive hazardous waste is hazardous waste that

- has, for example, been solidified
- has leaching behaviour equivalent to that of non-hazardous waste
- meets certain criteria see *Regulatory guidance note 2: interim waste acceptance criteria and procedures* and
- may be deposited in a non-hazardous waste landfill.

B3 Landfill classification

You must decide which class of landfill site you wish to operate under the Directive. We will have advised you of our views on your site's classification based on the types of waste that it is currently authorised to accept ('preliminary classification').

Your proposals

The proposals must be appropriate for the class of landfill you intend to operate. Classification will affect the

- types of waste which you can accept onto your site
- timing and impact of some of the requirements of the Landfill Directive
- date you will be required to submit your subsequent application for a PPC permit (or variation of your existing permit, where one is already in force).

If the information you provide does not meet the requirements relevant to the proposed classification you have identified, then we may not accept your conditioning plan and may require you to close the site.

Hazardous waste

If we have advised that the landfill should be classified as a 'landfill for hazardous waste' then tick the 'Landfill for hazardous waste' box. However, in this case you can

- carry on operating as a hazardous waste landfill, in which case the site will be subject to the obligations on hazardous waste landfills set out in the Landfill Directive or
- stop taking hazardous waste by 16 July 2004 and operate as a non-hazardous landfill from then on, or
- stop taking hazardous waste by 16 July 2002 and opt for a non-hazardous or inert waste classification as appropriate.

In order to accept hazardous waste after 16 July 2002, the site must be formally classified by us as a landfill for hazardous waste.

Non-hazardous or inert waste

If we have advised that your site falls into either of the other two categories (non-hazardous or inert), this will have been based on the wastes currently permitted under the waste management licence and will help you to prepare your conditioning plan.

If you want to operate the site as a different class of landfill from the preliminary classification, your conditioning plan must reflect the change.

For non-hazardous or inert landfills, classification will not formally take place until a PPC Permit is issued.

Revising plans

You will not be able to revise your conditioning plan after 16 July 2002.

B3.1 Which class of landfill do you propose to operate?

You should read 'Regulatory guidance note 1: classification of sites', which came with this pack.

- ☐ hazardous waste
- ☒ hazardous waste changing to non-hazardous waste before 16 July 2004
- ☐ non-hazardous waste
- ☐ inert waste

B3.2 Is your site operated as a pet cemetery?

- No ☒
- Yes ☐

B4 Habitats at risk from your landfill

B4.1 Have you received a Habitats Regulations review pack with this form?

If we have sent one to you it will be in the folder that contained this form.

- No ☐ This means we have not identified any habitat sites within 5km of your landfill. Please go to 'B5 Size of your landfill'
- Yes ☒ This means we have identified at least one habitat site within 5km of your landfill that may be at risk from your activities. If your landfill is currently covered by more than one licence/permit, then you may have received more than one Habitats Regulations review pack.

If you have ticked 'yes' to this question you should read the following notes and study the contents of the Habitats Regulations review pack(s).

So-called 'habitats sites' have been identified in accordance with several European Directives. These sites must be protected in order to maintain a coherent ecological network within Europe. If there are any habitats sites within a 5km zone around your landfill you will need to assess the potential for your landfill to impact on the features of the site(s) that have led to its designation.

In many cases this assessment of risks to habitats sites will have to be carried out as part of a subsequent PPC permit application – you do not need to undertake a full risk assessment now. We are providing you with this information about habitats sites at this early stage to help you identify any extra measures that may be necessary to address particular risks. The Habitats Regulations review pack sets out the sensitive features of the habitats site(s) and the possible risks to these that could result from your landfill.

In reaching a decision on the PPC application we will have to consider your risk assessment and decide on the adequacy of any proposed remedial or preventative measures. Where affected landfills close before a PPC application is made a risk assessment will need to be carried out at the point of closure.

B5 Size of your landfill

B5.1 Will the site accept more than 10 tonnes of waste in any one day?

- No ☐
- Yes ☒

B5.2 Is the total overall capacity (not just the remaining void-space) of the site greater than 25 000 tonnes?

- No ☐
- Yes ☒

B6 Wastes accepted on your site that are banned under the Landfill Directive

Sites classified as hazardous waste landfills have to stop accepting other types of waste after 16 July 2004.

B6.1 Please complete the following table.

Implementation dates differ depending on the type of waste accepted.

Banned wastes currently accepted

Do you accept, in your currently operational areas, any of the following	Final dates for accepting those wastes at landfills for			
	No	Yes	hazardous	non-hazardous and inert
Liquid waste including waste waters but excluding sludge	☒	☐	July 2002	July 2002–2007
Waste, which in the conditions of landfill is explosive, corrosive, oxidising, highly flammable or flammable see 'Notes' below	☒	☐	July 2002	July 2002
Hospital and other clinical infectious wastes from medical or veterinary establishments	☒	☐	July 2002	July 2002
Chemical substances from research and development or teaching activities, for example laboratory residues, which are unidentified and/or which are new and whose effects on man and/or the environment are unknown	☒	☐	July 2002	July 2002
Whole used tyres other than tyres used as engineering materials, bicycle tyres and tyres with an outside diameter of more than 1400mm *	☒	☐	July 2003	July 2003
Shredded tyres other than bicycle tyres and tyres with an outside diameter of more than 1400mm *	☐	☒	July 2004	July 2006
Any other waste that does not fulfil the relevant waste acceptance criteria for this class of site	☒	☐	July 2002	July 2002–2007
Waste which has been diluted or mixed solely to meet the relevant waste acceptance criteria for this class of site	☒	☐	July 2002	July 2002–2007

* From 16 July 2004 hazardous sites can take hazardous waste only. Other waste types, for example tyres, can no longer be accepted.

B6.2 Do you currently dispose of hazardous and non-hazardous waste together?

No ☐

Yes ☒ *you can continue to co-dispose hazardous and non-hazardous waste until July 2004, provided your site is classified as a landfill for hazardous waste.*

Notes

Definitions for the purposes of the Directive

1 explosive

substances and preparations which may explode under the effect of flame or which are more sensitive to shocks or friction than dinitrobenzene

2 corrosive

substances and preparations which may destroy living tissue on contact

3 flammable

liquid substances and preparations having a flash point equal to or greater than 21°C and less than or equal to 55°C

4 highly flammable

- liquid substances and preparations having a flash point below 21°C (including extremely flammable liquids) or
- substances and preparations which may become hot and finally catch fire in contact with air at ambient temperature without any application of energy or
- solid substances and preparations which may readily catch fire after brief contact with a source of ignition and

which continue to burn or be consumed after removal of the source of ignition or

- gaseous substances and preparations which are flammable in air at normal pressure or
- substances and preparations which, in contact with water or damp air, evolve highly flammable gases in dangerous quantities

5 infectious

substances containing viable micro-organisms or their toxins which are known or reliably believed to cause disease in man or other living organisms

6 oxidising

substances and preparations, which exhibit highly exothermic reactions when in contact with other substances, particularly flammable substances.

B7 The waste acceptance procedures and criteria for your landfill

You should refer to *Regulatory guidance note 2: interim waste acceptance criteria and procedures* when completing this section.

About your waste acceptance procedures

B7.1 Do they ensure that banned wastes are not accepted at your landfill?

No ☐

Yes ☒

Level 1 checks

B7.2 Do you ensure Level 1 checks are carried out on the wastes?

You must ensure that the waste has been characterised before it is delivered to your landfill.

No ☐

Yes ☒

Level 2 checks

B7.3 Do you carry out Level 2 checks on the wastes?

You must check that wastes conform to their basic characterisation.

No ☐

Yes ☒

Level 3 checks

B7.4 Do you carry out Level 3 checks on the wastes?

You must inspect the waste at the landfill entrance and at the point of deposit to check that it matches the transfer note.

No ☐

Yes ☒

B7.5 Do you keep Level 2 samples and the results of the analyses for at least one month?

No ☐

Yes ☒

B7.6 Do you check that waste has been treated before accepting it at your landfill?

No ☐

Yes ☒

B7.7 Do you keep a register showing the following?

- the quantities of waste deposited
- its characteristics
- its origin
- the dates of its delivery
- the identity of the producer or, in the case of municipal waste, the collector
- the precise location of any hazardous waste on the site

No ☐

Yes ☒

B7.8 Do you provide a written receipt to the person delivering the waste?

No ☐

Yes ☒

B7.9 Do you let us know as soon as reasonably possible if you have rejected a delivery?

You must let us know about any rejections within 7 days.

No ☐

Yes ☒

B7.10 Do the currently accepted wastes meet the relevant national waste acceptance criteria?

Please see 'Regulatory guidance note 2'.

No ☐

Yes ☒

B7.11 Have you answered 'no' to any of the questions in section 'B7 The waste acceptance procedures and criteria for your landfill'?

No ☒ go to 'Engineering guidance for Parts C and D' overleaf

Yes ☐ please give details of any corrective measures you intend to take

Engineering features of a landfill

The Landfill Directive uses a number of terms relating to the natural geological barriers and engineered features of landfills. The diagram illustrates the Agency's interpretation of these terms.

Corrective measures

The conditioning plan will identify whether

- existing measures are sufficient to meet the Directive's requirements or
- corrective measures will be needed and how you plan to deliver them.

You should note that the Landfill Directive does not require retrospective basal re-engineering of existing areas. The hydrogeology of your landfill is determined by its location.

The diagram is illustrative. It does not set minimum or maximum standards that apply to every site.

For example

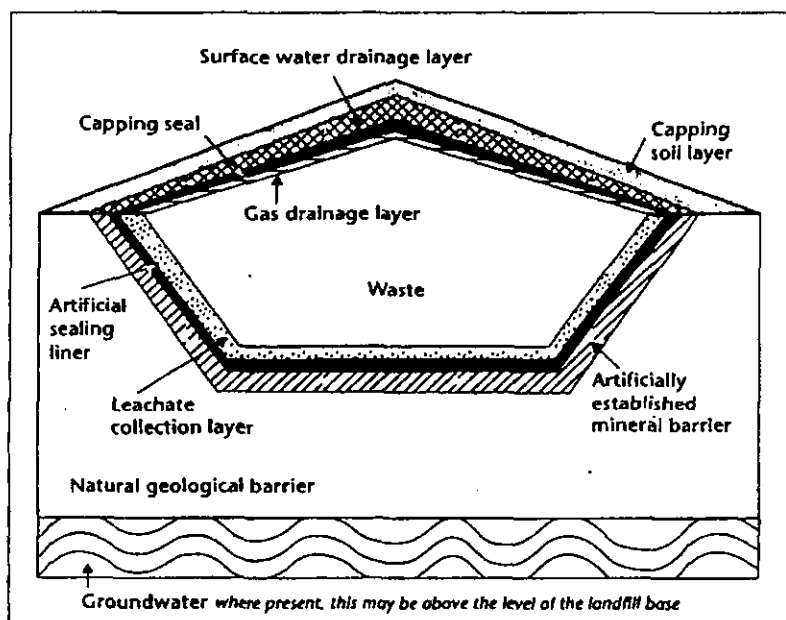
- the capping measures are not mandatory requirements
- in some cases the artificial sealing liner and the leachate collection layer may not be required
- inert waste landfills may not require an artificially established mineral barrier in addition to any natural geological barrier.

Risk assessment carried out when a PPC application is submitted will be used to identify the detailed engineering requirements.

You can find more detailed practical guidance in 'Regulatory guidance note 6: Interpretation of the engineering requirements of Annex 1 of the Landfill Directive', which will be available on our website from February 2002.

<http://www.environment-agency.gov.uk>

Features of a landfill



Seals: capping and liners may be required where it is necessary to

- control leachate formation
 - collect leachate
 - collect landfill gas
- These can consist of natural or synthetic materials installed to quality assured standards

Gas drainage layer required where gas collection is necessary

Leachate collection layer required where there is an artificial sealing liner Engineered to quality assured standards

Artificially established mineral barrier required where natural geological barrier cannot provide adequate attenuation capacity Engineered to quality assured standards

C Areas taking hazardous or non-hazardous wastes: current standards and corrective measures

You must complete this part for any areas of the landfill covered by this conditioning plan which

- have received
- are currently receiving
- are intended to receive*

hazardous or non-hazardous wastes.

This includes areas

- where hazardous waste is co-disposed with non-hazardous wastes
- that are currently licensed and operational and will continue to accept waste after 16 July 2002
- that are currently licensed but not yet operational.

Your answers in 'B2 Area covered by the conditioning plan' on page 8 will have identified the relevant areas.

The diagram on page 14 shows the features we ask about in this section.

C1 Engineering and infrastructure for your landfill

Schedule 1 of the Landfill Directive sets requirements for the engineering of landfill areas that take hazardous or non-hazardous wastes.

We therefore need to know whether the engineering and infrastructure of your landfill meet these requirements and whether you are intending to provide any corrective measures.

You will be required to submit full details of the engineering measures you will be providing with your PPC application. These will either

- have to meet the minimum standards defined in the Schedule 1 of the Landfill Directive, or
- be supported by a detailed environmental risk assessment.

Barriers and liners, including leachate collection layer, bottom sealing liner and capping

You need to demonstrate that appropriate measures shall be taken to

- control water from precipitation entering the landfill body
- prevent surface water and/or groundwater from entering landfilled waste
- collect contaminated water and leachate (*unless we agree that your landfill poses no potential risk to the environment*).

Barriers and liners

C1.1 Is there groundwater in surrounding strata which are above the level of the base of the landfill area?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☒

Yes ☐

For currently licensed but not yet operational areas.

No ☒

Yes ☐

C1.2 Is the groundwater level artificially maintained below the level of the base of the landfill area?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☒

Yes ☐

For currently licensed but not yet operational areas.

No ☒

Yes ☐

C1.3 Is there a natural geological barrier between the base of any of the landfill areas and the nearest groundwater?

No ☐ go to question C1.5

Yes ☒

C1.4 Is the maximum permeability (k) of this geological barrier $\leq 1.0 \times 10^{-9}$ metre/second?

'k' is the coefficient of permeability for the geological barrier. It is a measure of the rate at which liquid will move through the geological barrier, expressed in metres per second, under unit differential pressure.

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☐

Yes ☒

For currently licensed but not yet operational areas.

No ☐

Yes ☒

C1.5 Is an artificially established mineral barrier provided?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☐ go to question C1.7

Yes ☒ go to question C1.7

For currently licensed but not yet operational areas.

No ☐ go to question C1.7

Yes ☒

C Areas taking hazardous or non-hazardous wastes: current standards and corrective measures continued

C1.6 Have you carried out a stability analysis of the waste, the associated structures on the site and the geological substratum?

No ☐

Yes ☒

C1.7 Is an artificial sealing liner provided?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☐

Yes ☒

For currently licensed but not yet operational areas.

No ☐

Yes ☒

C1.8 Is a leachate collection layer provided?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☐

Yes ☒

or currently licensed but not yet operational areas.

No ☐

Yes ☒

C1.9 Is a gas drainage layer being provided?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☒

Yes ☐

For currently licensed but not yet operational areas.

No ☒

Yes ☐

Capping

C1.10 Is a capping seal being provided?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☐

Yes ☒

For currently licensed but not yet operational areas.

No ☐

Yes ☒

C1.11 Is a surface water drainage layer being provided as part of the capping?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☒

Yes ☐

For currently licensed but not yet operational areas.

No ☒

Yes ☐

C1.12 Is a capping soil layer provided?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☐

Yes ☒

For currently licensed but not yet operational areas.

No ☐

Yes ☒

C1.13 Are you intending to provide any corrective measures for your barriers and liners?

No ☒

Yes ☐ *please give details, for example, 'redesign and re-engineer the capping seal to prevent formation of leachate', or 'design and engineer the leachate management system for (say Cell 1 / Phase A) by (intended date)'*

C2 Management of leachate, surface water drainage and landfill gas

Extraction, treatment and disposal

Hazardous waste landfills and non-hazardous waste landfills must have measures in place to treat contaminated water and leachate collected from the landfill to the appropriate standard required for their discharge. This requirement may not apply if we are satisfied (on the basis of the information supplied in your subsequent PPC application) that your landfill poses no risk to the environment.

Leachate extraction can only be effective where there is a functioning leachate collection system. This section covers the part of the leachate extraction, treatment and disposal system which can be re-engineered if necessary following completion of the area.

C2.1 Is there an engineered and operational leachate management system in place now for all of these areas?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☐ please give the date by which they will be in place

Yes ☒

For currently licensed but not yet operational areas

No ☐ please give the date by which they will be in place

Yes ☒

C2.2 Are you intending to provide any corrective measures for your leachate management system?

No ☒

Yes ☐ please give details, for example, 'redesign and re-engineer the capping seal to prevent formation of leachate', or 'design and engineer the leachate management system for (say Cell 1 / Phase A) by (intended date)'.

Surface water management

Hazardous waste landfills must have measures to

- control water from precipitation entering the landfill body
- prevent surface water from entering landfilled waste.

C2.3 Are the above measures in place now for all of these areas?

No ☐ please give the date by which they will be in place

Yes ☒

C2.4 Will they segregate uncontaminated surface water from surface water which is potentially contaminated?

For example by contact with waste or by other operational activities such as wheelwashes.

No ☐

Yes ☒

C2.5 Will they prevent surface water damage to the structure or integrity of the engineered landfill containment system, monitoring systems or final capping?

No ☐

Yes ☒

C2.6 Are you intending to provide any corrective measures for your surface water management systems?

No ☒

Yes ☐ please give details. For example, 'redesign and re-engineer surface water management system for (say Cell 1 / Phase A) to provide increased level of segregation and protection by (intended date)'.

Landfill gas management

Landfills accepting biodegradable waste (whether hazardous or non-hazardous) must be provided with measures to

- control the accumulation and migration of landfill gas
- collect, treat and use the landfill gas if the gas cannot be used to produce energy, then it must be flared – see 'Using landfill gas' on page 19.
- collect, treat and use the landfill gas in a manner which minimises damage to or deterioration of the environment and risk to human health.

If your landfill

- has received
- is receiving
- will receive

biodegradable wastes then you will need to show you are using the landfill gas wherever possible.

For example, you may use it to generate electricity or for space heating.

Your scale drawing and answers to question B2.1 on page 8 will identify any areas that will have received biodegradable wastes. You will be required to monitor the landfill gas generated within the waste deposits in each of these areas, and sub-surface gas emissions that could migrate from your landfill.

If you currently co-dispose hazardous with biodegradable wastes, the Landfill Directive requires you to cease co-disposal before 16 July 2004. If you intend to operate the site as a landfill for hazardous waste after 16 July 2004 (and hence will have stopped accepting biodegradable waste), you will still need to provide gas management and monitoring measures for areas accepting biodegradable waste prior to that date.

If an area receives only non-biodegradable wastes, then gas management measures may not be required for that area.

C2.7 Are gas collection and control measures in place now for these areas?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☐ please give the date by which they will be in place

Yes ☒

For currently licensed but not yet operational areas.

No ☐ please give the date by which they will be in place

Yes ☒

C2.8 Will they control the accumulation and migration of gas?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☐ give the date when they will meet the standards?

Yes ☒

For currently licensed but not yet operational areas.

No ☐ give the date by which they will be in place?

Yes ☒

C2.9 Do the methods used to collect, treat and/or use the gas minimise damage to or deterioration of the environment and risk to human health?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☐ give the date when they will meet the standards?

Yes ☒

For currently licensed but not yet operational areas.

No ☐ give the date by which they will be in place?

Yes ☒

C2.10 Are you intending to provide any corrective measures to your landfill gas management systems?

No ☒

Yes ☐ please give details, for example, 'redesign and re-engineer gas management system for (say Cell 1 / Phase A) to provide increased level of protection by (intended date)'.

Using landfill gas

The following information may help you decide whether you should be using your landfill gas rather than flaring it.

- **Size of site** – sites of less than 200,000 tonnes of waste are unlikely to produce enough gas to generate more than 750kW and are therefore of limited commercial interest. Many developers suggest that sites of less than 500,000 tonnes would not be commercially viable.
- **Geometry of site** – recoveries of landfill gas are high (up to 75 per cent) on large deep sites. It is often impractical to recover gas from shallow sites or peripheral areas of sites. It is generally accepted that the minimum depth from which landfill gas can be recovered is around 4m.
- **Gas flow rate** – it is generally accepted that a gas flow rate of between 600–750m³ per hour is required to generate 1MW. The flow rate refers to what can actually be recovered from the site and may be as little as 40 per cent of the theoretical gas production rate due to inefficiencies of the extraction system.
- **Waste composition** – it is generally accepted that if the waste within the site contains 75 per cent or more inert wastes, then landfill gas production will be minimal.
- **Gas schemes and location** – if a direct use scheme is being considered then it is generally accepted that the end user for the gas should be within 10km of the landfill site, otherwise the transport costs make schemes economically non-viable.

C2.11 Is a gas scheme planned for your landfill?

No ☐

Yes ☒ go to 'C3 Monitoring measures'

C2.12 Is the total capacity of your site

☐ up to 500,000 tonnes

☐ more than 500,000 tonnes

C2.13 Is it likely that the total waste mass deposited will contain 25 per cent or more biodegradable wastes?

No ☐

Yes ☐

C2.14 Will the maximum depth of deposited waste in your landfill be more than 4m?

No ☐

Yes ☐

C2.15 Is the maximum predicted gas flow rate from your landfill estimated at more than 600m³ per hour?

No ☐

Yes ☐

C3 Monitoring measures

Quality control of your analytical operations

This must be carried out by competent laboratories using suitably accredited test procedures.

C3.1 Is quality control of your analytical operations carried out by laboratories using suitably accredited procedures?

No ☐ Go to question C3.2

Yes ☒ Which laboratory is undertaking the monitoring?

SEVERN TRENT SERVICES

C3.2 Do you intend to undertake any corrective measures?

No ☒

Yes ☐ please give details, for example, 'implement system of quality control of analytical operations for environmental monitoring, by competent laboratories taking suitably accredited test procedures by (intended date)'.

Landfill gas monitoring within the waste body

Landfills accepting biodegradable waste, whether hazardous or non-hazardous, must monitor landfill gas arising within the waste body.

Your scale drawing and answers to question B2.1 on page 8 will identify any areas that have received biodegradable wastes.

C3.3 Are monitoring measures now in place for all of the closed areas which have taken biodegradable wastes?

No ☐

Yes ☐ N/A (Refer to A. EVAN, W.C. Officer, Swanton)

C3.4 Will monitoring measures be in place for each of the currently operational areas taking biodegradable wastes by the expected closure date?

No ☐

Yes ☒

C Areas taking hazardous or non-hazardous wastes: current standards and corrective measures continued

C3.5 Do you intend to undertake any monitoring improvements?

No ☒

Yes ☐ please give details, for example, 'install/extend landfill gas monitoring system within the waste body' for (say Cell 1 / Phase A) to provide representative monitoring for each area by (intended date)'.

Monitoring of sub-surface landfill gas emissions

Landfills accepting biodegradable waste, whether hazardous or non-hazardous, must monitor sub-surface landfill gas emissions that could migrate from the landfill.

C3.6 Are sub-surface monitoring measures now in place for all of the areas which have received or will receive biodegradable wastes?

No ☐ please give the date by which they will be in place

Yes ☒

C3.7 Do you intend to undertake any monitoring improvements?

No ☒

Yes ☐ please give details, for example, 'install/extend sub-surface landfill gas monitoring system within the waste body' for (say Cell 1 / Phase A) to provide representative monitoring for each area by (intended date)'.

Leachate monitoring

You must provide representative monitoring of leachate for all the areas listed in question B2.1 on page 8 which have taken hazardous or non-hazardous wastes.

C3.8 Will all the currently licensed and operational areas continuing to accept waste after 16 July 2002 be covered by measures for representative monitoring of leachate?

No ☐

Yes ☒

C3.9 Will monitoring be in place for areas that receive hazardous wastes and which are closed or operational on 16 July 2004?

No ☐

Yes ☒

C3.10 Do you intend to undertake any monitoring improvements?

No ☒

Yes ☐ please give details, for example, 'install leachate monitoring system for (say Cell 1 / Phase A) to provide representative monitoring of leachate from that area by (intended date)'.

Surface water monitoring

You must provide representative monitoring of the water quality of any surface water body (streams, rivers, lakes, etc) which is likely to be affected by your landfill.

The scale drawing you provide in 'B1 Your landfill in relation to its local environment' will identify whether there are any surface water bodies at risk within 500 m of the licensed area of your landfill.

C3.11 Are there any surface water bodies within 500m of your landfill?

No ☐ go to 'Groundwater monitoring'

Yes ☒ continue reading this section

C3.12 Is surface water monitoring provided for all potentially affected water bodies?

No ☐

Yes ☒

C3.13 How many potentially affected water bodies have sectional flow?

☐ none

☒ one or more

C3.14 Will there be at least one monitoring point upstream and one downstream for each potentially affected water body?

No ☐

Yes ☒

C3.15 Do you intend to undertake any monitoring improvements?

No ☒

Yes ☐ please give details, for example, 'install surface water monitoring to provide representative monitoring of "brickworks pond" (intended date)'.

Groundwater monitoring

You need to provide representative monitoring of any groundwater that is at risk from your landfill.

C3.16 Are groundwater monitoring measures in place now?

No ☐ go to question C3.18

Yes ☒

C3.17 Is there at least one monitoring point at the inflow and two at the outflow for each groundwater body likely to be affected by the landfill?

No ☐

Yes ☒

C3.18 Will any new areas be sampled in at least three locations before the waste filling operations so that reference values for future sampling can be established?

No ☐

Yes ☒

C3.19 Do you intend to undertake any monitoring improvements?

No ☒

Yes ☐ please give details, for example, 'install/extend groundwater monitoring to provide representative monitoring for groundwater in vicinity of landfill (intended date)'.

C4 Monitoring of the landfill structure and composition

You must provide monitoring of the structure and composition of your landfill.

C4.1 Are measures now in place to monitor

- surface occupied by the waste
- volume and composition of the waste
- the remaining capacity still available
- the settling behaviour of the landfill body?

No ☐

Yes ☒

C4.2 Do you intend to undertake any monitoring improvements?

No ☐

Yes ☐ please give details, for example, 'implement measures to monitor the structure and composition of the landfill body in each area by (intended date)'.

C5 Operational measures

Stability of deposited waste

You must provide measures to ensure that any wastes deposited, and any associated structures, are stable and not subject to slippages.

The measures should include controls over

- phasing the deposits of waste within each cell
- the manner in which waste is discharged and compacted at the working face
- maximum and minimum gradients for the working face
- temporary phase/cell separation slopes
- the final slopes of the landform.

Nuisance and other risks

You must implement measures to minimise any nuisance or risks from

- birds, vermin and insects
- aerosols
- windblown material
- odour emissions
- dust emissions
- fires
- noise and on-site traffic.

Management of 'dirt'

You must ensure that dirt originating from the site is not dispersed onto public roads and the surrounding land. This will include

- prevention for example use of wheelwashes
- remediation for example use of road cleaners.

Site security

You must

- prevent free access to the site
- secure it outside operating hours
- detect and discourage illegal dumping on the site.

C5.1 Do your operational measures meet the standards outlined in this section?

	Are measures in place now?		Will measures be in place by 16 July 2004?	
	No	Yes	No	Yes
Site stability	☐	☒	☐	☒
Nuisance	☐	☒	☐	☒
Dirt management	☐	☒	☐	☒
Site security	☐	☒	☐	☒

C5.2 Do you intend to undertake any operational improvements?

No ☒

Yes ☐ please give details, for example, 'implement measures to minimise risks (say dust emissions, odour emissions, etc) from the landfill body in each area by (intended date)'.

C6 Plans for closure and aftercare

You will need to provide detailed plans of the aftercare phase of each of your landfill areas when you make your PPC application.

C6.1 Are plans for closure and aftercare in place for each area?

No ☐

Yes ☒

C6.2 Do these plans cover the following for each area

- ☒ procedures for ensuring that final waste levels are achieved
- ☒ access and site security once the area is closed
- ☒ proposed restoration of the area
- ☒ aftercare (post-closure) monitoring
- ☒ aftercare maintenance
- ☒ decommissioning, including removal of redundant facilities (such as leachate and landfill gas plant), and cleaning and backfilling of wells and lagoons

C6.3 Do you intend to undertake any corrective measures?

No ☒

Yes ☐ please give details, for example, 'provide plans for closure and aftercare for each area of the landfill, and implement them on closure of those areas by (intended date)'.

D Areas taking Inert wastes: current standards and corrective measures

You must complete this Part for any area of the landfill covered by this conditioning plan which has received and will receive only inert wastes (as defined in the Landfill Directive – see 'Explanatory note' on page 9).

If the wastes deposited in an area are termed 'inert' under the current licence/permit, but do not fall within the definition of 'inert' given in the Landfill Directive, then that waste must be regarded as non-hazardous.

The standards in the Directive may be reduced where we consider it appropriate on the basis of the risk assessment submitted with your PPC application.

The diagram on page 14 shows the features we ask about in this section.

D1 Engineering and infrastructure for your landfill

We need you to complete this section so that we can identify the containment measures in place at your site, and the type of any corrective measures that you intend to provide.

Barriers and liners

D1.1 Is there a natural geological barrier between the base of any of the landfill areas and the nearest groundwater?

No ☐ go to question D1.3

Yes ☐

D1.2 Is the maximum permeability (k) of this geological barrier $\leq 1.0 \times 10^{-7}$ metre/second?

'k' is the coefficient of permeability for the geological barrier. It is a measure of the rate at which liquid will move through the geological barrier, expressed in metres per second, under unit differential pressure.

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☐

Yes ☐

Not known ☐

For currently licensed but not yet operational areas.

No ☐

Yes ☐

Not known ☐

D1.3 Is an artificially established mineral barrier provided?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☐

Yes ☐

For currently licensed but not yet operational areas.

No ☐

Yes ☐

D1.4 Is a capping soil layer provided?

For currently licensed and operational areas that will continue to accept waste after 16 July 2002.

No ☐

Yes ☐

For currently licensed but not yet operational areas.

No ☐

Yes ☐

D1.5 Do you intend to undertake any corrective measures?

No ☐

Yes ☐ please give details

D2 Monitoring measures

and fill gas monitoring

You must provide representative monitoring of landfill gas rising within the waste deposits in each of these areas.

You will need to provide details of the measures and of your monitoring programmes in your subsequent PPC application.

D2.1 Are measures in place now to monitor landfill gas rising within the body of the waste?

No ☐

Yes ☐

D2.2 Do you intend to undertake any corrective measures?

For example, 'install/extend monitoring system within the waste body for (say Cell 1/ Phase A) to provide representative monitoring of landfill gas by (intended date)'.

No ☐

Yes ☐ please give details

Surface water monitoring

D2.3 Are there any surface water bodies within 500m of your landfill?

No ☐ go to 'Groundwater monitoring'

Yes ☐ continue reading this section

You must provide representative monitoring of the water quality of any surface water body (streams, rivers, lakes, etc) which is likely to be affected by your landfill.

The scale drawing you provide in 'B1 Your landfill in relation to its local environment' will identify whether there are any surface water bodies at risk within 500 m of the licensed area of your landfill.

D2.4 Is surface water monitoring provided for all potentially affected water bodies?

No ☐ Will they be in place by 16 July 2004?

No ☐ go to question D2.7

Yes ☐

Yes ☐

D2.5 How many potentially affected water bodies have a 'directional flow'?

None

One or more

D2.6 Will there be at least one monitoring point upstream and one downstream for each potentially affected water body?

No ☐

Yes ☐

D2.7 Do you intend to undertake any monitoring improvements?

No ☐

Yes ☐ please give details, for example, 'install surface water monitoring to provide representative monitoring of surface water bodies in vicinity of landfill by (intended date)'.

Groundwater monitoring

You need to provide representative monitoring of any groundwater that is at risk from your landfill.

D2.8 Are groundwater monitoring measures in place now?

No ☐ go to question D2.10

Yes ☐

D2.9 Is there at least one monitoring point at the inflow and two at the outflow for each groundwater body likely to be affected by the landfill?

No ☐

Yes ☐

D2.10 Will any new areas be sampled in at least three locations before the waste filling operations so that reference values for future sampling can be established?

No ☐

Yes ☐

D2.11 Do you intend to undertake any monitoring improvements?

No ☐

Yes ☐ please give details, for example, 'install/extend groundwater monitoring to provide representative monitoring for groundwater in vicinity of landfill by (intended date)'.

D Areas taking inert wastes: current standards and corrective measures continued

Quality control of your analytical operations

This must be carried out by competent laboratories using suitably accredited test procedures.

D2.12 Is quality control of your analytical operations carried out by laboratories using suitably accredited procedures?

No ☐ Go to question D2.13

Yes ☐ Which laboratory is undertaking the monitoring?

D2.13 Do you intend to undertake any corrective measures?

For example, 'implement system of quality control of analytical operations for environmental monitoring, by competent laboratories taking suitably accredited test procedures by (intended date)'.

No ☐

Yes ☐ please give details

Monitoring of the landfill structure and composition

D2.14 Are measures now in place to monitor the structure and composition of the landfill body to give

- surface occupied by the waste
- volume and composition of the waste
- calculated remaining capacity still available
- the settling behaviour of the landfill body?

No ☐

Yes ☐

D3 Operational measures for areas receiving inert wastes

Stability of deposited waste

You must provide measures to ensure that any wastes deposited, and any associated structures, are stable and not subject to slippages.

The measures should include controls over

- phasing the deposits of waste within each cell
- the manner in which waste is discharged and compacted at the working face
- maximum and minimum gradients for the working face
- temporary phase/cell separation slopes
- the final slopes of the landform.

Nuisance and other risks

You must minimise any nuisance and risks from

- dust emissions
- noise and on-site traffic.

Management of 'dirt'

You must ensure that dirt originating from the site is not dispersed onto public roads and the surrounding land. This will include

- prevention for example use of wheelwashes
- remediation for example use of road cleaners.

Site security

You must

- prevent free access to the site
- secure it outside operating hours
- detect and discourage illegal dumping on the site.

D3.1 Do your operational measures meet the standards outlined in this section?

	Are measures in place now?	
	No	Yes
Site stability	☐	☐
Nuisance	☐	☐
Management of dirt	☐	☐
Site security	☐	☐

D4 Areas taking inert wastes: current standards and corrective measures continued

D3 Do you intend to undertake any improvements to your operational measures?

No ☐

Yes ☐ please give details, for example, 'implement measures' to minimise risks from (say dust emissions, odour emissions, etc) the landfill body in each area by (intended date)'.

D4 Plans for closure and aftercare

You will need to provide detailed plans of the aftercare phase of each of your landfill areas when you make your subsequent PPC application.

D4.1 Are the plans for closure and aftercare in place for each area?

No ☐ go to question D4.3

Yes ☐

D4.2 Do these plans cover the following for each area

- ☐ procedures for ensuring that final waste levels are achieved
- ☐ access and site security once the area is closed
- ☐ proposed restoration of the area
- ☐ aftercare (post-closure) monitoring
- ☐ aftercare maintenance
- ☐ decommissioning, including removal of redundant facilities

D4.3 Do you intend to undertake any corrective measures?

No ☐

Yes ☐ please give details, for example, 'provide plans for closure and aftercare for each area of the landfill, and implement them on closure of those areas by (intended date)'.

E Checklist, data protection and declaration

E1 Checklist

Please tick the box to confirm you are enclosing the items with this form.

- ☒ a copy of the certificate of incorporation and any certificates of subsequent name changes question A2.7
- ☐ evidence of corporate body status question A2.7
- ☒ 3 copies of your scale drawing question B1.1
- ☐ commercial confidentiality information if applicable, see folder notes for further details
- ☒ the correct fee as advised in March 2002.

£ 675

Continuation sheets

Make sure that you label each sheet clearly with the

- conditioning plan reference number you can find this in the first column on page 1
- question number it applies to
- number of the sheet, for example 3 of 5.

Please tell us how many continuation sheets you have enclosed.

E2 Data protection

The Environment Agency is responsible for regulating environmental protection, flood defence, water resources and fisheries. It has a duty to discharge its functions to protect and enhance the environment and to promote conservation and recreation.

The information provided will be processed by the Environment Agency to deal with your submission and for maintaining the relevant public register(s).

We may also process and/or disclose it in connection with the following:

- offering/providing you with our literature/services relating to environmental matters.
- consulting with the public, public bodies and other organisations (eg Health and Safety Executive, local authorities, emergency services, DEFRA on environmental issues)
- carrying out statistical analysis, research and development on environmental issues
- providing public register information to enquirers
- investigating possible breaches of environmental law and taking any resulting action
- preventing breaches of environmental law
- assessing customer service satisfaction and improving our service.

We may pass it on to our agents/representatives to do these things on our behalf.

You should ensure that any persons named on this form are informed of the contents of this data protection notice.

E3 Warning and declaration

If you do not complete the form, we may not be able to process your plan. The letter that came with this form outlines the possible consequences of this.

Operators and licence holders must sign the declaration themselves, even if an agent is working on their behalf.

For a company or other corporate body – an authorised person should sign. For partnerships all partners must sign.

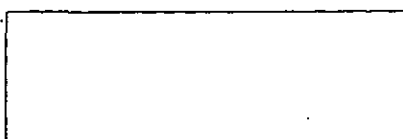
I certify that the information in this application and its attached documents is correct to the best of my knowledge.

Operator's signature(s)



Name LANCE JONES

Date 12-7-02



Name

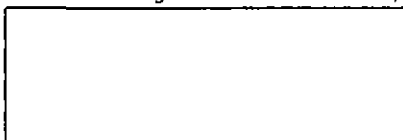
Date



Name

Date

Licence holder's signature if different from the operator



Name

Date

E4 What happens next

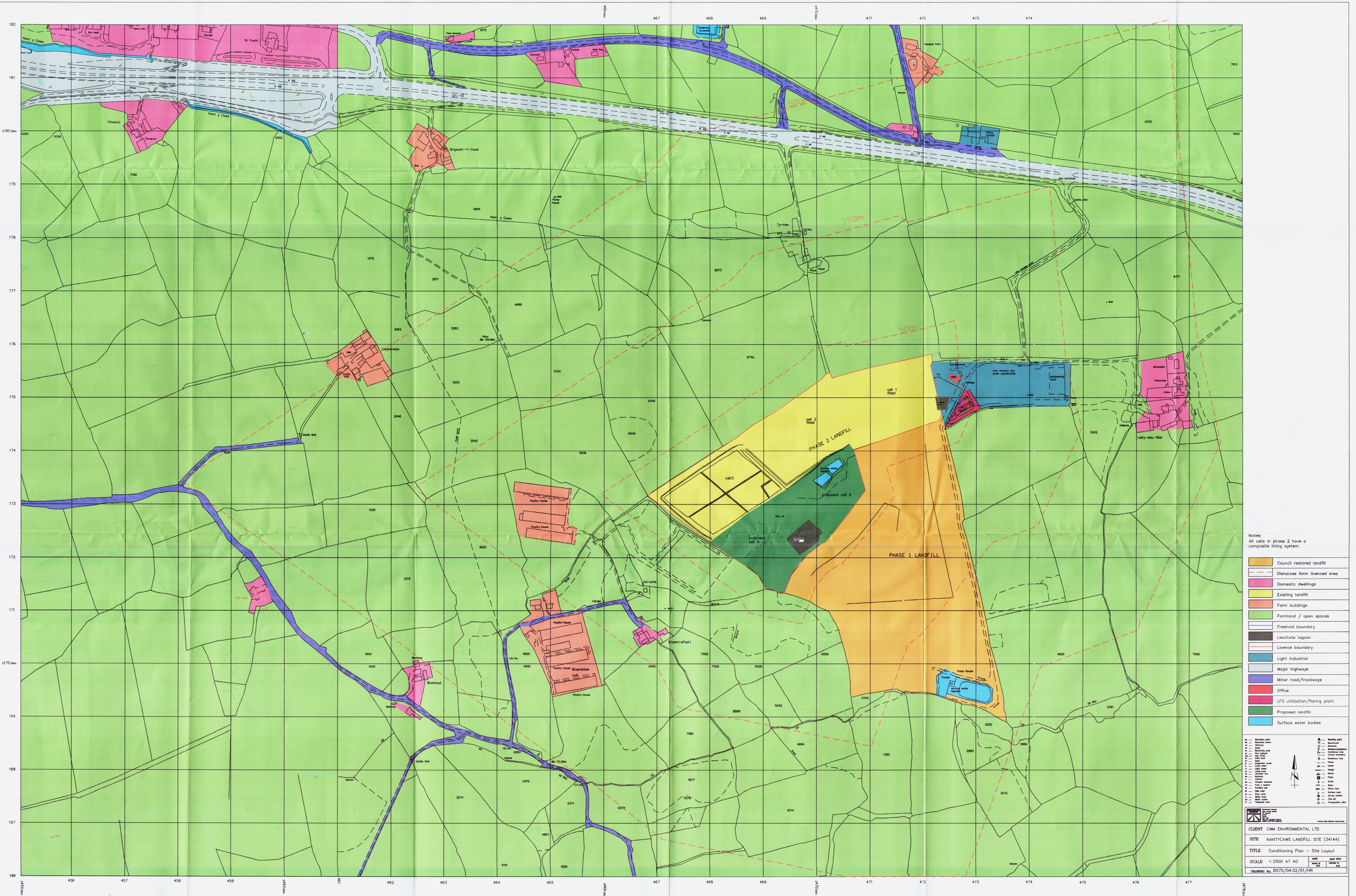
Please send the completed form back to the address on the covering letter we sent you with this pack. We advise you to keep copies of everything you send us for your own record.

We will send you an acknowledgement when we receive the form.

If we have any questions about your conditioning plan, we may need to discuss them with you.

We will give you at least six months notice of when you will need to make a PPC application.

DRAWING



Q B0.2 Non-Technical Summary

Nantycaws Landfill is located to the immediate south of the A48, approximately 8km to the east of Carmarthen and 1.5km to the south-east of the small village of Nantycaws. The site and its' immediate surrounds are shown on Drawing No. ESID1.

The site is located on the southern flank of a shallow topographic ridge that has a general east – west orientation. Maximum ground elevations to the north-west of the site are 150 to 155mAOD, dropping gently to c.110mAOD to the south-east of the site.

The area surrounding and including the Nantycaws Landfill is agricultural, with open fields to the north and east. A large poultry unit is located to the immediate west of the site. To the immediate south of the site is Phase 1 of the Nantycaws Landfill. Phase 1 is physically separate from the currently operational Phase 2 which is excluded from this PPC Permit Application. The nearest properties are located at Blaenisfael, to the immediate west of the site, and Llety-dau-filwr, located approximately 500m to the north-east.

Under the transitional provisions of the Landfill (England and Wales) Regulations 2002, the site has been classified as a landfill for hazardous waste changing to non-hazardous waste. However, it is proposed that for the PPC Application, the site will operate as a non-hazardous facility. Future waste inputs will be approximately 150,000 tonnes/year.

With regards to gas utilisation, the existing engine is greater than 3MW thermal input and is operated by a 3rd party. As a consequence of this, a separate PPC Application has been included for this separate technical unit (STU). However, as the engine is regarded as a directly associated activity to the landfill (i.e. the landfill is the primary activity), the engine has been included within the landfill's PPC installation boundary. The PPC application for the engine can be found in ESID Appendix 11 of this report.

The site layout is presented as Drawing No.ESID4, Cells 1, 2 and 3 have been completed, although only part of Cell 1 has been finally capped, with the remaining areas of these Cells being temporarily capped. Cell 4 has been engineered and is currently operational while Cell 5 has yet to be developed.

A groundwater management system has been installed beneath the engineered containment cells of Nantycaws Landfill (with the exception of Cell 2) to control shallow groundwater conditions immediately below the landfill phases. The under-drainage system beneath each phase comprises a series of free-draining granular filled trenches incorporating a pipe network, and discharges to the stream at the south of the site.

The leachate collection system within the Phase 1 landfill is detailed on Drawing No. ESID7. The collection system consists of a drainage blanket and network of drains which drain to common sumps located within Cell 2 and Cells 3/4. The leachate

Nantycaws Landfill PPC Application

Reference No. CP3735PB

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drainage system in the future Cell 5 shall comprise a granular drainage blanket with a system of basal drainage pipework falling to the extraction sump, as detailed on Drawing No. ESID7b.

An active gas management system is currently operating at the Nantycaws Landfill. The current system will be extended as the landfill continues to develop. A schematic design of the landfill gas management system is presented within Drawing No. ESID8. In summary, the application site has a gas collection system that consists of vertical gas extraction wells, well heads, manifolds, condensate knockout pots and pumps, connected pipework and gas mains.

Extracted gas from the application site is pumped to a fully operational Waste to Energy Plant, which currently comprises one Jenbacher 420 engine in addition to an enclosed flarestack.

A combination of the engine and flare may operate concurrently. If the engine shuts down, or the engine is unable to cope with an increase in gas flow, excess gas is diverted to the flarestack for combustion. The installation of any additional generators would be phased, as and when required and if commercially and technically practicable, in order to fit with proven supplies of landfill gas. In a similar manner, the number of on-site generators would be progressively reduced as the volume of generated landfill gas declines with time. Excess gas that cannot be used for power generation would continue to be flared off, as and when required, from a permanent flare installation that would have an appropriate capacity in order to cover the event of any breakdown.

A series of groundwater, landfill gas, stability, and amenity risk assessments have been carried out in accordance with the most recent guidance (and draft guidance) issued by the Environment Agency. The assessments have been carried out by SLR Consulting Limited and these form a substantial part of this application. The PPC application for the landfill gas engine has been carried out by Entec on behalf of UUGE Environmental. On the basis of these risk assessments, the installation has been designed to have minimal environmental impact and to be capable of long-term management during the post-closure, aftercare period of the landfill's life prior to its completion.

The hydrogeological risk assessment has demonstrated that the site will comply with the Groundwater Regulations 1998 during its active and after-care phases. The landfill gas risk assessment has determined that plant will be required in the medium and long term in order to utilise landfill gas emissions from the installation during the site's life. Landfill gas is already being collected and accordingly, the installation includes plant to generate electricity from the landfill gas. The stability risk assessment has confirmed that the excavation within which the landfill is formed will be stable and that temporary, final waste slopes, and capping system will be stable in both pre and post-settlement phases.

Nanty Caws Landfill PPC Application
Reference No. CP3735PB
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Q B2.1.4 Proposed Waste types for disposal at Nanty Caws landfill pre July 2004
(Classification as per European Waste Catalogue)

Proposed waste types for disposal at Nanty Caws pre July 2004

Code	Description	Physical Description (e.g. solid, sludge, nuisance risk)
1	WASTES RESULTING FROM EXPLORATION, MINING, QUARRYING, AND PHYSICAL AND CHEMICAL TREATMENT OF MINERALS	
01 01	wastes from mineral excavation	Solidified, solid, powder or sludge
01 01 01	wastes from mineral metalliferous excavation	Solidified, solid, powder or sludge
01 01 02	wastes from mineral non-metalliferous excavation	Solidified, solid, powder or sludge
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	Solidified, solid, powder or sludge
01 03 08	dusty and powdery wastes other than those mentioned in 01 03 07	Solidified, solid, powder or sludge
01 03 09	red mud from alumina production other than the wastes mentioned in 01 03 07	Solidified, solid, powder or sludge
01 03 99	wastes not otherwise specified	Solidified, solid, powder or sludge
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	Solidified, solid, powder or sludge
01 04 09	waste sand and clays	Solidified, solid, powder or sludge
01 04 10	dusty and powdery wastes other than those mentioned in 01 04 07	Solidified, solid, powder or sludge
01 04 11	wastes from potash and rock salt processing other than those mentioned in 01 04 07	Solidified, solid, powder or sludge
01 04 12	tailings and other wastes from washing and cleaning of minerals other than those mentioned in 01 04 07 and 01 04 11	Solidified, solid, powder or sludge
01 04 13	wastes from stone cutting and sawing other than those mentioned in 01 04 07	Solidified, solid, powder or sludge
01 04 99	wastes not otherwise specified	Solidified, solid, powder or sludge
01 05	drilling muds and other drilling wastes	
01 05 04	freshwater drilling muds and wastes	Solidified, solid, powder or sludge
01 05 07	barite-containing drilling muds and wastes other than those mentioned in 01 05 05 and 01 05 06	Solidified, solid, powder or sludge
01 05 08	chloride-containing drilling muds and wastes other than those mentioned in 01 05 05 and 01 05 06	Solidified, solid, powder or sludge
01 05 99	wastes not otherwise specified	Solidified, solid, powder or sludge
2	WASTES FROM AGRICULTURE, HORTICULTURE, AQUACULTURE, FORESTRY, HUNTING AND FISHING, FOOD PREPARATION AND PROCESSING	
02 01	wastes from agriculture, horticulture, aquaculture, forestry, hunting and fishing	
02 01 01	sludges from washing and cleaning	Solidified, solid, powder or sludge
02 01 02	animal-tissue waste	Solidified, solid, powder or sludge
02 01 03	plant-tissue waste	Solidified, solid, powder or sludge
02 01 04	waste plastics (except packaging)	Solidified, solid, powder or sludge

Proposed waste types for disposal at Nanty Caws pre July 2004

02 01 06	animal faeces, urine and manure (including spoiled straw), effluent, collected separately and treated off-site	Solidified, solid, powder or sludge	NH
02 01 07	wastes from forestry	Solidified, solid, powder or sludge	NH
02 01 09	agrochemical waste other than those mentioned in 02 01 08	Solidified, solid, powder or sludge	NH
02 01 10	waste metal	Solidified, solid, powder or sludge	NH
02 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
02 02	wastes from the preparation and processing of meat, fish and other foods of animal origin		
02 02 01	sludges from washing and cleaning	Solidified, solid, powder or sludge	NH
02 02 02	animal-tissue waste	Solidified, solid, powder or sludge	NH
02 02 03	materials unsuitable for consumption or processing	Solidified, solid, powder or sludge	NH
02 02 04	sludges from on-site effluent treatment	Solidified, solid, powder or sludge	NH
02 02 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
02 03	wastes from fruit, vegetables, cereals, edible oils, cocoa, coffee, tea and tobacco preparation and processing; conserve production; yeast and yeast extract production, molasses preparation and fermentation		
02 03 01	sludges from washing, cleaning, peeling, centrifuging and separation	Solidified, solid, powder or sludge	NH
02 03 02	wastes from preserving agents	Solidified, solid, powder or sludge	NH
02 03 03	wastes from solvent extraction	Solidified, solid, powder or sludge	NH
02 03 04	materials unsuitable for consumption or processing	Solidified, solid, powder or sludge	NH
02 03 05	sludges from on-site effluent treatment	Solidified, solid, powder or sludge	NH
02 03 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
02 04	wastes from sugar processing		
02 04 01	soil from cleaning and washing beet	Solidified, solid, powder or sludge	NH
02 04 02	off-specification calcium carbonate	Solidified, solid, powder or sludge	NH
02 04 03	sludges from on-site effluent treatment	Solidified, solid, powder or sludge	NH
02 04 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
02 05	wastes from the dairy products industry		
02 05 01	materials unsuitable for consumption or processing	Solidified, solid, powder or sludge	NH
02 05 02	sludges from on-site effluent treatment	Solidified, solid, powder or sludge	NH
02 05 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
02 06	wastes from the baking and confectionery industry		
02 06 01	materials unsuitable for consumption or processing	Solidified, solid, powder or sludge	NH
02 06 02	wastes from preserving agents	Solidified, solid, powder or sludge	NH
02 06 03	sludges from on-site effluent treatment	Solidified, solid, powder or sludge	NH
02 06 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
02 07	wastes from the production of alcoholic and non-alcoholic beverages (except coffee, tea and cocoa)		
02 07 01	wastes from washing, cleaning and mechanical reduction of raw materials	Solidified, solid, powder or sludge	NH
02 07 02	wastes from spirits distillation	Solidified, solid, powder or sludge	NH
02 07 03	wastes from chemical treatment	Solidified, solid, powder or sludge	NH
02 07 04	materials unsuitable for consumption or processing	Solidified, solid, powder or sludge	NH
02 07 05	sludges from on-site effluent treatment	Solidified, solid, powder or sludge	NH
02 07 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH

Proposed waste types for disposal at Nanty Caws pre July 2004

3	WASTES FROM WOOD PROCESSING AND THE PRODUCTION OF PANELS AND FURNITURE, PULP, PAPER AND CARDBOARD		
03 01	wastes from wood processing and the production of panels and furniture		
03 01 01	waste bark and cork	Solidified, solid, powder or sludge	NH
03 01 05	sawdust, shavings, cuttings, wood, particle board and veneer other than those mentioned in 03 01 04	Solidified, solid, powder or sludge	NH
03 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
03 03	wastes from pulp, paper and cardboard production and processing		
03 03 01	waste bark and wood	Solidified, solid, powder or sludge	NH
03 03 02	green liquor sludge (from recovery of cooking liquor)	Solidified, solid, powder or sludge	NH
03 03 05	de-inking sludges from paper recycling	Solidified, solid, powder or sludge	NH
03 03 07	mechanically separated rejects from pulping of waste paper and cardboard	Solidified, solid, powder or sludge	NH
03 03 08	wastes from sorting of paper and cardboard destined for recycling	Solidified, solid, powder or sludge	NH
03 03 09	lime mud waste	Solidified, solid, powder or sludge	NH
03 03 10	fibre rejects, fibre-, filler- and coating-sludges from mechanical separation	Solidified, solid, powder or sludge	NH
03 03 11	sludges from on-site effluent treatment other than those mentioned in 03 03 10	Solidified, solid, powder or sludge	NH
03 03 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
4	WASTES FROM THE LEATHER, FUR AND TEXTILE INDUSTRIES	Solidified, solid, powder or sludge	
04 01	wastes from the leather and fur industry		
04 01 01	fleshings and lime split wastes	Solidified, solid, powder or sludge	NH
04 01 02	liming waste	Solidified, solid, powder or sludge	NH
04 01 04	tanning liquor containing chromium	Solidified, solid, powder or sludge	NH
04 01 05	tanning liquor free of chromium	Solidified, solid, powder or sludge	NH
04 01 06	sludges, in particular from on-site effluent treatment containing chromium	Solidified, solid, powder or sludge	NH
04 01 07	sludges, in particular from on-site effluent treatment free of chromium	Solidified, solid, powder or sludge	NH
04 01 08	waste tanned leather (blue sheetings, shavings, cuttings, buffing dust) containing chromium	Solidified, solid, powder or sludge	NH
04 01 09	wastes from dressing and finishing	Solidified, solid, powder or sludge	NH
04 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
04 02	wastes from the textile industry		
04 02 09	wastes from composite materials (impregnated textile, elastomer, plastomer)	Solidified, solid, powder or sludge	NH
04 02 10	organic matter from natural products (for example grease, wax)	Solidified, solid, powder or sludge	NH
04 02 15	wastes from finishing other than those mentioned in 04 02 14	Solidified, solid, powder or sludge	NH
04 02 17	dye-stuffs and pigments other than those mentioned in 04 02 16	Solidified, solid, powder or sludge	NH
04 02 20	sludges from on-site effluent treatment other than those mentioned in 04 02 19	Solidified, solid, powder or sludge	NH
04 02 21	wastes from unprocessed textile fibres	Solidified, solid, powder or sludge	NH
04 02 22	wastes from processed textile fibres	Solidified, solid, powder or sludge	NH
04 02 99	wastes not otherwise specified	Solidified, solid, powder or sludge	

5	WASTES FROM PETROLEUM REFINING, NATURAL GAS PURIFICATION AND PYROLYTIC REATMENT OF COAL		
05 01	wastes from petroleum refining		
05 01 10	sludges from on-site effluent treatment other than those mentioned in 05 01 09	Solidified, solid, powder or sludge	NH
05 01 13	boiler feedwater sludges	Solidified, solid, powder or sludge	NH
05 01 14	wastes from cooling columns	Solidified, solid, powder or sludge	NH
05 01 16	sulphur-containing wastes from petroleum desulphurisation	Solidified, solid, powder or sludge	NH
05 01 17	bitumen	Solidified, solid, powder or sludge	NH
05 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
05 06	wastes from the pyrolytic treatment of coal		
05 06 04	waste from cooling columns	Solidified, solid, powder or sludge	NH
05 06 99	wastes not otherwise specified		NH
05 07	wastes from natural gas purification and transportation		
05 07 02	wastes containing sulphur	Solidified, solid, powder or sludge	NH
05 07 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
6	WASTES FROM INORGANIC CHEMICAL PROCESSES		
06 03	wastes from the MFSU 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	Solidified, solid, powder or sludge	NH
06 03 16	metallic oxides other than those mentioned in 06 03 15	Solidified, solid, powder or sludge	NH
06 03 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
06 05	sludges from on-site effluent treatment		
06 05 03	sludges from on-site effluent treatment other than those mentioned in 06 05 02	Solidified, solid, powder or sludge	NH
06 06	wastes from the MFSU of sulphur chemicals, sulphur chemical processes and desulphurisation processes		
06 06 03	wastes containing sulphides other than those mentioned in 06 06 02	Solidified, solid, powder or sludge	NH
06 06 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
06 08	wastes from the MFSU of silicon and silicon derivatives		
06 08 02	wastes containing chlorosilanes	Solidified, solid, powder or sludge	NH
06 08 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
06 09	wastes from the MSFU of phosphorous chemicals and phosphorous chemical processes		
06 09 02	phosphorous slag	Solidified, solid, powder or sludge	NH
06 09 04	calcium-based reaction wastes other than those mentioned in 06 09 03	Solidified, solid, powder or sludge	NH
06 09 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
06 11	wastes from the manufacture of inorganic pigments and opacifiers		
06 11 01	calcium-based reaction wastes from titanium dioxide production	Solidified, solid, powder or sludge	NH
06 11 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
06 13	wastes from inorganic chemical processes not otherwise specified		
06 13 03	carbon black	Solidified, solid, powder or sludge	NH
06 13 04*	wastes from asbestos processing	Solidified, solid, powder or sludge	H
06 13 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH

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7	WASTES FROM ORGANIC CHEMICAL PROCESSES		
07 01	wastes from the manufacture, formulation, supply and use (MFSU) of basic organic chemicals		
07 01 12	sludges from on-site effluent treatment other than those mentioned in 07 01 11	Solidified, solid, powder or sludge	NH
07 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
07 02	wastes from the MFSU of plastics, synthetic rubber and man-made fibres		
07 02 12	sludges from on-site effluent treatment other than those mentioned in 07 02 11	Solidified, solid, powder or sludge	NH
07 02 13	waste plastic	Solidified, solid, powder or sludge	NH
07 02 15	wastes from additives other than those mentioned in 07 02 14	Solidified, solid, powder or sludge	NH
07 02 16	wastes containing silicones	Solidified, solid, powder or sludge	
07 02 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
07 03	wastes from the MFSU of organic dyes and pigments (except 06 11)		
07 03 12	sludges from on-site effluent treatment other than those mentioned in 07 03 11	Solidified, solid, powder or sludge	NH
07 03 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
07 04	wastes from the MFSU of organic plant protection products (except 02 01 08 and 02 01 09), wood preserving agents (except 03 02) and other biocides		
07 04 12	sludges from on-site effluent treatment other than those mentioned in 07 04 11	Solidified, solid, powder or sludge	NH
07 04 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
07 05	wastes from the MFSU of pharmaceuticals		
07 05 12	sludges from on-site effluent treatment other than those mentioned in 07 05 11	Solidified, solid, powder or sludge	NH
07 05 14	solid wastes other than those mentioned in 07 05 13	Solidified, solid, powder or sludge	NH
07 05 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
07 06	wastes from the MFSU of fats, grease, soaps, detergents, disinfectants and cosmetics		
07 06 12	sludges from on-site effluent treatment other than those mentioned in 07 06 11	Solidified, solid, powder or sludge	NH
07 06 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
07 07	wastes from the MFSU of fine chemicals and chemical products not otherwise specified		
07 07 12	sludges from on-site effluent treatment other than those mentioned in 07 07 11	Solidified, solid, powder or sludge	NH
07 07 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
8	WASTES FROM THE MANUFACTURE, FORMULATION, SUPPLY AND USE (MFSU) OF COATINGS (PAINTS, VARNISHES AND VITREOUS ENAMELS), ADHESIVES, SEALANTS AND PRINTING INKS	Solidified, solid, powder or sludge	
08 01	wastes from MFSU and removal of paint and varnish	Solidified, solid, powder or sludge	
08 01 12	waste paint and varnish other than those mentioned in 08 01 11	Solidified, solid, powder or sludge	NH
08 01 14	sludges from paint or varnish other than those mentioned in 08 01 13	Solidified, solid, powder or sludge	NH
08 01 16	aqueous sludges containing paint or varnish other than those mentioned in 08 01 15	Solidified, solid, powder or sludge	NH

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08 01 18	wastes from paint or varnish removal other than those mentioned in 08 01 17	Solidified, solid, powder or sludge	NH
08 01 20	aqueous suspensions containing paint or varnish other than those mentioned in 08 01 19	Solidified, solid, powder or sludge	
08 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
08 02	wastes from MFSU of other coatings (including ceramic materials)		
08 02 01	waste coating powders	Solidified, solid, powder or sludge	NH
08 02 02	aqueous sludges containing ceramic materials	Solidified, solid, powder or sludge	NH
08 02 03	aqueous suspensions containing ceramic materials	Solidified, solid, powder or sludge	NH
08 02 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
08 03	wastes from MFSU of printing inks		
08 03 07	aqueous sludges containing ink	Solidified, solid, powder or sludge	NH
08 03 08	aqueous liquid waste containing ink	Solidified, solid, powder or sludge	NH
08 03 13	waste ink other than those mentioned in 08 03 12	Solidified, solid, powder or sludge	NH
08 03 15	ink sludges other than those mentioned in 08 03 14	Solidified, solid, powder or sludge	NH
08 03 18	waste printing toner other than those mentioned in 08 03 17	Solidified, solid, powder or sludge	NH
08 03 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
08 04	wastes from MFSU of adhesives and sealants (including waterproofing products)		
08 04 10	waste adhesives and sealants other than those mentioned in 08 04 09	Solidified, solid, powder or sludge	NH
08 04 12	adhesive and sealant sludges other than those mentioned in 08 04 11	Solidified, solid, powder or sludge	NH
08 04 14	aqueous sludges containing adhesives or sealants other than those mentioned in 08 04 13	Solidified, solid, powder or sludge	NH
08 04 16	aqueous liquid waste containing adhesives or sealants other than those mentioned in 08 04 15	Solidified, solid, powder or sludge	NH
08 04 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
08 05	wastes not otherwise specified in 08	Solidified, solid, powder or sludge	
9	WASTES FROM THE PHOTOGRAPHIC INDUSTRY	Solidified, solid, powder or sludge	
09 01	wastes from the photographic industry		
09 01 07	photographic film and paper containing silver or silver compounds	Solidified, solid, powder or sludge	NH
09 01 08	photographic film and paper free of silver or silver compounds	Solidified, solid, powder or sludge	NH
09 01 10	single-use cameras without batteries	Solidified, solid, powder or sludge	NH
09 01 12	single-use cameras containing batteries other than those mentioned in 09 01 11	Solidified, solid, powder or sludge	NH
09 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
10	WASTES FROM THERMAL PROCESSES	Solidified, solid, powder or sludge	
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)	Solidified, solid, powder or sludge	NH
10 01 02	coal fly ash	Solidified, solid, powder or sludge	NH
10 01 03	fly ash from peat and untreated wood	Solidified, solid, powder or sludge	NH
10 01 04*	oil fly ash and boiler dust	Solidified, solid, powder or sludge	H
10 01 05	calcium-based reaction wastes from flue-gas desulphurisation in solid form	Solidified, solid, powder or sludge	NH
10 01 07	calcium-based reaction wastes from flue-gas desulphurisation in sludge form	Solidified, solid, powder or sludge	NH
10 01 09*	sulphuric acid	Solidified, solid, powder or sludge	H

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10 01 13*	fly ash from emulsified hydrocarbons used as fuel	Solidified, solid, powder or sludge	H
10 01 14*	bottom ash, slag and boiler dust from co-incineration containing dangerous substances	Solidified, solid, powder or sludge	H
10 01 15	bottom ash, slag and boiler dust from co-incineration other than those mentioned in 10 01 14	Solidified, solid, powder or sludge	NH
10 01 16*	fly ash from co-incineration containing dangerous substances	Solidified, solid, powder or sludge	H
10 01 17	fly ash from co-incineration other than those mentioned in 10 01 16	Solidified, solid, powder or sludge	NH
10 01 18*	wastes from gas cleaning containing dangerous substances	Solidified, solid, powder or sludge	H
10 01 19	wastes from gas cleaning other than those mentioned in 10 01 05, 10 01 07 and 10 01 18	Solidified, solid, powder or sludge	NH
10 01 20*	sludges from on-site effluent treatment containing dangerous substances	Solidified, solid, powder or sludge	H
10 01 21	sludges from on-site effluent treatment other than those mentioned in 10 01 20	Solidified, solid, powder or sludge	NH
10 01 22*	aqueous sludges from boiler cleansing containing dangerous substances	Solidified, solid, powder or sludge	H
10 01 23	aqueous sludges from boiler cleansing other than those mentioned in 10 01 22	Solidified, solid, powder or sludge	NH
10 01 24	sands from fluidised beds	Solidified, solid, powder or sludge	NH
10 01 25	wastes from fuel storage and preparation of coal-fired power plants	Solidified, solid, powder or sludge	NH
10 01 26	wastes from cooling-water treatment	Solidified, solid, powder or sludge	NH
10 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 02	wastes from the iron and steel industry		
10 02 01	wastes from the processing of slag	Solidified, solid, powder or sludge	NH
10 02 02	unprocessed slag	Solidified, solid, powder or sludge	NH
10 02 08	solid wastes from gas treatment other than those mentioned in 10 02 07	Solidified, solid, powder or sludge	NH
10 02 10	mill scales	Solidified, solid, powder or sludge	NH
10 02 12	wastes from cooling-water treatment other than those mentioned in 10 02 11	Solidified, solid, powder or sludge	NH
10 02 14	sludges and filter cakes from gas treatment other than those mentioned in 10 02 13	Solidified, solid, powder or sludge	NH
10 02 15	other sludges and filter cakes	Solidified, solid, powder or sludge	NH
10 02 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
10 03	wastes from aluminium thermal metallurgy		
10 03 02	anode scraps	Solidified, solid, powder or sludge	NH
10 03 05	waste alumina	Solidified, solid, powder or sludge	NH
10 03 16	skimmings other than those mentioned in 10 03 15	Solidified, solid, powder or sludge	NH
10 03 18	carbon-containing wastes from anode manufacture other than those mentioned in 10 03 17	Solidified, solid, powder or sludge	NH
10 03 20	flue-gas dust other than those mentioned in 10 03 19	Solidified, solid, powder or sludge	NH
10 03 22	other particulates and dust (including ball-mill dust) other than those mentioned in 10 03 21	Solidified, solid, powder or sludge	NH
10 03 24	solid wastes from gas treatment other than those mentioned in 10 03 23	Solidified, solid, powder or sludge	NH
10 03 26	sludges and filter cakes from gas treatment other than those mentioned in 10 03 25	Solidified, solid, powder or sludge	NH
10 03 28	wastes from cooling-water treatment other than those mentioned in 10 03 27	Solidified, solid, powder or sludge	NH

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10 03 30	wastes from treatment of salt slags and black drosses other than those mentioned in 10 03 29	Solidified, solid, powder or sludge	NH
10 03 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 04	wastes from lead thermal metallurgy		
10 04 10	wastes from cooling-water treatment other than those mentioned in 10 04 09	Solidified, solid, powder or sludge	NH
10 04 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
10 05	wastes from zinc thermal metallurgy		
10 05 01	slags from primary and secondary production	Solidified, solid, powder or sludge	NH
10 05 04	other particulates and dust	Solidified, solid, powder or sludge	NH
10 05 05*	solid waste from gas treatment	Solidified, solid, powder or sludge	H
10 05 06*	sludges and filter cakes from gas treatment	Solidified, solid, powder or sludge	H
10 05 08*	wastes from cooling-water treatment containing oil	Solidified, solid, powder or sludge	H
10 05 09	wastes from cooling-water treatment other than those mentioned in 10 05 08	Solidified, solid, powder or sludge	NH
10 05 10*	dross and skimmings that are flammable or emit, upon contact with water, flammable gases in dangerous quantities	Solidified, solid, powder or sludge	H
10 05 11	dross and skimmings other than those mentioned in 10 05 10	Solidified, solid, powder or sludge	NH
10 05 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 06	wastes from copper thermal metallurgy		
10 06 01	slags from primary and secondary production	Solidified, solid, powder or sludge	NH
10 06 02	dross and skimmings from primary and secondary production	Solidified, solid, powder or sludge	NH
10 06 03*	flue-gas dust	Solidified, solid, powder or sludge	H
10 06 04	other particulates and dust	Solidified, solid, powder or sludge	NH
10 06 06*	solid wastes from gas treatment	Solidified, solid, powder or sludge	H
10 06 07*	sludges and filter cakes from gas treatment	Solidified, solid, powder or sludge	H
10 06 09*	wastes from cooling-water treatment containing oil	Solidified, solid, powder or sludge	H
10 06 10	wastes from cooling-water treatment other than those mentioned in 10 06 09	Solidified, solid, powder or sludge	NH
10 06 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 07	wastes from silver, gold and platinum thermal metallurgy		
10 07 01	slags from primary and secondary production	Solidified, solid, powder or sludge	NH
10 07 02	dross and skimmings from primary and secondary production	Solidified, solid, powder or sludge	NH
10 07 03	solid wastes from gas treatment	Solidified, solid, powder or sludge	NH
10 07 04	other particulates and dust	Solidified, solid, powder or sludge	NH
10 07 05	sludges and filter cakes from gas treatment	Solidified, solid, powder or sludge	NH
10 07 07*	wastes from cooling-water treatment containing oil	Solidified, solid, powder or sludge	H
10 07 08	wastes from cooling-water treatment other than those mentioned in 10 07 07	Solidified, solid, powder or sludge	NH
10 07 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 08	wastes from other non-ferrous thermal metallurgy		
10 08 04	particulates and dust	Solidified, solid, powder or sludge	NH
10 08 08*	salt slag from primary and secondary production	Solidified, solid, powder or sludge	H
10 08 09	other slags	Solidified, solid, powder or sludge	NH
10 08 10*	dross and skimmings that are flammable or emit, upon contact with water, flammable gases in dangerous quantities	Solidified, solid, powder or sludge	H

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10 08 11	dross and skimmings other than those mentioned in 10 08 10	Solidified, solid, powder or sludge	NH
10 08 12*	tar-containing wastes from anode manufacture	Solidified, solid, powder or sludge	H
10 08 13	carbon-containing wastes from anode manufacture other than those mentioned in 10 08 12	Solidified, solid, powder or sludge	NH
10 08 14	anode scrap	Solidified, solid, powder or sludge	NH
10 08 15*	flue-gas dust containing dangerous substances	Solidified, solid, powder or sludge	H
10 08 16	flue-gas dust other than those mentioned in 10 08 15	Solidified, solid, powder or sludge	NH
10 08 17*	sludges and filter cakes from flue-gas treatment containing dangerous substances	Solidified, solid, powder or sludge	H
10 08 18	sludges and filter cakes from flue-gas treatment other than those mentioned in 10 08 17	Solidified, solid, powder or sludge	NH
10 08 19*	wastes from cooling-water treatment containing oil	Solidified, solid, powder or sludge	H
10 08 20	wastes from cooling-water treatment other than those mentioned in 10 08 19	Solidified, solid, powder or sludge	NH
10 08 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 09	wastes from casting of ferrous pieces		
10 09 03	furnace slag	Solidified, solid, powder or sludge	NH
10 09 06	casting cores and moulds which have not undergone pouring other than those mentioned in 10 09 05	Solidified, solid, powder or sludge	NH
10 09 08	casting cores and moulds which have undergone pouring other than those mentioned in 10 09 07	Solidified, solid, powder or sludge	NH
10 09 10	flue-gas dust other than those mentioned in 10 09 09	Solidified, solid, powder or sludge	NH
10 09 12	other particulates other than those mentioned in 10 09 11	Solidified, solid, powder or sludge	NH
10 09 14	waste binders other than those mentioned in 10 09 13	Solidified, solid, powder or sludge	NH
10 09 16	waste crack-indicating agent other than those mentioned in 10 09 15	Solidified, solid, powder or sludge	NH
10 09 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 10	wastes from casting of non-ferrous pieces		
10 10 03	furnace slag	Solidified, solid, powder or sludge	NH
10 10 06	casting cores and moulds which have not undergone pouring, other than those mentioned in 10 10 05	Solidified, solid, powder or sludge	NH
10 10 08	casting cores and moulds which have undergone pouring, other than those mentioned in 10 10 07	Solidified, solid, powder or sludge	NH
10 10 10	flue-gas dust other than those mentioned in 10 10 09	Solidified, solid, powder or sludge	NH
10 10 12	other particulates other than those mentioned in 10 10 11	Solidified, solid, powder or sludge	NH
10 10 14	waste binders other than those mentioned in 10 10 13	Solidified, solid, powder or sludge	NH
10 10 16	waste crack-indicating agent other than those mentioned in 10 10 15	Solidified, solid, powder or sludge	NH
10 10 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 11	wastes from manufacture of glass and glass products		
10 11 03	waste glass-based fibrous materials	Solidified, solid, powder or sludge	I
10 11 05	particulates and dust	Solidified, solid, powder or sludge	NH

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10 11 10	waste preparation mixture before thermal processing, other than those mentioned in 10 11 09	Solidified, solid, powder or sludge	NH
10 11 12	waste glass other than those mentioned in 10 11 11	Solidified, solid, powder or sludge	I
10 11 14	glass-polishing and -grinding sludge other than those mentioned in 10 11 13	Solidified, solid, powder or sludge	I
10 11 16	solid wastes from flue-gas treatment other than those mentioned in 10 11 15	Solidified, solid, powder or sludge	NH
10 11 18	sludges and filter cakes from flue-gas treatment other than those mentioned in 10 11 17	Solidified, solid, powder or sludge	NH
10 11 19*	solid wastes from on-site effluent treatment containing dangerous substances	Solidified, solid, powder or sludge	H
10 11 20	solid wastes from on-site effluent treatment other than those mentioned in 10 11 19	Solidified, solid, powder or sludge	NH
10 11 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 12	wastes from manufacture of ceramic goods, bricks, tiles and construction products		
10 12 01	waste preparation mixture before thermal processing	Solidified, solid, powder or sludge	NH
10 12 03	particulates and dust	Solidified, solid, powder or sludge	NH
10 12 05	sludges and filter cakes from gas treatment	Solidified, solid, powder or sludge	NH
10 12 06	discarded moulds	Solidified, solid, powder or sludge	NH
10 12 08	waste ceramics, bricks, tiles and construction products (after thermal processing)	Solidified, solid, powder or sludge	NH
10 12 10	solid wastes from gas treatment other than those mentioned in 10 12 09	Solidified, solid, powder or sludge	NH
10 12 12	wastes from glazing other than those mentioned in 10 12 11	Solidified, solid, powder or sludge	NH
10 12 13	sludge from on-site effluent treatment	Solidified, solid, powder or sludge	NH
10 12 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
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	Solidified, solid, powder or sludge	NH
10 13 04	wastes from calcination and hydration of lime	Solidified, solid, powder or sludge	NH
10 13 06	particulates and dust (except 10 13 12 and 10 13 13)	Solidified, solid, powder or sludge	NH
10 13 07	sludges and filter cakes from gas treatment	Solidified, solid, powder or sludge	NH
10 13 09*	wastes from asbestos-cement manufacture containing asbestos	Solidified, solid, powder or sludge	H
10 13 10	wastes from asbestos-cement manufacture other than those mentioned in 10 13 09	Solidified, solid, powder or sludge	NH
10 13 11	wastes from cement-based composite materials other than those mentioned in 10 13 09 and 10 13 10	Solidified, solid, powder or sludge	NH
10 13 13	solid wastes from gas treatment other than those mentioned in 10 13 12	Solidified, solid, powder or sludge	NH
10 13 14	waste concrete and concrete sludge	Solidified, solid, powder or sludge	NH
10 13 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
11	WASTES FROM CHEMICAL SURFACE TREATMENT AND COATING OF METALS AND OTHER MATERIALS; NON-FERROUS HYDRO-METALLURGY	Solidified, solid, powder or sludge	

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11 01	wastes from chemical surface treatment and coating of metals and other materials (for example galvanic processes, zinc coating processes, pickling processes, etching, phosphating, alkaline degreasing, anodising)		
11 01 10	sludges and filter cakes other than those mentioned in 11 01 09	Solidified, solid, powder or sludge	NH
11 01 12	aqueous rinsing liquids other than those mentioned in 11 01 11	Solidified, solid, powder or sludge	NH
11 01 14	degreasing wastes other than those mentioned in 11 01 13	Solidified, solid, powder or sludge	NH
11 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
11 02	wastes from non-ferrous hydrometallurgical processes		
11 02 03	wastes from the production of anodes for aqueous electrolytical processes	Solidified, solid, powder or sludge	NH
11 02 06	wastes from copper hydrometallurgical processes other than those mentioned in 11 02 05	Solidified, solid, powder or sludge	NH
11 02 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
11 03	sludges and solids from tempering processes	Solidified, solid, powder or sludge	
11 05	wastes from hot galvanising processes		
11 05 01	hard zinc	Solidified, solid, powder or sludge	NH
11 05 02	zinc ash	Solidified, solid, powder or sludge	NH
11 05 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
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 01	ferrous metal filings and turnings	Solidified, solid, powder or sludge	NH
12 01 02	ferrous metal dust and particles	Solidified, solid, powder or sludge	NH
12 01 03	non-ferrous metal filings and turnings	Solidified, solid, powder or sludge	NH
12 01 04	non-ferrous metal dust and particles	Solidified, solid, powder or sludge	NH
12 01 05	plastics shavings and turnings	Solidified, solid, powder or sludge	NH
12 01 13	welding wastes	Solidified, solid, powder or sludge	NH
12 01 15	machining sludges other than those mentioned in 12 01 14	Solidified, solid, powder or sludge	NH
12 01 17	waste blasting material other than those mentioned in 12 01 16	Solidified, solid, powder or sludge	NH
12 01 21	spent grinding bodies and grinding materials other than those mentioned in 12 01 20	Solidified, solid, powder or sludge	NH
12 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
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 01	paper and cardboard packaging	Solidified, solid, powder or sludge	NH
15 01 02	plastic packaging	Solidified, solid, powder or sludge	NH
15 01 03	wooden packaging	Solidified, solid, powder or sludge	NH
15 01 04	metallic packaging	Solidified, solid, powder or sludge	NH
15 01 05	composite packaging	Solidified, solid, powder or sludge	NH
15 01 06	mixed packaging	Solidified, solid, powder or sludge	NH
15 01 07	glass packaging	Solidified, solid, powder or sludge	I
15 01 09	textile packaging	Solidified, solid, powder or sludge	NH

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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	Solidified, solid, powder or sludge	NH
16	WASTES NOT OTHERWISE SPECIFIED IN THE LIST		
16 01	end-of-life vehicles from different means of transport (including offroad machinery) and wastes from dismantling of end-of-life vehicles and vehicle maintenance (except 13, 14, 16 06 and 16 08)		
16 01 03	end-of-life tyres	Solidified, solid, powder or sludge	NH
16 01 06	end-of-life vehicles, containing neither liquids nor other hazardous components	Solidified, solid, powder or sludge	NH
16 01 12	brake pads other than those mentioned in 16 01 11	Solidified, solid, powder or sludge	NH
16 01 15	antifreeze fluids other than those mentioned in 16 01 14	Solidified, solid, powder or sludge	NH
16 01 16	tanks for liquefied gas	Solidified, solid, powder or sludge	NH
16 01 17	ferrous metal	Solidified, solid, powder or sludge	NH
16 01 18	non-ferrous metal	Solidified, solid, powder or sludge	NH
16 01 19	plastic	Solidified, solid, powder or sludge	NH
16 01 20	glass	Solidified, solid, powder or sludge	NH
16 01 22	components not otherwise specified	Solidified, solid, powder or sludge	NH
16 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
16 02	wastes from electrical and electronic equipment		
16 02 14	discarded equipment other than those mentioned in 16 02 09 to 16 02 13	Solidified, solid, powder or sludge	NH
16 02 16	components removed from discarded equipment other than those mentioned in 16 02 15	Solidified, solid, powder or sludge	NH
16 03	off-specification batches and unused products		
16 03 04	inorganic wastes other than those mentioned in 16 03 03	Solidified, solid, powder or sludge	NH
16 03 06	organic wastes other than those mentioned in 16 03 05	Solidified, solid, powder or sludge	NH
16 05	gases in pressure containers and discarded chemicals		
16 05 05	gases in pressure containers other than those mentioned in 16 05 04	Solidified, solid, powder or sludge	NH
16 05 09	discarded chemicals other than those mentioned in 16 05 06, 16 05 07 or 16 05 08	Solidified, solid, powder or sludge	NH
16 06	batteries and accumulators		
16 06 04	alkaline batteries (except 16 06 03)	Solidified, solid, powder or sludge	NH
16 06 05	other batteries and accumulators	Solidified, solid, powder or sludge	NH
16 08	spent catalysts		
16 08 01	spent catalysts containing gold, silver, rhenium, rhodium, palladium, iridium or platinum (except 16 08 07)	Solidified, solid, powder or sludge	NH
16 08 03	spent catalysts containing transition metals or transition metal compounds not otherwise specified	Solidified, solid, powder or sludge	NH
16 08 04	spent fluid catalytic cracking catalysts (except 16 08 07)	Solidified, solid, powder or sludge	NH
16 10	aqueous liquid wastes destined for off-site treatment	Solidified, solid, powder or sludge	

Proposed waste types for disposal at Nanty Caws pre July 2004

16 10 02	aqueous liquid wastes other than those mentioned in 16 10 01	Solidified, solid, powder or sludge	NH
16 10 04	aqueous concentrates other than those mentioned in 16 10 03	Solidified, solid, powder or sludge	NH
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	Solidified, solid, powder or sludge	NH
16 11 04	other linings and refractories from metallurgical processes other than those mentioned in 16 11 03	Solidified, solid, powder or sludge	NH
16 11 06	linings and refractories from non-metallurgical processes others than those mentioned in 16 11 05	Solidified, solid, powder or sludge	NH
17	CONSTRUCTION AND DEMOLITION WASTES (INCLUDING EXCAVATED SOIL FROM CONTAMINATED SITES)		
17 01	concrete, bricks, tiles and ceramics		
17 01 01	concrete	Solidified, solid, powder or sludge	I
17 01 02	bricks	Solidified, solid, powder or sludge	I
17 01 03	tiles and ceramics	Solidified, solid, powder or sludge	I
17 01 07	mixtures of concrete, bricks, tiles and ceramics other than those mentioned in 17 01 06	Solidified, solid, powder or sludge	NH
17 02	wood, glass and plastic		
17 02 01	wood	Solidified, solid, powder or sludge	NH
17 02 02	glass	Solidified, solid, powder or sludge	I
17 02 03	plastic	Solidified, solid, powder or sludge	NH
17 03	bituminous mixtures, coal tar and tarred products		
17 03 02	bituminous mixtures other than those mentioned in 17 03 01	Solidified, solid, powder or sludge	NH
17 04	metals (including their alloys)		
17 04 01	copper, bronze, brass	Solidified, solid, powder or sludge	NH
17 04 03	lead	Solidified, solid, powder or sludge	NH
17 04 04	zinc	Solidified, solid, powder or sludge	NH
17 04 05	iron and steel	Solidified, solid, powder or sludge	NH
17 04 06	tin	Solidified, solid, powder or sludge	NH
17 04 07	mixed metals	Solidified, solid, powder or sludge	NH
17 04 11	cables other than those mentioned in 17 04 10	Solidified, solid, powder or sludge	NH
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	Solidified, solid, powder or sludge	I
17 05 06	dredging spoil other than those mentioned in 17 05 05	Solidified, solid, powder or sludge	NH
17 05 08	track ballast other than those mentioned in 17 05 07	Solidified, solid, powder or sludge	NH
17 06	insulation materials and asbestos-containing construction materials		
17 06 01*	insulation materials containing asbestos	Solidified, solid, powder or sludge	H
17 06 03*	other insulation materials consisting of or containing dangerous substances	Solidified, solid, powder or sludge	H
17 06 04	insulation materials other than those mentioned in 17 06 01 and 17 06 03	Solidified, solid, powder or sludge	NH
17 06 05	construction materials containing asbestos	Solidified, solid, powder or sludge	NH
17 08	gypsum-based construction material		
17 08 02	gypsum-based construction materials other than those mentioned in 17 08 01	Solidified, solid, powder or sludge	NH

Proposed waste types for disposal at Nanty Caws pre July 2004

17 09	other construction and demolition wastes		
17 09 04	mixed construction and demolition wastes other than those mentioned in 17 09 01, 17 09 02 and 17 09 03	Solidified, solid, powder or sludge	NH
18	WASTES FROM HUMAN OR ANIMAL HEALTH CARE AND/OR RELATED RESEARCH (except kitchen and restaurant wastes not arising from immediate health care)		
18 01	wastes from natal care, diagnosis, treatment or prevention of disease in humans		
18 01 01	sharps (except 18 01 03)	Solidified, solid, powder or sludge	NH
18 01 02	body parts and organs including blood bags and blood preserves (except 18 01 03)	Solidified, solid, powder or sludge	NH
18 01 04	wastes whose collection and disposal is not subject to special requirements in order to prevent infection (for example dressings, plaster casts, linen, disposable clothing, diapers)	Solidified, solid, powder or sludge	NH
18 01 07	chemicals other than those mentioned in 18 01 06	Solidified, solid, powder or sludge	NH
18 01 09	medicines other than those mentioned in 18 01 08	Solidified, solid, powder or sludge	NH
18 02	wastes from research, diagnosis, treatment or prevention of disease involving animals		
18 02 01	sharps (except 18 02 02)	Solidified, solid, powder or sludge	NH
18 02 03	wastes whose collection and disposal is not subject to special requirements in order to prevent infection	Solidified, solid, powder or sludge	NH
18 02 06	chemicals other than those mentioned in 18 02 05	Solidified, solid, powder or sludge	NH
18 02 08	medicines other than those mentioned in 18 02 07	Solidified, solid, powder or sludge	NH
19	WASTES FROM WASTE MANAGEMENT FACILITIES, OFF-SITE WASTE WATER TREATMENT PLANTS AND THE PREPARATION OF WATER INTENDED FOR HUMAN CONSUMPTION AND WATER FOR INDUSTRIAL USE		
19 01	wastes from incineration or pyrolysis of waste		
19 01 02	ferrous materials removed from bottom ash	Solidified, solid, powder or sludge	NH
19 01 12	bottom ash and slag other than those mentioned in 19 01 11	Solidified, solid, powder or sludge	NH
19 01 14	fly ash other than those mentioned in 19 01 13	Solidified, solid, powder or sludge	NH
19 01 16	boiler dust other than those mentioned in 19 01 15	Solidified, solid, powder or sludge	NH
19 01 18	pyrolysis wastes other than those mentioned in 19 01 17	Solidified, solid, powder or sludge	NH
19 01 19	sands from fluidised beds	Solidified, solid, powder or sludge	NH
19 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
19 02	wastes from physico/chemical treatments of waste (including dechromatation, decyanidation, neutralisation)		
19 02 03	premixed wastes composed only of non-hazardous wastes	Solidified, solid, powder or sludge	NH
19 02 06	sludges from physico/chemical treatment other than those mentioned in 19 02 05	Solidified, solid, powder or sludge	NH
19 02 10	combustible wastes other than those mentioned in 19 02 08 and 19 02 09	Solidified, solid, powder or sludge	NH
19 02 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH

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19 03	stabilised/solidified wastes (4)		
19 03 05	stabilised wastes other than those mentioned in 19 03 04	Solidified, solid, powder or sludge	NH
19 03 07	solidified wastes other than those mentioned in 19 03 06	Solidified, solid, powder or sludge	NH
19 04	vitrified waste and wastes from vitrification		
19 04 01	vitrified waste	Solidified, solid, powder or sludge	NH
19 04 04	aqueous liquid wastes from vitrified waste tempering	Solidified, solid, powder or sludge	NH
19 05	wastes from aerobic treatment of solid wastes		
19 05 01	non-composted fraction of municipal and similar wastes	Solidified, solid, powder or sludge	NH
19 05 02	non-composted fraction of animal and vegetable waste	Solidified, solid, powder or sludge	NH
19 05 03	off-specification compost	Solidified, solid, powder or sludge	NH
19 05 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
19 06	wastes from anaerobic treatment of waste		
19 06 03	liquor from anaerobic treatment of municipal waste	Solidified, solid, powder or sludge	NH
19 06 04	digestate from anaerobic treatment of municipal waste	Solidified, solid, powder or sludge	NH
19 06 05	liquor from anaerobic treatment of animal and vegetable waste	Solidified, solid, powder or sludge	NH
19 06 06	digestate from anaerobic treatment of animal and vegetable waste	Solidified, solid, powder or sludge	NH
19 06 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
19 08	wastes from waste water treatment plants not otherwise specified		
19 08 01	screenings	Solidified, solid, powder or sludge	NH
19 08 02	waste from desanding	Solidified, solid, powder or sludge	NH
19 08 05	sludges from treatment of urban waste water	Solidified, solid, powder or sludge	NH
19 08 12	sludges from biological treatment of industrial waste water other than those mentioned in 19 08 11	Solidified, solid, powder or sludge	NH
19 08 14	sludges from other treatment of industrial waste water other than those mentioned in 19 08 13	Solidified, solid, powder or sludge	NH
19 08 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
19 09	wastes from the preparation of water intended for human consumption or water for industrial use		
19 09 01	solid waste from primary filtration and screenings	Solidified, solid, powder or sludge	NH
19 09 02	sludges from water clarification	Solidified, solid, powder or sludge	NH
19 09 03	sludges from decarbonation	Solidified, solid, powder or sludge	NH
19 09 04	spent activated carbon	Solidified, solid, powder or sludge	NH
19 09 05	saturated or spent ion exchange resins	Solidified, solid, powder or sludge	NH
19 09 06	solutions and sludges from regeneration of ion exchangers	Solidified, solid, powder or sludge	NH
19 09 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
19 10	wastes from shredding of metal-containing wastes		
19 10 01	iron and steel waste	Solidified, solid, powder or sludge	NH
19 10 02	non-ferrous waste	Solidified, solid, powder or sludge	NH
19 10 04	fluff-light fraction and dust other than those mentioned in 19 10 03	Solidified, solid, powder or sludge	NH
19 10 06	other fractions other than those mentioned in 19 10 05	Solidified, solid, powder or sludge	NH
19 11	wastes from oil regeneration		

Proposed waste types for disposal at Nanty Caws pre July 2004

19 11 06	sludges from on-site effluent treatment other than those mentioned in 19 11 05	Solidified, solid, powder or sludge	NH
19 11 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
19 12	wastes from the mechanical treatment of waste (for example sorting, crushing, compacting, pelletising) not otherwise specified		
19 12 01	paper and cardboard	Solidified, solid, powder or sludge	NH
19 12 02	ferrous metal	Solidified, solid, powder or sludge	NH
19 12 03	non-ferrous metal	Solidified, solid, powder or sludge	NH
19 12 04	plastic and rubber	Solidified, solid, powder or sludge	NH
19 12 05	glass	Solidified, solid, powder or sludge	NH
19 12 07	wood other than that mentioned in 19 12 06	Solidified, solid, powder or sludge	NH
19 12 08	textiles	Solidified, solid, powder or sludge	NH
19 12 09	minerals (for example sand, stones)	Solidified, solid, powder or sludge	NH
19 12 10	combustible waste (refuse derived fuel)	Solidified, solid, powder or sludge	NH
19 12 12	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	Solidified, solid, powder or sludge	NH
19 13	wastes from soil and groundwater remediation		
19 13 02	solid wastes from soil remediation other than those mentioned in 19 13 01	Solidified, solid, powder or sludge	NH
19 13 06	sludges from groundwater remediation other than those mentioned in 19 13 05	Solidified, solid, powder or sludge	NH
20	MUNICIPAL WASTES (HOUSEHOLD WASTE AND SIMILAR COMMERCIAL, INDUSTRIAL AND INSTITUTIONAL WASTES) INCLUDING SEPARATELY COLLECTED FRACTIONS		
		Solidified, solid, powder or sludge	
20 01 01	paper and cardboard	Solidified, solid, powder or sludge	NH
20 01 02	glass	Solidified, solid, powder or sludge	I
20 01 08	biodegradable kitchen and canteen waste	Solidified, solid, powder or sludge	NH
20 01 10	clothes	Solidified, solid, powder or sludge	NH
20 01 11	textiles	Solidified, solid, powder or sludge	NH
20 01 25	edible oil and fat	Solidified, solid, powder or sludge	NH
20 01 28	paint, inks, adhesives and resins other than those mentioned in 20 01 27	Solidified, solid, powder or sludge	NH
20 01 30	detergents other than those mentioned in 20 01 29	Solidified, solid, powder or sludge	NH
20 01 32	medicines other than those mentioned in 20 01 31	Solidified, solid, powder or sludge	NH
20 01 34	batteries and accumulators other than those mentioned in 20 01 33	Solidified, solid, powder or sludge	NH
20 01 36	discarded electrical and electronic equipment other than those mentioned in 20 01 21, 20 01 23 and 20 01 35	Solidified, solid, powder or sludge	NH
20 01 38	wood other than that mentioned in 20 01 37	Solidified, solid, powder or sludge	NH
20 01 39	plastics	Solidified, solid, powder or sludge	NH
20 01 40	metals	Solidified, solid, powder or sludge	NH
20 01 41	wastes from chimney sweeping	Solidified, solid, powder or sludge	NH
20 01 99	other fractions not otherwise specified	Solidified, solid, powder or sludge	NH
20 02	garden and park wastes (including cemetery waste)		
20 02 01	biodegradable waste	Solidified, solid, powder or sludge	NH
20 02 02	soil and stones	Solidified, solid, powder or sludge	NH
20 02 03	other non-biodegradable wastes	Solidified, solid, powder or sludge	NH
20 03	other municipal wastes		
20 03 01	mixed municipal waste	Solidified, solid, powder or sludge	NH
20 03 02	waste from markets	Solidified, solid, powder or sludge	NH

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20 03 03	street-cleaning residues	Solidified, solid, powder or sludge	NH
20 03 04	septic tank sludge	Solidified, solid, powder or sludge	NH
20 03 06	waste from sewage cleaning	Solidified, solid, powder or sludge	NH
20 03 07	bulky waste	Solidified, solid, powder or sludge	NH
20 03 99	municipal wastes not otherwise specified	Solidified, solid, powder or sludge	NH



Nanty Caws Landfill PPC Application
Reference No. CP3735PB
Application Form Supporting Information

Q B2.1.5 Proposed Waste types for disposal at Nanty Caws landfill post July 2004
(Classification as per European Waste Catalogue)

Proposed waste types for disposal at Nanty Caws post July 2004

Code	Description	Physical Description (e.g. solid, sludge, nuisance risk)	Waste Classification - H -hazardous, NH -non hazardous, SNH - stable, non-reactive hazardous
1	WASTES RESULTING FROM EXPLORATION, MINING, QUARRYING, AND PHYSICAL AND CHEMICAL TREATMENT OF MINERALS		
01 01	wastes from mineral excavation	Solidified, solid, powder or sludge	
01 01 01	wastes from mineral metalliferous excavation	Solidified, solid, powder or sludge	NH
01 01 02	wastes from mineral non-metalliferous excavation	Solidified, solid, powder or sludge	NH
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	Solidified, solid, powder or sludge	NH
01 03 08	dusty and powdery wastes other than those mentioned in 01 03 07	Solidified, solid, powder or sludge	NH
01 03 09	red mud from alumina production other than the wastes mentioned in 01 03 07	Solidified, solid, powder or sludge	NH
01 03 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
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	Solidified, solid, powder or sludge	NH
01 04 09	waste sand and clays	Solidified, solid, powder or sludge	NH
01 04 10	dusty and powdery wastes other than those mentioned in 01 04 07	Solidified, solid, powder or sludge	NH
01 04 11	wastes from potash and rock salt processing other than those mentioned in 01 04 07	Solidified, solid, powder or sludge	NH
01 04 12	tailings and other wastes from washing and cleaning of minerals other than those mentioned in 01 04 07 and 01 04 11	Solidified, solid, powder or sludge	NH
01 04 13	wastes from stone cutting and sawing other than those mentioned in 01 04 07	Solidified, solid, powder or sludge	NH
01 04 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
01 05	drilling muds and other drilling wastes		
01 05 04	freshwater drilling muds and wastes	Solidified, solid, powder or sludge	NH
01 05 07	barite-containing drilling muds and wastes other than those mentioned in 01 05 05 and 01 05 06	Solidified, solid, powder or sludge	NH
01 05 08	chloride-containing drilling muds and wastes other than those mentioned in 01 05 05 and 01 05 06	Solidified, solid, powder or sludge	NH
01 05 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH

Proposed waste types for disposal at Nanty Caws post July 2004

2	WASTES FROM AGRICULTURE, HORTICULTURE, AQUACULTURE, FORESTRY, HUNTING AND FISHING, FOOD PREPARATION AND PROCESSING		
02 01	wastes from agriculture, horticulture, aquaculture, forestry, hunting and fishing		
02 01 01	sludges from washing and cleaning	Solidified, solid, powder or sludge	NH
02 01 02	animal-tissue waste	Solidified, solid, powder or sludge	NH
02 01 03	plant-tissue waste	Solidified, solid, powder or sludge	NH
02 01 04	waste plastics (except packaging)	Solidified, solid, powder or sludge	NH
02 01 06	animal faeces, urine and manure (including spoiled straw), effluent, collected separately and treated off-site	Solidified, solid, powder or sludge	NH
02 01 07	wastes from forestry	Solidified, solid, powder or sludge	NH
02 01 09	agrochemical waste other than those mentioned in 02 01 08	Solidified, solid, powder or sludge	NH
02 01 10	waste metal	Solidified, solid, powder or sludge	NH
02 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
02 02	wastes from the preparation and processing of meat, fish and other foods of animal origin		
02 02 01	sludges from washing and cleaning	Solidified, solid, powder or sludge	NH
02 02 02	animal-tissue waste	Solidified, solid, powder or sludge	NH
02 02 03	materials unsuitable for consumption or processing	Solidified, solid, powder or sludge	NH
02 02 04	sludges from on-site effluent treatment	Solidified, solid, powder or sludge	NH
02 02 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
02 03	wastes from fruit, vegetables, cereals, edible oils, cocoa, coffee, tea and tobacco preparation and processing; conserve production; yeast and yeast extract production, molasses preparation and fermentation		
02 03 01	sludges from washing, cleaning, peeling, centrifuging and separation	Solidified, solid, powder or sludge	NH
02 03 02	wastes from preserving agents	Solidified, solid, powder or sludge	NH
02 03 03	wastes from solvent extraction	Solidified, solid, powder or sludge	NH
02 03 04	materials unsuitable for consumption or processing	Solidified, solid, powder or sludge	NH
02 03 05	sludges from on-site effluent treatment	Solidified, solid, powder or sludge	NH
02 03 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
02 04	wastes from sugar processing		

Proposed waste types for disposal at Nanty Caws post July 2004

02 04 01	soil from cleaning and washing beet	Solidified, solid, powder or sludge	NH
02 04 02	off-specification calcium carbonate	Solidified, solid, powder or sludge	NH
02 04 03	sludges from on-site effluent treatment	Solidified, solid, powder or sludge	NH
02 04 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
02 05	wastes from the dairy products industry		
02 05 01	materials unsuitable for consumption or processing	Solidified, solid, powder or sludge	NH
02 05 02	sludges from on-site effluent treatment	Solidified, solid, powder or sludge	NH
02 05 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
02 06	wastes from the baking and confectionery industry		
02 06 01	materials unsuitable for consumption or processing	Solidified, solid, powder or sludge	NH
02 06 02	wastes from preserving agents	Solidified, solid, powder or sludge	NH
02 06 03	sludges from on-site effluent treatment	Solidified, solid, powder or sludge	NH
02 06 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
02 07	wastes from the production of alcoholic and non-alcoholic beverages (except coffee, tea and cocoa)		
02 07 01	wastes from washing, cleaning and mechanical reduction of raw materials	Solidified, solid, powder or sludge	NH
02 07 02	wastes from spirits distillation	Solidified, solid, powder or sludge	NH
02 07 03	wastes from chemical treatment	Solidified, solid, powder or sludge	NH
02 07 04	materials unsuitable for consumption or processing	Solidified, solid, powder or sludge	NH
02 07 05	sludges from on-site effluent treatment	Solidified, solid, powder or sludge	NH
02 07 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
3	WASTES FROM WOOD PROCESSING AND THE PRODUCTION OF PANELS AND FURNITURE, PULP, PAPER AND CARDBOARD		
03 01	wastes from wood processing and the production of panels and furniture		
03 01 01	waste bark and cork	Solidified, solid, powder or sludge	NH
03 01 05	sawdust, shavings, cuttings, wood, particle board and veneer other than those mentioned in 03 01 04	Solidified, solid, powder or sludge	NH
03 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
03 03	wastes from pulp, paper and cardboard production and processing		

Proposed waste types for disposal at Nanty Caws post July 2004

03 03 01	waste bark and wood	Solidified, solid, powder or sludge	NH
03 03 02	green liquor sludge (from recovery of cooking liquor)	Solidified, solid, powder or sludge	NH
03 03 05	de-inking sludges from paper recycling	Solidified, solid, powder or sludge	NH
03 03 07	mechanically separated rejects from pulping of waste paper and cardboard	Solidified, solid, powder or sludge	NH
03 03 08	wastes from sorting of paper and cardboard destined for recycling	Solidified, solid, powder or sludge	NH
03 03 09	lime mud waste	Solidified, solid, powder or sludge	NH
03 03 10	fibre rejects, fibre-, filler- and coating-sludges from mechanical separation	Solidified, solid, powder or sludge	NH
03 03 11	sludges from on-site effluent treatment other than those mentioned in 03 03 10	Solidified, solid, powder or sludge	NH
03 03 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
4	WASTES FROM THE LEATHER, FUR AND TEXTILE INDUSTRIES	Solidified, solid, powder or sludge	
04 01	wastes from the leather and fur industry		
04 01 01	fleshings and lime split wastes	Solidified, solid, powder or sludge	NH
04 01 02	liming waste	Solidified, solid, powder or sludge	NH
04 01 04	tanning liquor containing chromium	Solidified, solid, powder or sludge	NH
04 01 05	tanning liquor free of chromium	Solidified, solid, powder or sludge	NH
04 01 06	sludges, in particular from on-site effluent treatment containing chromium	Solidified, solid, powder or sludge	NH
04 01 07	sludges, in particular from on-site effluent treatment free of chromium	Solidified, solid, powder or sludge	NH
04 01 08	waste tanned leather (blue sheetings, shavings, cuttings, buffing dust) containing chromium	Solidified, solid, powder or sludge	NH
04 01 09	wastes from dressing and finishing	Solidified, solid, powder or sludge	NH
04 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
04 02	wastes from the textile industry		
04 02 09	wastes from composite materials (impregnated textile, elastomer, plastomer)	Solidified, solid, powder or sludge	NH
04 02 10	organic matter from natural products (for example grease, wax)	Solidified, solid, powder or sludge	NH
04 02 15	wastes from finishing other than those mentioned in 04 02 14	Solidified, solid, powder or sludge	NH
04 02 17	dyestuffs and pigments other than those mentioned in 04 02 16	Solidified, solid, powder or sludge	NH
04 02 20	sludges from on-site effluent treatment other than those mentioned in 04 02 19	Solidified, solid, powder or sludge	NH
04 02 21	wastes from unprocessed textile fibres	Solidified, solid, powder or sludge	NH
04 02 22	wastes from processed textile fibres	Solidified, solid, powder or sludge	NH

Proposed waste types for disposal at Nanty Caws post July 2004

04 02 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
5	WASTES FROM PETROLEUM REFINING, NATURAL GAS PURIFICATION AND PYROLYTIC REATMENT OF COAL		
05 01	wastes from petroleum refining		
05 01 10	sludges from on-site effluent treatment other than those mentioned in 05 01 09	Solidified, solid, powder or sludge	NH
05 01 13	boiler feedwater sludges	Solidified, solid, powder or sludge	NH
05 01 14	wastes from cooling columns	Solidified, solid, powder or sludge	NH
05 01 16	sulphur-containing wastes from petroleum desulphurisation	Solidified, solid, powder or sludge	NH
05 01 17	bitumen	Solidified, solid, powder or sludge	NH
05 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
05 06	wastes from the pyrolytic treatment of coal		
05 06 04	waste from cooling columns	Solidified, solid, powder or sludge	NH
05 06 99	wastes not otherwise specified		NH
05 07	wastes from natural gas purification and transportation		
05 07 02	wastes containing sulphur	Solidified, solid, powder or sludge	NH
05 07 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
6	WASTES FROM INORGANIC CHEMICAL PROCESSES		
06 03	wastes from the MFSU 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	Solidified, solid, powder or sludge	NH
06 03 16	metallic oxides other than those mentioned in 06 03 15	Solidified, solid, powder or sludge	NH
06 03 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
06 05	sludges from on-site effluent treatment		
06 05 03	sludges from on-site effluent treatment other than those mentioned in 06 05 02	Solidified, solid, powder or sludge	NH
06 06	wastes from the MFSU of sulphur chemicals, sulphur chemical processes and desulphurisation processes		
06 06 03	wastes containing sulphides other than those mentioned in 06 06 02	Solidified, solid, powder or sludge	NH
06 06 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
06 08	wastes from the MFSU of silicon and silicon derivatives		
06 08 02	wastes containing chlorosilanes	Solidified, solid, powder or sludge	NH
06 08 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH

Proposed waste types for disposal at Nanty Caws post July 2004

06 09	wastes from the MSFU of phosphorous chemicals and phosphorous chemical processes		
06 09 02	phosphorous slag	Solidified, solid, powder or sludge	NH
06 09 04	calcium-based reaction wastes other than those mentioned in 06 09 03	Solidified, solid, powder or sludge	NH
06 09 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
06 11	wastes from the manufacture of inorganic pigments and opacifiers		
06 11 01	calcium-based reaction wastes from titanium dioxide production	Solidified, solid, powder or sludge	NH
06 11 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
06 13	wastes from inorganic chemical processes not otherwise specified		
06 13 03	carbon black	Solidified, solid, powder or sludge	NH
06 13 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
7	WASTES FROM ORGANIC CHEMICAL PROCESSES		
07 01	wastes from the manufacture, formulation, supply and use (MFSU) of basic organic chemicals		
07 01 12	sludges from on-site effluent treatment other than those mentioned in 07 01 11	Solidified, solid, powder or sludge	NH
07 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
07 02	wastes from the MFSU of plastics, synthetic rubber and man-made fibres		
07 02 12	sludges from on-site effluent treatment other than those mentioned in 07 02 11	Solidified, solid, powder or sludge	NH
07 02 13	waste plastic	Solidified, solid, powder or sludge	NH
07 02 15	wastes from additives other than those mentioned in 07 02 14	Solidified, solid, powder or sludge	NH
07 02 16	wastes containing silicones	Solidified, solid, powder or sludge	
07 02 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
07 03	wastes from the MFSU of organic dyes and pigments (except 06 11)		
07 03 12	sludges from on-site effluent treatment other than those mentioned in 07 03 11	Solidified, solid, powder or sludge	NH
07 03 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
07 04	wastes from the MFSU of organic plant protection products (except 02 01 08 and 02 01 09), wood preserving agents (except 03 02) and other biocides		
07 04 12	sludges from on-site effluent treatment other than those mentioned in 07 04 11	Solidified, solid, powder or sludge	NH

Proposed waste types for disposal at Nanty Caws post July 2004

07 04 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
07 05	wastes from the MFSU of pharmaceuticals		
07 05 12	sludges from on-site effluent treatment other than those mentioned in 07 05 11	Solidified, solid, powder or sludge	NH
07 05 14	solid wastes other than those mentioned in 07 05 13	Solidified, solid, powder or sludge	NH
07 05 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
07 06	wastes from the MFSU of fats, grease, soaps, detergents, disinfectants and cosmetics		
07 06 12	sludges from on-site effluent treatment other than those mentioned in 07 06 11	Solidified, solid, powder or sludge	NH
07 06 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
07 07	wastes from the MFSU of fine chemicals and chemical products not otherwise specified		
07 07 12	sludges from on-site effluent treatment other than those mentioned in 07 07 11	Solidified, solid, powder or sludge	NH
07 07 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
8	WASTES FROM THE MANUFACTURE, FORMULATION, SUPPLY AND USE (MFSU) OF COATINGS (PAINTS, VARNISHES AND VITREOUS ENAMELS), ADHESIVES, SEALANTS AND PRINTING INKS	Solidified, solid, powder or sludge	
08 01	wastes from MFSU and removal of paint and varnish	Solidified, solid, powder or sludge	
08 01 12	waste paint and varnish other than those mentioned in 08 01 11	Solidified, solid, powder or sludge	NH
08 01 14	sludges from paint or varnish other than those mentioned in 08 01 13	Solidified, solid, powder or sludge	NH
08 01 16	aqueous sludges containing paint or varnish other than those mentioned in 08 01 15	Solidified, solid, powder or sludge	NH
08 01 18	wastes from paint or varnish removal other than those mentioned in 08 01 17	Solidified, solid, powder or sludge	NH
08 01 20	aqueous suspensions containing paint or varnish other than those mentioned in 08 01 19	Solidified, solid, powder or sludge	
08 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
08 02	wastes from MFSU of other coatings (including ceramic materials)		
08 02 01	waste coating powders	Solidified, solid, powder or sludge	NH
08 02 02	aqueous sludges containing ceramic materials	Solidified, solid, powder or sludge	NH
08 02 03	aqueous suspensions containing ceramic materials	Solidified, solid, powder or sludge	NH
08 02 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
08 03	wastes from MFSU of printing inks		
08 03 07	aqueous sludges containing ink	Solidified, solid, powder or sludge	NH
08 03 08	aqueous liquid waste containing ink	Solidified, solid, powder or sludge	NH

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08 03 13	waste ink other than those mentioned in 08 03 12	Solidified, solid, powder or sludge	NH
08 03 15	ink sludges other than those mentioned in 08 03 14	Solidified, solid, powder or sludge	NH
08 03 18	waste printing toner other than those mentioned in 08 03 17	Solidified, solid, powder or sludge	NH
08 03 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
08 04	wastes from MFSU of adhesives and sealants (including waterproofing products)		
08 04 10	waste adhesives and sealants other than those mentioned in 08 04 09	Solidified, solid, powder or sludge	NH
08 04 12	adhesive and sealant sludges other than those mentioned in 08 04 11	Solidified, solid, powder or sludge	NH
08 04 14	aqueous sludges containing adhesives or sealants other than those mentioned in 08 04 13	Solidified, solid, powder or sludge	NH
08 04 16	aqueous liquid waste containing adhesives or sealants other than those mentioned in 08 04 15	Solidified, solid, powder or sludge	NH
08 04 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
08 05	wastes not otherwise specified in 08	Solidified, solid, powder or sludge	
9	WASTES FROM THE PHOTOGRAPHIC INDUSTRY	Solidified, solid, powder or sludge	
09 01	wastes from the photographic industry		
09 01 07	photographic film and paper containing silver or silver compounds	Solidified, solid, powder or sludge	NH
09 01 08	photographic film and paper free of silver or silver compounds	Solidified, solid, powder or sludge	NH
09 01 10	single-use cameras without batteries	Solidified, solid, powder or sludge	NH
09 01 12	single-use cameras containing batteries other than those mentioned in 09 01 11	Solidified, solid, powder or sludge	NH
09 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
10	WASTES FROM THERMAL PROCESSES	Solidified, solid, powder or sludge	
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)	Solidified, solid, powder or sludge	NH
10 01 02	coal fly ash	Solidified, solid, powder or sludge	NH
10 01 03	fly ash from peat and untreated wood	Solidified, solid, powder or sludge	NH
10 01 05	calcium-based reaction wastes from flue-gas desulphurisation in solid form	Solidified, solid, powder or sludge	NH
10 01 07	calcium-based reaction wastes from flue-gas desulphurisation in sludge form	Solidified, solid, powder or sludge	NH
10 01 15	bottom ash, slag and boiler dust from co-incineration other than those mentioned in 10 01 14	Solidified, solid, powder or sludge	NH
10 01 17	fly ash from co-incineration other than those mentioned in 10 01 16	Solidified, solid, powder or sludge	NH

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10 01 19	wastes from gas cleaning other than those mentioned in 10 01 05, 10 01 07 and 10 01 18	Solidified, solid, powder or sludge	NH
10 01 21	sludges from on-site effluent treatment other than those mentioned in 10 01 20	Solidified, solid, powder or sludge	NH
10 01 23	aqueous sludges from boiler cleansing other than those mentioned in 10 01 22	Solidified, solid, powder or sludge	NH
10 01 24	sands from fluidised beds	Solidified, solid, powder or sludge	NH
10 01 25	wastes from fuel storage and preparation of coal-fired power plants	Solidified, solid, powder or sludge	NH
10 01 26	wastes from cooling-water treatment	Solidified, solid, powder or sludge	NH
10 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 02	wastes from the iron and steel industry		
10 02 01	wastes from the processing of slag	Solidified, solid, powder or sludge	NH
10 02 02	unprocessed slag	Solidified, solid, powder or sludge	NH
10 02 08	solid wastes from gas treatment other than those mentioned in 10 02 07	Solidified, solid, powder or sludge	NH
10 02 10	mill scales	Solidified, solid, powder or sludge	NH
10 02 12	wastes from cooling-water treatment other than those mentioned in 10 02 11	Solidified, solid, powder or sludge	NH
10 02 14	sludges and filter cakes from gas treatment other than those mentioned in 10 02 13	Solidified, solid, powder or sludge	NH
10 02 15	other sludges and filter cakes	Solidified, solid, powder or sludge	NH
10 02 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
10 03	wastes from aluminium thermal metallurgy		
10 03 02	anode scraps	Solidified, solid, powder or sludge	NH
10 03 05	waste alumina	Solidified, solid, powder or sludge	NH
10 03 16	skimmings other than those mentioned in 10 03 15	Solidified, solid, powder or sludge	NH
10 03 18	carbon-containing wastes from anode manufacture other than those mentioned in 10 03 17	Solidified, solid, powder or sludge	NH
10 03 20	flue-gas dust other than those mentioned in 10 03 19	Solidified, solid, powder or sludge	NH
10 03 22	other particulates and dust (including ball-mill dust) other than those mentioned in 10 03 21	Solidified, solid, powder or sludge	NH
10 03 24	solid wastes from gas treatment other than those mentioned in 10 03 23	Solidified, solid, powder or sludge	NH
10 03 26	sludges and filter cakes from gas treatment other than those mentioned in 10 03 25	Solidified, solid, powder or sludge	NH
10 03 28	wastes from cooling-water treatment other than those mentioned in 10 03 27	Solidified, solid, powder or sludge	NH
10 03 30	wastes from treatment of salt slags and black drosses other than those mentioned in 10 03 29	Solidified, solid, powder or sludge	NH

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10 03 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 04	wastes from lead thermal metallurgy		
10 04 10	wastes from cooling-water treatment other than those mentioned in 10 04 09	Solidified, solid, powder or sludge	NH
10 04 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
10 05	wastes from zinc thermal metallurgy		
10 05 01	slags from primary and secondary production	Solidified, solid, powder or sludge	NH
10 05 09	wastes from cooling-water treatment other than those mentioned in 10 05 08	Solidified, solid, powder or sludge	NH
10 05 11	dross and skimmings other than those mentioned in 10 05 10	Solidified, solid, powder or sludge	NH
10 05 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 06	wastes from copper thermal metallurgy		
10 06 01	slags from primary and secondary production	Solidified, solid, powder or sludge	NH
10 06 02	dross and skimmings from primary and secondary production	Solidified, solid, powder or sludge	NH
10 06 04	other particulates and dust	Solidified, solid, powder or sludge	NH
10 06 10	wastes from cooling-water treatment other than those mentioned in 10 06 09	Solidified, solid, powder or sludge	NH
10 06 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 07	wastes from silver, gold and platinum thermal metallurgy		
10 07 01	slags from primary and secondary production	Solidified, solid, powder or sludge	NH
10 07 02	dross and skimmings from primary and secondary production	Solidified, solid, powder or sludge	NH
10 07 03	solid wastes from gas treatment	Solidified, solid, powder or sludge	NH
10 07 04	other particulates and dust	Solidified, solid, powder or sludge	NH
10 07 05	sludges and filter cakes from gas treatment	Solidified, solid, powder or sludge	NH
10 07 08	wastes from cooling-water treatment other than those mentioned in 10 07 07	Solidified, solid, powder or sludge	NH
10 07 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 08	wastes from other non-ferrous thermal metallurgy		
10 08 04	particulates and dust	Solidified, solid, powder or sludge	NH
10 08 09	other slags	Solidified, solid, powder or sludge	NH
10 08 11	dross and skimmings other than those mentioned in 10 08 10	Solidified, solid, powder or sludge	NH
10 08 13	carbon-containing wastes from anode manufacture other than those mentioned in 10 08 12	Solidified, solid, powder or sludge	NH

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10 08 14	anode scrap	Solidified, solid, powder or sludge	NH
10 08 16	flue-gas dust other than those mentioned in 10 08 15	Solidified, solid, powder or sludge	NH
10 08 18	sludges and filter cakes from flue-gas treatment other than those mentioned in 10 08 17	Solidified, solid, powder or sludge	NH
10 08 20	wastes from cooling-water treatment other than those mentioned in 10 08 19	Solidified, solid, powder or sludge	NH
10 08 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 09	wastes from casting of ferrous pieces		
10 09 03	furnace slag	Solidified, solid, powder or sludge	NH
10 09 06	casting cores and moulds which have not undergone pouring other than those mentioned in 10 09 05	Solidified, solid, powder or sludge	NH
10 09 08	casting cores and moulds which have undergone pouring other than those mentioned in 10 09 07	Solidified, solid, powder or sludge	NH
10 09 10	flue-gas dust other than those mentioned in 10 09 09	Solidified, solid, powder or sludge	NH
10 09 12	other particulates other than those mentioned in 10 09 11	Solidified, solid, powder or sludge	NH
10 09 14	waste binders other than those mentioned in 10 09 13	Solidified, solid, powder or sludge	NH
10 09 16	waste crack-indicating agent other than those mentioned in 10 09 15	Solidified, solid, powder or sludge	NH
10 09 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 10	wastes from casting of non-ferrous pieces		
10 10 03	furnace slag	Solidified, solid, powder or sludge	NH
10 10 06	casting cores and moulds which have not undergone pouring, other than those mentioned in 10 10 05	Solidified, solid, powder or sludge	NH
10 10 08	casting cores and moulds which have undergone pouring, other than those mentioned in 10 10 07	Solidified, solid, powder or sludge	NH
10 10 10	flue-gas dust other than those mentioned in 10 10 09	Solidified, solid, powder or sludge	NH
10 10 12	other particulates other than those mentioned in 10 10 11	Solidified, solid, powder or sludge	NH
10 10 14	waste binders other than those mentioned in 10 10 13	Solidified, solid, powder or sludge	NH
10 10 16	waste crack-indicating agent other than those mentioned in 10 10 15	Solidified, solid, powder or sludge	NH
10 10 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 11	wastes from manufacture of glass and glass products		
10 11 03	waste glass-based fibrous materials	Solidified, solid, powder or sludge	I
10 11 05	particulates and dust	Solidified, solid, powder or sludge	NH

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10 11 10	waste preparation mixture before thermal processing, other than those mentioned in 10 11 09	Solidified, solid, powder or sludge	NH
10 11 12	waste glass other than those mentioned in 10 11 11	Solidified, solid, powder or sludge	I
10 11 14	glass-polishing and -grinding sludge other than those mentioned in 10 11 13	Solidified, solid, powder or sludge	I
10 11 16	solid wastes from flue-gas treatment other than those mentioned in 10 11 15	Solidified, solid, powder or sludge	NH
10 11 18	sludges and filter cakes from flue-gas treatment other than those mentioned in 10 11 17	Solidified, solid, powder or sludge	NH
10 11 20	solid wastes from on-site effluent treatment other than those mentioned in 10 11 19	Solidified, solid, powder or sludge	NH
10 11 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
10 12	wastes from manufacture of ceramic goods, bricks, tiles and construction products		
10 12 01	waste preparation mixture before thermal processing	Solidified, solid, powder or sludge	NH
10 12 03	particulates and dust	Solidified, solid, powder or sludge	NH
10 12 05	sludges and filter cakes from gas treatment	Solidified, solid, powder or sludge	NH
10 12 06	discarded moulds	Solidified, solid, powder or sludge	NH
10 12 08	waste ceramics, bricks, tiles and construction products (after thermal processing)	Solidified, solid, powder or sludge	NH
10 12 10	solid wastes from gas treatment other than those mentioned in 10 12 09	Solidified, solid, powder or sludge	NH
10 12 12	wastes from glazing other than those mentioned in 10 12 11	Solidified, solid, powder or sludge	NH
10 12 13	sludge from on-site effluent treatment	Solidified, solid, powder or sludge	NH
10 12 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
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	Solidified, solid, powder or sludge	NH
10 13 04	wastes from calcination and hydration of lime	Solidified, solid, powder or sludge	NH
10 13 06	particulates and dust (except 10 13 12 and 10 13 13)	Solidified, solid, powder or sludge	NH
10 13 07	sludges and filter cakes from gas treatment	Solidified, solid, powder or sludge	NH
10 13 10	wastes from asbestos-cement manufacture other than those mentioned in 10 13 09	Solidified, solid, powder or sludge	NH
10 13 11	wastes from cement-based composite materials other than those mentioned in 10 13 09 and 10 13 10	Solidified, solid, powder or sludge	NH
10 13 13	solid wastes from gas treatment other than those mentioned in 10 13 12	Solidified, solid, powder or sludge	NH
10 13 14	waste concrete and concrete sludge	Solidified, solid, powder or sludge	NH

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10 13 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
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, phosphating, alkaline degreasing, anodising)		
11 01 10	sludges and filter cakes other than those mentioned in 11 01 09	Solidified, solid, powder or sludge	NH
11 01 12	aqueous rinsing liquids other than those mentioned in 11 01 11	Solidified, solid, powder or sludge	NH
11 01 14	degreasing wastes other than those mentioned in 11 01 13	Solidified, solid, powder or sludge	NH
11 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
11 02	wastes from non-ferrous hydrometallurgical processes		
11 02 03	wastes from the production of anodes for aqueous electrolytical processes	Solidified, solid, powder or sludge	NH
11 02 06	wastes from copper hydrometallurgical processes other than those mentioned in 11 02 05	Solidified, solid, powder or sludge	NH
11 02 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
11 03	sludges and solids from tempering processes	Solidified, solid, powder or sludge	
11 05	wastes from hot galvanising processes		
11 05 01	hard zinc	Solidified, solid, powder or sludge	NH
11 05 02	zinc ash	Solidified, solid, powder or sludge	NH
11 05 99	wastes not otherwise specified	Solidified, solid, powder or sludge	
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 01	ferrous metal filings and turnings	Solidified, solid, powder or sludge	NH
12 01 02	ferrous metal dust and particles	Solidified, solid, powder or sludge	NH
12 01 03	non-ferrous metal filings and turnings	Solidified, solid, powder or sludge	NH
12 01 04	non-ferrous metal dust and particles	Solidified, solid, powder or sludge	NH
12 01 05	plastics shavings and turnings	Solidified, solid, powder or sludge	NH
12 01 13	welding wastes	Solidified, solid, powder or sludge	NH

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12 01 15	machining sludges other than those mentioned in 12 01 14	Solidified, solid, powder or sludge	NH
12 01 17	waste blasting material other than those mentioned in 12 01 16	Solidified, solid, powder or sludge	NH
12 01 21	spent grinding bodies and grinding materials other than those mentioned in 12 01 20	Solidified, solid, powder or sludge	NH
12 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
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 01	paper and cardboard packaging	Solidified, solid, powder or sludge	NH
15 01 02	plastic packaging	Solidified, solid, powder or sludge	NH
15 01 03	wooden packaging	Solidified, solid, powder or sludge	NH
15 01 04	metallic packaging	Solidified, solid, powder or sludge	NH
15 01 05	composite packaging	Solidified, solid, powder or sludge	NH
15 01 06	mixed packaging	Solidified, solid, powder or sludge	NH
15 01 07	glass packaging	Solidified, solid, powder or sludge	I
15 01 09	textile packaging	Solidified, solid, powder or sludge	NH
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	Solidified, solid, powder or sludge	NH
16	WASTES NOT OTHERWISE SPECIFIED IN THE LIST		
16 01	end-of-life vehicles from different means of transport (including offroad machinery) and wastes from dismantling of end-of-life vehicles and vehicle maintenance (except 13, 14, 16 06 and 16 08)		
16 01 03	end-of-life tyres	Solidified, solid, powder or sludge	NH
16 01 06	end-of-life vehicles, containing neither liquids nor other hazardous components	Solidified, solid, powder or sludge	NH
16 01 12	brake pads other than those mentioned in 16 01 11	Solidified, solid, powder or sludge	NH
16 01 15	antifreeze fluids other than those mentioned in 16 01 14	Solidified, solid, powder or sludge	NH
16 01 16	tanks for liquefied gas	Solidified, solid, powder or sludge	NH
16 01 17	ferrous metal	Solidified, solid, powder or sludge	NH

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16 01 18	non-ferrous metal	Solidified, solid, powder or sludge	NH
16 01 19	plastic	Solidified, solid, powder or sludge	NH
16 01 20	glass	Solidified, solid, powder or sludge	NH
16 01 22	components not otherwise specified	Solidified, solid, powder or sludge	NH
16 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
16 02	wastes from electrical and electronic equipment		
16 02 14	discarded equipment other than those mentioned in 16 02 09 to 16 02 13	Solidified, solid, powder or sludge	NH
16 02 16	components removed from discarded equipment other than those mentioned in 16 02 15	Solidified, solid, powder or sludge	NH
16 03	off-specification batches and unused products		
16 03 04	inorganic wastes other than those mentioned in 16 03 03	Solidified, solid, powder or sludge	NH
16 03 06	organic wastes other than those mentioned in 16 03 05	Solidified, solid, powder or sludge	NH
16 05	gases in pressure containers and discarded chemicals		
16 05 05	gases in pressure containers other than those mentioned in 16 05 04	Solidified, solid, powder or sludge	NH
16 05 09	discarded chemicals other than those mentioned in 16 05 06, 16 05 07 or 16 05 08	Solidified, solid, powder or sludge	NH
16 06	batteries and accumulators		
16 06 04	alkaline batteries (except 16 06 03)	Solidified, solid, powder or sludge	NH
16 06 05	other batteries and accumulators	Solidified, solid, powder or sludge	NH
16 08	spent catalysts		
16 08 01	spent catalysts containing gold, silver, rhenium, rhodium, palladium, iridium or platinum (except 16 08 07)	Solidified, solid, powder or sludge	NH
16 08 03	spent catalysts containing transition metals or transition metal compounds not otherwise specified	Solidified, solid, powder or sludge	NH
16 08 04	spent fluid catalytic cracking catalysts (except 16 08 07)	Solidified, solid, powder or sludge	NH
16 10	aqueous liquid wastes destined for off-site treatment		
16 10 02	aqueous liquid wastes other than those mentioned in 16 10 01	Solidified, solid, powder or sludge	NH
16 10 04	aqueous concentrates other than those mentioned in 16 10 03	Solidified, solid, powder or sludge	NH
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	Solidified, solid, powder or sludge	NH
16 11 04	other linings and refractories from metallurgical processes other than those mentioned in 16 11 03	Solidified, solid, powder or sludge	NH

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19 01 19	sands from fluidised beds	Solidified, solid, powder or sludge	NH
19 01 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
19 02	wastes from physico/chemical treatments of waste (including dechromatation, decyanidation, neutralisation)		
19 02 03	premixed wastes composed only of non-hazardous wastes	Solidified, solid, powder or sludge	NH
19 02 06	sludges from physico/chemical treatment other than those mentioned in 19 02 05	Solidified, solid, powder or sludge	NH
19 02 10	combustible wastes other than those mentioned in 19 02 08 and 19 02 09	Solidified, solid, powder or sludge	NH
19 02 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
19 03	stabilised/solidified wastes (4)		
19 03 05	stabilised wastes other than those mentioned in 19 03 04	Solidified, solid, powder or sludge	NH
19 03 07	solidified wastes other than those mentioned in 19 03 06	Solidified, solid, powder or sludge	NH
19 04	vitrified waste and wastes from vitrification		
19 04 01	vitrified waste	Solidified, solid, powder or sludge	NH
19 04 04	aqueous liquid wastes from vitrified waste tempering	Solidified, solid, powder or sludge	NH
19 05	wastes from aerobic treatment of solid wastes		
19 05 01	non-composted fraction of municipal and similar wastes	Solidified, solid, powder or sludge	NH
19 05 02	non-composted fraction of animal and vegetable waste	Solidified, solid, powder or sludge	NH
19 05 03	off-specification compost	Solidified, solid, powder or sludge	NH
19 05 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
19 06	wastes from anaerobic treatment of waste		
19 06 03	liquor from anaerobic treatment of municipal waste	Solidified, solid, powder or sludge	NH
19 06 04	digestate from anaerobic treatment of municipal waste	Solidified, solid, powder or sludge	NH
19 06 05	liquor from anaerobic treatment of animal and vegetable waste	Solidified, solid, powder or sludge	NH
19 06 06	digestate from anaerobic treatment of animal and vegetable waste	Solidified, solid, powder or sludge	NH
19 06 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
19 08	wastes from waste water treatment plants not otherwise specified		
19 08 01	screenings	Solidified, solid, powder or sludge	NH
19 08 02	waste from desanding	Solidified, solid, powder or sludge	NH
19 08 05	sludges from treatment of urban waste water	Solidified, solid, powder or sludge	NH

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17 06 05	construction materials containing asbestos	Solidified, solid, powder or sludge	NH
17 08	gypsum-based construction material		
17 08 02	gypsum-based construction materials other than those mentioned in 17 08 01	Solidified, solid, powder or sludge	NH
17 09	other construction and demolition wastes		
17 09 04	mixed construction and demolition wastes other than those mentioned in 17 09 01, 17 09 02 and 17 09 03	Solidified, solid, powder or sludge	NH
18	WASTES FROM HUMAN OR ANIMAL HEALTH CARE AND/OR RELATED RESEARCH (except kitchen and restaurant wastes not arising from immediate health care)		
18 01	wastes from natal care, diagnosis, treatment or prevention of disease in humans		
18 01 01	sharps (except 18 01 03)	Solidified, solid, powder or sludge	NH
18 01 02	body parts and organs including blood bags and blood preserves (except 18 01 03)	Solidified, solid, powder or sludge	NH
18 01 04	wastes whose collection and disposal is not subject to special requirements in order to prevent infection (for example dressings, plaster casts, linen, disposable clothing, diapers)	Solidified, solid, powder or sludge	NH
18 01 07	chemicals other than those mentioned in 18 01 06	Solidified, solid, powder or sludge	NH
18 01 09	medicines other than those mentioned in 18 01 08	Solidified, solid, powder or sludge	NH
18 02	wastes from research, diagnosis, treatment or prevention of disease involving animals		
18 02 01	sharps (except 18 02 02)	Solidified, solid, powder or sludge	NH
18 02 03	wastes whose collection and disposal is not subject to special requirements in order to prevent infection	Solidified, solid, powder or sludge	NH
18 02 06	chemicals other than those mentioned in 18 02 05	Solidified, solid, powder or sludge	NH
18 02 08	medicines other than those mentioned in 18 02 07	Solidified, solid, powder or sludge	NH
19	WASTES FROM WASTE MANAGEMENT FACILITIES, OFF-SITE WASTE WATER TREATMENT PLANTS AND THE PREPARATION OF WATER INTENDED FOR HUMAN CONSUMPTION AND WATER FOR INDUSTRIAL USE		
19 01	wastes from incineration or pyrolysis of waste		
19 01 02	ferrous materials removed from bottom ash	Solidified, solid, powder or sludge	NH
19 01 12	bottom ash and slag other than those mentioned in 19 01 11	Solidified, solid, powder or sludge	NH
19 01 14	fly ash other than those mentioned in 19 01 13	Solidified, solid, powder or sludge	NH
19 01 16	boiler dust other than those mentioned in 19 01 15	Solidified, solid, powder or sludge	NH
19 01 18	pyrolysis wastes other than those mentioned in 19 01 17	Solidified, solid, powder or sludge	NH

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16 11 06	linings and refractories from non-metallurgical processes others than those mentioned in 16 11 05	Solidified, solid, powder or sludge	NH
17	CONSTRUCTION AND DEMOLITION WASTES (INCLUDING EXCAVATED SOIL FROM CONTAMINATED SITES)		
17 01	concrete, bricks, tiles and ceramics		
17 01 01	concrete	Solidified, solid, powder or sludge	I
17 01 02	bricks	Solidified, solid, powder or sludge	I
17 01 03	tiles and ceramics	Solidified, solid, powder or sludge	I
17 01 07	mixtures of concrete, bricks, tiles and ceramics other than those mentioned in 17 01 06	Solidified, solid, powder or sludge	NH
17 02	wood, glass and plastic		
17 02 01	wood	Solidified, solid, powder or sludge	NH
17 02 02	glass	Solidified, solid, powder or sludge	I
17 02 03	plastic	Solidified, solid, powder or sludge	NH
17 03	bituminous mixtures, coal tar and tarred products		
17 03 02	bituminous mixtures other than those mentioned in 17 03 01	Solidified, solid, powder or sludge	NH
17 04	metals (including their alloys)		
17 04 01	copper, bronze, brass	Solidified, solid, powder or sludge	NH
17 04 03	lead	Solidified, solid, powder or sludge	NH
17 04 04	zinc	Solidified, solid, powder or sludge	NH
17 04 05	iron and steel	Solidified, solid, powder or sludge	NH
17 04 06	tin	Solidified, solid, powder or sludge	NH
17 04 07	mixed metals	Solidified, solid, powder or sludge	NH
17 04 11	cables other than those mentioned in 17 04 10	Solidified, solid, powder or sludge	NH
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	Solidified, solid, powder or sludge	I
17 05 06	dredging spoil other than those mentioned in 17 05 05	Solidified, solid, powder or sludge	NH
17 05 08	track ballast other than those mentioned in 17 05 07	Solidified, solid, powder or sludge	NH
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	Solidified, solid, powder or sludge	NH

Proposed waste types for disposal at Nanty Caws post July 2004

19 08 12	sludges from biological treatment of industrial waste water other than those mentioned in 19 08 11	Solidified, solid, powder or sludge	NH
19 08 14	sludges from other treatment of industrial waste water other than those mentioned in 19 08 13	Solidified, solid, powder or sludge	NH
19 08 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
19 09	wastes from the preparation of water intended for human consumption or water for industrial use		
19 09 01	solid waste from primary filtration and screenings	Solidified, solid, powder or sludge	NH
19 09 02	sludges from water clarification	Solidified, solid, powder or sludge	NH
19 09 03	sludges from decarbonation	Solidified, solid, powder or sludge	NH
19 09 04	spent activated carbon	Solidified, solid, powder or sludge	NH
19 09 05	saturated or spent ion exchange resins	Solidified, solid, powder or sludge	NH
19 09 06	solutions and sludges from regeneration of ion exchangers	Solidified, solid, powder or sludge	NH
19 09 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
19 10	wastes from shredding of metal-containing wastes		
19 10 01	iron and steel waste	Solidified, solid, powder or sludge	NH
19 10 02	non-ferrous waste	Solidified, solid, powder or sludge	NH
19 10 04	fluff-light fraction and dust other than those mentioned in 19 10 03	Solidified, solid, powder or sludge	NH
19 10 06	other fractions other than those mentioned in 19 10 05	Solidified, solid, powder or sludge	NH
19 11	wastes from oil regeneration		
19 11 06	sludges from on-site effluent treatment other than those mentioned in 19 11 05	Solidified, solid, powder or sludge	NH
19 11 99	wastes not otherwise specified	Solidified, solid, powder or sludge	NH
19 12	wastes from the mechanical treatment of waste (for example sorting, crushing, compacting, pelletising) not otherwise specified		
19 12 01	paper and cardboard	Solidified, solid, powder or sludge	NH
19 12 02	ferrous metal	Solidified, solid, powder or sludge	NH
19 12 03	non-ferrous metal	Solidified, solid, powder or sludge	NH
19 12 04	plastic and rubber	Solidified, solid, powder or sludge	NH
19 12 05	glass	Solidified, solid, powder or sludge	NH
19 12 07	wood other than that mentioned in 19 12 06	Solidified, solid, powder or sludge	NH

Proposed waste types for disposal at Nanty Caws post July 2004

19 12 08	textiles	Solidified, solid, powder or sludge	NH
19 12 09	minerals (for example sand, stones)	Solidified, solid, powder or sludge	NH
19 12 10	combustible waste (refuse derived fuel)	Solidified, solid, powder or sludge	NH
19 12 12	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	Solidified, solid, powder or sludge	NH
19 13	wastes from soil and groundwater remediation		
19 13 02	solid wastes from soil remediation other than those mentioned in 19 13 01	Solidified, solid, powder or sludge	NH
19 13 06	sludges from groundwater remediation other than those mentioned in 19 13 05	Solidified, solid, powder or sludge	NH
20	MUNICIPAL WASTES (HOUSEHOLD WASTE AND SIMILAR COMMERCIAL, INDUSTRIAL AND INSTITUTIONAL WASTES) INCLUDING SEPARATELY COLLECTED FRACTIONS		
20 01 01	paper and cardboard	Solidified, solid, powder or sludge	NH
20 01 02	glass	Solidified, solid, powder or sludge	I
20 01 08	biodegradable kitchen and canteen waste	Solidified, solid, powder or sludge	NH
20 01 10	clothes	Solidified, solid, powder or sludge	NH
20 01 11	textiles	Solidified, solid, powder or sludge	NH
20 01 25	edible oil and fat	Solidified, solid, powder or sludge	NH
20 01 28	paint, inks, adhesives and resins other than those mentioned in 20 01 27	Solidified, solid, powder or sludge	NH
20 01 30	detergents other than those mentioned in 20 01 29	Solidified, solid, powder or sludge	NH
20 01 32	medicines other than those mentioned in 20 01 31	Solidified, solid, powder or sludge	NH
20 01 34	batteries and accumulators other than those mentioned in 20 01 33	Solidified, solid, powder or sludge	NH
20 01 36	discarded electrical and electronic equipment other than those mentioned in 20 01 21, 20 01 23 and 20 01 35	Solidified, solid, powder or sludge	NH
20 01 38	wood other than that mentioned in 20 01 37	Solidified, solid, powder or sludge	NH
20 01 39	plastics	Solidified, solid, powder or sludge	NH
20 01 40	metals	Solidified, solid, powder or sludge	NH
20 01 41	wastes from chimney sweeping	Solidified, solid, powder or sludge	NH
20 01 99	other fractions not otherwise specified	Solidified, solid, powder or sludge	NH
20 02	garden and park wastes (including cemetery waste)		

Proposed waste types for disposal at Nanty Caws post July 2004

20 02 01	biodegradable waste	Solidified, solid, powder or sludge	NH
20 02 02	soil and stones	Solidified, solid, powder or sludge	NH
20 02 03	other non-biodegradable wastes	Solidified, solid, powder or sludge	NH
20 03	other municipal wastes		
20 03 01	mixed municipal waste	Solidified, solid, powder or sludge	NH
20 03 02	waste from markets	Solidified, solid, powder or sludge	NH
20 03 03	street-cleaning residues	Solidified, solid, powder or sludge	NH
20 03 04	septic tank sludge	Solidified, solid, powder or sludge	NH
20 03 06	waste from sewage cleaning	Solidified, solid, powder or sludge	NH
20 03 07	bulky waste	Solidified, solid, powder or sludge	NH
20 03 99	municipal wastes not otherwise specified	Solidified, solid, powder or sludge	NH

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Q B2.1.6 Waste list for Restoration
(Classification as per European Waste Catalogue)

PROPOSED WASTE TYPES FOR RESTORATION

Chapter Heading and EWC Code	EWC Description	Physical Description (e.g. solid, sludge, nuisance risk)	Waste Classification H - hazardous, NH - non hazardous, SNH - stable, non-reactive hazardous
wastes from manufacture of ceramic goods, bricks, tiles and construction products			
10 12 08	waste ceramics, bricks, tiles and construction products (after thermal processing)	Solid or sludge	NH
concrete, bricks, tiles and ceramics			
17 01 01	concrete	Solid or sludge	NH
17 01 02	bricks	Solid or sludge	NH
17 01 03	tiles and ceramics	Solid or sludge	NH
17 01 07	mixtures of concrete, bricks, tiles and ceramics other than those mentioned in 17 01 06	Solid or sludge	NH
Garden and parks waste (including cemetery waste)			
20 02 02	soil and stones	Solid or sludge	NH
other construction and demolition wastes			
17 09 04	mixed construction and demolition wastes other than those mentioned in 17 09 01, 17 09 02 and 17 09 03	Solid or sludge	NH
17 05 04	soil and stones other than those mentioned in 17 05 03	Solid or sludge	NH
Wastes from aerobic treatment of solid waste			
19 05 03	off-specification compost	Solid or sludge	NH
wastes from mineral excavation			
01 01 01	wastes from mineral metalliferous excavation	Solid or sludge	NH
01 01 02	wastes from mineral non-metalliferous excavation	Solid or sludge	NH
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	Solid or sludge	NH
01 04 09	waste sand and clays	Solid or sludge	NH
wastes from the mechanical treatment of waste (for example sorting, crushing, compacting, pelletising) not otherwise specified			
19 12 09	minerals (for example sand, stones)	Solid or sludge	NH
19 12 12	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	Solid or sludge	NH
wastes from waste water treatment plants not otherwise specified			
19 08 05	sludges from treatment of urban waste water	Solid or sludge	NH



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Q 2.2.27 Off Site Leachate Treatment

In general, details of the treatment provided at the sewage treatment works have been described as follows; "Primary Treatment-includes screening to remove gross solids & settlement to remove suspended solids. Secondary Treatment - activated sludge to remove organic contents. Sludge Treatment - Thickening, Dewatering and Digestion."



INSTALLATION INFRASTRUCTURE

Introduction

This document describes the infrastructure that is provided at the installation.

Security Measures and Standards

In order to minimise the risk of problems arising as a result of inadequate security, the following measures are implemented at the installation.

Fencing

The installation has the benefit of a mixture of security fencing, comprising of stock-proof and palisade fencing, natural hedgerows and ditches, which will extend around the perimeter of the installation.

Security Gates

Security gates, which span the full width of the access road, are provided at the entrance to the installation. The gates are locked outside operational hours to deter unauthorised vehicular and pedestrian access.

Warning Notices

Notices warning against unauthorised access (and alerting potential trespassers to on site hazards) will be erected at the installation entrance and adjacent to the footpath, and will be repeated as necessary at locations around the perimeter.

Authorised Access System

All visitors are required to register their presence by signing in the visitors' book on entry to the installation, and again on exit. This will minimise the risk of unauthorised visitors being present on site.

Inspection

The Site Manager or his/her nominated Deputy will inspect gates and fencing weekly to identify deterioration, damage and the need for any repairs.

Maintenance and Repair

The fencing and gates are maintained and repaired when required to ensure their continued integrity. In the event that damage is sustained, a temporary repair is made within 24 hours until permanent repairs can be affected.

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Action Plan

In the event of a breach of security at the installation, the following course of action will be followed.

Unauthorised Access

The route of access is determined, and consideration given to the following measures as appropriate: -

Repair of gates or fencing;
Replacement of gates or fencing with more secure design;
Erection of warning signs

Unauthorised Tipping

The following actions will be taken in the event of unauthorised tipping: -

The material will be examined for evidence of ownership;
The Environment Agency will be informed;
With the agreement of the Environment Agency, the material will be removed and disposed of correctly;

If appropriate, additional warning signs will be erected; and additional security measures will be considered.

Records

A record relating to the management and monitoring of security will be maintained. It will include the following details: -

Records of the inspections and maintenance of security fencing and gates;
A record of all breaches of security and incidents of fly tipping, and investigations of these breaches of security; and
Details of the action taken to replace or repair security equipment, and investigate fly tipping, including any subsequent changes to operational procedures.

Sub-Surface Structures

Installation and operation of sub-surface structures such as drains, pipe work, sumps and storage vessels will be subject to the following criteria: -

The source, direction and destination of all drains, ditches and subsurface pipe work will be recorded;
All sumps and storage vessels will be identified;

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Systems are designed where appropriate to provide secondary containment or leak detection, and minimise leakage;

Sub surface structures, where appropriate, will be subject to an inspection and maintenance programme, which will include pressure tests, leak tests, material thickness checks or CCTV. These checks will be undertaken at maximum regular intervals.

Installation Surfacing

All areas of the installation (excluding the landfill containment areas) where there is potential for activities to pollute the ground or controlled waters are hard surfaced.

To ensure appropriate standards are achieved, all hard surfaced areas will be designed to take account of the following requirements: -

Capacities;
Thickness;
Falls;
Material of construction;
Hydraulic conductivity;
Strength/reinforcement; and
Resistance to chemical attack.

Construction of the surfacing will be subject to Construction Quality Assurance procedures, and thereafter regular inspection and maintenance.

The extent of the hard surfaced areas at the installation is shown on Drawing ESID4. Hard surfaced areas incorporate the following: -

Main installation access road;
Waste reception/installation control area

Bunds

Bunds or other means of containment will be provided for all tanks containing liquid whose spillage could be harmful to the environment.

The bunds will possess the following features: -

Impermeability and resistance to the stored materials;
No outlet and drain to a blind collection point, which does not penetrate or compromise the structure of the bund;
Fill points within the bund;
Pipework routed within the bund, with no penetration of contained surfaces; and
Designed to catch leaks from tanks or fittings.

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Bunds will be subject to regular visual inspections at weekly intervals and the results will be entered on the inspection form. Where the structural integrity of bunds is in doubt, water testing will be undertaken.

The contents of the bunds will be pumped out or otherwise removed under supervision and control after checking for contamination.

Any tanks, which are not subject to frequent inspection, will be fitted with a high level alarm as appropriate.

Infrastructure

The following infrastructure is provided at the installation.

Notices and Signs

A large, clearly marked notice board of durable, weather resistant design is maintained at the entrance to the installation. The notice board will show the following: -

The name of the installation;

The name, address and telephone number of the permit holder;

The PPC permit reference number;

The hours of operation;

An emergency out-of-hours telephone number for the permit holder;

An emergency telephone number for the Environment Agency.

The notice board is maintained in a legible condition throughout the duration of operations.

Access Road

A site access road is provided at the installation from the site entrance to the site control office.

Installation Roads

Thereafter, installation traffic will gain access to the installation using internal compacted hardcore roads, which will be constructed as and when required to enable all vehicles to gain access to operational areas.

Internal hardcore roads consist of hardcore and general construction material, which are compacted utilising suitable plant.

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Access and Site Security Plan

Following 'definite closure', an audit will be carried out of security provisions to ensure that the installation is left in a secure condition, unauthorised access is avoided, and illegal dumping is discouraged.

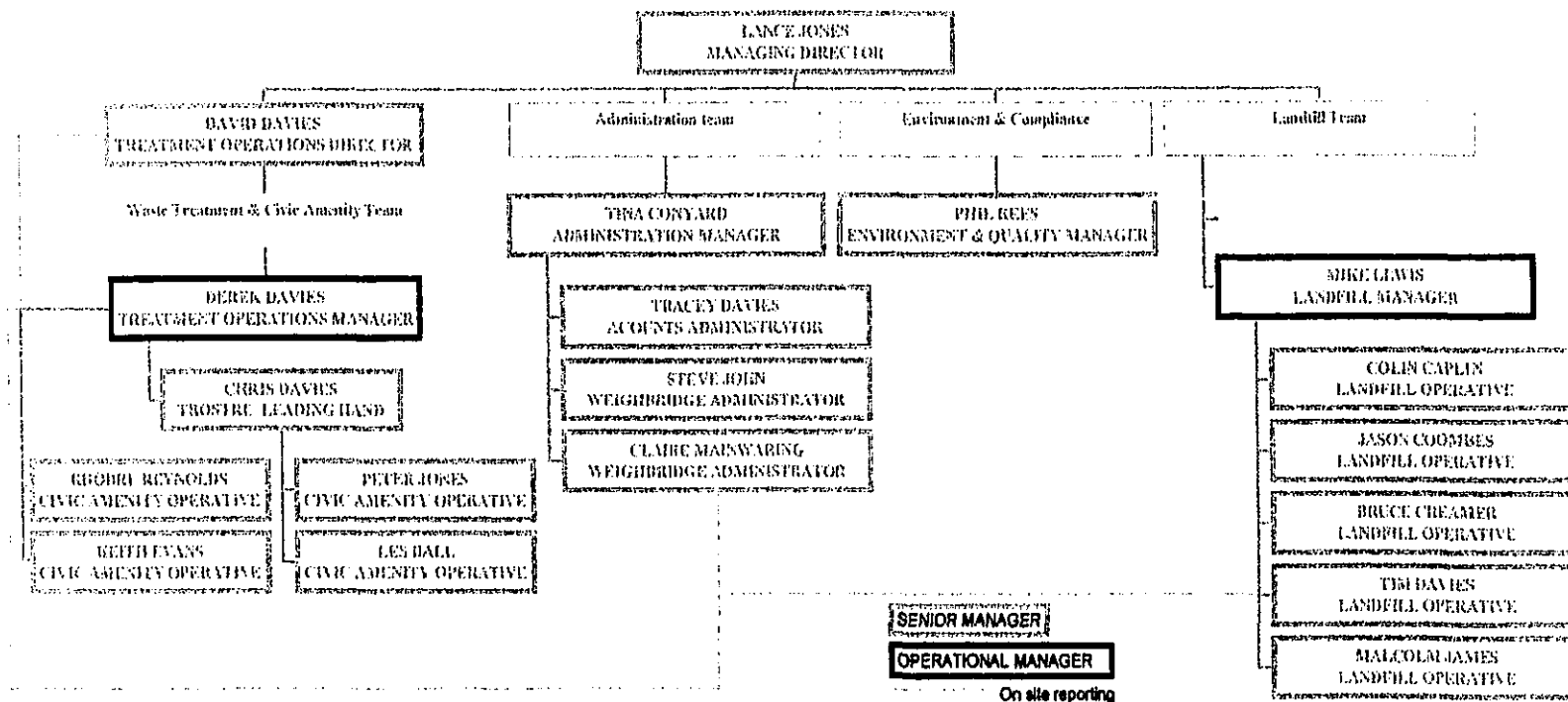
Installation security will be maintained through the use of perimeter fencing and lockable gates to prevent unauthorised access to the installation after closure. Fencing and gates around the Gas Management compound will also be maintained throughout the aftercare period.

To ensure maintenance of security at the installation, inspections of the fencing and gates will be carried out on at least a 2 weekly basis, and any damage will be repaired as soon as practicable. This may necessitate the completion of temporary repairs pending permanent repairs. Temporary repairs will be carried out within 24 hours of the damage being observed. Maintenance and repair will be carried out where damage or deterioration is observed either during the routine inspection programme or as reported by a third party such as a local resident and only where the observed damage affects the integrity of the security provision.

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Q B2.3.1 Organogram

WMP ENVIRONMENTAL LIMITED - ORGANISATIONAL CHART



November 2002

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Q 2.4.1 Raw Materials

RAW MATERIAL	FUNCTION	CHEMICAL NATURE / COMPOSITION	ADDITION RATE	FATE	POTENTIAL ENV. IMPACT	ALTERNATIVES	SIGNIFICANT ACCIDENT RISK
Fuels (Diesel) P401 P707 P 908	Generating power	Fuel Oil 100%	132,124.35l per year on average	100% to air	Consult relevant emissions data for various plant	Petrol, gas, none available currently	Flammable, toxic
Lubricating Oils & Greases P402 P921	Lubrication of metal parts	Highly refined mineral Oil	As required, minimal	100% to air	Marine Pollutant	Synthetic Oils, greases, Lithium grease	Irritant
Hydraulic Oils P403 P708 P709 P901	Operation of hydraulic arms etc	Petroleum hydrocarbons and Additives	Various	100% to air	Marine Pollutant	Not Known	Suspected Carcinogen
Degreaser P405 P917	Cleaning & Degreasing of plant	Solvent from a light mineral spirit fraction with ASA3, chemical marker & Dye	Various, as required	100% to sewer	Minimal	None Known	Flammable H3B
Lead acid batteries (Sulphuric acid / H2)	Power storage	Sulphuric Acid & Hydrogen gas	Various dependant on plant on site	Disposal by specialist disposer	Minimal	None Known	Explosion hazard / Corrosive
Antifoaming agents P414 P719	Removal of foam from leachate	Blend of fatty acid esters and emulsifiers with water	Small, as required	100% to sewer	Minimal	None known	Low
Acids P501	Chemical tests on waste streams	Hydrochloric acid Nitric Acid Ethanoic Acid Solution	Small amounts	100% to sewer	Minimal	None known	Corrosive
Alkalis P502	Chemical tests on waste streams	Sodium Hydroxide, Ammonia	Small amounts	100% to sewer	Minimal	None known	Corrosive

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Buffer solutions P504	Calibration of testing equipment	Not available (commercial secret)	Small amounts	100% to sewer	Minimal	None Known	Minimal
Cuvette test solutions P508	Testing of water, leachate, waste	Sulphuric acid	5-10ml per use.	Reaction & return to manufacturer	Minimal	None known	Minimal
Ethanol P510	Cleaning of apparatus	Ethanol	As required	100% to sewer	Minimal	Other cleaning solutions	Minimal
Aerosol Fly sprays P103 P201 P509	Killing Flies	Pesticide	Summer months during times of fly infestation	100% to air	Minimal	Electrical fly killing apparatus	Minimal
Ammonium Test Kit P515	Waste / Water testing	Sodium Hydroxide	5ml per test	100% to land	Minimal	Other test kits	Minimal
Rubble and hardcore P706	Road construction	Aggregate	As required up to 500tpw	100% to land	Minimal	Stone / tarmac	Minimal
Stone	Road Construction	Stone	As required up to 500tpw	100% to land	Minimal	Hardcore / tarmac	Minimal
Rat Poison P729	Pest Control	3-(3-biphenyl-4-yl-1,2,3,4-tetrahydro-1-naphthyl)-4-hydroxycoumarin 0.005%	Used by contractors in small amounts	100% to land	Minimal	Non known	Minimal
Bentonite P717	Sealing of holes	Crystalline silica, refractory oxides in matrix	As required in 25kg bags	100% to land	Minimal	Non known	Minimal
Clay	Cell liner	Unknown	Non calcareous clay	100% to land	Minimal	Various	Minimal

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	construction						
Geotextiles	Protection of geomembranes	Unknown	Unknown	100% to land	Minimal	Various	Minimal
HDPE MDPE Pipeworks	Leachate & landfill gas drainage	Polyethylene	Unknown	100% to land	Minimal	Various	Minimal
HDPE MDPE Liner	Cell construction / capping	Polyethylene	Unknown	100% to land	Minimal	Various	Minimal

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Q B2.7.1 Energy

Calculated for the period January to December 2003.

Energy source	Energy Consumption per Annum						
	Supply units	Units used	Conversion Factor	Delivered, MWh	Conversion Factor	Primary, MWh	% of total
			Note. 1		Note. 2		
Electricity from public supply	kWh	41,000	1	41	2.6	106.6	7.08%
Electricity from other source*	kWh						
Gas	N/A						
Oil	N/A						
Coal	N/A						
Other - Fuel	litres	132,124.35	10.58	1,397.87	-	1,397.87	92.92%
Total Energy Consumed						1504.475	100

*specify source and conversion factor from delivered to primary energy

Note:

1. Conversion factors provided by Horizontal Guidance Note IPPC H2: Energy Efficiency
2. Conversion factor provided by Energy Management Advisor (EMMA98) software

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ENVIRONMENTAL MANAGEMENT SYSTEMS

CONTENTS

- Environmental Monitoring – Landfill (MW1 302)
- Emergency Procedures – Landfill, Transfer station and Civic amenity
- Incident Reporting Procedure (EW1 300)
- Site Inspection (MW1 300)
- Litter Control (SW1 009)
- Odour Control (SW1 007)
- Pest Control (SW1 008)
- Mud Control (ENV 005)

- Leachate Level Contingency Plan

MANAGEMENT SYSTEMS

Environmental Monitoring - Landfill

1. Purpose and Scope

The purpose of this work instruction is to ensure that the required environmental monitoring is carried out, recorded and communicated correctly. Environmental monitoring of landfill sites provides an important indicator of engineering integrity and operational management.

2. Procedure

2.1 Daily:

- Rainfall - measure precipitation in millimetres using the site rain gauge. The gauge should be read every working day at 08.00 hrs and emptied after each reading.
- Electrical Conductivity (EC) shall be measured using a regularly calibrated hand held EC meter at the outlet from any under liner drainage system.

These results must be recorded on form MWIF 302 *Daily Monitoring Log* noting EC Meter calibration dates, other forms of precipitation etc.

2.2 Weekly:

- Borehole Monitoring - operational monitoring boreholes will be measured for the following ;
 - Gas Concentrations of :
 - Methane (CH₄)
 - Oxygen (O₂)
 - Carbon Dioxide (CO₂)
 - Hydrogen Sulphide(H₂S)
 - Atmospheric Pressure at time of gas reading
 - Water Level in metres below borehole collar

2.3 Monthly:

- Water Sampling (as per table C5 WMP No. 4)

2.4 Quarterly:

- Water Sampling (as per table C5 WMP No. 4)
- Data collation and recording of hard copy to Environment Agency
- Gas concentrations of passive vents

2.5 Annual:

- Water Sampling (as per table C5 WMP No. 4)
- Annual report on environmental monitoring to Environment Agency

MANAGEMENT SYSTEMS

3. GAS MONITORING:

- Gas concentrations will only be measured and datalogged using a correctly calibrated intrinsically safe Geotechnical Instruments Gas Analyser (GA 90 or similar) and employees trained in its use.
- The next required Calibration date is displayed on the analyser when switched on at the due date the instrument must be returned to the manufacturer for service / calibration
- Data recording & Logging is performed using the preset borehole numbering protocol, which corresponds to the borehole numbering at the site.
- A geotechnical instruments dip meter is used to record water level on the datalogger once the gas readings have been established.
- Borehole gas taps and bungs must be secure to keep boreholes gas tight once a recording has been taken.
- Boreholes must be securely capped and locked on completion of monitoring.
- The data logger must be downloaded monthly and the data imported into MS Excel for analysis and presentation for internal and external reporting.

4. WATER MONITORING:

- Sample bottles, labels and reagents will be delivered by courier prior to sampling.
- Water samples are taken from boreholes by use of the dedicated Watera pumping system, surface water using the sample bottle or a bailing device and leachate via a bailing device. PPE including water proof gloves must be worn when taking samples.
- When samples are collected from the appropriate locations (see working plan) they must be taken to the workshop bench where the dissolved oxygen must be fixed using the following technique :

Instructions for Preserving samples for Dissolved Oxygen Measurements

WARNING : The reagents used are very corrosive and also toxic. Always wear safety spectacles and gloves when handling chemicals.

Procedure

1. Completely fill a 250 ml Dissolved Oxygen bottle with sample.
2. Insert the plastic stopper, displacing some of the sample.
3. Remove the plastic stopper.
4. Add **2ml** (i.e. 2 x 1ml aliquot) of **Manganous Sulphate** using one of the teat pipettes provided (top graduation mark = 1 ml). When adding the reagent, make sure the tip of the pipette is below the surface of the sample.
5. Repeat step 4 but instead of 2 ml of **Alsterberg Reagent**. At this stage a precipitate (flocculant solid) will be formed.

MANAGEMENT SYSTEMS

6. Re-insert the stopper quickly so that **no air is trapped** in the bottle. If the air is trapped, discard the sample and repeat steps 1 - 6 using fresh sample.
7. Shake the sample by inverting approximately 10 times.
8. Allow the precipitate to settle to approximately 1/3 the height of the bottle.
9. Repeat step 7 so the precipitate is disturbed. Allow to settle.

The sample is now ready to be sent to the laboratory. Please send as soon as possible.

When the samples have been 'fixed' sample bottles must be secured and labelled using the sample point number and a prefix denoting the type of analysis:

- GW - Ground Water
- SW - Surface Water
- LC - Leachate

The bottles must then be packaged ready for same day collection which will be by prior arrangement. The samples should be stored in a cool environment until collection.

Analytical results are sent by E-Mail (MS Excel format) and hard copy within 10 days. These results must be analysed for trends / anomalies prior to storage.

EMERGENCY PROCEDURES – LANDFILL

I. Purpose and Scope

The purpose of this work instruction is to detail the procedures to be followed during abnormal operating conditions, incidents, accidents and potential emergency situations.

It must be emphasised that events of this nature are extremely unlikely to occur. Every effort is made to ensure that sites operate safely and with the minimum environmental impact at all times.

The response to emergency situations will be dependant on the situation itself and the individual site.

Procedure

Injury- All Sites

Ensure basic precautions include:

Keeping all plant/equipment in good working order according to maintenance schedules and within required specification (Refer to SWI 001/002 *Instructions to Site Users/ Operators*).

All site personnel are issued with full safety clothing as detailed in SWI 002 and in line with Company Health & Safety Policy.

Training of personnel conducted as necessary.

In the event of an incident resulting in injury, alert First Aid officers to the scene.

If the injury is serious to warrant an emergency ambulance service call out, the First Aid officer will give instructions for them to be contacted immediately.

All accidents and injuries are to be recorded in the site accident book and reported to the Health and Safety Executive (HSE), as appropriate, in accordance with statutory guidelines.

Hazardous Chemical Spillage - All Sites

Hazardous chemicals may be on site as either waste or as part of a process. COSHH assessment/data sheets will be available for such chemicals.

Ensure basic precautions include.

Full training given to relevant personnel.

Full safety equipment. Emergency first aid / eye wash and shower facilities are available.

All chemicals are correctly containerised / labelled and have undergone thorough correct Assessment procedures.

All storage areas have impermeable floors with containment features to prevent leakage.

Absorbent materials are available at location of usage.

Persons using chemicals for process are kept in contact with Weighbridge office personnel at all times.

In the event of a load arriving at the Site Reception which is known or is found to be leaking the lorry carrying the load will be directed to the emergency area which has a sealed drainage system.

Take appropriate action according to SWI 100 Dealing with Difficult and Hazardous loads.

Fire – All Sites

Ensure basic precautions include:

Yearly inspections by the Fire Prevention Officer, implementing any suggestions made to improve procedures.

Strategically placed fire extinguishers (for both buildings and plant) which are maintained and serviced regularly.

On the landfill sites open gas vents are kept above face level and capped.

Proper inspection, placing, compacting and cover of waste is given to prevent accidental or spontaneous ignition.

Enough water storage is kept on site to supply fire equipment.

Written procedures in case of fire are given to all employees and regular fire drills are conducted. This will be site specific.

In the event of a minor incident site personnel will extinguish any fire. A report must be made to the Competent Manager in accordance with EWI 300 Incident Reporting Procedure.

In the case of a more serious incident where initial containment/extinguishing attempts have failed. The Fire Brigade will be alerted.

The Fire Officer will ensure all relevant information has been noted and given to the emergency services on arrival.

Once extinguished full internal investigations will be made by the Competent Manager in accordance with EWI 300 and reports made to HSE and the Environment Agency

In the event of a fire alert outside working hours, an emergency number will be given on the site sign. If necessary an answer phone message will leave instructions to telephone relevant personnel who will assess the situation and take appropriate action.

Gas Leak/Build Up/Confined Space Incident – Nantycaws Landfill

Landfill gas may be both toxic and an asphyxiant and is also flammable and explosive in certain conditions (5 - 15% methane mixed in air).

It is imperative that gas is not allowed to migrate from the site where it could build up in concentration in enclosed spaces and create a potential hazard.

The following precautions are incorporated into landfill site design to minimise the risk from landfill gas related incidents:

Gas is given easy migration routes engineered through the fill.

Gas levels are recorded on a weekly basis at relevant locations and are analysed by the competent manager to ensure awareness of trends.

If during weekly monitoring, readings are above pre-determined trigger levels (agreed with the E.A.), procedural actions will be implemented as detailed below:

1. Stage 1 Trigger $\geq 1\%$ Gas (outside site Boundary)

Gas levels appear to be rising above previous norm, no foreseeable danger.

Action: Increase gas monitoring to daily to assess pattern of increase.

1. Stage 2 Trigger $\leq 5\%$ Gas

Gas levels increasing. No imminent danger of fire or explosion.

Action:

- Continue to monitor daily/install permanent alarm.

- Notify EA and agree remediation measures.
- Try to ascertain area of leakage from site.

1. Stage 3 Trigger $\geq 5\%$ Gas

Gas levels concentrated. Potential danger of explosion or fire.

Action:

- Evacuate area if occupied.
- Try to vent building if safe to do so.
- Alert emergency services if necessary.
- Alert EA.

Leachate Leakage – All Sites

The potential risk of ground water and surface water pollution from leachate is minimised by implementing the following precautions into site selection, engineering and good operational practice:

Landfill:

Outflow from the under liner drainage system is monitored daily to ensure its purity.

Perimeter bore holes are sampled regularly to ensure purity of water.

Leachate lagoons are surrounded by perimeter bunds to prevent overflow in case automatic pumps fail.

Drinking water abstractions licensed or unlicensed are not located within the vicinity of sites.

If the groundwater analysis shows increases in any parameter above trigger levels (agreed with EA), procedural actions will be implemented as detailed below:

1. Stage 1 Trigger 10% variation in determinant over baseline average

Evidence of potential change in groundwater chemistry, no indication of gross pollution.

Action:

- Increase frequency of monitoring on existing boreholes to gauge

1. Stage 2 Trigger Increase over 10%

Change in groundwater chemistry, potential for pollution

Action:

- Increase number of boreholes in affective area as agreed with EA
- Continue to monitor to assess relevant action and risk of pollution
- Remove leachate from cells in relevant phase

1. Stage 3 Trigger > 10% change in determinant

Major change in groundwater chemistry

Action:

- Evacuate cells in relevant phase
- Install cut off walls
- Monitor boreholes to assess success of barrier

1. Surface Water Incident: Landfill

A surface water incident can arise from leachate leakage into surface water system on site.

This will be brought to attention by daily electrical conductivity and visual checks or by regular monitoring of freshwater lagoons and outflow ditches.

Action:

- Find and secure leakage area
- Contain contaminated water on site
- Treat water as necessary, then discharge or dispose as appropriate.

Flood:

Flood prevention precautions include keeping lagoons capacity below 25% to enable flood storage.

Sites will close during storm conditions if deemed necessary by on-site Management and will remain in operational until authorised by the Compliance Manager after thorough inspection of the site.

MANAGEMENT SYSTEMS

INCIDENT REPORTING PROCEDURE

1. Purpose and Scope

The purpose of this work instruction is to provide a system in which non-compliance issues in any form are investigated and resolved.

Non-compliance issues are to be reported to the Managing Director by the employee / line manager responsible dealing with the non-compliance activity.

Reception of Waste Non-conformance is dealt with as a separate issue, refer to RWI 301 *Reception of Waste, Non Conformance Procedures*.

2. Procedure

Record the details of the non-compliance on form EWIF 300. State the date. Location and when the non-compliance was first reported.

Evaluate any adverse environmental and health & safety effects. This will include a statement regarding the cause and the degree of severity of the non-compliance.

Discuss with the relevant persons involved the plan of action to remedy the situation, include and record corrective actions to eliminate recurrence of non-compliance.

Agree a time scale within which to implement corrective actions.

Review non-compliance on completion of proposed time scale.

Ensure compliance is maintained. In the event of continued non-compliance re-examine the agreed corrective action.

If necessary discuss and record changes in procedures/codes of practice with the relevant author.

MANAGEMENT SYSTEMS

SITE INSPECTION

1. Purpose and Scope

The purpose of this work instruction is to provide a guide to the criteria of a site inspection conducted at each site operated by CWM Environmental Ltd.

An inspection of a site and licence conditions shall be made on a site specific basis and will be dependent on the type of site and the type of inspection. Larger sites will require a longer and more detailed inspection.

All site inspections will be conducted by personnel of an appropriate level of competency appointed by the relevant Manager.

Landfill

The site inspection will be recorded on MWIF 300 *Site Inspection Form*. Each detail listed on the form will be scored to indicate the level of compliance, 1 being pass, 5 being absolute fail. In the event of some elements of a criterion failing to meet the required standard a score between 1 and 5 will be given depending on severity and / or priority action for remediation to be taken.

Based on the above scoring, comments and required actions must be recorded on the form.

2. Procedure

Daily Checks:

Access Road - Check that the approach to the site is kept tidy and free from obstructions. Check that the site sign is clearly displayed at the entrance to the site and details the name, address and telephone number of the operator and the name of the Waste Regulation Authority. Site opening hours and any other requirements specified by the site licence. Vehicles that carry mud and debris onto highways are in breach of the Highways Act. Check for the presence of mud etc on the main highway leading to the site.

Gate and Fences - Check the entrance gates and fences around the site are properly managed and secure.

Litter - Check for litter on and off site. Ensure measures are enforced to control the spread of litter.

Daily Cover - Check the working face area behind the advancing face for sufficient daily cover to prevent wind-blow, odours and discourage vermin.

Bunded Areas - check for leakage from tanks and bund walls. Ensure that as far as possible

MANAGEMENT SYSTEMS

bunded areas are empty of water and never present less capacity than the holding tank.

Odours - Check for the presence of offensive odours. Ensure that odours are effectively controlled by proper working face management.

Dust Control - Check that dust levels are not hazardous to health and do not impair amenity. Ensure that dust is effectively controlled.

Weekly Checks:

Nature of Wastes - Check that an adequate system to monitor the quantity and quality of wastes are maintained and follows the procedure given in RWI001 *Reception of Wastes Procedure*. Ensure that a second inspection of waste occurs at the disposal face and follows the procedure given in RWI300 *Visual Waste Inspection*.

Vehicle Control - ensure that vehicles and crews are following instruction from landfill operatives and are observing *site users instructions*. Ensure that two way radio communications are effective between weighbridge and working face operations.

Health & Safety Compliance - check that safe work practices are being observed, all operatives are wearing suitable PPE and fire / first aid equipment is available in site machines and within specification. Ensure Manning levels are adequate to allow safe operation of the site.

Site Plant - check for damage / faults with operator and check that necessary servicing has been performed.

Signs - check that site signs are in place and are adequate for vehicle control and safety information.

Slope Profiles - check that any engineered slopes constructed accord with working plan / planning permission requirements and that temporary slopes are stable and safe to work.

Capping/Restoration - check the integrity of any capping and restoration work to ensure environmental protection.

Monitoring - Ensure that site monitoring for Leachate, Groundwater, Surface Water and Landfill Gas is up to date according to the site monitoring schedule.

Weighbridge Records - check that the reception of waste is correctly logged and documented and follows the procedure given in RWI 001 *Reception of Wastes*. Check the Visitors Book for recent visitor entries. Fire regulations insist that a record of visitors received at a site are recorded. Check that a system is enforced to ensure that ALL visitors going on site are signed in and out.

MANAGEMENT SYSTEMS

Site Licence - Check that a copy of the most recent Waste Management Licence is displayed

Facilities - check that all welfare facilities (canteen, shower-room, toilets etc) are clean and functional with the correct safety equipment available. Check that a current copy of the Health and Safety Law poster is displayed in a prominent position in the office and check that COSHH assessments are available and up to date where necessary.

Accident Book - Check for recent entries and that they are correctly made - ensure action has been taken where necessary to prevent similar accidents.

First Aid Kit - Check that a standard first aid kit is complete and stored in an accessible position. Ensure that a competent first aider is available.

Fire / Safety equipment - Check that are extinguishers are both properly maintained/serviced and accessible in the event of an emergency. Check that protective equipment is in good condition and available for visitors

Controlling Litter

1.0 ISO 14001

4.3.3 Objectives and targets

4.3.4 Environmental management programme

2.0 Purpose

The purpose of this procedure is to have zero instances of litter escaping from the site.

3.0 Target

The targets set to meet the objective are:

- ◆ Erecting a perimeter fence and the use of mobile fences.
- ◆ All litter escaping off site will be picked within 24 hours

4.0 Responsibility

It is the responsibility of the nominated manager to ensure that the requirements of this procedure are adhered to.

5.0 Litter Control

On a daily basis the weather forecast for the following day must be reviewed. If strong winds are forecasted which could lead to site closure the appropriate customers must be given advanced warning.

Operations must be planned in advance to reduce the need for site closure, e.g. move litter nets, use emergency tipping areas etc.

Litter must be controlled in the first instance by mobile litter nets that are placed adjacent to the operational area. The mobile nets must be placed downwind of the operational face and moved when appropriate to collect maximum litter.

Site closure must be considered if litter escapes off site.

Litter must be picked from the litter nets adjacent to the operating face on a daily basis so as to prevent the nets becoming overloaded and litter re-broadcast.

In the event of litter escaping outside the mobile nets, the priorities for picking must be as follows:

- ✓ Clear sensitive areas first public areas, grazing cattle.
- ✓ Clear from the outside inwards, simultaneously ensuring the mobile nets are kept clear to prevent them falling over
- ✓ Clear other areas within the site perimeter.

The site must reduce or restrict inputs or close due to wind when:

- ✓ It is unsafe to tip high-sided vehicles
- ✓ The cost of litter picking will outweigh the revenue earned.

It is likely that even in the windiest conditions the site will remain open for deliveries of spoil and hardcore as these can be tipped safely and be used to hold down lighter wastes.

In cases where the site has to close due to wind, the site staff will ensure that the waste in the operational area is firmly pinned down before leaving the area.

Any complaints received must be followed up in accordance with EW1300 and detailed on the form EWIF300.

Odour Control

1.0 ISO14001

4.3.3 Objectives and Targets

4.4.6 Operational control

4.5.2 Non-conformance and corrective and preventative action.

2.0 Purpose

To ensure that environmental nuisance via odour from disposal of waste is minimised.

3.0 Objectives

To have zero instances of substantiated complaints regarding odours from the site.

4.0 Responsibility

The responsibility is that of the nominated manager for ensuring that the procedure is followed.

5.0 Odour Control

The following are typical sources of smells, with likely remedies

Smell from

Remedy

Fresh refuse

Apply daily cover

Landfill Gas

Follow MWI 302 (Environmental Monitoring – Landfill) and EWI 001 Emergency Procedures Landfill

Fugitive emissions from
Around the outside of gas wells

Regular monitoring: reseal
as necessary

Leachate Pools

Aerate, application off de-odorising agents

Malodorous Waste

Cover with less odorous waste discontinue
acceptance if unacceptable.

Excavations into waste

Minimise excavations (new waste only) and
cover as soon as possible

6.0 Odour Counteractants

Can be used but are only successful with specific problems. Their greatest use is as a palliative.

Pest Control

1.0 ISO 14001

4.4.6 Operational Control

4.5.2 Non-conformance and corrective and preventative action

2.0 Purpose

The Purpose of this procedure is to have zero instances of substantiated complaints regarding pests such as flies / rodents.

3.0 Targets

The targets set to meet the objective are:

- ◆ Perform a weekly inspection of any exposed waste surfaces and potential vermin runs.
- ◆ Cover all exposed waste surfaces within the working day.

4.0 Controls

Pests at Nantycaws and the other CWM Environmental sites are identified as **flies, rats and birds**. All of these have the potential for causing nuisance or health problems to the surrounding neighbours. Weekly inspections must be carried out for traces of vermin and appropriate action taken, e.g. employ on site vermin control specialist, apply additional cover etc. Details of all inspections and actions must be recorded in EWIF 302 Pest Control Diary.

Should **flies** be noticed on site, the Site Manager must investigate where an infestation might be located. Spraying with an insecticide may be deemed necessary, but must only be carried out by a qualified practitioner.

If a complaint about flies is received from a neighbour, the Site Manager must find out what type of fly it is, in order to see if the site is likely to be causing the problem.

In order to prevent flies hatching waste must not be left uncovered; cover can take the form of an additional layer of waste or inert cover material. All waste batters must be covered with inert cover material.

Rats must be controlled on all sites by a qualified vermin control officer. The services of on or off site registered pest controllers are responsible for carrying out the weekly inspections at Nantycaws. The external site operations will also have regular visits by an external pest officer, quarterly as a minimum with additional visits as required. Records of these visits must be kept. In addition putrescible waste materials must be covered each day so as not to provide a food supply, and any items in the incoming waste which might provide nest sites must be well compacted to prevent such use.

Birds are controlled by using a variety of devices including a starting pistol, which must be used if a problem develops.



Controlling of Mud

1.0 ISO 14001

4.3.3 Objectives and targets

4.4.6 Operational Control

4.5.2 Non-conformance and corrective and preventative action

2.0 Purpose

The objective of this procedure is to have zero instances of mud reaching the public highways e.g. the A48 Carmarthen highway from the site.

3.0 Targets & Objectives

The targets set to meet the objective are:

- ♦ Installation and use of the vehicle wash as specified.

4.0 Responsibility

It is the responsibility of the management representative to ensure that the requirements of this procedure are adhered to.

5.0 Action to be taken to minimise the impact from mud from site

On a daily basis the weather forecast for the following day must be reviewed. If the weather conditions forecasted are likely to cause mud to be taken out from the haul road on to the main public highway operations must be planned in advance to prevent this, e.g. monitoring of the condition of the haul road and cleaning of excessive mud from vehicles leaving the tip face as required.

The effectiveness of the wheel cleaning equipment must be monitored daily and appropriate action taken to ensure continued effectiveness, e.g. additional sweeper hired in, mobile wash hired in etc. Details of these actions must be recorded in the site diary.

The condition of the public road must be checked whenever any of the site staff leave the site. If these inspections show that it is necessary, the public road must be swept by a contracted roadsweeper. Details of these actions must be recorded in the site diary.

Any complaint received must be followed up in accordance with EWI 300 incident reporting procedure.

LEACHATE LEVEL CONTINGENCY PLAN

Leachate Level Contingency Action Plan

The leachate *assessment* levels and *compliance* levels will be set as follows at the Nantycaws landfill site:

Cell	Assessment level above the base of the sump	Compliance level above the base of the sump
1 & 2	2.5 metres	3.0 metres
3 & 4	2.3 metres	2.8 metres
Cell	Assessment level above the base of the cell	Compliance level above the base of the cell
5	1.5 metres	2.0 metres

These levels will give early warning of potential problems before they occur.

Where leachate levels exceed the *assessment* level in any of the phases at the site, the site manager will review and take appropriate action.

Where levels exceed *compliance* levels then action detailed below will be implemented in relation to that phase:-

- (a) The Agency will be informed immediately and advised in writing.
- (b) Levels will be re-tested after 24 hours.
- (c) If the leachate level is still above the maximum permitted level, measures will be implemented immediately for the removal of leachate from the extraction point in accordance with the procedures for leachate management specified in the Leachate Management Plan.
- (d) Where the leachate level is exceeded in one of the leachate monitoring points (other than the extraction point), leachate level monitoring will be increased in that leachate level monitoring point to daily. Daily monitoring in the leachate level monitoring point will continue until levels have been reduced. If levels in a monitoring well are not reduced by pumping from the extraction well within 7 days, then leachate will be extracted directly from the leachate monitoring well. Following extraction of leachate from the leachate monitoring well, levels will be re-tested 24 hours after cessation of pumping. If the leachate level cannot be reduced in the leachate monitoring point within 7 days of pumping from the monitoring well, then discussions will be held with the Agency, and proposals submitted within 14 days for the reduction of leachate in the phase to comply with trigger levels, and will be implemented following approval by the agency.

- (e) Where the leachate level is exceeded in the leachate extraction point, leachate level monitoring will be increased to daily in the leachate level monitoring points in the same phase. Leachate level monitoring will continue at the monitoring points at daily intervals, until leachate levels at the extraction point have been confirmed as having been effectively reduced to below trigger. Leachate levels in the extraction point will be re-tested 24 hours after cessation of pumping from that well and will be confirmed as having been effectively reduced, if the leachate level complies with the trigger level when tested. If the level does not comply 24 hours after cessation of pumping, then extraction will continue. If the leachate level cannot be reduced in the leachate extraction point within 7 days of pumping having commenced, then discussions will be held with the Agency, and proposals submitted within 14 days for the reduction of leachate in the phase to comply with trigger levels, and will be implemented following the approval of the Agency.
- (f) In all cases, records of the volumes of leachate extracted will be kept. The results of daily leachate level monitoring will be forwarded to the Agency within 1 week of measurement.

Leachate Quality Contingency Action Plan

Leachate quality results from the quarterly and annual analyses will be compared against the leachate source term concentrations modelled in the hydrogeological risk assessment. The trigger level for a relevant determinand will be deemed to have been exceeded if the result obtained exceeds the *assessment* criteria, as an early warning to enable appropriate action to be taken.

Where the *compliance* level is exceeded, the Agency will be informed immediately, confirmed in writing and advised of further actions to be taken.

Exceedance of assessment criteria

In the event that the assessment (trigger) criteria for a determinand modelled in the risk assessment is exceeded in a monitoring point in any phase, then a further sample will be taken from the relevant monitoring point and subject to a repeat analysis for the relevant determinand within one month. Where the repeat analysis confirms the exceedance, leachate samples will be taken from all monitoring points within the same phase during the next three quarterly sampling exercises and analysed for the specified determinand. Monitoring results from the above samples will be forwarded to the Agency immediately following receipt.

Exceedance of compliance limit

In the event that the compliance limit for a determinand modelled in the risk assessment is exceeded in a monitoring point in any phase, then a further sample will be taken from the relevant monitoring point and subject to a repeat analysis for the relevant determinand within one month, and for the subsequent two months.

Should the determinand exceed and remain above the compliance limit, a review will be undertaken of the risk assessment, to determine the significance of such concentrations and the potential impact of leachate being present in the phase at the revised concentration. The review will contain any appropriate recommendations and timescales to ensure that the elevated concentration does not cause an adverse impact on groundwater. The review of the risk assessment will be submitted to the Agency and any recommendations implemented following written consent of the Agency.

Leachate Determinand Action Plan

Where the results of the annual analysis for the list I/II substances detect a substance which was not detected in the previous annual analysis, or not used to determine the leachate source term in the risk assessment, then an assessment will be undertaken as to whether the risk assessment needs to be reviewed, taking into account the properties of the substance detected, and the properties of the substances already modelled in the risk assessment.

If it is considered that the risk assessment should be reviewed, a review will be undertaken determining the potential impact of the new substance and containing any appropriate recommendations. The review of the risk assessment will be submitted to the Agency and any recommendations implemented following written consent of the Agency.

Nanty Caws Landfill PPC Application
Reference No. CP3735PB
Application Form Supporting Information

QB 7.2.1 Copy of Relevant Planning Permission

TYPE	PERMIT REF.	PERMISSION FOR	DATE ISSUED
Planning Permission	C/15/97	Development Permission	13/02/97
Planning Permission	C/00029	Variation of Condition	19/09/97

Serial No: C/15/97

CARMARTHENSHIRE COUNTY COUNCIL

Town and Country Planning Act 1990
Town and Country Planning General Regulations 1992

GRANT OF PLANNING PERMISSION FOR DEVELOPMENT

**In Accordance with Regulation 3 of the
Town and Country Planning General Regulations 1992**

To:- Mr Eifion Bowen
Area Manager - West
Planning, Property and Technical Services Department
40 Spilman Street
Carmarthen
SA31 1LQ

In pursuance of its powers under the above-mentioned Act and Regulations the Council as Local Planning Authority **HERBY PERMITS:-**

Proposed removal of condition No. 3 on deemed consents D4/C/5933/17 and D4/C/5934/17 and condition on deemed consent D4/A/10844/17, Llanddarog Road Landfill Site, Nant-Y-Caws, Carmarthen.

In accordance with the application submitted to the Council on 3rd January 1997, subject to the following conditions:-

1. Unless otherwise approved or granted planning permission by the County Planning Authority, the development of the landfill site shall be carried out in accordance with the details shown on the following drawings:
 - (a) The 1:2500 scale location plan dated March 1983 (drawing No 3.55.)
 - (b) The 1:1250 scale plan showing proposed final contours, dated September 1992 (drawing No. 15/38 A1/238)
 - (c) The relevant 1:1250 scale Operational Plan
2. The developer shall notify the planning authority not less than two working days before:
 - (1) The completion of soil storage mounds.
 - (2) The removal of soil storage mounds.
 - (3) The formation of the finished levels of any parts of the landfilled area prior to replacement of soils.

- (4) The replacement of soils.
- (5) Seeding and planting.

- 3. Existing hedges and trees on the site boundaries shall be retained and protected from damage throughout the duration of operations at the tip.
- 4. Except in the case of emergencies (which shall be notified to the LPA within 72 hours) no operations shall be carried out at the site except between the following times:

07.00 hrs to 18.00 hrs Monday to Friday

07.00 hrs to 13.00 hrs Saturday

There shall be no working on Sundays and Public Holidays.

- 5. Works in accordance with the Working Plan shall be carried out to deal effectively with any pests, birds and insects at the site.
- 6. Provision shall be made within the site to prevent the dropping of mud, stone, or other debris on any public road from vehicles leaving the site.
- 7. Arrangements shall be made for ensuring that operations on the site do not generate noise which has an adverse effect on amenities of neighbouring areas.
- 8. Silencers and appropriate acoustic screens or covers shall be fitted to, used, and maintained on all vehicles, plant and machinery used on the site. Save for the purposes of maintenance, no machinery shall be operated with the covers open or removed.
- 9. *The best available techniques not entailing excessive cost shall be used to minimise the emission of noise, dust and fumes from the site.*
- 10. During the carrying out of the operations and development hereby permitted, water bowsters, sprayers, whether mobile or fixed, or similar equipment shall be available to minimise the emission of dust from the site. At such times as the prevention of dust nuisance by these means is not possible, movement of soils and materials shall temporarily cease until such time as the weather conditions improve. No vehicle used for the movement of materials within the site shall be equipped with downward pointing exhausts.
- 11. Measures shall be implemented for the overall drainage of the site and the prevention of pollution by leachate, in accordance with a scheme which shall have been submitted to and been approved in writing by the Planning Authority after appropriate consultation. Any leachate formed as a result of the waste deposition shall be dealt with in accordance with a scheme which shall have been submitted to and been approved in writing by the Planning Authority.
- 12. Within 3 months of the date of this permission the developer shall submit for the approval of the planning authority a comprehensive scheme for managing, regulating and treating drainage on and from the site. The scheme shall include:
 - i. cut-off ditches constructed above the working area to intercept and direct clean water away from the site.;
 - ii. preservation of existing watercourses, ditches, streams and culverts outside operational areas of the site.
 - iii. works to prevent silting, flooding or damage by erosion of watercourses:
 - iv. settlement ponds, leachate ponds and lagoons. Lagoons and ponds shall be constructed in excavation wherever possible, with side slopes inside the ponds not steeper than 1 ½ horizontal to 1 vertical.

- v. all ponds and lagoons shall be securely fenced.
 - vi. Any leachate or foul water treatment/disposal facility.
13. The site shall be restored to agricultural use, with surface levels and configuration which facilitates that use and the carrying out of normal agricultural operations.
 14. Not later than three months from the cessation of tipping or other operations on Phase 1, and not later than 3 months prior to the cessation of tipping or other operations on Phase 2, the operator shall submit for the approval of the planning authority details of the proposed restoration, including the final ground profiles, a detailed soils replacement strategy including intended soil profiles, proposals for the location and design of watercourses, any other water features, fences, hedges, walls, internal roads, tree or shelter belt planting and water supply to the site and any other features together with a written specification of how the works will be undertaken. The boundaries of all agricultural field parcels shall consist of banks of traditional form and proportions appropriate to the local landscape. The plan shall include details of field water supplies and ditch/watercourse and piped ditch systems to control surface run-off and prevent erosion and where necessary a piped field drainage system consistent with good practice for restoration of land of the type occurring on this site. The plan shall also include details of any installations required for continuing treatment and management of leachate and landfill gas. No restoration shall take place except in conformity with the plan, and no restoration shall take place prior to approval of the plan.
 15. All topsoil and subsoil shall be stripped from all the areas to be used for waste disposal, roads, offices, the storage of topsoil, subsoil and soil forming material and to be traversed by heavy machinery. Plant or vehicles shall not cross areas of unstripped topsoil other than for the purpose of stripping those soils.
 16. Where there is a shortage of in situ natural soil material, any material identified as suitable for use as soil, soil forming material, or for use as a mineral layer above the landfill capping device, during the course of the operations shall be identified and stored for use in the restoration. All such selected imported mineral material shall be approved by the Planning Authority as being fit for the intended purpose prior to final placement. The operator shall provide the Planning Authority with a plan showing the location of the areas on which this material will be stored.
 17. The boundary of the site and any internal enclosures shall be made stockproof for the duration of operations including throughout the period of agricultural aftercare.
 18. On cessation of operations at the site, all plant, machinery, buildings, fixed equipment, areas of hardstanding, including site compounds and access and haul roads shall be removed unless otherwise approved by the Planning Authority.
 19. All settlement ponds when no longer required for pollution control shall be emptied of slurry and filled with dry inert material to agreed levels prior to covering with soils. Any proposal to retain settlement ponds as wet areas or stock drinking facilities must be submitted for the approval of the Planning Authority as part of the restoration plan required by condition 14.
 20. Restoration shall be carried out in accordance with the approved contours so that the restored site conforms with the contours of the surrounding land, and shall be free from the risk of ponding or erosion. The restored landform shall have a minimum gradient of 1 in 25.
 21. The restored landfilled area shall be provided with a minimum depth of 1 metre of soil and granular free draining material above the landfill capping device. Within this 1 metre thickness of material at least 0.5 metres of soils shall be provided.
 22. The soil material set aside for use in agricultural restoration shall be spread uniformly and in the correct sequence above the granular layer, and shall be rooted and scarified to full depth without

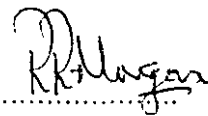
causing mixing between different soil layers. All stones, boulders or foreign objects likely to impede normal agricultural cultivations shall be removed. The finished topsoil surface shall be stone picked where necessary to remove all stones greater than 100mm side dimension and the final surface shall be free from risk of ponding and erosion and in a suitable condition to receive a sowing of fine grass seeds.

23. Any part of the restored area which is affected by surface ponding or by localised settlement shall be regraded to resolve the problem including the reinstatement of the soil cover as required by Condition 22.
24. Wherever possible the working programme shall make provision for the immediate spreading of stripped soils on areas being restored. Where this is not possible topsoil and subsoil shall be stored separately in mounds not exceeding 4 metres in height.
25. Topsoil, subsoil and soil forming materials shall be stored separately and shall be prevented from mixing with each other, or with other material. The works of formation of the heaps shall include drainage works so as to prevent waterlogging at base level, ponding or erosion.
26. After the formation of soil and soil forming material storage heaps the planning authority shall be supplied with a plan indicating the location of each heap and the quantity of material in it.
27. The soil and soil-forming material mounds shall be graded and seeded with a low maintenance grass mix within 3 months of formation. Thereafter the mounds shall be maintained by re-seeding and mowing.
28. The developer shall give the planning authority at least 48 hours notice before the intended commencement of any soil movements, and shall obtain the agreement of the Planning Authority as to the suitability of the soil conditions prior to stripping, movement, storage, or re-spreading. Soil handling shall not be undertaken if soil wetness would cause degradation of soil structure.
29. Following approval of the final contours of the landfill, sub-soil shall be spread over it to a minimum depth of 0.3 metres or as specified in the Restoration Plan and cultivated so as to break down any compacted layers.
30. Following spreading and cultivation of the subsoil, topsoil shall be spread over it to a minimum depth of 0.1 metres or to such other depth as may be specified in the approved restoration plan.
31. An Aftercare Scheme requiring that such steps as may be necessary to bring the land to a condition reasonably fit for the proposed agricultural or other use specified in the approved restoration plan shall be submitted for the approval of the Planning Authority not later than 1 year from the date of this permission. The submitted aftercare scheme shall specify the steps to be taken and the period during which they are to be taken and shall include where appropriate details of:-
 - a) Tree and hedge planting and landscaping
 - b) Cultivations, seeding and management of grassland, in accordance with the rules of good husbandry.
 - c) Fertiliser and lime application based on soil chemical analysis, the results of which are to be submitted to the Planning Authority.
 - d) Grazing management. (class of livestock grazing and stocking density).
 - e) Any other agricultural or conservation treatment particularly relevant to the site.

- f) Entry onto the site to be granted to representatives of the Planning Authority and their agents at all times during soil spreading operations, working, restoration and aftercare of the site.
- g) Provision of water supplies and land drainage facilities, including watercourse, field ditch systems and piped field under drainage where appropriate. The developer shall submit a scheme for the approval of the Planning Authority showing the proposals for field underdrainage and the scheme shall be installed during the first year of the aftercare unless otherwise approved by the Planning Authority.
- h) At least once a year the site operators shall arrange a formal review to consider the operations which have taken place on the land during the previous year, and the programme of management for the following year. The parties invited to this review shall include the Operator, the owner(s) of the land, the occupier(s), the Planning Authority, the Welsh Office Agriculture Department, and the Environment Agency.
- i) At least 4 weeks before the date of each annual review the operator shall provide the Planning Authority with a record of the management and operations carried out on the land during the period covered by the review.
32. No Special Waste shall be imported onto or deposited in or on the site.

Reasons

1. For the avoidance of doubt and to maintain planning control over the site.
2. To assist the orderly operation and restoration of the site.
- 3,4-5. 7 - 10, 32. In the interests of amenity.
6. In the interests of highway safety.
- 11-12. In the interests of the water environment and the prevention of pollution.
- 13-31. To assist the restoration of the site.

Signed: 
Mr. R. Morgan
Chief Executive
Date: 13th February 1997

Croesewir gohebiaeth yn Gymraeg neu'n Saesneg - Correspondence in Welsh or English is welcomed

Mr H. Towns (Ext.2954)

C/15/97/HT/HJ

19 February, 1997

Lance Jones
CWM Environmental
Nantycaws Landfill Site
Nantycaws
Carmarthen

Dear Sir

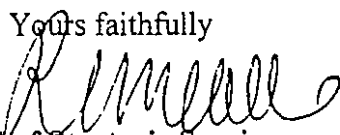
Conditions Relating to Nantycaws Landfill Site

I refer to your telephone conversation with Mr Hugh Towns of this Department regarding the conditions relating to Nantycaws Landfill Site. You indicated concerns regarding some of the conditions imposed on decision notice reference C/15/97. In answer to your queries I have the following observations.

1. In relation to condition No.4 the definition of operations is intended to be the same as that referred to in the draft waste management licence i.e. the deposit of waste on land and the use of plant and equipment, excluding the use of Mobile Plant, to treat or process waste on land.
2. In relation to condition 10 the vehicles that should not have downward pointing exhausts should be your own vehicles used on site for the movement of materials within the site. I accept that it would be unreasonable to expect you to control the private vehicles that enter the site to deposit waste.
3. In relation to condition 32 I consider that it would be unreasonable for the Authority to take enforcement action against you if some other person imports Special Waste onto the site provided remedial action is taken and the Special waste is, immediately it is discovered, removed and taken to a facility properly licenced to accept such waste.

I hope that this answers your concerns.

Yours faithfully


Head of Strategic Services

CARMARTHENSHIRE COUNTY COUNCIL

Town and Country Planning Act 1990
Town and Country Planning (General Development Procedure) Order 1995

GRANT OF PLANNING PERMISSION FOR DEVELOPMENT

NAME & ADDRESS OF APPLICANT

Cwm Environmental
Nantycaws Landfill Site
Llanddarog Road
Nantycaws
Carmarthen SA32 8BG

NAME & ADDRESS OF AGENT

PART 1 - PARTICULARS OF APPLICATION

Application No: C/00029

Date of Application: 5th June 1997

Particulars and location of development:

Variation of Condition No.4 to Define Operations and Deletion of Condition 32 Restricting the Disposal of Special Waste on Planning Permission C/15/97 at Nantycaws Landfill Site, Llanddarog Road, Nantycaws, Carmarthen.

PART 2 - PARTICULARS OF DECISION

The Carmarthenshire County Council hereby gives notice in pursuance of the provisions of the Town and Country Planning Act 1990 that permission has been GRANTED for the carrying out of the development referred to in Part 1 hereof in accordance with the application submitted subject to the following condition(s), if any:

CONDITIONS:

1. Condition 4 be varied to read as follows:

Except in emergencies when working is necessary to prevent the pollution of the environment and to maintain safe working on the site (which shall be notified to the Local Planning Authority within 72 hours).

- a) no operations other than environmental monitoring, water/leachate pumping, restoration works, cell construction work and the servicing, essential maintenance and repair of plant shall be carried out except between:

0700 hours and 1800 hours Monday to Friday

and

0700 hours and 1300 hours Saturdays
and no working on Sundays or Public Holidays.

- b) no restoration work or cell construction work shall be carried out at the site between 2200 hours and 0700 hours on any day from 1 April to 31 October. From 1 November to 31 March the operating hours shall be as in (a) above.
- c) no servicing, maintenance and testing of plant shall be carried out at the site between 2100 hours and 0700 hours Monday to Friday and 1800 hours and 0700 hours on Saturdays, Sundays and Public Holidays.

2. Condition 7 be varied to read:

between 0700 hours and 1800 hours the level of noise emitted as a result of any activity or operation at the site shall not exceed 55dB LAeq (1 hour) (Freefield) when measured at any noise sensitive property.

Outside these hours the level of noise emitted as a result of any activity or operation at the site shall not exceed 42dB LAeq (1 hour) (Freefield) when measured at any noise sensitive property.

For the purposes of this condition noise sensitive property means any occupied residential property.

- 3. Not later than three months from the cessation of landfilling operations on Phase 1, and not later than three months prior to the cessation of landfilling operations on Phase 2, the operator shall submit for the approval of the planning authority details of the proposed restoration, including the final ground profiles, a detailed soils replacement strategy including intended soil profiles, proposals for the location and design of watercourses, any other water features, fences, hedges, walls, internal roads, tree or shelter belt planting and water supply to the site and any other features together with a written specification of how the works will be undertaken. The boundaries of all agricultural field parcels shall consist of banks of traditional form and proportions appropriate to the local landscape. The plan shall include details of field water supplies and ditch/watercourse and piped ditch systems to control surface run-off and prevent erosion and where necessary a piped field drainage system consistent with good practice for restoration of land of the type occurring on this site. The plan shall also include details of any installations required for continuing treatment and management of leachate and landfill gas. No restoration shall take place except in conformity with the plan, and no restoration shall take place prior to approval of the plan.

REASONS:

- 1-2. In the interest of the amenity of residents of neighbouring properties.
- 3. To ensure satisfactory restoration of the site on completion of landfilling operations.

NOTES:

- a) Condition 32 on planning permission C/15/97 is deleted.
- b) All other conditions on planning permission C/15/97 remain in force.

DECISION DATE: 19th September 1997

SIGNED: _____

Mr Bradley Roynon
Chief Executive

Nantycaws Landfill PPC Application
Reference No. CP3735PB
Application Form Supporting Information

Q B7.3.1 Relevant Offences / Convictions

The Environment Agency issued a formal caution to the Nantycaws Landfill Site on 29/07/02 relating to an incident dated the 07/12/00, re. s85 WRA and s33.1.c and 6 of the Environmental Protection Act, 1990.

NantyCaws Landfill PPC Application
Reference No. CP3735PB
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QB 7.4.1 Technically Competent Management

RESPONSIBLE PERSON	POSITION	LEVEL OF WAMITAB CERTIFICATE	DATE CERTIFICATE ISSUED	CERTIFICATE REF NO.
Micheal John Lewis	Landfill Manager	LS4	17 th May 2000	2653
Dale Anthony	Operations Manager	LS4	8 th March 2000	2433

WAMITAB

WASTE MANAGEMENT INDUSTRY TRAINING AND ADVISORY BOARD

CERTIFICATE No: 2433

CERTIFICATE OF TECHNICAL COMPETENCE

This Certificate confirms that

Dale Anthony

has demonstrated the standard of technical competence required for the management of
a facility of the type set out below

Facility Type:

~~Managing Landfill Operations - Special Waste~~

~~(Level 4) - LS4~~



Authorising Signatures:

Director General

Director

Date of issue:

08 March 2000

WAMITAB

WASTE MANAGEMENT INDUSTRY TRAINING AND ADVISORY BOARD

CERTIFICATE No: 2653

CERTIFICATE OF TECHNICAL COMPETENCE

This Certificate confirms that

Michael John Lewis

has demonstrated the standard of technical competence required for the management of
a facility of the type set out below

Facility Type:

~~Managing Landfill Operations - Special Waste~~

~~(Level 4) - LS4~~



Authorising Signatures:

Director General

Director

Date of issue:

[Signature]

[Signature]

17 May 2000

Nanty Caws Landfill PPC Application
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Q B 7.4.4 Management of other Installations

The responsible people are not providing technically competent management at any other PPC Installations or at sites licensed under Part II of the Environmental Protection Act 1990.

Company Training Plan

Company Name	Name of Training Champion	Total Training Budget	Year	No. of Employees	Products/Services
CWM Environmental Ltd	Philip Rees	£	2002/3	20	Waste Management

Priority of Training	Title of Training	Job titles, Categories or Groups	No	NVQ Level or Unit	Objectives of Training	Method of Training	Name of Training Provider	Resources Required	Time-scale Length of Training	Outcome of Training (N) (D)	Linked to which Business Objective
1	Waste Management	ALL	16		To raise awareness and compliance	Internal and External	CWM IWM ESA WAMITAB	Travel Time Venue	Ongoing	N	145
2	Health & Safety	ALL	16		To raise awareness and compliance	Internal and External	IOSH CWM	Travel Time Venue	Ongoing	N	145
3	Service Levels	ALL	16		Improve customer relations	Internal	TBA	Travel Time Venue	Ongoing	N	2
4	Information Technology	ALL	10		Flexibility of staffing requirements	Internal and External	TBA	Travel Time Venue	Ongoing	N	6
5	Marketing	ALL	7		To expand scope of	External	IWM ESA	Travel Time	Ongoing	N	34

					services and recycling			Venue			
6	Man- management	ALL	5		To improve skills and time management	External	IWM	Travel Time Venue	Ongoing	N	12

Management Systems Training

1.0 Relevant sections of ISO14001

- 4.4.2 Training, awareness and competence
- 4.4.3 Communication

2.0 Purpose

To ensure that acceptable standards of workmanship are maintained and that all personnel receive adequate training in tasks relating to quality and environmental awareness.

3.0 Associated Documents

Employee Handbook
Personnel training records
Copies of training certificates
Induction checklists

4.0 Responsibility

The management representative is responsible for ensuring that all personnel under his control are adequately trained in the execution of work related tasks with a through understanding of all environmental aspects and policy.

5.0 Induction

Induction training is given to each new employee when he/she is employed by the company. The relevant policies and work instructions are used extensively in the induction training.

All staff will be given a copy of the relevant job related work instructions and an employee handbook.

Induction also includes an introduction to the Health & Safety requirements of the company and any supporting legislation. Initial training will relate to basis safety and familiarity with everyday hazards and requirements for a safe place of work. This will normally take the form and issue and explanation of company risk assessments and emergency work instructions.

The company will hold a personnel record form on each employee detailing:

Personal details
Experience
Qualifications
Training given

Employees recruited for waste management work will be assessed by the management representative in conjunction with the experienced site operatives after their first few days work to ensure they can work on their own initiative and in a safe and competent manner.

6.0 Existing Employees

The management team is responsible for ensuring that all employees are adequately trained and qualified to perform their work effectively. Training will include environmental awareness so that employees can identify the way in which function influences company environmental impacts, achieving compliance with the environmental policy and objectives of the company.

Environmental achievement is measured through the monitoring of the performance achieved during work through the interim and final inspections/ audits of work completed. Results will be fed back to show management recognition of performance when high levels are attained.

Where required further training will be given to personnel to improve the service provided. More training will be given in relation to any relevant legislation as required.

A training matrix is kept on the office wall detailing the ongoing training for staff updated by the site manager.

When further training required is completed, details of training are again entered onto the individual Personnel Training Record.

The management committee on an annual basis reviews training. The review will ensure that the training needs of all employees are identified, and methods for providing that training established. Particular attention will be given to the selection and training of recruited personnel and personnel transferred to new assignments.

Where a need is identified the relevant training courses are evaluated and arranged by the management representative. On completion of the training course all relevant details are recorded on the personnel training record

Nanty Caws Landfill PPC Application
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Q B 7.6.1 Expenditure Plan



ENVIRONMENT
AGENCY

Nantycaws Landfill CP3735PB

Re: Expenditure Plan

**Commercially confidential
information has been removed.**

NantyCaws Landfill PPC Application
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Q B 9.0.1 Improvement Plan

It is proposed that for the PPC Application the site will operate as a non-hazardous facility after the 16th July 2004, consequently it will not accept waste classified as "hazardous" as defined by the Waste Directive (91/689/EEC).

Subsequent changes to the techniques employed in handling waste accepted at the site may be required.

Procedures shall be forwarded to the Environment Agency to ensure that accepted wastes meet the relevant European Waste Acceptance Criteria (WAC) for non hazardous landfill sites upon confirmation of the implementation date for the WAC and upon receipt of guidance and the detailed requirements of the WAC. Until such a time, wastes shall continue to be assessed against the national interim WAC.

An active gas management system has been constructed at the landfill comprising a network of gas extraction wells, connected to a system of gas mains and spurs. The gas collection system directs collected gas to the landfill gas flare, which is currently located to the north east of the landfill in the gas compound. Future installation of further engines and flares are subject to approval of the planning authority.

The gas extraction system will continue to be progressively expanded as the landfill develops and the remaining Phases are permanently capped. This will ensure that the quantity and quality of landfill gas collected at any one time is optimised.

Leachate extraction within the proposed Cell 5 will comprise of a vertical telescopic extraction riser. The telescopic well will be designed to accommodate the predicted settlement of the waste mass. In addition, two leachate monitoring wells will be installed to the base of Cell 5 in accordance with Drawing No. ESID7. The monitoring wells will be telescopic to accommodate settlement of the waste mass.

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Q F 2.0.1 Commercial Confidentiality Statement

The information requested to be withheld (as detailed in question 2.0.1 in Part F of the application) and which should not be placed on the public register is that contained in the Expenditure Plan.

Pollution Prevention and Control (England and Wales) Regulations 2000 (SI 2000 No. 1973) Permit Application Reference Number CP3735PB – Nanty Caws Landfill. In accordance with Regulation 31 of the above Regulations, we request that the 'Expenditure Plan' information submitted to the Environment Agency as part of the IPPC Permit Application be excluded from the public registers. This is commercially confidential information and includes figures that have been derived exclusively from within Carmarthen Waste Management and, if made available externally, could significantly prejudice Carmarthen Waste Management's commercial interests.

The figures provided for within the expenditure plan is specific to the site and as such includes calculations using site data with real areas, volumes and prices based on the actual costs of development, restoration and aftercare of Nanty Caws Landfill.

Should Carmarthen Waste Management's competitors acquire this information via the public register then it could be used to the competitors' advantage in both pricing structures for waste streams and for tendering on other local authority and commercial contracts. In addition, should the customer acquire this information then it would afford them a commercial advantage in terms of agreeing pricing structures. We look forward to your confirmation that the requested details have been excluded from the public register.