ENVIRONMENTAL RISK ASSESSMENT

Brecon Recycling Centre, Ffrwdgrech Industrial Estate, Brecon, Powys, LD3 9LA

Sundorne Products (Llanidloes) Limited

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List of Appendices:

1 Introduction

1.1 General

1.1.1 This Environmental Risk Assessment (ERA) considers the potential and actual risks associated with the use of the site at Brecon Recycling Centre, Ffrwdgrech Industrial Estate, Brecon, Powys, LD3 9LA which is operated as a Household Waste Recycling Centre (HWRC) by Sundorne Products (Llanidloes) Limited.

1.1.2 The main potential risks are due to the proposed variation of the permit which includes the following:

i) Increase the permit boundary of the site
ii) Upgrade the permit to modern format
iii) Increase the storage volumes of the following wastes shown in Table 1.1

- Fridges = 50 items from 30 items
- WEEE = 60m^3 from 10m^3
- Add the storage of engine oil (13 02 05* – 13 02 07*) to 2,000 litres / 2m^3

iv) Removal of treatment activities comprising chipping and baling
v) Addition of the following waste types into the site in addition to what is already permitted:

- 15 01 01 – paper & card
- 15 01 02 – plastic packaging
- 15 01 03 – wooden packaging
- 15 01 05 – composite packaging
- 15 01 06 – mixed packaging
- 15 01 07 – glass packaging
- 15 01 09 – textile packaging
- 15 01 10* – packaging containing residues of a contaminated by hazardous substances

15 01 11* – metallic packaging containing a hazardous solid porous matrix (for example asbestos), including empty pressure containers

1.1.3 The variation will also entail a new site layout encompassing new impermeable surfaces and drainage design to remain compliant with a modern permit.

1.2 Management and permitted operations

1.2.1 All site staff should be provided with a copy of this ERA and be aware of where it is located on site.

1.2.2 All environmental risks identified in this document should be acted upon accordingly by site management to ensure all environmental risks can be appropriately managed/controlled.

1.2.3 This document primarily considers environmental risks associated with the site. This does not aim to provide detailed Health and Safety risk assessments as required separately through the necessary legislation.

1.2.4 The Environmental Permit is required for the storage (keeping) prior to removal, and treatment (all types of handling/processing) of waste. Waste treatment processes to be carried out on site may include the following:

- Compacting (using 3 no. static compactors)
- Sorting (with loading shovel/360° excavator or by hand)
- Separation (with loading shovel/360° excavator or by hand)

1.3 Specified waste management operations include waste disposal and waste recovery operations listed Annex I and II of The Waste Framework Directive 2008/98/EC and are listed in summary below:

- D15: Storage pending any of the operations numbered D1 to D14 (excluding temporary storage, pending collection, on the site where it is produced)
- R13: Storage of wastes pending any of the operations numbered R1 to R12 (excluding temporary storage, pending collection, on the site where it is produced)
- D14: Repackaging prior to submission to any of the operations numbered D1 to 13
- D9: Physico-chemical treatment not specified elsewhere in Annex IIA which results in final compounds or mixtures which are discarded by means of any of the operations numbered D1 to D8 and D10 to D12
- R3: Recycling/reclamation of organic substances which are not used as solvents
- R4: Recycling/reclamation of metals and metal compounds
- R5: Recycling/reclamation of other inorganic materials

2 Site Receptors

2.1 Receptor Plan

2.1.1 A sensitive Receptors Plan has been provided at Appendix II of this document.

2.2 List of receptors

2.2.1 The receptors listed from the SRP are also shown in the table below with appropriate distances to these properties. It is considered residential receptors situated over 500m will not be affected by the site and proposed operations therefore only sensitive receptors within a 500m radius have been included.

Table 2.1 – Distances to Selected, Representative Sensitive Locations

Boundary	Receptor	Approximate distance from edge of nearest site boundary (m)
North & North East	Numerous industrial/commercial uses including Honddu Vetinary Practice, Airflo Fishing Products, Genuine JayJays Limited, CMJ Motors, British Wool, GSM Automative, Brecon Joinery, Brecon Self Limited Storage, Freedom Green Energy etc..	Adjacent - 500
West	Afron Tarell	90
North	Brecon Golf Club	710
North East	Llanfaes Primary School	870
West/ South West	Residential properties	155-300
North East	Castle Farm Bungalow	470
West	River Usk SSSI & SAC	80
North East	Christ College Brecon	1200
South West	Broad habitat combined BAP habitats	80
Adjacent	Source protection zone 2	On site

3 Environmental Risk Assessment Model

3.1 Fundamental Considerations

3.1.1 **Source/Hazard:** A property or situation that in particular circumstances could lead to harm.

3.1.2 **Consequences:** The adverse effects or harm as the result of realising a hazard which causes the quality of human health or the environment to be impaired in the short or long term.

3.1.3 **Risk:** A combination of the probability of occurrence of a defined hazard and the magnitude of the consequences of the occurrence.

3.2 Pathway

3.2.1 Important in the assessment of a particular risk(s) and to inform the subsequent management of the risk(s) is the identification of the pathway(s) through which the risk may affect the identified receptor(s). The following are examples of pathways:

- Air (windblown dust etc.)
- Ground (leaching of contaminants into underlying aquifers).
- Water (hydrocarbon run off into surface waters)
- Direct contact / exposure

3.3 Consequences

3.3.1 The following table highlights the consequences of the hazard(s) identified and the abbreviations for each as used in the Risk Assessment Table in Section 3:

Abbreviation	Consequences
A	Minor Injury
B	Major Injury
C	Death
D	Air Pollution
E	Water Pollution
F	Pollution of Land

3.4 Effects of Consequences

3.4.1 In order to quantify the level of risk and identify the appropriate management procedures, the potential effects must be considered, as outlined in the table below:

Abbreviation	Consequences	Management Requirements
S	SEVERE	In all cases
Mo	MODERATE	In most cases
Mi	MILD	Occasionally
N	NEGLIGIBLE	No

3.4.2 Note: “Management” is the action required to reduce the risk of a hazard causing a problem on site. Contingency measures are procedures which are in place to reduce the consequences of a hazard.

3.5 Risk Estimation and Evaluation (Probability/Frequency of Occurring Hazard)

3.5.1 The following table allows the likelihood of an occurrence of an identified risk to be assessed:

Abbreviation	Probability	Evaluation
1	Very likely	Could occur during any working day
2	Likely	Could occur regularly
3	Possible	Event possible
4	Unlikely	Event very unlikely

3.6 Risk Assessment Outcome (Combination of Probability & Consequence)

3.6.1 The following table shows the resultant risk of an identified hazard or potential situation. This uses the hierarchy of both probability and consequence to assess the level of risk. The level of risk determines what level of management would be required in order to reduce the risk of occurrence and/or scale.

		Consequence			
		S	**Mo**	**Mi**	**N**
Probability	**1**	High	High	Medium	Low
	2	High	Medium	Low	Near-Zero
	3	Medium	Low	Near-Zero	N/A
	4	Low	Near-Zero	N/A	N/A

3.6.2 Where the risk assessment outcome is high, first-level management of the risk is essential, i.e. removal of hazard, implementation of major infrastructure/structural design measures to contain the risk/hazard and company policy changes to incorporate the management of the risk. All risk management measures must be supplemented with detailed induction training, spot training and tool-box talks to ensure all site staff and users are made fully aware of the risk/hazard, all potential consequences and necessary management and contingency procedures.

3.6.3 Where the risk assessment outcome is medium, the management of the risk should be tackled by management or delegates. If removal of the hazard is not possible, management will normally be met through implementing minor structural design measures or by imposing procedures for the prevention of occurrences which will be conveyed to all site staff through the appropriate training, including any contingency measures/procedures.

3.6.4 Where the risk assessment outcome is low, the management of the risk can be done wholly through appropriate training to site staff including any contingency measures/procedures.

3.6.5 Where the risk assessment outcome is near-zero, site staff should be made aware of the possibility of an occurrence and contingency measures should be readily available to all staff should they be required.

4 Risk Assessment Table

4.1 The following pages contain the site-specific risk assessment for the site with appropriate remedial actions, recommendations and comments included for each identified hazard, potential contaminant or situation.

4.2 The table also contains references to the appropriate section(s) of the site's EMS for additional management procedures.

4.3 As discussed in Section 3.6 above, all situations which identify a risk from Low – High should be incorporated into the staff/visitor training schedule, where appropriate and acted on as required.

SEE TABLES OVERLEAF

Appendix I

RISK ASSESSMENT TABLES

Hazard / Potential Contaminant or Situation	Source(s)	Pathway	Receptor(s)	Consequences	Effect	Probability	Assessment Outcome	Remedial Action/ Recommendations/ Comments
Dust / particulates	Formation of dust on site surfaces during dry and windy weather on both areas of the site. Waste delivery vehicles depositing and collecting potentially dusty waste during dry and windy weather conditions Storage of potentially dusty/waste material externally Settlement of dust of processing plant on both areas of the site. Droughts or water bans leading to a water shortage	Air	Site personnel/ visitors Surrounding site users/occupiers Surface water comprising a spring (issue) adjacent to the site (west) Flora & fauna Residential receptors Schools Surrounding road networks Groundwater source protection zones 1 & 2 River Usk SSSI & SAC Broad habitat combined BAP habitats	A, B, D, E	Mo	3	Low	Plant and equipment on site and all vehicles in the fleet are subject to periodic manufacturer maintenance to ensure proper working order in the form of service contracts. Site management undertake or delegate additional preventative maintenance checks on a more frequent basis to ensure, where possible, the machinery is mechanically sound. These checks will be carried daily with any outcomes, defects and actions taken will be recorded on this form and/or in the site diary All maintenance/housekeeping are listed on daily record/ inspection forms. The inspection form will be completed by a person who is familiar with the requirements of the EMS and EP for the site. All details of defects, problems and repairs carried out will be recorded on the form on the day that each event occurs. Detailed comments may also be recorded in a site diary. All repairs will be carried out as soon as practically possible. All repairs to site security will take place as soon as practically possible and the site will be made secure until the repair has been carried out. Any major defects found during the daily site inspection will be repaired as soon as practically possible. Vehicles will be visually inspected before exit to check that loads are safe and that no mud is carried up the access track which could spill off site from the wheels or bodies of HGVs. Visual inspections of the vehicle running surfaces at the site will also be carried out daily and staff will report any problems with mud or debris on the site roads immediately to the site manager. The deposit of material on the access road or public highway will be treated as an emergency and will be cleared immediately by the operator using either a brush or vacuum tanker/road sweeper if necessary. Silt will not be washed into roadside drains or gullies. A series of dust mitigation measures are implemented on site and when site conditions dictate to ensure dust emissions are controlled as far as is practically possible. The measures include: • sheeting of vehicles removing waste with the potential to cause dust from the site to the site; • cleaning of any spillages using wet cleaning methods; • Hose pipes to dampen wastes during dry/windy weather conditions

Hazard / Potential Contaminant or Situation	Source(s)	Pathway	Receptor(s)	Consequences	Effect	Probability	Assessment Outcome	Remedial Action/ Recommendations/ Comments
								• All wastes with the potential to cause dust will be stored in sealed containers and below the height of the containers • Road sweepers available off site which will benefit from high pressure spray bars to remove mud/debris off site roads Site operatives will continuously monitor dust emissions whilst the site is in operation and will report back to the site supervisor for advice if required. The site supervisor will make a formal visual inspection of dust emissions at once per day. Results of monitoring will be entered into the site diary/record forms. The deposit of material on the access road or public highway will be treated as an emergency and will be cleaned immediately using a brush or a road sweeper/vacuum tanker if necessary. Use the complaint's procedure from the EMS to ensure any dust complaints are addressed and substantiated
Odour	Stored biodegradable waste on site Cracks in concrete leading to trapped waste in both areas of the site Dry/hot weather conditions exceeding three dry days Prevailing wind to towards residential receptor locations Additional waste types being accepted Minor increase in storage volumes of certain wastes e	Air	Site personnel/ visitors Surrounding site users/occupiers Residential receptors Schools	A, D	Mi to Mo	3	Low	The site can accept wastes with the potential to cause odour but strict waste acceptance procedures are in place to identify wastes which could result in an odour escaping the site i.e. heavily contaminated food/putrescible waste containing flies/pests The above waste would be rejected and loaded into a sealed bin and removed from the site by the end of the working day. If malodorous waste is deposited on site, it will be consigned to the skip for rejected waste or removed from the site immediately. If this cannot take place, the material will be sprayed with an odour suppressant. The complaints procedure will be rigorously enforced should a third-party complaint be received from a public or private source. Low residence times for all wastes.

Hazard / Potential Contaminant or Situation	Source(s)	Pathway	Receptor(s)	Consequences	Effect	Probability	Assessment Outcome	Remedial Action/ Recommendations/ Comments
Litter	Vehicles delivering / removing and waste during dry and windy weather conditions including unsheeted / poorly sheeted skips on delivery / removal vehicles Poor or faulty storage containment / damaged skips Poor housekeeping Staff negligence leading to litter escaping off site Additional waste types being accepted Minor increase in storage volumes of certain wastes	AIR	See dust receptors	A to C E,F	Mi to Mo	4	Low	All wastes with the potential to cause litter are stored in or skips which reduces the risk of airbourne litter on site. The greatest risk of litter would be during windy conditions and during this period, the frequency of litter picking would increase. The complaints procedure will be rigorously enforced should a third-party complaint be received from a public or private source. Daily inspections in place for litter. Suitable surrounding containment fence in place around the site. When staff carry out inspections for litter on and off site they will collect the litter and place it in a skip/bin for recovery before the end of the working day. All vehicles which either deposit or remove light waste will be sheeted and checked to ensure no litter is being tracked off site.
Noise/ vibration	Mobile plant and machinery breakdowns or malfunctions Tipping / loading waste into vehicles in external areas of the site Increased annual waste acceptance	Air or ground by vibration	As above	A, D	Mo	3	Low	All vehicles are required to be driven onto and off site with due consideration for neighbouring premises. Vehicles must be well maintained and operated with silencers. Moving parts to be regularly lubricated. All vehicles must be driven slowly around the site (5mph site speed limit). Engines to be switched off when not in use. Reversing alarms to be preferentially fitted with white noise alarms to minimise impacts on neighbouring sites. No shaking of vehicle bodies whilst raised. Plant to be well maintained and operated with silencers. Moving parts to be regularly lubricated.

Hazard / Potential Contaminant or Situation	Source(s)	Pathway	Receptor(s)	Consequences	Effect	Probability	Assessment Outcome	Remedial Action/ Recommendations/ Comments
								Drop heights to be kept to a minimum, particularly when loading empty tipper wagon/skip/container to minimise noise/vibration. Engines to be switched off when not in use. Loading plant/machinery will only be operated at ground level, i.e. never on stockpiles. All those working on and visiting the site to be made aware of need for considerate driving and keeping vehicles well maintained. The complaints procedure will be rigorously enforced should a third-party complaint be received from a public or private source.
Vermin causing leptospirosis and other respiratory diseases	Poor housekeeping Staff negligence leading to acceptance of unauthorised waste giving rise to pests Storing waste for excessive time periods	Water, direct contact with waste	Site personnel/ visitors Surrounding site users/occupiers Workers on adjacent sites Residential receptors	A to C	Mi to Mo	4	Near zero	Wear PPE - gloves and masks as appropriate Site inspections daily for the presence of any pests/vermin or excrement. Any waste which is rejected will be stored in a quarantine skip/bin with and removed from the site the by the end of the working day. The location of this skip may vary as operating conditions permit (i.e. to permit the loading of rejected wastes but clear labelling and management control will ensure its use as specified). Strict waste acceptance procedures at the site reducing the likelihood of non-conforming wastes being accepted. All maintenance/housekeeping are listed on daily record/inspection forms. The inspection form will be completed by a person who is familiar with the requirements of the EMS and EP for the site. All details of defects, problems and repairs carried out will be recorded on the form on the day that each event occurs. Detailed comments may also be recorded in a site diary. All repairs will be carried out as soon as practically possible. Pest controller called in the event of pests being present at the site or complaints received from receptors.

Hazard / Potential Contaminant or Situation	Source(s)	Pathway	Receptor(s)	Consequences	Effect	Probability	Assessment Outcome	Remedial Action/ Recommendations/ Comments
Fire/ smoke / particulates	Plant failure Unauthorised waste causing reaction Arson Staff negligence Additional waste types being accepted Minor increase in storage volumes of certain wastes	Air, direct contact	As above	A to F	Mi to S	3	Low	The site will have Fire Prevention & Mitigation Plan in place which covers all potential fire risks and what to do in an incident. No burning of waste at the site. The site is fully secure. All staff are fully trained for recognition of early fire signs and trained to prevent negligence. Fire-fighting equipment on site including water and extinguishers. All wastes in stored in containers apart from bulky items.
Vehicle collision/ accidents including impacts and injury	Poor visibility Spillages of oils/fluids causing vehicles to skid Lack of PPE worn by staff Staff negligence i.e. mobile plant operators Excessive waste storage causing collapse of stored materials / falling materials and reducing accessibility around the site Increased annual waste acceptance	Direct contact	Site personnel / visitors Vehicle users Pedestrians	A to F	Mi to S	3	Low	All maintenance/housekeeping are listed on daily record/inspection forms. The inspection form will be completed by a person who is familiar with the requirements of the EMS and EP for the site. All details of defects, problems and repairs carried out will be recorded on the form on the day that each event occurs. Detailed comments may also be recorded in a site diary. All repairs will be carried out as soon as practically possible. All repairs to site security will take place as soon as practically possible and the site will be made secure until the repair has been carried out. Any major defects found during the daily site inspection will be repaired as soon as practically possible. Vehicles will be visually inspected before exit to check that loads are safe and that no mud is carried up the access track which could spill off site from the wheels or bodies of HGVs. Visual inspections of the vehicle running surfaces at the site will also be carried out daily and staff will report any problems with mud or debris on the site roads immediately to the site manager. An accident logbook is kept in the site office so all new and existing staff members can review previous accidents. Encouragement for staff for greater number of “accident-free days” to encourage a safer working environment. All new and existing site staff are subject to a specific training regime based on their responsibilities to ensure all operations are

Hazard / Potential Contaminant or Situation	Source(s)	Pathway	Receptor(s)	Consequences	Effect	Probability	Assessment Outcome	Remedial Action/ Recommendations/ Comments
								carried out without harm to the environment or amenity of the surrounding area. Training in all aspects of the site and waste operations at the site with regard to the individual responsibilities of the site staff will help to prevent incidents occurring which may have an adverse impact on the environment and/or the employees and their co-workers. Appropriate signage throughout the site. The operator has trained staff who control vehicle movements throughout the site. Vehicle movements on site restricted to 5mph. Dedicated staff & visitor parking areas as shown on Drawing No. BRC/3313/03.
Leachate	Poor housekeeping Staff negligence leading to acceptance of unauthorised waste giving rise to leachate Stored wastes Cracks in concrete surfaces Defects in to the drainage system	Ground	See dust receptors	E, F	Mi to S	3	Low	All maintenance/housekeeping are listed on daily record/inspection forms. The inspection form will be completed by a person who is familiar with the requirements of the EMS and EP for the site. All details of defects, problems and repairs carried out will be recorded on the form on the day that each event occurs. Detailed comments may also be recorded in a site diary. All repairs will be carried out as soon as practically possible. All employees are given induction training and subsequent regular training to identify those waste types which are permitted for acceptance at the site under the site's EP and those wastes which are not. This will include specific training to identify those common wastes which may be found following deposit and are not permitted at the site and will also include more obscure wastes and how to handle these wastes safely. All employees are advised that they should refer any unrecognisable or unknown wastes to senior management, who should, in turn, follow procedures outlined in the EMS and/or contact NRW to agree a suitable method for removal Regular (minimum daily) checks of site surface infrastructure (as above). Any spillages identified will be dealt with in accordance with the spillage procedures.

Hazard / Potential Contaminant or Situation	Source(s)	Pathway	Receptor(s)	Consequences	Effect	Probability	Assessment Outcome	Remedial Action/ Recommendations/ Comments
								Dedicated mobile quarantine skip for intercepted leachable wastes found during initial inspections ensuring isolation and quick removal off site. The skip may be positioned in various positions of the site depending how operations permit. All waste storage will be undertaken on an impermeable concrete surface with sealed surfaces. The site is installing new and improved drainage at the site to eliminate the possibility of any contaminated water escaping the site. The increase in permitted area will result in installing new areas of concrete with dedicated sealed drainage and will only be used for the storage static compactors which are moving slightly west of their current location, storge of the empty skips in the south-west corner and storage of skips containing waste i.e. overflow storage area in the event full skips cannot be removed from site due to a breakdown, driver shortage or closure of destination site The empty skip storage area will drain to a soakaway as there would be no contamination arising from any rain water and in terms of concreted areas storing waste, all concreted will be engineered to fall towards the entrance of the site using suitable drainage channels, into the interceptor which has a shut off then into the surface water sewer system. As all waste on site will be stored in containers, the risk of contamination of surface water is considered to be very low. The current site drainage system is understood to be draining to the surface water sewer and not resulted in any pollution incidents previously. The improvement of the drainage infrastructure will ensure the risk of pollution to surface waters is further minimised. The interceptor is checked weekly or daily during periods of heavy rainfall (three days continuous) and also alarmed when 80% full to ensure it can be emptied in good time to prevent overfilling. Daily inspections take place for any defects to surface areas and the drainage system.

Hydrocarbons including release of gases/fumes/ vapours/ volatiles	Spills from fuel tanks Drips when refueling During delivery Leakage from stored drums Fixed and mobile plant malfunction Mixing of waste/ chemicals Spillage of chemicals Overturned vehicle plant/plant failure Reaction between stored wastes Additional storage of skips of larger areas of concrete draining to the surface water sewer system	Ground - direct contact, ingestion Inhalation (of volatiles)	See dust receptors	A, B, D, E, F	Mi to S	3	Low	Fuel and other hazardous fluids stored in dedicated bunded tanks. Where plant is operated, spill kits will be available to ensure that fuel spillages are cleared. Spill kits kept close to source(s) of hazards as shown on Drawing No. BRC/3313/03. All repairs to site security will take place as soon as practically possible and the site will be made secure until the repair has been carried out. Any major defects found during the daily site inspection will be repaired as soon as practically possible. Vehicles will be visually inspected before exit to check that loads are safe and that no mud is carried up the access track which could spill off site from the wheels or bodies of HGVs. Visual inspections of the vehicle running surfaces at the site will also be carried out daily and staff will report any problems with mud or debris on the site roads immediately to the site manager. If any oil and vehicle maintenance chemicals are kept on site, they will be stored securely. In the event of a spillage a spill containment kit (absorbent pads, booms or granules) will be used to prevent further spillage and the contaminated absorbents placed in a skip for disposal to a suitably permitted facility. Any wastes which would be classified as having the potential to cause polluting runoff will be stored within a concrete area. All site surfaces will be inspected daily for the presence of spillages when the site is in operation. Debris will be swept as required and placed in a skip for further processing on site and sent to a suitably permitted site. All wastes liable to give rise to contamination will be removed from the site within an agreed timescale with NRW. Dedicated mobile quarantine skip for intercepted if wastes found during initial inspections ensuring isolation and quick removal off site. The skip may be positioned in various positions of the site depending how operations permit. Very little potential for hydrocarbons to be released from site given the wastes accepted and stored. Ensure all waste storage areas are stored as per the waste storage table and locations shown on Drawing No. BRC/3313/03 to reduce

								the risk reactions of stored waste, fire and collisions between plant causing release of fumes. Any gas stored is done so in cages. All waste storage will be undertaken on an impermeable concrete surface with sealed surfaces. The site is installing new and improved drainage at the site to eliminate the possibility of any contaminated water escaping the site. The increase in permitted area will result in installing new areas of concrete with dedicated sealed drainage and will only be used for the storage static compactors which are moving slightly west of their current location, storge of the empty skips in the south-west corner and storage of skips containing waste i.e. overflow storage area in the event full skips cannot be removed from site due to a breakdown, driver shortage or closure of destination site The empty skip storage area will drain to a soakaway as there would be no contamination arising from any rain water and in terms of concreted areas storing waste, all concreted will be engineered to fall towards the entrance of the site using suitable drainage channels, into the interceptor which has a shut off then into the surface water sewer system. As all waste on site will be stored in containers, the risk of contamination of surface water is considered to be very low. The current site drainage system is understood to be draining to the surface water sewer and not resulted in any pollution incidents previously. The improvement of the drainage infrastructure will ensure the risk of pollution to surface waters is further minimised. The interceptor is checked weekly or daily during periods of heavy rainfall (three days continuous) and also alarmed when 80% full to ensure it can be emptied in good time to prevent overfilling. Daily inspections take place for any defects to surface areas and the drainage system.

Appendix II

SITE LAYOUT PLAN & RECEPTOR PLAN

WASTE STORAGE AREA DETAILS

Plan Ref	Description	Storage form / containment	Max Length / Width (m)	Height (m)	Approx. Area (m2)	Conversion factor used	Volume (m3)	Max Duration of storage	Comments
AREAS 1 & 2, 5 & 6	Waste storage skips for customer deposits (non-hazardous)	Mixture of 10 - 40-cubic yard roll on roll off open topped sealed skip / no containment required	6.1	2.62	14.884	1	40.00	<12 weeks	Area based on one skips, container emptied sooner if full and replenished with empty container. The contents in each skip may vary throughout the lifetime of the permit.
AREA 3	Storage area for fridges	Free-standing / fire wall to the north-west	6	5	30	1	30.00	<4 weeks	Fridges removed from area when full
AREA 4	Smaller waste storage skips/areas for non-hazardous potentially hazardous wastes	1-cubic yard - 4-cubic yard skips/bins / freestanding / fire wall to the north-west	3.7	1.86	6.882	1	6.88	<4 weeks	See AREA 1 comments
AREA 7	Sealed waste storage compactors	Sealed containers	10.6	2	21.2	1	21.20	<4 weeks	Containers emptied sooner when full
AREA 8	Temporary overflow storage area for skips and also empty skip storage	Mixture of 10 - 40-cubic yard roll on roll off open topped sealed skip / no containment required	6.1	2.62	14.884	1	40.00	<12 weeks	See AREA 1 comments

1350mm manhole installed upstream with penstock to reduce flows
Existing connection to surface water drain
Out-of-hours mobile plant storage
INITIATE PENSTOCK IN FIRE OR OTHER EMERGENCY INCIDENT
INT
2.4m high palisade fencing with 0.15m high kerb below
Staff/visitor parking
Reuse building
Site office & welfare
2.4m high palisade fencing with 0.15m kerb below
150mm solid carrier pipes taking grey water
Channel drainage to minimize risk of surface water getting into highway drainage
Birco 200 linear drainage channels preventing surface water escaping from site
Site access (2.5m high lockable steel gates)
Visitor parking
Birco 200 linear drainage channels outfalling into 150mm carrier pipe
2.4m high palisade fencing
Site egress (2.5m high lockable steel gates)
0.6m high concrete block wall
20m long, 0.16m high fire water boom deployment in fire event
2.4m high palisade fencing
AREA 2 - Waste storage skips (contents may vary)
Earth bund
AREA 1 - Waste storage skips (contents may vary)
Birco 200 linear drainage channels outfalling into 150mm carrier pipe
french drain 150mm, 400mm to invert at shallow end. drain laid at 1in100
AREA 7 - Waste storage compactors
AREA 3 - Fridge storage area
0.1m high lip to seal concrete pad
2.0m high post & wire fencing
AREA 8 - Temporary overflow storage area for various skips and also empty skip storage
AREA 4 - Small waste skips storage area including free-standing areas for wastes (contents may vary)
250m² landscaped area acting as SUDS feature for surface water run off
AREA 6 - Waste storage skips (contents may vary)
200mm thick c35 concrete slab for bin storage. Ground naturally falling to the north so surface water caught by french drain and discharged into interceptor.
AREA 5 - Waste storage skips (contents may vary)
15m² / 40m³ quarantine area
6m
Landscaped area
2.0m high post & wire fencing
0.6m high concrete block wall
Non-waste gas cylinder / aerosol storage
Non-waste gas cylinder / aerosol storage
Clean stone soakaway wrapped in terram, 10mL x 2mW x 2mD
Storage area for empty skips
150mm heavy duty ACO drain to take clean surface water from concreted storage areas
Earth bund
Landscaped area acting as SUDS feature for surface water run off
2.0m high post & wire fencing

Mountain Rescue Hut

NOTES

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Exact locations of skips may vary throughput the lifetime of the permit given type of site.

REVISION HISTORY

Rev:	Date:	Init:	Description:
-	26.10.23	CP	Initial drawing
A	08.11.23	CP	Layout amendment

KEY:

- Permit boundary
- Storage areas
- Hazardous waste storage areas
- Non-waste storage area
- Building
- Concrete area
- Stone surfacing
- Non-waste oils/fluids storage
- Landscaped area
- Landscaped area (acting as SUDS feature)
- Heavy duty aco drain (clean stone soakaway wrapped in terram)
- Vehicle unload area
- Other buildings (offices etc.)
- Quarantine area
- Spill kit
- Fire fighting equipment (extinguishers etc.)
- Fire alarm
- Plant shut off
- Firewater containment location
- Staff PPE equipment
- Access routes for emergency vehicles
- Designated smoking area
- Foul drainage
- Surface water drainage
- Surface water drainage fall direction
- Surface water ACO / birco drainage channels
- French drains
- Manholes
- Interceptor
- Surface gully
- CCTV camera locations (indicative location)
- Emergency services box

Scale Bar (1:200)
0 m 2 4 6 8 10 m

Oaktree Environmental Ltd
Waste, Planning and Environmental Consultants

DRAWING TITLE
SITE LAYOUT & FIRE PLAN

CLIENT
Sundorne Products (Llanidloes) Limited

PROJECT/SITE
Ffrwdgrech Industrial Estate, Ffrwdgrech Road, Brecon LD3 8LA

SCALE @ A1	CLIENT NO	JOB NO
1:200	3313	001

DRAWING NUMBER	REV	STATUS
BRC/3313/03	A	Issued

DRAWN BY	CHECKED	DATE
JH/CP	CP	08.11.23

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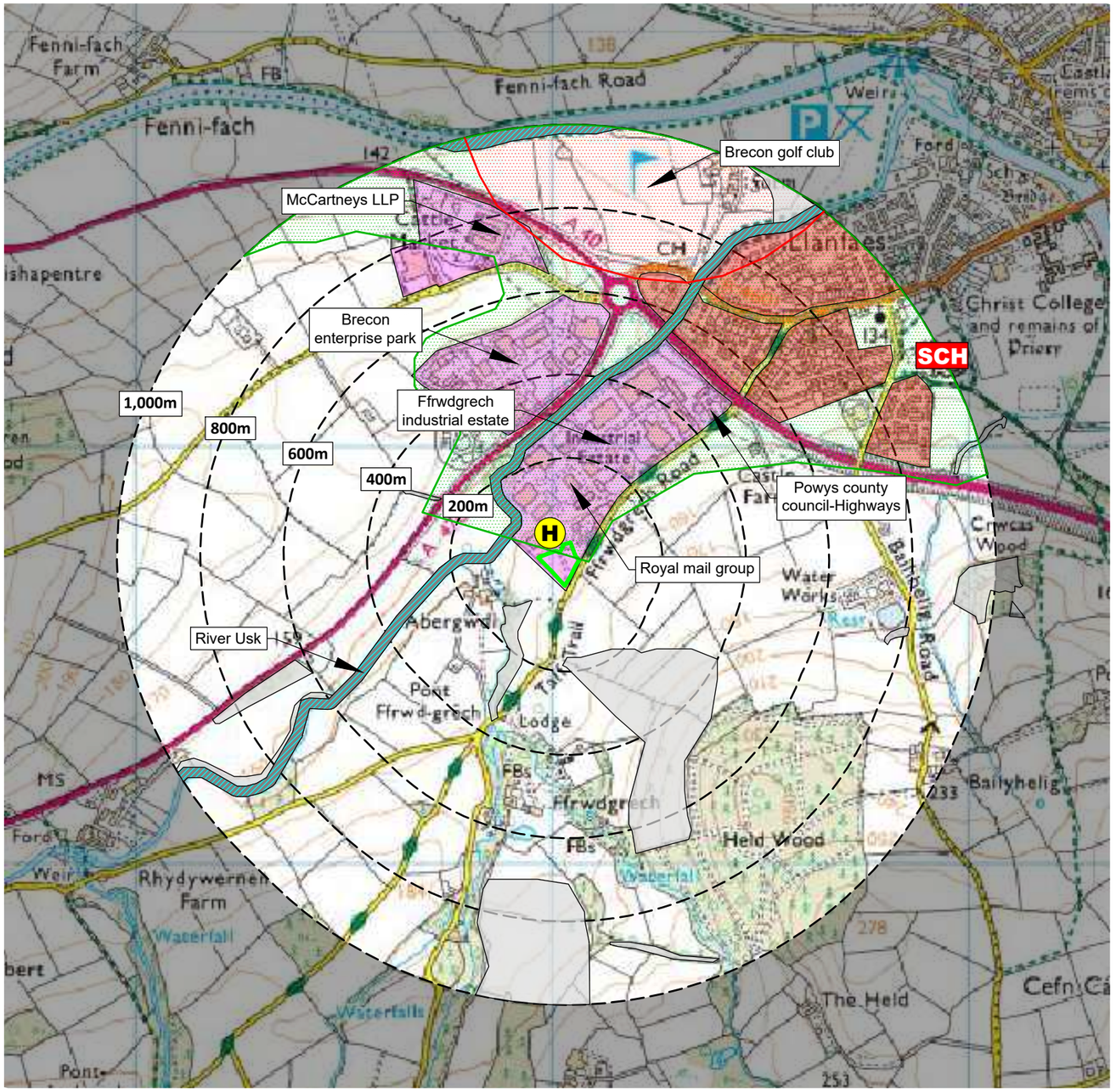
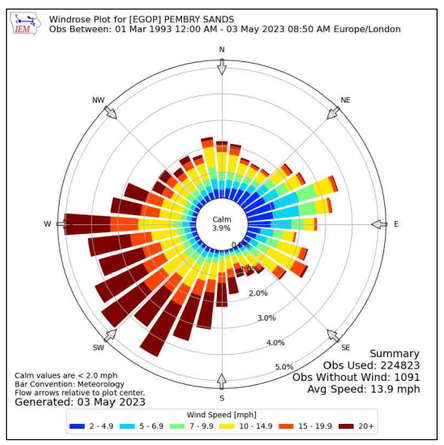
KEY:

- Permit boundary
- Main River
- Surface water body (river / stream / pond / pool / lake)
- Workplaces (includes agriculture industry, commerce and retail)
- Areas with mix of residential, retail and commercial properties
- Residential blocks
- Class A, B, C roads
- Nearest fire hydrant
- Railway line
- School
- Woodland areas
- River Usk - Sites of special scientific interest & Special area of conservation
- Source protection zones
- Broad habitat combined BAP habitats





Compass Wind Rose for Pembry Sands (EGOP)
Period 1993-2023
- source: Iowa State University

NOTES

1. Boundaries are shown indicatively.
2. Wind rose data shows the prevailing wind direction to be Southerly.

REVISION HISTORY

Rev:	Date:	Init:	Description:
-	26.10.23	JH	Initial drawing
A	08.11.23	JH/CP	Updated references

Oaktree Environmental Ltd
Waste, Planning and Environmental Consultants

DRAWING TITLE
RECEPTOR PLAN

CLIENT
Sundorne Products (Llanidloes) Limited

PROJECT/SITE
Ffrwdgrech Industrial Estate, Ffrwdgrech Road, Brecon, LD3 8LA

SCALE @ A3	CLIENT NO	JOB NO
1:12,500	3313	001

DRAWING NUMBER	REV	STATUS
BRC/3313/04	A	Issued

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JH	CP	08.11.23

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