Headquarters, P.O. Box 3000, Johnstown Castle Estate County Wexford, Ireland

# WASTE LICENCE PROPOSED DECISION

Waste Licence 131-1

**Register Number:** 

Applicant: Midland Waste Disposal Company

Limited

Location of Facility: Clonmagaddan, Proudstown, Navan, Co.

1 of 29

Meath

# **Table of Contents**

	Page No.
REASONS FOR THE DECISION	1
PART I: ACTIVITIES LICENSED	1
INTERPRETATION	3
PART II: CONDITIONS	6
CONDITION 1 SCOPE	6
CONDITION 2 MANAGEMENT OF THE ACTIVITY	7
CONDITION 3 NOTIFICATION AND RECORD KEEPING	8
CONDITION 4 SITE INFRASTRUCTURE	11
CONDITION 5 WASTE ACCEPTANCE AND HANDLING	16
CONDITION 6 ENVIRONMENTAL NUISANCES	17
CONDITION 7 EMISSIONS AND ENVIRONMENTAL IMPACTS	18
CONDITION 8 RESTORATION AND AFTERCARE	19
CONDITION 9 ENVIRONMENTAL MONITORING	19
CONDITION 10 CONTINGENCY ARRANGEMENTS	20
CONDITION 11 CHARGES AND FINANCIAL PROVISIONS	22
SCHEDULE A: Content of the Environmental Management Programme	23
SCHEDULE B: Content of the Annual Environmental Report	24
SCHEDULE C: Recording and Reporting to the Agency	25
SCHEDULE D: Specified Engineering Works	26
SCHEDULE E: Monitoring	26
SCHEDULE F: Emission Limits	28

### Reasons for the Decision

The Agency is satisfied, on the basis of the information available, that subject to compliance with the conditions of this licence any emissions from the activity will comply with and not contravene any of the requirements of Section 40(4) of the Waste Management Act, 1996.

In reaching this decision the Agency has considered the application and supporting documentation received from the applicant, all submissions received from other parties and the report of its inspector.

## Part I: Activities Licensed

In pursuance of the powers conferred on it by the Waste Management Act, 1996, the Environmental Protection Agency (the Agency) proposes, under Section 40(1) of the said Act to grant this Waste Licence to Midland Waste Disposal Company Limited to carry on the waste activities listed below at Clonmagaddan, Proudstown, Navan, Co. Meath subject to eleven conditions, with the reasons therefor and the associated schedules attached thereto set out in the licence.

Licensed waste disposal activities, in accordance with the Third Schedule of the Waste Management Act. 1996

Class 11. Blending or mixture prior to submission to any activity referred to in a preceding paragraph of this Schedule.

This activity is limited to the mixture of waste from different sources prior to eventual disposal at an appropriate alternative facility.

Class 12. Repackaging prior to submission to any activity referred to in a preceding paragraph of in this Schedule.

This activity is limited to the repackaging of waste deemed unsuitable for recovery, and includes the transfer of waste into compactors and the compaction of such waste, prior to disposal at an appropriate alternative facility.

Class 13. Storage prior to submission to any activity referred to in a preceding paragraph of this Schedule, other than temporary storage, pending collection, on the premises where the waste concerned is produced.

This activity is limited to the temporary storage of waste prior to removal off-site for disposal at an appropriate alternative facility.

Licensed waste recovery activities, in accordance with the Fourth Schedule of the Waste Management Act, 1996

Class 2. Recycling or reclamation of organic substances which are not used as solvents (including composting and other biological transformation processes).

This activity is limited to the receipt, holding, collection, segregation and repackaging of cardboard, paper and timber. Composting of suitable organic wastes may be performed at the facility subject to the prior agreement of the Agency.

#### Class 3. Recycling or reclamation of metals and metal compounds.

This activity is limited to the receipt, holding, collection and segregation of metal found within waste accepted at the facility.

#### Class 4. Recycling or reclamation of other inorganic materials.

This activity is limited to the receipt, holding, collection and segregation of construction and demolition waste and, subject to the prior agreement of the Agency, the receipt, holding and recovery of glass.

# Class 12. Exchange of waste for submission to any activity referred to in a preceding paragraph of this Schedule.

This activity is limited to the exchange of waste to an appropriate alternative facility for submission to one of the waste recovery activity classes above.

# Class 13. Storage of waste intended for submission to any activity referred to in a preceding paragraph of this Schedule, other than temporary storage, pending collection, on the premises where such waste is produced.

This activity is limited to the temporary storage of waste prior to submission to one of the waste recovery activity classes above, and to the temporary storage of waste prior to removal off-site for reuse or recycling.

## INTERPRETATION

Act The Waste Management Act, 1996 (No. 10 of 1996).

**Adequate lighting** 20 lux measured at ground level.

**Agency** Environmental Protection Agency.

**Agreement** Agreement in writing.

Attachment Any reference to Attachments in this licence refers to attachments

submitted as part of the waste licence application.

**Application** The application by the licensee for this waste licence, including any

other material submitted to the Agency in writing by the licensee between the date of the application and the date of grant of this

licence.

**Annually** All or part of a period of twelve consecutive months.

Appropriate facility

A waste management facility, duly authorised under relevant law and

technically suitable.

BATNEEC Best Available Technology Not Entailing Excessive Cost as defined in

section 5 (2) of the Act.

Biodegradable

waste

Any waste that is capable of undergoing anaerobic or aerobic decomposition, such as food and garden waste, and paper and

paperboard.

**Bund** A structure to provide containment for any loss of liquid from a storage

tank and associated pipework. The Agency's Landfill Design Manual

(draft) sets forth design criteria.

Commercial waste As defined in Section 5 (1) of the Act.

**Condition** A condition of this licence. In any case where this licence refers to a

numbered condition, the reference shall be taken to mean the condition and any sub-condition therein which the context of the

reference requires that reference is made to.

Containment

boom

A boom which can contain spillages and prevent these from entering

drains or watercourses.

**Daily** Consecutive 24 hour periods.

Day A period from 0.00 hours to 2400 hours.

**Daytime** 08:00 to 22:00.

**Documentation** Any report, record, result, data, drawing, proposal, interpretation or

other document in written or electronic form which is required by this

licence.

**Drawing** Any reference to a drawing or drawing number means a drawing or

drawing number contained in the application, unless otherwise

specified in this licence.

**Emission** As defined in Section 5 (1) of the Act.

**Emission Limit** Value

Those limits, including concentration limits and deposition levels

established in Schedule F.

Environmental Pollution

As defined in Section 5 (1) of the Act.

European Waste Catalogue (EWC)

The EWC is a harmonised, non-exhaustive list of wastes drawn up by the European Commission and published as Commission Decision 94/3/EC and any subsequent amendment published in the Official

Journal of the European Community.

**Facility** That area or areas defined under Condition 1.2.

**Green waste** Waste wood, plant matter and other vegetation.

Hazardous Waste As defined in Section 4 (2) of the Act.

Household Waste As defined in Section 5 (1) of the Act.

**Incident** Any reference to an incident in this licence means an incident as

defined in Condition 3.1.

**Industrial waste** As defined in Section 5 (1) of the Act.

Inert waste Waste that does not undergo any 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 likely to give rise to environmental pollution or harm human health. The total leachability and pollutant content of the waste and the ecotoxicity of the leachate must be insignificant, and in particular not endanger the quality of

surface water and/or groundwater.

**Instruction** Instruction in writing.

**Licence** A Waste Licence issued in accordance with the Act.

Licensee Midland Waste Disposal Company Limited

List I/II Organics Substances classified pursuant to EC Directives 76/464/EEC and

80/68/EEC.

Maintain Keep in a fit state, including such regular inspection, servicing and

repair as may be necessary to adequately perform its function.

**Monthly** At least 12 times per year, at approximately monthly intervals.

**Municipal Waste** Municipal waste as defined in Section 5 (1) of the Act.

**Night-time** 22:00 to 08:00.

Noise Sensitive Location (NSL)

Any dwelling house, hotel or hostel, health building, educational establishment, place of worship or entertainment, or any other facility or area of high amenity which for its proper enjoyment requires the

absence of noise at nuisance levels.

Non-hazardous Waste is any waste, which is not a hazardous waste

waste as defined in the Act.

Oil Separator Device installed according to the draft European Standard prEN 858

(Installations for the separation of light liquids, eg. oil and petrol).

Putrescible waste Waste which is readily biodegradable such as vegetable matter, green

waste, etc.

Quarterly A period of three calendar months, the first period of which

commences on the date of grant of this licence.

**Recovery** As defined in Section 4 (4) of the Act.

Sample(s) Unless the context of this licence indicates to the contrary, samples

shall include measurements by electronic instruments.

Sanitary Authority Meath County Council.

**Sludge** The accumulation of solids resulting from chemical coagulation,

flocculation and/or sedimentation after water or wastewater treatment

with between 2% and 14% dry matter.

Specified Emissions Those emissions listed in Schedule F: Emission Limits of this licence.

Specified Engineering Works Those engineering works listed in Schedule D: Specified Engineering

Works of this licence.

Submit Unless the context of this licence indicates otherwise, submit to the

Agency in writing for agreement.

**Trigger Level** A parameter value which when achieved or exceeded requires certain

actions to be taken.

Waste As defined in Section 4(1) of the Act.

Waste disposal activity

Includes the activities referred to in Section 4 of the Act and listed in

the Third Schedule thereto.

Waste recovery activity

Includes the activities referred to in Section 4 of the Act and listed in

the Fourth Schedule thereto.

**Weekly** During all weeks of plant operation, and in the case of emissions, when

emissions are taking place; with no more than one measurement in

any one week.

Working Day 08:00 to 20:00 Monday to Saturday.

### Part II: CONDITIONS

#### CONDITION 1 SCOPE

- 1.1. Waste activities at the facility shall be restricted to those listed and described in *Part I:* Activities Licensed and required by this licence.
- 1.2. Waste activities shall be restricted to the area of land outlined in red on Drawing No. B2.1 "Site Plan" of the application. Any reference in this licence to "facility" shall mean the area thus outlined in red.
- 1.3. Every plan, programme or proposal submitted to the Agency for agreement pursuant to any condition of this licence shall include a proposed timescale for its implementation. The Agency may modify or alter any such plan, programme or proposal in so far as it considers such modification or alteration to be necessary. Every plan, programme or proposal shall be carried out within the timescale fixed by the Agency but shall not be undertaken without the agreement of the Agency.
- 1.4. This licence is for the purposes of waste licensing under the Waste Management Act 1996 only and nothing in this licence shall be construed as negating the licensee's statutory obligations or requirements under any other enactments or regulations.
- 1.5. Where the Agency considers that a non-compliance with the Conditions of this licence has occurred, it may serve a notice on the licensee specifying:
  - a) that only those wastes as specified, if any, in the notice are to be accepted at the facility after the date set down in the notice;
  - b) that the licensee shall undertake the works stipulated in the notice, and/or otherwise comply with the requirements of the notice as set down therein, within the time-scale contained in the notice; and,
  - c) that the licensee shall carry out any other requirement specified in the notice.

When the notice has been complied with, the licensee shall provide written confirmation that the requirements of the notice have been carried out. No waste, other than that which is stipulated in the notice, shall be accepted at the facility until written confirmation is received from the Agency that the notice is withdrawn.

**Reason:** To clarify the scope of this licence.

#### CONDITION 2 MANAGEMENT OF THE ACTIVITY

#### 2.1 Environmental Management System

- 2.1.1 The licensee shall within eighteen months from the date of grant of this licence, submit to the Agency for its agreement a proposal for a documented Environmental Management System (EMS) for the facility. Following the agreement of the Agency, the licensee shall establish and maintain such a system. The EMS shall be updated on an annual basis with amendments being submitted to the Agency for agreement.
- 2.1.2 The EMS shall include as a minimum those elements specified in the Conditions 2.2 to 2.7 below:

#### 2.2 Schedule of Environmental Objectives and Targets

- 2.2.1 The licensee shall, within twelve months from the date of grant of this licence, submit to the Agency for its agreement a Schedule of Objectives and Targets. The objectives should be specific and the targets measurable.
- 2.2.2 The Schedule shall address a five year period as a minimum and shall be reviewed and submitted annually to the Agency for its agreement.

#### 2.3 Environmental Management Programme

- 2.3.1 The licensee shall, within twelve months from the date of grant of this licence, submit to the Agency for its agreement an Environmental Management Programme (EMP). The EMP shall include a time-scale for achieving the Schedule of Objectives and Targets and shall comply with any other guidance issued by the Agency.
- 2.3.2 The EMP shall include, as a minimum, the information specified in *Schedule A:*Content of the Environmental Management Programme. The EMP shall be reviewed and submitted to the Agency for its agreement annually.

#### 2.4 Corrective Action

2.4.1 Within six months of the date of grant of this licence, the licensee shall establish and maintain written Corrective Action Procedures to ensure that corrective action is taken should specified requirements to this licence not be fulfilled.

#### 2.5 Awareness and Training

2.5.1 Within six months of the date of grant of this licence, the licensee shall establish and maintain Awareness and Training Procedures for identifying training needs and for providing appropriate training, for personnel whose work is related to the licensed facility. Written records of training shall be maintained.

#### 2.6 Management Structure

2.6.1 Within three months from the date of grant of this licence, the licensee shall submit written details of the management structure of the facility for the agreement of the Agency. Any proposed changes in the management structure shall be submitted in writing to the Agency for its agreement. Written details of the management structure shall include the following information:

- a) the names of all persons who are to provide the management and supervision of the waste activities authorised by the licence;
- b) details of the responsibilities for each individual named under a) above;
- c) details of the relevant experience, competence and qualifications held by each of the persons nominated under a) above; and
- d) contingency arrangements for the absences of the named persons from the facility.

#### 2.7 Communications

2.7.1 Within twelve months from the date of grant of this licence, the licensee shall submit for agreement to the Agency a Communications Programme to ensure that members of the public can obtain information concerning the environmental performance of the facility at all reasonable times.

#### 2.8 Annual Environmental Report

- 2.8.1 The licensee shall submit to the Agency for its agreement, within thirteen months from the date of grant of this licence, and within one month of the end of the year thereafter, an Annual Environmental Report (AER).
- 2.8.2 The AER shall include as a minimum the information specified in *Schedule B:*Content of the Annual Environmental Report and shall be prepared in accordance with any relevant written guidance issued by the Agency.
- 2.9 The licensee shall employ a suitably qualified and experienced facility manager who shall be designated as the person in charge. The facility manager or a suitably qualified and experienced deputy shall be present at all times during the operation of the facility.
- 2.10 The licensee shall ensure that personnel performing specifically assigned tasks shall be qualified on the basis of appropriate education, training and/or experience, as required and shall be aware of the requirements of this licence.

Reason:

To make provision for management of the activity on a planned basis having regard to the desirability of ongoing assessment, recording and reporting of matters affecting the environment.

# CONDITION 3 NOTIFICATION AND RECORD KEEPING

- 3.1 The licensee shall make written records of the following incidents:
  - a) any nuisance caused by the activity;
  - any emission which results in the contravention of any relevant standard, including any standard for an environmental medium, or any relevant emission limit value, prescribed under any relevant enactment;
  - c) any emission which does not comply with the requirements of this licence;
  - d) any trigger level specified in this licence which is attained or exceeded;
  - e) any indication that environmental pollution has, or may have, taken place;

- f) any occurrence with the potential for environmental pollution; and,
- g) any emergency.
- 3.2 The written record shall include all aspects described in Condition 10.7(a-e).
- 3.3 Unless otherwise instructed in writing by the Agency, the licensee shall:
  - a) notify the Agency as soon as practicable and in any case not later than 10.00 a.m. the following working day after the occurrence of any incident; and
  - b) submit the written record required by this condition to the Agency as soon as practicable and in any case within five working days after the occurrence of any incident.
- 3.4 Should any further actions be taken after the date of written notification, as a result of an incident occurring, the licensee shall forward a written report of those actions to the Agency as soon as practicable and no later than ten days after the initiation of those actions.
- 3.5 Unless otherwise instructed by the Agency, all documentation submitted to the Agency shall:
  - (a) be sent to the Agency's headquarters;
  - (b) comprise one original and three copies;
  - (c) be formatted in accordance with any written instruction or guidance issued by the Agency;
  - (d) include whatever information as is specified in writing by the Agency;
  - (e) be identified by a unique code, indicate any modification or amendment, and be correctly dated to reflect any such modification or amendment;
  - (f) be submitted in accordance to the relevant reporting frequencies specified by this licence; and
  - (g) in the case of results of any environmental monitoring, be accompanied by a written interpretation setting out their significance.
- 3.6 Copies of all environmental monitoring data obtained by the licensee which relates to the facility shall be forwarded to the Agency at the frequencies set out in *Schedule C:* Recording and Reporting to the Agency of this licence.
- 3.7 Unless otherwise instructed by the Agency, all documentation and records required to be made under this licence, shall be retained by the licensee.
- 3.8 The licensee shall provide additional copies of any documentation and records referred to in this licence to the Agency upon written request, within the time specified in writing by the Agency.
- 3.9 The licensee shall keep the following documents at the facility office referred to in Condition 4.5:
  - a) the current waste licence relating to the facility;
  - b) the current EMS for the facility;
  - c) the previous year's AER for the facility; and

- d) all written procedures produced by the licensee which relate to the licensed activities.
- 3.10 The licensee shall maintain a written record, or a record in a format to be agreed with the Agency, for each load of waste arriving at and departing from the facility. The licensee shall record the following:
  - a) the time and date of arrival or departure;
  - b) the name of the carrier;
  - c) the vehicle registration number;
  - d) the name of the producer(s)/collector(s) of the waste as appropriate;
  - e) a description of the waste;
  - f) the quantity of the waste accepted at the facility, recorded in tonnes;
  - g) the name of the person checking the load;
  - h) where loads or wastes are removed or rejected, details of the date of occurrence, the types of waste and the facility to which they were removed;
  - i) the quantity of waste leaving the facility, recorded in tonnes;
  - j) the destination of the load; and
  - k) any other information which might be required from time to time subject to prior agreement with the Agency.
- 3.11 The licensee shall maintain a written record of the type and quantity, recorded in tonnes, of all waste recovered at the facility or removed from the facility for disposal.
- 3.12 A written record shall be kept of each consignment of foul water removed from the facility. The record shall include the following:
  - a) the name of the carrier;
  - b) the date and time of removal of foul water from the facility:
  - c) the volume of foul water, in cubic metres, removed from the facility on each occasion;
  - d) the name and address of the Waste Water Treatment Plant to which the foul water was transported; and
  - e) any incidents or spillages of foul water during its removal or transportation.
- 3.13 The licensee shall maintain a written record of all complaints relating to the operation of the activity. Each such record shall give details of the following:
  - a) date and time of the complaint;
  - b) the name of the complainant;
  - c) details of the nature of the complaint;
  - d) actions taken on foot of the complaint and the results of such actions; and
  - e) the response made to each complainant.

**Reason :** To provide for the notification of incidents, to update information on the activity and to provide for the keeping of records.

#### CONDITION 4 SITE INFRASTRUCTURE

4.1 The licensee shall establish all infrastructure referred to in this licence prior to the commencement of the licensed activities or as instructed by the Agency.

#### 4.2 Site Notice Board

- 4.2.1 Within three months of the date of grant of this licence the licensee shall provide and maintain a Site Notice Board on the facility so that it is legible to persons outside the main entrance to the facility. The minimum dimensions of the identification board shall be 1200 mm by 750 mm.
- 4.2.2 The board shall clearly show:
  - a) the name and telephone number of the facility;
  - b) the normal hours of opening;
  - c) the name, address and telephone number of the licence holder;
  - d) an emergency out of hours contact telephone number;
  - e) the name, address and telephone number of the operator of the facility;
  - f) the licence reference number;
  - g) where and when environmental monitoring information relating to the facility can be obtained.

#### 4.3 Site Security

- 4.3.1 Security and stockproof fencing shall be installed and maintained as described in Response 1 of further information submitted to the Agency on 10 August 2000. The base of the fencing shall be set in the ground.
- 4.3.2 Within six months of the date of grant of this licence the licensee shall provide and maintain security gates at the weighbridge entrance and the general entrance.
- 4.3.3 The licensee shall remedy any defect in the gates and/or fencing as follows:
  - a) a temporary repair shall be made by the end of the working day; and,
  - b) a repair to the standard of the original gates and/or fencing shall be undertaken within three working days or as otherwise agreed with the Agency.
- 4.3.4 Gates shall be locked shut when the facility is unsupervised.

#### 4.4 Site Hardstanding

- 4.4.1 The licensee shall provide and maintain an impermeable hardstanding surface in all areas of the facility where waste handling or storage and vehicle parking occurs.
- 4.4.2 A tarmacadamed car parking area shall be provided and maintained at the location shown in Drawing No. D1.1 "Site Design" and referred to therein as "Car Park (Tarmac)".
- 4.5 The licensee shall provide and maintain an office on the facility, at the location shown in Drawing No. D1.1 "Site Design". The office shall be constructed and maintained in a manner suitable for the processing and storing of documentation.

- 4.6 The licensee shall provide and maintain a working telephone and facsimile machine in the office specified in Condition 4.5 above.
- 4.7 Waste Inspection / Waste Quarantine Area
  - 4.7.1 Within twelve months of the date of grant of this licence a Waste Inspection Area and a Waste Quarantine Area shall be provided and maintained.
  - 4.7.2 The licensee shall ensure that these areas shall be constructed and maintained in a manner suitable and be of a size appropriate for the inspection of waste and subsequent quarantine if required. The waste inspection area and the waste quarantine area shall be suitably and clearly segregated from each other.
- 4.8 The licensee shall provide a weighbridge at the facility. The location of the weighbridge shall be as shown in Drawing No. D1.1 "Site Design". The weighbridge shall be maintained in such condition as to accurately measure the weight of all vehicles using it.
- 4.9 Facility Layout
  - 4.9.1 The Recycle Plant Building and associated infrastructure including conveyor belt, cardboard bailing unit and compactors shall be provided and maintained as set out in the Drawing "Operational Storage Areas", dated 8 August 2000 and submitted to the Agency on 10 August 2000, and Drawing No. D1.3 "Site Operation".
  - 4.9.2 The Workshop Building, Dry Storage Building and Diesel Room/Toilets shall be provided and maintained as set out in Drawing No. D1.1 "Site Design" and Drawing No. D1.3 "Site Operation".

#### 4.10 Waste Handling Plant

- 4.10.1 Items of plant deemed critical to the efficient and adequate processing of waste on site (including *inter alia* waste loading vehicles and sorting lines) shall be provided on the following basis:
  - 100% duty capacity;
  - 50% additional standby capacity;
  - provision of contingency arrangements and/or back up and spares in the case of breakdown of critical equipment.
- 4.10.2 Within three months of the date of grant of this licence the licensee shall provide a report for the agreement of the Agency detailing the capacity, in tonnes per day, of all waste handling and processing equipment used on site.
- 4.10.3 The quantity of waste accepted at the facility on a daily basis shall not exceed the duty capacity of the waste handling and processing equipment on site. Any waste intake exceeding the duty capacity shall be treated as an incident and reported to the Agency under Condition 10.7.
- 4.10.4 The updated schedule of duty and standby plant shall be agreed with the Agency and reported in the Annual Environmental Report.
- 4.11 Vehicle cleaning facilities shall be provided and maintained at the location shown in Drawing No. D1.2 "Site Services" and referred to therein as "Wash Area".
- 4.12 Fuel and Liquid Storage

- 4.12.1 The licensee shall provide and maintain a bunded fuel storage area at the facility. Unless otherwise agreed by the Agency the location of the fuel storage area shall be as shown in Drawing No. D1.2 "Site Services", and referred to therein as "Diesel Tank". Fuels shall only be stored at the agreed location.
- 4.12.2 Hydraulic oil and engine oil shall only be stored in tanks within the Workshop and the Diesel Room. The tanks shall be at the locations shown in Drawing No. D1.3 "Site Operation", and referred to therein as "Oil Tanks".
- 4.12.3 Within six months of the date of grant of this licence all tank and drum storage areas (including those for diesel, hydraulic oil, engine oil, waste oil, gear oil, steering oil and cleaning materials) shall be rendered impervious to the materials stored therein. In addition, all tank and drum storage areas, other than water storage areas, shall as a minimum be bunded, either locally or remotely, to a volume not less than the greater of the following:
  - a) 110% of the capacity of the largest tank or drum within the bunded area; or
  - b) 25% of the total volume of substance which could be stored within the bunded area.
- 4.12.4 All drainage from bunded areas shall be diverted for collection and safe disposal.
- 4.12.5 All inlets, outlets, vent pipes, valves and gauges must be within the bunded area.
- 4.12.6 The integrity and water tightness of all the bunds, tanks, containers and storage chambers and their resistance to penetration by water or other materials stored therein shall be tested and demonstrated by the licensee and shall be reported to the Agency within nine months of the date of grant of this licence. This testing shall be carried out by the licensee at least once every three years thereafter and reported to the Agency on each occasion. The licensee shall also submit to the Agency for its agreement in each case a written report on the storage of fuels on site. A written record of all integrity tests and any maintenance or remedial work arising from them shall be maintained by the licensee.
- 4.12.7 All tanks and containers shall be labelled to clearly indicate their contents.
- 4.12.8 All tanks and containers shall be secured against unauthorised access.

#### 4.13 Surface Water Management

4.13.1 Within six months of the date of grant of this licence, the licensee shall report to the Agency on the compatibility of the oil separators with the Class I separators as described in European Standard prEN 858 "Installations for the separation of light liquids". If, in the opinion of the Agency this comparison proves negative, the licensee shall install a suitable oil separator to replace the existing one within six months of such notification by the Agency.

#### 4.14 Foul Water Management

- 4.14.1 The licensee shall provide and maintain foul water holding chambers at the locations shown in the Drawing "Site Design", submitted with the EIS, and referred to therein as "Containment Tanks". Each foul water holding chamber shall be fitted with a high level visual alarm.
- 4.14.2 All liquid run-off from the floor of the Recycle Plant Building, the compactors and any other areas where waste is handled or processed, and all washwater from the washing of wheelie bins and skips that contained non-inert waste shall be discharged to and stored in the foul water holding chambers pending disposal off-site.

4.14.3 Within three months of the date of grant of this licence, all vehicle washwater shall be discharged to and stored in the foul water holding chambers pending disposal off-site.

#### 4.15 Sewage Treatment

- 4.15.1 Unless otherwise agreed in advance by the Agency, the licensee shall establish and maintain a septic tank and secondary treatment system at the facility for the treatment of all sewage arising on site. The sewage treatment works shall satisfy the recommendations set out in the Agency's guidance document "Wastewater Treatment Manuals Treatment Systems for Single Houses".
- 4.15.2 The treatment works shall be maintained in accordance with the manufacturers specification and shall be desludged at least annually. A written record of all inspections, maintenance, desludging and disposal of associated waste products shall be maintained by the licensee. Within four months of the date of grant of this licence the licensee shall submit to the Agency a report on the installation of the sewage treatment works.
- 4.15.3 Within three months of the date of grant of this licence, all effluent from the sewage treatment works shall be discharged to and stored in the foul water holding chambers pending disposal off-site.
- 4.16 The drainage system, bunds and oil separators shall be inspected weekly, desludged as necessary and properly maintained at all times. The oil interceptors shall be cleaned out at least once every six months. All sludge and drainage from these operations shall be collected for safe disposal. A written record shall be kept of the inspections, desludging, cleaning, disposal of associated waste products, maintenance and performance of the interceptors, bunds and drains.
- 4.17 The integrity and water tightness of all underground pipes and their resistance to penetration by water or other materials carried or stored therein shall be tested and demonstrated by the licensee and shall be reported to the Agency within twelve months from the date of grant of this licence. This testing shall be carried out by the licensee at least once every five years thereafter and reported to the Agency on each occasion. A written record of all integrity tests and any maintenance or remedial work arising from them shall be maintained by the licensee.
- 4.18 The licensee shall provide, install and maintain a system for the detection of a fire inside the Recycle Plant Building, the Workshop and the Office within nine months of the date of grant of this licence. A written record shall be kept of the inspections, testing and maintenance of the system.
- 4.19 The licensee shall provide and use adequate lighting during the operation of the facility in hours of darkness.

#### 4.20 Specified Engineering Works

- 4.20.1 The licensee shall submit written proposals for all Specified Engineering Works, as defined in *Schedule D: Specified Engineering Works*, to the Agency for its agreement at least two months prior to the intended date of commencement of any such works. No such works shall be carried out without the prior agreement of the Agency.
- 4.20.2 All specified engineering works shall be supervised by a competent person(s) agreed in advance by the Agency and that person, or persons, shall be present at all times during which relevant works are being undertaken.
- 4.20.3 Following the completion of all specified engineering works, the licensee shall complete a construction quality assurance validation. The validation report shall

be made available to the Agency on request. The report shall include the following information:

- a) a description of the works;
- b) as-built drawings of the works;
- c) records and results of all tests carried out (including failures);
- d) where relevant a drawing and sections showing the location of all samples and tests carried out;
- e) where relevant daily records sheets/diary;
- name(s) of contractor(s)/individual(s) responsible for undertaking the engineering works;
- g) name(s) of individual(s) responsible for supervision of works and for quality assurance validation of works;
- h) records of any problems and the remedial works carried out; and
- i) any other information requested in writing by the Agency.

Reason: To provide for the protection of the environment.

#### CONDITION 5 WASTE ACCEPTANCE AND HANDLING

- 5.1. The following wastes only shall be accepted at the facility: household waste, commercial waste, construction and demolition waste and industrial non hazardous solid waste.
- 5.2. Within six months of the date of grant of this licence, the licensee shall submit to the Agency for its agreement detailed written procedures for the acceptance and handling of all wastes.
- 5.3. The licensee shall within six months of the date of grant of this licence submit a written procedure for the management of unacceptable wastes received at the facility for the agreement of the Agency. This procedure will detail unacceptable waste types, handling procedures, waste quarantine procedures, record keeping and levels of staff responsibility.
- 5.4. Waste arriving at the facility shall be weighed, documented and directed to the Recycle Plant Building. The waste shall then be deposited on the floor of the Recycle Plant Building for visual inspection. Only following visual inspection and assessment shall the waste be processed for disposal or recovery.
- 5.5. All wastes shall be checked to ensure that they comply with the requirements of the licence. Any wastes deemed to be in contravention of this licence and/or unsuitable for recovery or disposal at this facility shall be removed for recovery or disposal at an appropriate alternative facility. Subject to Condition 4.7.1, such wastes shall be stored in the Waste Quarantine Area only. A record of all waste inspections shall be maintained.
- 5.6. Waste processing at the facility shall be conducted within the Recycle Plant Building and shall only employ the plant as specified in the application, unless otherwise agreed by the Agency.
- 5.7. The licensee shall submit a written proposal on any proposed new waste processing procedure, along with relevant details, to the Agency for its agreement at least two months prior to any such processes or associated works being carried out.
- 5.8. The quantity of wastes to be accepted at the facility shall not exceed 32,000 tonnes per annum unless otherwise agreed in advance by the Agency.
- 5.9. Recycling rates of 50% by 31/12/2003, increasing to 85% by 31/12/2013 for construction and demolition waste accepted at the facility shall be achieved, unless otherwise agreed by the Agency.
- 5.10. Waste shall only be handled at the facility between the hours of 08:00 and 20:00, Monday to Saturday.
- 5.11. Waste other than baled cardboard shall only be stored overnight at the facility in skips/containers within the Recycle Plant Building and the compactor bays. All waste stored on the facility outside of buildings shall be stored in fully enclosed containers.
- 5.12. No waste containers other than clean, empty skips and bins shall be stored in the hardcore surfaced storage areas shown in the Drawing "Operational Storage Areas", dated 8 August 2000 and submitted to the Agency on 10 August 2000, unless otherwise agreed by the Agency.
- 5.13. Unless subject to the prior agreement of the Agency, a maximum of six enclosed waste containers (including sealed containers of compacted waste or fully enclosed collection

vehicles containing waste), shall be stored on the facility overnight. These containers shall be stored at areas clearly designated for this purpose.

#### 5.14. Hazardous Waste

- 5.14.1. No hazardous waste other than batteries and fluorescent tubes for recovery shall be accepted at the facility. The quantity of such wastes to be accepted at the facility shall not exceed 2 tonnes per annum.
- 5.14.2. Batteries and fluorescent tubes shall be stored in enclosed, bunded, non-corrosive receptacles within the Recycle Plant Building pending transport off-site for recovery at an appropriate facility. Unless otherwise agreed by the Agency, the batteries and fluorescent tubes shall be stored at the location shown in the Drawing "Operational Storage Areas", dated 8 August 2000 and submitted to the Agency on 10 August 2000.
- 5.15. There shall be no casual public access to the facility and scavenging shall not be permitted.
- 5.16. No smoking shall be allowed on the facility other than in the office building referred to in Condition 4.5 and the canteen as shown in Drawing No. D1.3 "Site Operation".
- 5.17. No waste shall be burned or otherwise combusted at the facility.
- 5.18. At the end of the working day the floor of the Recycle Plant Building shall be cleaned of all waste.
- 5.19. Wastes sent off-site for recovery or disposal shall only be conveyed to a waste contractor as agreed by the Agency. The ultimate recovery or disposal facility for all wastes shall be agreed in advance with the Agency. All wastes removed off-site for recovery or disposal shall be transported from the facility to the consignee in a manner which will not adversely affect the environment.
- 5.20. Within six months of the date of grant of this licence the licensee shall submit to the Agency for its agreement a proposal for the reuse and recovery of appropriate components of the wastes accepted at the facility. The licensee shall set out proposals to achieve the targets set out in the Policy Statement "Waste Management, Changing Our Ways" (Department of the Environment and Local Government, 1998).

**Reason:** To provide for the acceptance and management of wastes authorised under this waste licence.

### CONDITION 6 ENVIRONMENTAL NUISANCES

- 6.1. At all times other than Bank Holiday weekends all waste for disposal shall be removed from the facility within forty eight hours of its arrival on site. At Bank Holiday weekends such waste shall be removed from the facility within seventy two hours of its arrival on site.
- 6.2. The licensee shall, at a minimum of one week intervals, inspect the facility and its immediate surrounds for nuisances caused by vermin, birds, flies, mud, dust and odours. Written records shall be made of all inspections and any actions taken as a result of these inspections.
- 6.3. The road network in the vicinity of the facility shall be kept free from any debris caused by vehicles entering or leaving the facility. Any such debris or deposited materials shall be removed without delay.

#### 6.4. Litter Control

- 6.4.1. The measures and infrastructure as described in Attachment F5 of the application shall be applied to control litter at the facility.
- 6.4.2. All loose litter accumulated within the facility and its environs shall be removed and appropriately disposed of on a daily basis.
- 6.5. Any waste placed on or in the vicinity of the facility, other than in accordance with the requirements of this licence, shall be removed by the licensee immediately and in any event by 10.00 a.m. of the next working day, after such waste is discovered. Such waste shall be disposed of at an appropriate facility.
- 6.6. The licensee shall ensure that all vehicles delivering waste to and removing waste and materials from the facility are clean and appropriately covered and that there shall be no liquid discharges from the waste transported therein.

#### 6.7. Dust Control

- 6.7.1. In dry weather the areas of the facility used by vehicles shall be sprayed with water as and when required to minimise airborne dust nuisance.
- 6.7.2. Water sprinklers shall be operated in the waste handling areas, as and when required for the prevention of dust nuisance.
- 6.8. The licensee shall ensure that vermin, birds, flies, mud, dust and odours do not give rise to nuisance at the facility or the immediate area of the facility. Any method used by the licensee to control any such nuisance shall not cause environmental pollution.

Reason: To provide for the control of nuisance.

# CONDITION 7 EMISSIONS AND ENVIRONMENTAL IMPACTS

- 7.1. No specified emission from the facility shall exceed the emission limit values set out in *Schedule F: Emissions Limits* of this licence. There shall be no other emissions of environmental significance.
- 7.2. All treatment/abatement and emission control equipment shall be calibrated and maintained in accordance with the instructions issued by the manufacturer/supplier or installer. Written records of the calibrations and maintenance shall be made and kept by the licensee.
- 7.3. The licensee shall ensure that the activities shall be carried out in a manner such that emissions do not result in significant impairment of, or significant interference with the environment beyond the facility boundary.
- 7.4. There shall be no emissions to surface water.
- 7.5. Indirect Emissions to Groundwater
  - 7.5.1. Within three months of the date of grant of this licence, roof water run-off and surface water run-off from all areas other than those areas specified in Condition 4.14.2 shall be discharged via a suitable oil interceptor/sedimentation tank prior to discharge to a soakpit.

7.6. All foul water removed from the foul water holding chambers shall be disposed of by tankering off-site in fully enclosed tankers and discharging to Navan Waste Water Treatment Plant. Disposal procedures for the foul water at the Waste Water Treatment Plant shall be in accordance with any written requirements of Meath County Council. The frequency of removal shall be such that a minimum of 10% spare capacity is maintained at all times in the holding chambers.

**Reason:** To control emissions from the facility and provide for the protection of the environment.

#### CONDITION 8 RESTORATION AND AFTERCARE

8.1. Decommissioning shall be according to the scheme laid out in Attachment G2 of the application. The licensee shall update the schemes for Decommissioning and Aftercare when required by the Agency and submit amendments to the Agency for its agreement.

**Reason:** To provide for decommissioning of the facility and aftercare of the site on which the facility is located.

#### **CONDITION 9 ENVIRONMENTAL MONITORING**

- 9.1. The licensee shall carry out such monitoring and at such locations and frequencies as set out in *Schedule E: Monitoring* and as specified in the Conditions of this licence.
- 9.2. Groundwater Monitoring
  - 9.2.1. Within six months of the date of grant of the licence, the licensee shall install two groundwater monitoring boreholes at locations to be agreed in advance by the Agency. One of the boreholes shall be located upgradient of site activities and the other borehole shall be located downgradient of the sewage treatment works, the foul water holding chambers. Groundwater monitoring shall commence within one month of completion of the monitoring boreholes.
- 9.3. The licensee shall provide, install and maintain within six months of the date grant of this licence, a monitoring point for the representative sampling of the discharge from the soak pit. The first monitoring of this discharge shall be undertaken within one month of installation of the monitoring point.
- 9.4. The licensee shall include a dust monitoring station at the north eastern boundary of the facility and a noise monitoring station at the GAA pitch to the north east of the facility.
- 9.5. Dust Monitoring
  - 9.5.1. Dust deposition monitoring shall be carried out as specified in *Schedule E: Monitoring*. The first such monitoring shall be undertaken during the first relevant period occurring after the date of grant of this licence.
  - 9.5.2. Directional dust monitoring shall be carried as specified in *Schedule E: Monitoring* to establish the source of dust at the facility.
- 9.6. Noise monitoring as specified in *Schedule E: Monitoring* shall be carried out on an annual basis during operational hours. The first such monitoring shall be undertaken within six months of the date of the grant of this licence.

- 9.7. The licensee shall provide safe and permanent access to all on-site sampling and monitoring points and off-site points as required by the Agency.
- 9.8. The licensee shall maintain all sampling and monitoring points so that they may be used for representative sampling and monitoring.
- 9.9. Monitoring and analysis equipment shall be operated and maintained in accordance with the manufacturers instructions (if any) so that all monitoring results accurately reflect any emission or discharge or environmental parameter.
- 9.10. The licensee shall amend the frequency, locations, methods and scope of monitoring, sampling, analyses and investigations only upon the written instruction of the Agency and shall provide such information concerning such amendments as may be requested in writing by the Agency. Such alterations shall be carried out within any timescale nominated by the Agency.
- 9.11. A written record shall be kept of the names, qualifications and a summary of relevant experience of all persons who carry out all sampling and monitoring as required by this licence and who carry out the interpretation of the results of such sampling and monitoring.
- 9.12. The licensee shall install on all emission points such sampling points or equipment, including any data-logging or other electronic communication equipment, as may be required by the Agency. All such equipment shall be consistent with the safe operation of all sampling and monitoring systems.
- 9.13. All on-site monitoring points as described in Condition 9 shall be tagged in situ with their agreed sampling point codes within ten months of the granting of this licence.

**Reason:** To ensure compliance with the requirements of other conditions of this licence by provision of a satisfactory system of measurement and monitoring of emissions.

#### CONDITION 10 CONTINGENCY ARRANGEMENTS

- 10.1. The licensee shall, within six months of the date of grant of this licence, submit a written Emergency Response Procedure (ERP) to the Agency for its agreement. The ERP shall address any emergency situations which may originate on the facility and shall include provision for minimising the effects of any emergency on the environment.
- 10.2. The licensee shall have in storage an adequate supply of containment booms and/or suitable absorbent material to contain and absorb any spillage at the facility. Once used the absorbent material shall be disposed of at an appropriate facility. A written record of the use and disposal of these items shall be maintained by the licensee.
- 10.3. All significant spillages occurring at the facility shall be treated as an emergency and immediately cleaned up and dealt with so as to alleviate their effects.
- 10.4. No waste shall be burned within the boundaries of the facility. A fire at the facility shall be treated as an emergency. Immediate action shall be taken to extinguish it and the appropriate authorities notified.
- 10.5. The licensee shall carry out a risk assessment to determine the requirements at the facility for fire fighting and fire water retention facilities and shall, within six months from the date of grant of this licence submit a report, including recommendations on the risk assessment, to the Agency for its agreement. The Fire Authority of Meath County Council shall be consulted by the licensee during this assessment.

- 10.6. In the event of a complete breakdown of equipment or any other occurrence which results in the closure of the Recycle Plant Building, any putrescible waste arriving at or already deposited at the facility shall be transferred directly to appropriate landfill sites or any other appropriate facility until such time as the Recycle Plant Building is returned to a fully operational status. Such a breakdown event will be treated as an emergency and rectified as soon as possible.
- 10.7. Unless otherwise notified in writing by the Agency, in the event that any monitoring, sampling or observations indicate that an incident has, or may have taken place, the licensee shall immediately:
  - a) identify the date, time and place of the incident;
  - b) carry out an immediate investigation to identify the nature, source and cause of the incident and any emission;
  - c) isolate the source of the emission, if any;
  - d) evaluate the environmental pollution, if any, caused by the incident;
  - e) identify and execute measures to minimise the emission/malfunction and the effects thereof; and
  - f) within one month of the occurrence of the incident, provide a proposal to the Agency for its agreement to:
    - (i) identify and put in place measures to avoid reoccurrence of the incident; and
    - (ii) identify and put in place any other appropriate remedial action.

21 of 29

**Reason:** To provide for the protection of the environment.

# CONDITION 11 CHARGES AND FINANCIAL PROVISIONS

#### 11.1 Agency Charges

- 11.1.1 The licensee shall pay to the Agency an annual contribution of £ 8,582 or such sum as the Agency from time to time determines, towards the cost of monitoring the activity or otherwise in performing any functions in relation to the activity, as the Agency considers necessary for the performance of its functions under the Waste Management Act, 1996. The licensee shall in 2001 and subsequent years, not later than January 31 of each year, pay to the Agency this amount updated in accordance with changes in the Public Sector Average Earnings Index from the date of the licence to the renewal date. The updated amount shall be notified to the licensee by the Agency. For 2000 the licensee shall pay a pro rata amount from the date of this licence to 31<sup>st</sup> December 2000. This amount shall be paid to the Agency within one month of the date of grant of this licence.
- 11.1.2 In the event that the frequency or extent of monitoring or other functions carried out by the Agency needs to be increased or decreased the licensee shall contribute such sums as determined by the Agency to defraying its costs.
- 11.2 Financial Provision for Closure, Restoration and Aftercare
  - 11.2.1 The licensee shall arrange for the completion of a comprehensive and fully costed Environmental Liabilities Risk Assessment for the facility which will address liabilities arising from the carrying on of the activities to which this licence relates. A report on this assessment shall be submitted to the Agency for its agreement within six months of date of grant of this licence.
  - 11.2.2 Within nine months of the date of grant of this licence, the licensee shall make a Proposal for Financial Provision to the Agency for its agreement to cover any liabilities incurred by the licensee in carrying on the activities to which this licence relates. Such provision shall be maintained by the licensee unless otherwise agreed by the Agency.
  - 11.2.3 The amount of financial provision, held under Condition 11.2.2 shall be reviewed and revised as necessary, but at least annually. Any proposal for such a revision shall be submitted to the Agency for its agreement.
  - 11.2.4 The licensee shall within two weeks of purchase, renewal or revision of the financial provision required under Condition 11.2.2, forward to the Agency written proof of such indemnity.

**Reason:** To provide for adequate financing for monitoring and financial provisions for measures to protect the environment.

# SCHEDULE A: Content of the Environmental Management Programme

#### **Environmental Management Programme**

#### **Details of Operator**

Name and address of operator and site. Included should be contact names in respect of persons with managerial responsibility for site operations, including the facility manager. Relevant telephone numbers should also be given. All relevant drawings should be included in the EMP.

#### **Types of Waste Accepted**

A detailed description of the types of waste that can be accepted on the site should be given.

#### **Quantity of Wastes Accepted**

Details should be given on the annual quantity of waste taken into the site.

#### **Engineering Details**

Details of all significant site engineering works should be included. Where applicable the information should cover:

- · fencing, gates and other security
- · hardstanding and vehicle parking areas
- offices, fuel stores etc.
- site infrastructure etc.
- waste handling and storage areas / buildings

#### **Operational Matters**

These should include:

- · description of the operations
- measures for the control of environmental nuisances
- measures for the control of emissions
- site opening and operating times
- access control
- · waste acceptance procedures
- procedures for dealing with unacceptable wastes
- equipment to be utilised
- site personnel, including qualifications, duties and responsibilities
- monitoring and maintenance procedures
- trigger levels for emissions
- · operational and safety rules (including safety statement)
- · emergency procedures

#### **Objectives and Targets**

Objectives and targets for improving the environmental performance of the facility shall be detailed. These should include:

- emissions
- resource use
- wastes produced
- recycling / recovery of waste

Timescale for achieving the objectives and targets listed in the Schedule of Objectives and Targets Designation of responsibility for achieving targets and objectives

#### Other items specified by the Agency

# SCHEDULE B: Content of the Annual Environmental Report

#### **Annual Environmental Report Content**

Reporting period.

Waste activities carried out at the facility.

Quantity and composition of waste received, disposed of and recovered during the reporting period and each previous year.

Summary report on emissions (Certified results/data sheets to be attached as Appendices).

Summary of results and interpretations of environmental monitoring, including a location plan of all monitoring locations along with their respective 12 digit grid references.

Resource and energy consumption summary.

Report on development/infrastructural works in place and planned, to process waste quantities projected for the following year (including plant operating capacity, provision of adequate standby capacity and provision of contingency, backup and spares in the case of breakdown). Report to include details of works undertaken during the reporting period, and a timescale for those proposed for the coming year.

Schedule of environmental objectives and targets for the forthcoming year, including recovery targets relating to those specified in the Government's Waste Management Policy Statement "Changing Our Ways".

Report on the progress towards achievement of the environmental objectives and targets contained in previous year's report.

Full title and a written summary of any procedures developed by the licensee in the year, which relate to the facility operation.

Tank, drum, storage chamber, pipeline and bund testing and inspection report.

Reported incidents and complaints summaries.

Review of nuisance controls.

Reports on financial provision made under this licence, management and staffing structure of the facility, and a programme for public information.

Estimated annual and cumulative quantity of indirect emissions to groundwater.

Volume of foul water produced and volume of foul water transported/discharged off-site.

Any other items specified by the Agency.

# SCHEDULE C: Recording and Reporting to the Agency

Table C.1 Recurring Reports

Report	Reporting Frequency Note1	Report Submission Date
Environmental Management System Updates	Annually	One month after the end of the year reported on.
Annual Environment Report (AER)	Annually	Thirteen months from the date of grant of licence and one month after the end of each year thereafter.
Record of incidents	As they occur	Within five working days of the incident.
Specified Engineering Works reports	As they arise	Prior to the works commencing.
Bund, tank, container and storage chamber integrity assessment	Every three years	Nine months from the date of grant of licence and one month after end of the three year period being reported on.
Underground pipe and tank integrity assessment	5 yearly	Twelve months from the date of grant of licence and one month after end of the year being reported on.
Noise Monitoring	Annually	One month after the completion of the monitoring.
Dust Deposition Monitoring	Three times a year	One month after the completion of the monitoring.
Directional Dust Monitoring	Monthly	One month after the completion of the monitoring.
Groundwater monitoring	Quarterly	Ten days after end of the quarter being reported on.
Monitoring of indirect emissions to groundwater	Quarterly	Ten days after end of the quarter being reported on.
Any other monitoring	As they occur	Within ten days of obtaining results.

Note 1: Unless altered at the request of the Agency

## **SCHEDULE D: Specified Engineering Works**

#### **Specified Engineering Works**

Installation of bunded liquid storage areas.

Installation of Waste Inspection / Waste Quarantine Area.

Installation of security gates. Note 1

Installation of groundwater monitoring boreholes.

Installation of fire detection system.

Extension of Recycle Plant Building.

Provision of in-situ tagging of monitoring points. Note 1

Any other works notified by the Agency.

Note 1: Not subject to Condition 4.20.1

## **SCHEDULE E: Monitoring**

Monitoring to be carried out as specified below.

#### E.1: Dust

Dust monitoring locations shall be those as set out in Table E.1.1 and, where relevant, shown on Drawing No. J1.0 R1 "Environmental Monitoring" of the application.

Table E.1.1 Dust Monitoring Locations

STATION
D1
D2
D3
Monitoring location as required by Condition 9.4

Table E.1.2 Dust Monitoring Frequency and Technique

Parameter	Monitoring Frequency	Analysis Method/Technique
Dust Deposition (mg/m²/day)	Three times a year Note 2	Standard Method Note 1
Dust Direction	Monthly Note 4	Standard Method Note 3

Note 1: Standard method VDI2119 (Measurement of Dustfall, Determination of Dustfall using Bergerhoff Instrument (Standard Method) German Engineering Institute). A modification (not included in the standard) whereby 2 methoxy ethanol may be employed to eliminate interference due to algae growth in the gauge.

Note 2: Twice during the period May to September, or as otherwise specified in writing by the Agency.

Note 3: British Standard BS 1747: Part 5 "Directional dust gauges".

Note 4: Unless otherwise instructed by the Agency.

#### E.2: Noise

Noise monitoring locations shall be those as set out in Table E.2.1 and, where relevant, shown on Drawing No. C8.0 R1 "Noise Monitoring Locations" of the application.

Table E.2.1 Noise Monitoring Locations

STATION
N1
N2
N3
N4
N5
Noise sensitive location as required by Condition 9.4

Table E.2.2 Noise Monitoring Frequency and Technique

Parameter	Monitoring Frequency	Analysis Method/Technique
L(A) <sub>EQ</sub> [30 minutes]	Annual	Standard <sup>Note 1</sup>
L(A) <sub>10</sub> [30 minutes]	Annual	Standard <sup>Note 1</sup>
L(A) <sub>90</sub> [30 minutes]	Annual	Standard <sup>Note 1</sup>
Frequency Analysis(1/3 Octave band analysis)	Annual	Standard <sup>Note 1</sup>

Note 1: "International Standards Organisation. ISO 1996. Acoustics - Description and Measurement of Environmental Noise. Parts 1, 2 and 3."

#### E.3: Indirect Emissions to Groundwater

Monitoring location as required by Condition 9.3.

Table E.3.1 Indirect Emissions to Groundwater - Monitoring Parameters and Frequencies

Parameter	Monitoring Frequency	Analysis Method/Technique
Ammoniacal Nitrogen	Quarterly	ISE / Colorimetry
BOD	Quarterly	Electrometry / Titrimetry with nitrification inhibitor
COD	Quarterly	Digestion, Colorimetry / Titrimetry
Electrical Conductivity	Quarterly	Electrometry
Fats, Oil, Grease	Monthly	Visual
Total Suspended Solids	Quarterly	Gravimetry

#### E.4: Groundwater

Groundwater monitoring locations shall be those as set out in Table E.4.1.

Table E.4.1 Groundwater Monitoring Locations

STATION	
Upgradient borehole as required by Condition 9.2.1	
Downgradient borehole as required by Condition 9.2.1	
Kilsaran Well	

Table E.4.2 Groundwater Monitoring Parameters and Frequencies

Parameter Note 1	Monitoring Frequency
Groundwater Level Note 2	Monthly
рН	Quarterly
Temperature	Quarterly
Electrical Conductivity	Quarterly
Dissolved Oxygen	Quarterly
Ammoniacal Nitrogen	Quarterly
Boron	Annually
Barium	Annually
Cadmium	Annually
Calcium	Annually
Chloride	Annually
Chromium	Annually
Copper	Annually
Iron	Annually
Lead	Annually
List I/II Organic Substances Note 3	Annually
Magnesium	Annually
Manganese	Annually
Mercury	Annually
Nickel	Annually
Potassium	Annually
Sodium	Annually
Sulphate	Annually
Total Organic Carbon	Annually
Total Oxidised Nitrogen	Annually
Total Petroleum Hydrocarbons	Annually
Total Phosphorus / orthophosphate	Annually
Zinc	Annually
Faecal Coliforms Note 4	Annually
Total Coliforms Note 4	Annually

**Note 1:** All analyses shall be carried out by a competent laboratory using standard and internationally acceptable techniques. The testing laboratory and the testing technique shall be agreed with the Agency in advance.

Note 2: Not required for Kilsaran well. All groundwater levels to be referenced to the same datum.

Note 3: Screened for the presence of organic compounds using Gas Chromatography/ Mass Spectrometry (GC/MS) or other appropriate techniques and using the List I/II Substances From EU Directive 76/464/EEC and 80/68/EEC as a guideline. Recommended analytical methods include: volatiles (US EPA method 524 or equivalent), semi-volatiles (US EPA method 525 or equivalent), and pesticides (US EPA method 608 or equivalent).

Note 4: If there is evidence of bacterial contamination, the analysis at up gradient and down gradient monitoring points should include enumeration of total bacteria at 22°C, 37°C and faecal streptococci.

## **SCHEDULE F:** Emission Limits

**F.1 Dust Deposition Limits:** (Measured at the monitoring points indicated in Table E.1.1).

Level (mg/m² /day) <sup>Note 1</sup>	
350	

Note 1: 30 day composite sample with the results expressed as mg/m<sup>2</sup>/day.

## **F.2 Noise Emissions:** (Measured at any noise sensitive location).

Day dB(A) L <sub>Aeq</sub> (30 minutes)	Night dB(A) L <sub>Aeq</sub> (30 minutes)
55	45

# **F.3** Indirect Emissions to Groundwater: (Measured at the monitoring location specified in Schedule E.3)

Parameter	Limit (mg/l)
BOD	5
Suspended solids	30

Signed on behalf of the said Agency		
on the 17th day of October, 2000	Breda Sheehan	Authorised Person