

WASTE LICENCE REVIEW APPLICATION FORM

FOR INTENSIFICATION OF WASTE INTAKE AT KNOCKHARLEY LANDFILL, CO. MEATH

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December 2008



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User is Responsible for Checking The Revision Status Of This Document

Rev. Nr.	Description of Changes	Prepared by:	Checked by:	Approved by:	Date:
0	Final	for yill AMR	SMA	DOS	22/12/08

Client: Greenstar Ltd

Keywords: Knockharley, landfill, waste licence review application, 400,000

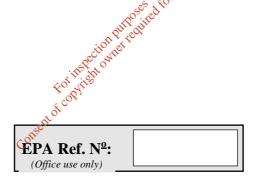
t/a

Abstract:

Greenstar is applying to the Environmental Protection Agency for a review of its waste licence (W0146-01) to operate the Knockharley Landfill. The application is for the review of the waste licence to increase the licensed rate of waste acceptance at the site from 200,000 tonnes to 400,000 tonnes per annum for disposal. Save the increase in the volume of waste and an alteration to the landfill phasing sequence, the nature of the activity envisaged is essentially the same as the activity authorised under the existing waste licence. Greenstar has also applied directly to An Bord Pleanála under the provisions of the Strategic Infrastructure Act for planning permission for this proposed development. An environmental impact statement has been prepared in support of both applications. This document comprises the waste licence review application form.



Waste Licence Application Form



This document does not purport to be and should not be considered a legal interpretation of the provisions and requirements of the Waste Management Acts 1996 to 2003.

Environmental Protection Agency

P.O.Box 5000, Johnstown Castle Estate, County Wexford Telephone: 053-60600 Fax: 053-60699



INTRODUCTION

A valid application must contain the information prescribed in the Waste Management (Licensing) Regulations 2004 (SI No. 395 of 2004). The applicant is strongly advised to read the *Application Guidance Notes* for Waste Licensing, available from the EPA.

The applicant must conform to the format set out in the guidance notes for applications. Each page of the completed application form must be numbered, e.g. page 5 of 45, etc. Also duplicated pages from the application form should be uniquely numbered, e.g. page 5(i) of 45, etc. **The basic information should for the most part be supplied in the spaces given in application form** and any supporting documentation should be supplied as attachments, as specified. Consistent measurement units must be used throughout.

The applicant should note that the application form has been structured so that it requires information to be presented in an order of progressive detail.

When it is found necessary, additional information may be provided on supplementary attachments which should be clearly cross referenced with the relevant sections in the main document.

While all sections in the application form may not be relevant to the activity concerned, the applicant should look carefully through all aspects of the form and provide the required information, in the greatest possible detail.

All maps/drawings/plans must be no larger than A3 size and scaled appropriately such that they are clearly legible. In exceptional circumstances, where A3 is considered inadequate, a larger size may be requested by the Agency.

Information supplied in this application, including supporting documentation will be put on public display and open to inspection by any person. Should the applicant consider information to be confidential, this information should be submitted in a separate enclosure bearing the legend "In the event that this information is deemed not to be held as confidential, it must be returned to". In the event that information is considered to be of a confidential nature, then the nature of this information, and the reasons why it is considered confidential (with reference to the "Access to Information on the Environment" Regulations) should be stated in the Application Form, where relevant.

It should be noted that it will not be possible to process or determine the application until the required documents have been provided in sufficient detail and to a satisfactory standard.

CHECKLIST

Articles 12 and 13 of the Waste Management (Licensing) Regulations, 2004 (S.I. No. 395 of 2004) set out the information which must, in all cases, accompany a waste licence application. In order to ensure that the application fully complies with the legal requirements of Articles 12 and 13 of the 2004 Regulations, all applicants should **complete** the following.

In each case, refer to the attachment number(s) of your application which contain(s) the information requested in the appropriate sub-article.

Article 12(1) In the case of an application for a waste licence, the application shall -

(a) give the name, address and, where applicable, any telephone number and telefax of the applicant (and, if different, the operator of the facility concerned), the address to which correspondence relating to the application should be sent and, if the applicant or operator is a body corporate, the address of its registered office or principal office,

LOCATION	Section B1	het the		
CHECKED	Applicant	X 34. 104 of	Official	

(b) give the name of the planning authority in whose functional area the relevant activity is or will be carried on,

LOCATION	Section B3		
CHECKED	Applicant	\boxtimes	Official

(c) in the case of a discharge of any trade effluent or other matter (other than domestic sewage or storm water) to a sewer of a sanitary authority, give the name of the sanitary authority in which the sewer is vested or by which it is controlled,

LOCATION	Not applicable		
CHECKED	Applicant 🖂	Official	

(d) give the location or postal address (including where appropriate, the name of the townland or townlands) and the National Grid reference of the facility or premises to which the application relates,

LOCATION	Section B2		
CHECKED	Applicant	\boxtimes	Official

(e) describe the nature of the facility or premises concerned, including the proposed capacity of the facility or premises, and in the case of application in respect of a landfill of waste, the requirements specified in Annex 1 of the Landfill Directive,

LOCATION	Section B7		
CHECKED	Applicant	\boxtimes	Official

(f) specify the class or classes of activity concerned, in accordance with the Third and Fourth Schedules of the Act, and in the case of an application in respect of the landfill of waste, specify the class of landfill in accordance with Article 4 of the Landfill Directive,

LOCATION	Section B7		
CHECKED	Applicant	\boxtimes	Official

(g) specify, by reference to the relevant European Waste Catalogue codes as presented by Commission Decision 2000/532/EC of 3 May 2000, the quantity and nature of the waste or wastes which will be treated, recovered or disposed of,

LOCATION	Section H1			
CHECKED	Applicant	\boxtimes	Official	

(h) specify the raw and ancillary materials, substances, preparations, fuels and energy which will be unlisted in or produced by the activity,

LOCATION	Section	
CHECKED	Applicant 🖂	Official

(i) describe the plant, methods, processes, ancillary processes, abatement recovery and treatment systems and operating procedures for the activity,

LOCATION	Section D, F, H, J and K	
CHECKED	Applicant 🔀	Official

(j) provide information for the purpose of enabling the Agency to make a determination in relation to the matters specified in paragraphs (a) to (g) of section 40(4) of the Act,

LOCATION	Section L1	
CHECKED	Applicant	Official



(k) give particulars of the source, location, nature, composition, quantity, level and rate of emissions arising from the activity and, where relevant, the period or periods during which such emissions are made or are to be made,

LOCATION	Section E		
CHECKED	Applicant	\boxtimes	Official

(l) give details, and an assessment of the effects, of any existing or proposed emissions on the environment, including any environmental medium other than those into which the emissions are, or are to be made, and of proposed measures to prevent or eliminate or, where that is not practicable, to limit or abate such emissions,

LOCATION	Section I		
CHECKED	Applicant	\boxtimes	Official

(m) identify monitoring and sampling points and indicate proposed arrangements for the monitoring of emissions and the environmental consequences of any such emissions,

LOCATION	Section F	M. Stay of	
CHECKED	Applicant	No. Other	Official

(n) describe any proposed arrangements for the prevention, minimisation and recovery of waste arising from the activity concerned,

LOCATION	Section D		
CHECKED	Applicant	\boxtimes	Official

(o) describe any proposed arrangements for the off-site treatment or disposal of solid or liquid wastes,

LOCATION	Section D4			
CHECKED	Applicant	\boxtimes	Official	

(p) describe the existing or proposed measures, including emergency procedures, to prevent unauthorised or unexpected emissions and minimise the impact on the environment of any such emission,

LOCATION	Section J		
CHECKED	Applicant	\boxtimes	Official



(q) describe the proposed measures for the closure, restoration, remediation or aftercare of the facility concerned, after the cessation of the activity in question,

LOCATION	Section K		
CHECKED	Applicant	\boxtimes	Official

- (r) in the case of an application in respect of the landfilling of waste, give particulars of
 - (i) such financial provision as is proposed to be made by the applicant, having regard to the provisions of Articles (7)(i) and (8)(a)(iv) of the Landfill Directive and section 53(1) of the Act, and

LOCATION	Section L		
CHECKED	Applicant	\boxtimes	Official

(ii) such charges as are proposed or made, having regard to the requirements of section 53A of the Act.

LOCATION	Section L	यात्र, यात्र भूप	
CHECKED	Applicant	No. of	Official
•		20.10	

(s) state whether the activity is for the purposes of an establishment to which the European Communities (Control of Major Accident Hazards involving Dangerous Substances) Regulations, 2000 (S.I. No. 476 of 2000) apply,

LOCATION	Section B.8	
CHECKED	Applicant	Official

(t) in the case of an activity which gives rise or could give rise to an emission into an aquifer containing the List I and II substances specified in the Annex to Council Directive 80/68/EEC of 17 December 1979, describe the existing or proposed arrangements necessary to give effect to Articles 3,4,5,6,7,8,9 and 10 of the aforementioned Council Directive,

LOCATION	Sections D and F and E4		
CHECKED	Applicant \boxtimes	Official	



(u) include a non-technical summary of information provided in relation to the matters specified in paragraphs (a) to (t) of this sub-article,

LOCATION	Section A	
CHECKED	Applicant	Official

Article 12(4) Without prejudice to Article 13(1) and (2), an application for a licence shall be accompanied by -

(a) a copy of the relevant page of the newspaper(s) in which the notice in accordance with article 6 has been published,

LOCATION	Section B6		
CHECKED	Applicant	\boxtimes	Official

(b) a copy of the text of the notice or notices erected or fixed in accordance with article 7,

LOCATION	Section B6		ne.
CHECKED	Applicant	X ather	Official

(c) where appropriate, a copy of the Motice given to a local planning under article 9,

LOCATION	Section	
CHECKED	Applicant 🖂	Official

- (d) a copy of such plans (appropriately scaled and no larger than A3 size), including a site plan or plans and location map or maps, and such other particulars, reports and supporting documentation as are necessary to identify and describe, as appropriate -
 - (i) the position of the notice in accordance with article 7,

LOCATION	Section B1 (Drawing WLA01)	
CHECKED	Applicant 🔀	Official

(ii) the point or points from which emissions are made or are to be made, and

LOCATION	Section E (Drawing WLA11)	
CHECKED	Applicant	Official

(iii) the point or points at which monitoring and sampling are undertaken or are to be undertaken,

LOCATION	Section F (Drawing WLA12)	
CHECKED	Applicant 🔀	Official

(e) such fee as is appropriate having regard to the provisions of articles 40 and 41.

INCLUDED Y/N	Table B.7.3		
CHECKED	Applicant	\boxtimes	Official

Article 12(5)(a) & (b) An application shall comprise 1 signed original of the application and 2 copies in hardcopy format plus 2 copies of all files in electronic searchable PDF format on CD-Rom.

		ther	Re.
HARDCOPIES PROVIDED Y/N	Yes only	any	
CHECKED	Applicant	\boxtimes	Official
	On of rede		
CD OF PDF FILES PROVIDED? Y/N	of estimates		
CHECKED	Applicant	\boxtimes	Official
<u> </u>			

Article 13 Where a development requires an Environmental Impact Assessment to be carried out, 1 signed original and 2 copies in hardcopy format of the environmental impact statement plus 16 copies in electronic searchable PDF format on CD-ROM should accompany this application.

EIA REQUIRED? Y/N	Yes			
CHECKED	Applicant	\boxtimes	Official	
3 HARD COPIES OF EIS INCLUDED? Y/N	Yes			
CHECKED	Applicant	\boxtimes	Official	
16 CD versions of EIS, as PDF files, PROVIDED? Y/N	Yes			
CHECKED	Applicant	abla	Official	



PROCEDURES

It is recommended that pre-application consultations with the Agency are undertaken before a formal submission of the waste licence application.

The procedure for making and processing of applications for waste licences, and for the processing of reviews of such licences, appear in the Waste Management (Licensing) Regulations 2004 (S.I. No. 395 of 2004) and are summarised below. The application fees that shall accompany an application are listed in the Second Schedule to the Regulations.

Prior to submitting an application the applicant must publish in a local newspaper, and erect on site, a notice of intention to apply. An applicant, other than a local authority in whose functional area the development is located, must also notify the Local Planning Authority, in writing, of their intention to apply.

An application for a licence must be submitted on the appropriate form (available from the Agency) with the correct fee, and should contain relevant supporting documentation as attachments. The application should be based on responses to the form, supporting written text and the appropriate use of tables and drawings. Where point source emissions occur, a system of unique reference numbers should be used to denote each emission point. These should be simple, logical, and traceable throughout the application.

The application form is divided into a number of sections of related information. The purpose of these divisions being to facilitate both the applicant and the Agency in the provision of the information and its assessment. Attachments should be clearly numbered, titled and paginated and must contain the required information as set out in the application form. Additional attachments may be included to supply any further information supporting the application. Any references made should be supported by a bibliography.

All questions should be answered. No waste management facility is exactly the same and hence each application will require different information. It is therefore possible that some of the sections of this application form may not be relevant to the activity concerned. Where information is requested in the application form, which is not relevant to the application, the words "not applicable" should be clearly written on the form. The abbreviation "N/A" should not be used.

Additional information may need to be submitted beyond that which is explicitly requested on this form. Any references made should be supported by a bibliography. The Agency may request further information if it considers that its provision is material to the assessment of the application. Advice should be sought from the Agency where there is doubt about the type of information required or the level of detail.

Information supplied in this application, including supporting documentation will be put on public display and be open to inspection by any person. **Should the applicant**



consider information to be confidential, then the nature of this information, and the reasons why it is considered confidential should be clearly stated in an attachment to the Application Form. This information should be submitted in a separate enclosure bearing the legend "In the event that this information is deemed not to be held as confidential, it must be returned to (representative of the applicant)".

Applicants should be aware that a contravention of the conditions of a waste licence is an offence under Section 39 of the Waste Management Acts 1996 to 2003.

The provision of information in an application for a waste licence which is false or misleading is an offence under Section 45 of the Waste Management Acts 1996 to 2003.

Note: <u>*Drawings.*</u> *The following guidelines are included to assist applicants:*

- All drawings submitted should be titled and dated.
- They should have a <u>unique reference number</u> and should be signed by a clearly identifiable person.
- They should indicate a scale and the direction of north
- All drawings should, generally, be to a scale of between 1:20 to 1:500, depending upon the degree of detail needed to be shown and the size of the facility. Drawings delineating the boundary can be to a smaller scale of between 1:1000 to 1:10560, but must clearly and accurately present the required level of detail. Drawings showing the site location can be to a scale of between 1:50 000 to 1:126 720. All drawings should, however, be A3 or less and of an appropriate scale such that they are clearly legible. Provide legends on all drawings and maps as appropriate.

The provision of information in an application for a waste licence, which is false or misleading, is an offence under s45 of the Acts.

SECTION A NON-TECHNICAL SUMMARY

A Non-Technical Summary is to be submitted. The summary should include information on those aspects outlined in the Guidance Note and must comply with the requirements of Article 12 (1) (u) of the Waste Management (Licensing) Regulations, S.I. 395 of 2004.

The Non-Technical Summary should form **Attachment A.1**.



SECTION B GENERAL

B.1 Applicant's Details

Name*:	Greenstar Holdings Limited
Address:	Ballyogan Business Park
	Ballyogan Road
	Sandyford
	Dublin 18
Tel:	(01) 2947900
Fax:	(01) 2947990
e-mail:	info@greenstar.ie

^{*} This should be the name of the applicant which is current on the date this Waste Licence Application is lodged with the Agency. It should be the name of the legal entity (which can be a limited company or a sole trader). A trading/business name is not acceptable.

Name and Address for Correspondence

Only application documentation submitted by the applicant and by the nominated person will be deemed to have come from the applicant.

Name:	Mr Morgan Burke	ally, stay
Address:	Greenstar Ltd	- Sep. 410t
	Fassaroe	nurgo dire
	Bray	ation of the
	Co. Wicklow	. o Contraction
Tel:	(01) 2947900	For thigh
Fax:	(01) 2947990	*Cont.
e-mail:	morgan.burke@green	star.ie.
		A Company of the Comp

Address of registered or principal office of Body Corporate (if applicable)

Address:	Greenstar Holdings Ltd
	Burton Court
	Burton Hall Drive,
	Sandyford,
	Dublin 18
	Registered in Ireland No. 325120
Tel:	(01) 2947900
Fax:	(01) 2947990
e-mail:	info@greenstar.ie

If the applicant is a body corporate, the following information must be attached as **Attachment B1**:

- a) a Certified Copy of the Certificate of Incorporation or Memorandum and Article of Association;
- b) the Company's Registration Number from the Companies Registry Office; and
- c) a list of the Company Directors.



State the interest of the applicant in the land which is subject to the application. The applicant is (please check):

Landowner		
Lessee		
Prospective		
Other (pleas	se specify)	
Name and a applicant na	address of all occupiers of the land on which the Activity is situated (if different timed above).	ent from
Name:	Not applicable	
Address:		
Tel:		
Fax:		
e-mail:	a.·	
37 1		
on which th	uddress of the current* owner(s) and lessees of the land, buildings and ancillary planted activity is or will be situated (if different from applicant named above). iately scaled drawing(\(\leq A3\)) showing the above details should be included in Attachi	
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on which the An appropri Name: Address: Tel: Fax: e-mail:	the activity is or will be situated (if different from applicant named above). iately scaled drawing(≤A3) showing the above details should be included in Attachr Not applicable From applicant named above). In the included in Attachr From applicant named above). In the included in Attachr From applicant named above).	
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Name: Address: Tel: Fax: e-mail: *Current at t	the activity is or will be situated (if different from applicant named above). iately scaled drawing(≤A3) showing the above details should be included in Attachm Not applicable Total different from applicant named above). Indicately scaled drawing(≤A3) showing the above details should be included in Attachm Not applicable Total different from applicant named above). Indicately scaled drawing(≤A3) showing the above details should be included in Attachm Not applicable Total different from applicant named above).	

National Grid Reference	2975E, 2670N
(8 digit 4E,4N)	

reinhard.wilkes@greenstar.ie

(0)41 - 98 21 650

(0)41 - 98 21 750

Location maps (\leq A3), appropriately scaled, with legible grid references should be enclosed in **Attachment B.2.** The site boundary must be outlined on the map in colour.

Tel:

Fax:

e-mail:



B.3 Planning Authority

Give the name of the planning authority in whose functional area the activity is or will be carried out.

Name:	Meath County Council			
Address:	Planning Department			
	Abbey Mall			
	Abbey Road			
	Navan			
	Co. Meath			
Tel:	046-9097000			
Fax:	046-9097001			

Has the Planning Authority received written notification from the applicant of the application to The Environmental Protection Agency for a Waste Licence under Article 9 of the Waste Management (Licensing) Regulations?

Planning Authority notified Yes No

Planning Permission relating to this application:-

Has been obtained is being processed is not yet applied for is not required	itoses only, any other use.
An Bord Pleanala File Reference	17.PA 0009 ething led

Attachment B.3 should contain *the most recent* planning permission, including a copy of *all* conditions, and the required copies of any EIS should also be enclosed. For existing activities, **Attachment B.3** should also contain copies of of the most recent waste licence and any permits in force at the time of submission. Where planning permission is not required for the development, provide reasons, relevant correspondence, *etc*.

B.4Sanitary Authority

In the case of a discharge of any trade effluent or other matter (other than domestic sewage or storm water) to a sewer of a sanitary authority or other body, give the name of the sanitary authority in which the sewer is vested or by which it is controlled and the waste water treatment plant (if any) to which the sewer discharges.

Name:	Not applicable
Address:	
Tel:	
Fax:	



The applicant must enclose, as **Attachment B.4**, a copy of any effluent discharge licence and/or agreement between the applicant and the body with responsibility for the sewer.

B.5 Other Authorities

The applicant should tick the appropriate box below to identify whether the activity is located within the Shannon Free Airport Development Company (SFADCo.) area.

Within SFADCo. Area	Yes	No 🖂
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The applicant should indicate the **Health Board Region** where the activity is or will be located.

Name:	Health Service Executive		
Address:	Dublin North-East		
	Dublin Road		
	Kells, Co Meath		
Tel:	046 928 0621		
Fax:	046 9241784		

B.6 Notices and Advertisements

Articles 6 and 7 of the Waste Management (Licensing) Regulations 2004 requires all applicants to advertise the application in a newspaper and by way of a site notice. See Guidance Note.

Attachment B.6 should contain a copy of the site notice and an appropriately scaled drawing (≤A3) showing its location on site. The original application must include the complete newspaper in which the advertisement was placed. The relevant page of the newspaper containing the advertisement should be included with the original and three copies of the application.

EPA Waste Licence Review Application

B.7 Type of Waste Activity, Tonnages & Fees

B.7.1 Specify the class or classes of activity in Table B.7.1, in accordance with the Third Schedule or Fourth Schedule to the Waste Management Acts 1996 to 2003, to which the application relates (check the relevant box(es) and mark the principal activity with a 'P').

Attachment B.7 should identify the principle activity and include a brief technical description of each of the other activities specified. **There can only be one principal activity.**

TABLE B.7.1 THIRD AND FOURTH SCHEDULES OF THE WASTE MANAGEMENT ACTS 1996 TO 2003

Waste Manage	ment	Acts 1996 to 2003	
THIRD SCHEDULE Waste Disposal Activities	Y/N	FOURTH SCHEDULE Waste Recovery Activities	Y/N
Deposit on, in or under land (including landfill).	Y	Solvent reclamation or regeneration.	N
2. Land treatment, including biodegradation of liquid or sludge discards in soils.	N	Recycling or reclamation of organic substances which are not used as solvents (including composting and other biological processes).	Y
 Deep injection of the soil, including injection of pumpable discards into wells, salt domes or naturally occurring repositories. 	Nose Purposi	Recycling or reclamation of metals and metal compounds.	N
Surface impoundment, including placement of liquid or sludged discards into pits, ponds or lagoons.	NY	4. Recycling or reclamation of other inorganic materials.	Y
5. Specially engineered landfill, including placement into line discrete cells which are capped and isolated from one another and the environment.	Y (P)	5. Regeneration of acids or bases.	N
6. Biological treatment not referred to elsewhere in this Schedule which results in final compounds or mixtures which are disposed of by means of any activity referred to in paragraphs 1 to 5 or paragraphs 7 to 10 of this Schedule.	Y	6. Recovery of components used for pollution abatement.	N
7. Physico-chemical treatment not referred to elsewhere in this Schedule which results in final compounds or mixtures which are disposed of by means of any activity referred to in paragraphs 1 to 5 or paragraphs 8 to 10 of this Schedule (including evaporation, drying and calcination).	N	7. Recovery of components from catalysts.	N
8. Incineration on land or at sea.	N	8. Oil re-refining or other re-uses of oil.	N
9. Permanent storage, including emplacement of containers in a mine.	N	9. Use of any waste principally as a fuel or other means to generate energy.	Y
10. Release of waste into a water body (including a seabed insertion).	N	 The treatment of any waste on land with a consequential benefit for an agricultural activity or ecological system. 	N
11. Blending or mixture prior to submission to any activity referred to in a preceding paragraph of this Schedule.	N	11. Use of waste obtained from any activity referred to in a preceding paragraph of this Schedule.	Y
12. Repackaging prior to submission to any activity referred to in a preceding paragraph of this Schedule.	N	 Exchange of waste for submission to any activity referred to in a preceding paragraph of this Schedule. 	N
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.	Y	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.	Y

TABLE B.7.2 MAXIMUM ANNUAL TONNAGE

The maximum annual tonnage of waste to be handled at the site should be indicated and the year to which the quantity relates indicated.

Maximum Annual Tonnage (tpa)	400,000 tpa for disposal	
	plus material	
	for engineering purposes	
Year	2009	

B.7.3 FEES

State each class of activity for which a fee is being submitted as per Part I of the Second Schedule of the Waste Management (Licensing) Regulations 2004, S.I. No. 395 of 2004. Note: two fees are required if disposal and recovery are to occur.

Waste Activity	Fee (in €)
Disposal of Waste (appropriate	€25,000
disposal activity $1.1 - 3.3$)	
Recovery of Waste (4)	€6,000
Total	_% . €31,000

TABLE B.7.4 (FOR A LANDFILL APPLICATION)

STATE WHICH OF THE FOLLOWING IS RELEVANT TO THE CURRENT APPLICATION.

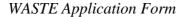
ithight	
(a) landfill for hazardous waste	
(b) landfill for non-hazardous waste	
(c) landfill for inert waste	
\$ G*	•

B.8 SEVESO II DIRECTIVE

State whether the activity is for the purposes of an establishment to which the European Communities (Control of Major Accident Hazards involving Dangerous substances) Regulations, 2000 (S.I. No. 476 of 2000), apply.

Regulations Apply	Yes	No 🖂
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If yes, **Attachment B.8** should include the relevant details. Supporting information, as well as copies of any Hazardous Operation Studies (HAZOP) carried out for the site, should also be included in the attachment.



SECTION C MANAGEMENT OF THE FACILITY

Advice on completing this section is provided in the *Guidance Note*.

C.1 Technical Competence and Site Management

This information should form **Attachment C 1**.

Details of the applicant's experience and qualifications, along with that of other relevant employees, should be summarised as shown below. Statements of duties, responsibilities, experience and qualifications should be submitted for each position named below. Additional information, including the management structure and an organisational chart, should be included in **Attachment C 1.**

Name	Position	Duties and	Experience /Qualifications
		Responsibilities	
Greenstar	Licensee	Overall responsibility for the landfill, its development, its operation and its effect on the environment including its aftercare	Greenstar is Ireland's leading provider of environmental, waste management and recycling solutions. It was established as 'Celtic Waste' in 1999. Employing more than 700 people across 40 sites nationwide, its range of services includes education, research, composting, recycling and the development of facilities for the safe disposal of waste that cannot be reused, recycled or recovered. Greenstar provides waste management solutions to industry, business and domestic customers and in 2007 handled over 1.7 million tonnes of waste, recycling or recovering over 70% of that waste. Greenstar owns and operates four EPA licensed, state-of-the-art residual landfill facilities at Kilcullen, County Kildare, Knockharley, County Meath, Kilconnell, Co. Galway and Ballynagran, Co. Wicklow. Greenstar has been awarded the Green Apple Award for excellence in landfill operations for its facility at Kilcullen, Co. Kildare. Most recently, Greenstar's residual landfill facility in Ballynagran, Co. Wicklow was awarded the Chartered Institute of Wastes Management (CIWM) PEEL Peoples Cup Award for operational excellence of a waste management facility in Ireland and in the UK. This is a clear demonstration of the company's ability to run landfills to the highest possible standards.



Name	Position	Duties and Responsibilities	Experience /Qualifications
Reinhard Wilkes	Landfill Manager	Landfill administration, communications, environmental protection.	Education ■ DiplIng.(FH) (Environmental Engineering), University for Applied Sciences in Münster, Germany, June 1998.
			 Training FAS National Certificate, Waste Management - Landfill, All Course Modules incl. Practical Assessment for Landfill, Autumn 1999. CIWM Certificate Practical Management and Control of Landfill Gas, July 2007.
		Ectips section but of the Consent of Consent of Constitution of the Consent of Consent o	ClWM Corporate Member, The Chartered Institution of Wastes Management, July 2002 CEnv Chartered Environmentalist, Society for the Environment, January 2006. VDI Corporate Member, Verein Deutscher Ingenieure (German Institution of Engineers), July 1997 Experience Landfill Manager, Greenstar., Knockharley Landfill (Waste Licence RegNo.: 146-1), since July 2004 Technologist, Celtic Anglian Water, Ringsend Wastewater Treatment Works, May 2002 until June 2004 Facility Manager, SITA Environmental Ltd. (Waste Licence RegNo.: 35-1), September 2000 until April 2002 Operations- and Environmental Manager, Padraig Thornton Waste Disposal Ltd. (Waste Licence RegNo.: 44-1), January 2000 until August 2000
			 Landfill Manager, Meath County Council, Basketstown Landfill Site (Waste Licence RegNo.: 10-1), July 1998 until December 1999



Name	Position	Duties and Responsibilities	Experience /Qualifications
Heather Miller	Assistant landfill manager	Landfill administration, communications, environmental protection.	 Education MA (Joint Hons) Environmental Science and Geography (Second Upper Class) Masters of Research in Civil Engineering (with Distinction) (EPSRC Sponsorship)
			 Training Qualified Internal Quality Assurance Auditor 2005 to Present
			 Membership CITB CSCS Health and Safety Qualification The Geological Society, Fellow
Robert Hughes	Site Foreman	Day-to day control and supervision of all site activities	 Education O-Level Certificates, Brynhyfryd School, Wales. Diploma in Engineering Drawings, City & Guilds, Plant Operations and Mechanics Training Construction Plant Competence Scheme (CSCS)
		For its pection purple for the consent of copyright owners	Construction Plant Competence Scheme (CSCS) Landfill Operations and Health & Safety Training, Greenstar, December 2004 Experience Site Foreman, Greenstar, Knockharley Landfill (Waste Licence RegNo.: 146-1), since December 2004 Earthworks Foreman, Logan Earthmoving Ltd., January 2004 until November 2004 Ownership of Dragon Plant Hire Ltd., January 2000 until December 2003 Plant and Machine Operator in various Engineering Companies, 1987 until 1999



Name	Position	Duties and Responsibilities	Experience /Qualifications
Sean Smith	Deputy Foreman	Day-to day control and supervision of all site activities	 Education Community College Navan, 1983 – 1988 Fabricator and Welder, Mathieu Bolton College of Engineering, Birmingham, 1988 until 1989
			 Training FETAC Level 6 Certificate in Waste Management, March 2008 CIWM Certificate Practical Management and Control of Landfill Gas, March 2008 Welding Test BS 4872 Part 1, Anco Training Centre Dundalk; Landfill Operations and Health & Safety Training, Greenstar, December 2004
		in perion purples	General Operative and Deputy Foreman, Greenstar, Knockharley Landfill (Waste Licence RegNo.: 146-1), since December 2004 Plant Operator, Logan Earthmoving Ltd., Knockharley Landfill, March 2004 until November 2004 Miner, Tara Mines Ltd., 1996 until 2002 Fabricator and Welder in various Steel Fabrication Companies, 1988 until 1996.

EPA Waste Licence Review Application

epa_

WASTE Application Form

C.2 Environmental Management System

Attachment C 2 should contain the Environmental Management System (EMS) details required.

C.3 Hours of Operation

Attachment C 3 should contain details of hours of operation for the waste facility, civic waste facilities and other facilities.

- (a) Proposed hours of operation.
- (b) Proposed hours of waste acceptance/handling.
- (c) Proposed hours of any construction and development works at the facility and timeframes (required for landfill facilities).
- (d) Any other relevant hours of operation expected.

C.4 Conditioning Plan

Address as **Attachment C 4**, in the case of a LANDFILL Application, and only for the review of a Landfill Waste Licence.

The Landfill Directive was adopted on July 2002 with the adoption of the Waste Management Licensing (Amendment) Regulations 2002 and European Communities (Amendment of Waste Management (Licensing) Regulations 2000) Regulations 2002. Article 14 of the Directive states that a Conditioning Plan shall be prepared for sites that were in operation at the time of transposition. Knockharley did not commence operation until December 24th 2004. Thus a Conditioning Plan is not required.



SECTION D INFRASTRUCTURE & OPERATION

D.1 Infrastructure

Complete the following table detailing the site infrastructure. **Attachment D 1** should contain the appropriate documentation. Information provided should follow the sequence, and use the headings, established in Table D.1. Additional advice on completing this section is provided in the application *Guidance Note*.

Table D.1. Infrastructure		y/n	Comments
D.1.a	Site security arrangements including gates and fencing	N	No Change proposed
D.1.b	Designs for site roads	Υ	See attachment D.1 Section D.1.b
D.1.c	Design of hardstanding areas	Z	No Change proposed
D.1.d	Plant Allet 115.	Υ	See attachment D.1 section D.1.d
D.1.e	Wheel-wash	Υ	See attachment D.1 Section D.1.e
D.1.f	Plant Wheel-wash Laboratory facilities Design and location of fuel storage areas	Ν	There is no laboratory at the site
D.1.g	Design and location of fuel storage areas	Ν	No Change proposed
D.1.h	Waste quarantine areas	Ν	No Change proposed
D.1.i	Waste inspection areas	Ν	No Change proposed
D.1.j	Traffic control	Z	No Change proposed
D.1.k	Sewerage and surface water drainage infrastructure	Ν	No Change proposed
D.1.l	All other services	N	No Change proposed
D.1.m	Plant sheds, garages and equipment compound	N	No Change proposed
D.1.n	Site accommodation	N	No Change proposed
D.1.0	A fire control system, including water supply	Ν	No Change proposed



Table	D.1. Infrastructure	y/n	Comments
D.1.p	Civic amenity facilities	N	There are no civic amenity facilities at the site
D.1. q	Any other waste recovery infrastructure	Ν	No Change proposed
D.1.r	Composting infrastructure	Ν	No Change proposed
D.1. s	Construction and Demolition waste infrastructure	Y	See attachment D.1 section D.1.s
D.1.t	Incineration infrastructure (if applicable). Provide information to fulfil Article 4 (2) & (3) of the Incineration of Waste Directive	Ζ	There are no incineration activities proposed
D.1.u	Any other infrastructure	N	Not applicable

D.2 Facility Operation

In Attachment D 2 describe the plant, methods, processes and operations of the waste facility, as required by the Guidance Note,

A44141111	Contraction of the contraction o		
Attachment included	yes 🖂	no	not applicable
	at of		

LANDFILLS

The following Sections D3 to D7 should only be completed for Landfill Applications. Reference should be made to the Agency landfill manual 'Landfill Site Design (2000)' when completing this section.

D.3 Liner System

Complete the following table regarding the liner system to be used for the landfill/landfill extension and detail the information requested as Attachment D.3. Items D3c to D3g should only be completed for immediate projects only (ie Years 1 & 2). A schedule of Liner construction activities for the medium to long term need only be listed in item D3a below, since Condition 3 of any licences granted will provide reporting requirements for any future projects.

TABLE D.3 LINER SYSTEM

		y/n	Comments
D.3.a	Provide information to fulfil Annex 1 of the Landfill Directive	Y	See Attachment D.3 section D3a
D.3.b	What type of liner system is specified?	Υ	See Attachment D.3 section D3b
D.3.c	Has a Quality Control Plan been specified?	Υ	See Attachment D.3 section D3c
D.3.d	Has a Quality Assurance Plan been specified?	Υ	See Attachment D.3 section D3d
D.3.e	Have independent, third-party supervision, testing and controls been specified?	Υ	See Attachment D.3 section D3e
D.3.f	Have basal gradients for all cells and access ramps to the cells been designed?	Υ	See Attachment D.3 section D3f
D.3.g	Has a leak detection survey been specified?	Ϋ́	See Attachment D.3 section D3g

D.4 Leachate Management

Complete the following table detailing leachtate management arrangements. Further information should be included in Attachment D.4.

TABLE D.4.1 LEACHATE MANAGEMENT ARRANGEMENTS

	CONSOLUTION CONTRACTOR	y/n	Comments
D.4.a	Is there a Leachate Management Plan?	Υ	See attachment D.4 section D.4a and also Section 3.2 and 3.4.2 of the EIS
D.4.b	Have annual quantities of leachate been calculated?	Υ	See EIS Section 3.4.2 and attachment D.4 section D.4b
D.4.c	Has the total quantity of leachate been calculated?	Υ	See EIS Section 3.4. 2 and attachment D.4 section D.4c
D.4. d	Have the size of the cells been specified taking account of the water balance calculations?	Υ	See attachment D.4 section D.4d
D.4.e	Has a leachate collection system been specified?	Υ	See EIS Section 3.2 and attachment D.4 section D.4e
		Υ	See attachment D.4

D.4.f	Has a leachate storage system been specified?		section D.4f
D.4.g	Has a system for monitoring the level of leachate in the waste been designed?	Υ	See attachment D.4 section D.4g
D.4.h	Is leachate recirculation proposed/practised?	Υ	See attachment D.4 section D.4h
D.4. i	Has leachate treatment on-site been specified?	N	See attachment D.4 section D.4i
D.4.j	Has leachate removal been specified?	Υ	See attachment D.4 section D.4j

D 5 Landfill Gas Management

All landfill sites should have suitable arrangements for the management of landfill gas. **Attachment D.5** should contain the appropriate documentation. Information provided should follow the sequence, and use the headings, established in Table D.5. **Items D5g to D5m should only be completed <u>for immediate or current gas collection projects only</u> (ie Years 1 & 2). A schedule of gas management aspects for the medium to long term need only be listed in item D5f below, since Condition 3 of any proposed decision/licence will provide reporting requirements for any future projects.**

Table D.5. Landfill Gas Management

	Sect wife	y/n	Comments
D. 5a	Is there a Landfill Gas Management Plan? Provide estimates of the volumes of landfill gas which will be produced by the waste disposed of in the site for the next 20 years, and compare to the EPER list for methane:	Υ	See EIS Section 3.4.2 See also attachment D.5 section D.5a
D.5b	Is there a passive venting system?	Υ	See attachment D.5 section D.5b
D.5 c	Does the passive system cover all of the filled area?	Υ	See attachment D.5 section D.5c
D.5d	Have gas alarm systems been installed in the site buildings?	Υ	See attachment D.5 section D.5d
D.5e	Have measures been installed to prevent landfill gas migration (e.g. barriers)?	Υ	See attachment D.5 section D.5e

D.5f	Has a time-scale been proposed for the installation of landfill gas infrastructure?	Y	See attachment D5 section D.5f
D.5g	Is gas flaring undertaken at the site?	Υ	See attachment D.5 section D.5a
D.5h	Is there an active (i.e., pumped) landfill gas extraction system?	Y	See attachment D.5 section D.5a
D.5i	Does the active system cover all of the filled area?	Υ	The active system covers all of the filled area with the exception of the active cells. It is impractical to install or operate the active system while waste is being placed.
D. 5j	Is landfill gas used to generate energy at the site?	N	See attachment D.5 section D.5j. The site is ready to generate electricity but its commencement is contingent on the ESB providing a grid connection. That facility is expected shortly.
D.5k	Have emissions from the flarestack and utilisation plant been assessed for source, composition, quantity and level and rate?	Yother	The flare stack and its efficiency is continuously monitored and the data is recorded on the SCADA system. Similar monitoring will apply to the utilisation plant when installed.
D.51	Has a maintenance programme for the control system been specified?	Υ	All gas-flare control equipment is maintained on an ongoing basis by the LFG contractor. The engine(s) will be similarly maintained.
D.5m	Has a condensate removal system been designed?	Υ	See attachment D.5 section D.5a

D.6 Capping System

Complete the following table detailing the design of the capping system. Attachment D.6 should contain the appropriate documentation. *Items D6e to D6k should be completed for immediate projects only* (ie Years 1 & 2). Condition 10 of any proposed decision/licence will provide reporting requirements for capping requirements beyond this timeframe.

Table D.6 Capping System

		y/n	Comments
D.6a	Has the daily cover been specified?	Υ	See attachment D.6 section D.6a
D.6b	Has the intermediate cover been specified?	Υ	See attachment D.6 section D.6b
D.6c	Has the temporary capping been specified?	N	See attachment D.6 section D.6c
D.6d	Has the Capping System been designed and does it meet the requirements of the Landfill Directive Annex 1 (3.3)?	Υ	See attachment D.6 section D.6d
D.6e	Does the Capping System include a flexible membrane liner?	Υ	See attachment D.6 section D.6e to i
D.6f	Have all capping materials been specified?	N	See attachment D.6 section D.6e to i
D. 6g	Has a Method Statement for construction been produced?	N Suge.	See attachment D.6 section D.6e to i
D.6h	Has a Quality Control Plan been produced?	N	See attachment D.6 section D.6e to i
D.6i	Has a Quality Assurance Plan been described to produced?	N	See attachment D.6 section D.6e to i
D.6j	Has a programme for monitoring landfill stability been developed?	Υ	Stability analysis is based on an annual topographic survey and on visual inspections by the site staff. The designed shape of the landfill lends itself to a stable landform.
D.6k	Has a programme for monitoring landfill settlement been developed?	Υ	An annual topographic survey is undertaken and, where relevant (i.e. where waste has not been placed in the interim), compared with previous surveys. The site staff is instructed to observe and report any slippages, cracks etc. Slope stability is modelled using the 'Slope/W' software.

SECTION E EMISSIONS

Give particulars of the source, location, nature, composition, quantity, level and rate of emissions arising from the activity and, where relevant, the period or periods during which such emissions are made or are to be made.

The applicant should address in particular any emission point where the substances listed in the Schedule of S.I. 394 of 2004 are emitted.

E.1 Emissions to Atmosphere

Details of all point emissions to atmosphere should be supplied. Table E.1.(i) (for Landfill Gas Flare emissions) must be completed for all landfills with a flare. Complete Table E.1(ii) and E.1(iii) for <u>all</u> other main emission points, including stack sources (incinerator stacks, landfill gas utilisation plants, air handling unit emissions etc.). Complete Table E.1(iv) for minor/fugitive/ground emission points.

E.2 Emissions to Surface Waters

Attachment E.2 Tables E.2(i) and E.2(ii) should be completed where relevant.

E.3 Emissions to Sewer

Attachment E.3 Tables E.3(i) and E.3(ii) should be completed, where relevant.

E.4 Emissions to Groundwater

Describe the existing or proposed arrangements necessary to give effect to Articles 3,4,5,6, and 7 of Council Directive 80/68/EEC of 17 December 1979 on the protection of groundwater against pollution by certain dangerous substances.

Table E.4(i) should be completed, as relevant, for each source.

Supporting information should form **Attachment E.4**

E.5 Noise Emissions

Give particulars of the source, location, nature, level, and the period or periods during which the noise emissions are made or are to be made.

Table E.5(i) should be completed, as relevant, for each source.

Supporting information should form **Attachment E.5**



E.6 Environmental Nuisances

Attachment E.6 should contain the appropriate documentation. Information provided should follow the sequence, and use the headings as relevant established in Table D.6. Additional advice on completing this section is provided in the *Guidance Note*.

TABLE E.6 ENVIRONMENTAL NUISANCES

Bird Control	Control method specified	yes 🖂	no	not applicable
	Attachment included	yes 🖂	no	not applicable
Dust Control	Control method specified	yes 🖂	no	not applicable
	Attachment included	yes 🖂	no	not applicable
Fire Control	Control method specified	yes 🖂	no	not applicable
	Attachment included	yes 🖂	no	not applicable
Litter Control	Control method specified	yes 🖂	no _	not applicable
	Attachment included	yes 🏻	no	not applicable
Traffic Control	Control method specified	es dioi	no	not applicable
	Attachment included	wiit yes 🖂	no	not applicable
Vermin Control	Control method ground specified	yes 🖂	no	not applicable
	Attachment included	yes 🖂	no	not applicable
Road Cleansing	Control method specified	yes 🖂	no	not applicable
	Attachment included	yes 🖂	no	not applicable



SECTION F CONTROL & MONITORING

F.1: Treatment, Abatement and Control Systems

Describe the proposed technology and other techniques for preventing or, where this is not possible, reducing emissions from the installation/facility. Details of treatment/abatement systems (air and effluent emissions) should be included, together with appropriately scaled schematics ($\leq A3$) as appropriate.

For each Emission Point identified complete Table F.1 of the Annex, and include detailed descriptions and appropriately scaled schematics (≤A3) of all abatement systems.

Attachment F.1 should contain any supporting information.

F.2- F. 9. Monitoring and Sampling Points

Programmes for environmental monitoring should be submitted as part of the application. These programmes should be provided as **Attachments F.2 to F.6** and meet the advice published by the Agency in the relevant BAT Note. For Landfills the additional **Attachments F.7 to F.8** should be completed. Furthermore for a landfill application the applicant <u>must</u> refer to the Agency *Landfill Monitoring Manual* (2003) for further details on monitoring requirements for proposed facilities.

Include details of monitoring/sampling locations and methods.

F.2 Air - to include Dust, Odour

Monitoring Arrangements specified	yes 🖂	no	not applicable
Monitoring points identified, (plus	yes 🖂	no	not applicable
12-figure grid references)			
Attachment included	yes 🖂	no	not applicable

F.3 Surface Water

Monitoring of surface water shall be carried out at not less than two points, one upstream from the waste facility and one downstream.

Monitoring Arrangements specified	yes 🖂	no	not applicable
Monitoring points identified, (plus	yes 🖂	no	not applicable
12-figure grid references)			
Attachment included	yes 🖂	no	not applicable



F.4 Sewer Discharge

Monitoring of sewer discharge shall be carried out at the point specified by the local authority/Agency.

Monitoring Arrangements specified	yes 🗌	no	not applicable
Monitoring points identified, (plus	yes 🗌	no	not applicable
12-figure grid references)			
Attachment included	yes 🗌	no	not applicable $oxtime $

F.5 Groundwater

Groundwater monitoring is required at all landfill facilities; and certain other waste facilities depending on waste activities and the underlying aquifer vulnerability.

Monitoring Arrangements specified	yes 🖂	no	not applicable
Monitoring points identified, (plus	yes 🖂	no	not applicable
12-figure grid references)			
Attachment included	yes 🖂	no	not applicable

F.6 Noise

Monitoring Arrangements specified	yes Sol	no	not applicable
Monitoring points identified, (plus	yes	no	not applicable
12-figure grid references)	an Pilitedil		
Attachment included	yes 🖂	no	not applicable

F.7 Meteorological Data

Monitoring Arrangements specified	yes 🖂	no	not applicable
Monitoring points identified, (plus	yes 🖂	no	not applicable
12-figure grid references)			
Attachment included	yes 🖂	no	not applicable

Application for Landfills require the additional Attachments F.7 to F.8, to be completed:

F.8 Leachate

Monitoring Arrangements specified	yes 🖂	no	not applicable
Monitoring points identified, (plus	yes 🖂	no	not applicable
12-figure grid references)			
Attachment included	yes 🖂	no	not applicable

F.9 Landfill Gas

Complete each of the following tables to show whether information has been included on aspects of landfill gas monitoring. Attachment F.9 should also contain information to show whether the data given in Tables F.9.(a) and F.9(b) below represents actual or anticipated data. Complete Table F.9 as follows:

Table F 9 (a) Landfill Gas Monitoring for existing landfill gas flares / utilisation plants

rable F.9 (a) Landilli Gas Monit				36.1.1.0	T C .:
Parameter	Concentration	Proposed	Information	Method of	Information
	(mg/Nm^3)	Frequency of	Included Y/N	Analysis	Included Y/N
		Analysis			
Inlet					
Methane (CH ₄) % v/v	38.86	Annually	Υ	IR Analyser	
Carbon dioxide (CO ₂) %v/v	25.43	Annually	Υ	IR Analyser	
Oxygen (O ₂) % v/v	3.18	Annually	Υ	Electrochemi	
				cal cell	
Outlet					
Volumetric Flow Rate (m ³ /h)	810				
SO ₂					
Nox	37	Annually	Υ	Chemilumine	
				scence	
CO	15	Annually	Υ	NDIR	
Particulates					
TA Luft Class I, II, III					
organics			2.		
Hydrochloric acid	4.4	Annually	Y, JSE.	IC	
Hydrogen Fluoride	3.5	Annually	Ne.	IC	

Table F.9(b) Landfill Gas Monitoring						
Parameter	Proposed Frequency of		Information Included Y/N	Method of Analysis	Information Included Y/N	
	Gas boreholes / vents/ wells/ perimeter locations	Facility Office				
Methane (CH ₄) % v/v	Monthly Control	Continuous	Υ	GA 94*		
Carbon Dioxide (CO ₂) % v/v	Monthly	Continuous	Υ	GA 94*		
Oxygen (O ₂) % v/v	Monthly	Continuous	Υ	GA 94*		
Atmospheric Pressure	Monthly	-	Υ	GA 94*		
Temperature	Monthly	-	Υ	GA 94*		

Table F.9 (c) Landfill Gas Infrastructure

Monitoring Frequency	Information Included Y/N	Monitoring Action	Information Included Y/N
Monthly	Y	Visual and aural and olofactory inspection for leaks	
Fortnightly		Field balancing to optimise gas yield	
Monthly	Y	Verification that SCADA is collecting and storing data, and that valves and flare are responding to control inputs	
	Monthly Fortnightly	Frequency Included Y/N Monthly Y Fortnightly	Frequency Included Y/N Monthly Y Visual and aural and olofactory inspection for leaks Fortnightly Field balancing to optimise gas yield Monthly Y Verification that SCADA is collecting and storing data, and that valves and flare are responding to

Monitoring Arrangements specified	yes 🖂	no	not applicable
Monitoring points identified, (plus	yes 🖂	no	not applicable
12-figure grid references)			
Attachment included	yes 🖂	no	not applicable

SECTION G RESOURCES USE & ENERGY EFFICIENCY

G.1 Raw Materials, Substances, Preparations and Energy

Attachment G.1 should contain a list of all raw, product and ancillary materials, substances, preparations, fuels and energy which will be utilised in or produced by the activity. Information on any insecticides, herbicides or rat poisons etc. should also be provided with their respective data and safety sheets. The Standard Forms, provided in Annex 1, should be used in the description of these materials, substances, etc., where relevant. Additional advice on completing this section is provided in the *Guidance Note*.

Attachment	yes 🛛 no 🗌 not applicable 🗌	
included	· — — — — —	
		_
G.2 Energy Efficiency		
A description of the energy is	ised in or generated by the activity must be provided in	
Attachment G.2.	isca in or generated by the aggreety must be provided in	
Attachment G.2.	i statie	
	outs, aux	
A 440 olement	was North and and and and	
Attachment	yes karana yes ver not applicable	
included	ight stru	
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SECTION H MATERIALS HANDLING

H.1 Waste Types and Quantities – Existing & Proposed

Provide an estimation of the quantity of waste likely to be handled in relation to each class of activity applied for. This information should be included in Table H.1(a).

TABLE H.1(A). QUANTITIES OF WASTE IN RELATION TO EACH CLASS OF ACTIVITY APPLIED FOR

Waste Man	Waste Management Act		Waste Management Act		
3rd Schedule (D	3rd Schedule (Disposal) Activities		4th Schedule (Recovery) Activities		
Class of	Quantity (tpa)	Class of	Quantity (tpa)		
Activity		Activity			
Applied For		Applied For			
Class 1	400,000	Class 1			
Class 2		Class 2	Q.+		
Class 3		Class 3	1 USE		
Class 4		Class 4	Sille		
Class 5	400,000	Class 5x3 x5			
Class 6		Class & Co			
Class 7		Class			
Class 8		Class 8			
Class 9		Cit ^O Class 9			
Class 10	.75	Class 10			
Class 11	£01.515	Class 11			
Class 12	COD	Class 12			
Class 13	at of	Class 13			
	Consentation				

In Table H. 1 (B) provide the annual amount of waste handled/to be handled at the facility. Additional information should be included in **Attachment H.1.** The tonnage per annum should be given of that expected for the life of the licence, with at least the next five years tonnages provided. For Landfill Review applications provide an estimate of the quantity of waste already deposited in (i) lined cells; (ii) unlined cells.

TABLE H.1(B) ANNUAL QUANTITIES AND NATURE OF WASTE

Year	Non-hazardous waste for disposal (tonnes per annum)	Bound Asbestos (tonnes per annum)	Total annual quantity of waste for disposal
2000	200.000	10.000	(tonnes per annum)
2009	390,000	10,000	400,000
2010	390,000	10,000	400,000
2011	390,000	10,000	400,000
2012	390,000	10,000	400,000
2013	390,000	10,000	400,000



532,821 tonnes have been disposed in the landfill since it opened in December 2004.

A detailed inventory of the types and quantities of wastes currently handled at the site and proposed to be handled should be submitted as Table H.1 (C).

TABLE H.1 (C) WASTE TYPES AND QUANTITIES FOR DISPOSAL

WASTE TYPE	TONNES PER ANNUM (existing) as per existing licence	TONNES PER ANNUM (proposed) for approximately eight years
Household	100,000	180,000 of H/C
Commercial	45,000	
Sewage Sludge	0	0
Construction and Demolition	25,000	90,000
Industrial Non- Hazardous Sludges	0	10,000
Industrial Non- Hazardous Solids	30,000	Up to 150,000 including stabilised by products of other waste management processes
Hazardous *(Specify detail in Table H 1.2)	Consent of copyright on	10,000
Inert Waste imported for restoration purposes	Conse COMPLETE	No limit where used in landfill engineering FACILITIES ONLY

Note 1: The individual limitation on waste types may be varied with the agreement of the Agency subject to the overall total limit staying the same.

Note 2: Although the indicative tonnages presented above add up to more than 400,000 tonnes, no more than 400,000 tonnes will be accepted in a single year.

• TABLE H.1.2 HAZARDOUS WASTE TYPES AND QUANTITIES

HAZARDOUS WASTE	DETAILED DESCRIPTION * REFERENCE SHOULD BE MADE TO THE RELEVANT EUROPEAN WASTE CATALOGUE CODES AS PRESENTED BY COMMISSION DECISION 2000/532/EC	Tonnes Per Annum (Existing)	(Tonnes Per Annum Proposed)
Waste Oil	-	0	0
Oil filters	-	0	0
Asbestos	17 05 06	0	10.000
Paint and Ink	-	0	0
Batteries	-	0	0
Fluorescent Light Bulbs	-	0	0
Contaminated Soils	-	0	0
OTHER HAZARDOUS WASTE (APPLICANT TO SPECIFY)			
Not applicable	- met lize.	-	-

Attachment H.1 should contain any relevant additional information.

It should be noted that an applicant may be issued with a licence which restricts the type of wastes which may be deposited.

H.2 Waste Acceptance Procedures

Procedures for checking waste loads as they arrive at the facility must be included. These should follow the requirements of the Agency's Waste Acceptance Manual. A copy of these procedures and other associated documentation should be included as **Attachment H.2.**

H.3 Waste Handling

Waste handling and the operating procedures used at the facility including waste treatment processes should be described in **Attachment H.3**. Included in the attachment should be information on the plant used on site and on the methods and processes for handling waste on-site. Special requirements hold for contaminated soil facilities, see *Guidance Note*.

In addition, an application for a Landfill requires Section H.3.a to be completed:

H.3a Waste Handling at the Landfill Facility

State whether all waste will be subject to treatment prior to landfilling. Provide information as to the quantities of biodegradable municipal waste and how the



targets of the Landfill Directive (1999/31/EC) relating to that waste type are to be achieved. In particular describe how the following will be achieved:

- (a) a reduction by 16/07/06 to 75% by weight of the total amount of biodegradable municipal waste produced in 1995 or the latest year before 1995 for which standardised Eurostat data is available;
- (b)a reduction by 16/07/09 to 50% by weight of the total amount of biodegradable municipal waste produced in 1995 or the latest year before 1995 for which standardised Eurostat data is available;
- (c)a reduction by 16/07/16 to 35% by weight of the total amount of biodegradable municipal waste produced in 1995 or the latest year before 1995 for which standardised Eurostat data is available:
- (d)Evidence should be provided to show that energy will be used efficiently.

Refer to Attachment H.3a.

H.4 Waste Arisings

Waste Arisings should be considered for all contaminated soil applications. Details of all waste materials generated on the site including, name, description and nature as well as the source(s) should be identified. The quantities of each type of waste generated on an annual/monthly basis should be calculated and stated in Tables H.1(i) and H. 1(ii) of the application form. Applicants should also provide conversion factors used to relate volume (m³) and tonnage (t) for their waste stream.

Leachate and landfill gas are the principal wastes arising on site. Office use and construction gives rise to a small quantity of 'domestic' waste. All such wastes are source segregated and sent off site for processing with the residual fraction being landfilled.

SECTION I EXISTING ENVIRONMENT & IMPACT OF THE FACILITY

Detailed information is required to enable the Agency to assess the existing environment. This section requires the provision of information on the ambient environmental conditions at the site prior to the commencement of waste management activities or prior to the receipt of a review application.

Where development is proposed to be carried out, being development which is of a class for the time being specified under Article 24 (First Schedule) of the Environmental Impact Assessment Regulations, the information on the state of the existing environment should be addressed in the EIS. In such cases, it will suffice for the purposes of this section to provide adequate cross-references to the relevant sections in the EIS.

I.1. Assessment of atmospheric emissions

Describe the existing environment in terms of air quality with particular reference to ambient air quality standards.

Provide a statement whether or not emissions of main polluting substances (as defined in the Schedule of S.I. 394 of 2004) to the atmosphere are likely to impair the environment.

Give summary details and an assessment of the impacts of any existing or proposed emissions on the environment, including environmental media other than those into which the emissions are to be made.

Attachment I.1 should also contain full details of any dispersion modelling of atmospheric emissions from the activity, where required.

I.2. Assessment of Impact on Receiving Surface Water

Describe the existing environment in terms of water quality with particular reference to environmental quality standards or other legislative standards. Table I.2(i) should be completed

Provide a statement whether or not emissions of main polluting substances (as defined in the Schedule of S.I. 394 of 2004) to water are likely to impair the environment.

Give summary details and an assessment of the impacts of any existing or proposed emissions on the environment, including environmental media other than those into which the emissions are to be made.

Full details of the assessment and any other relevant information on the receiving environment should be submitted as **Attachment I.2.**

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WASTE Application Form

I.3. Assessment of Impact of Sewage Discharge.

Give summary details and an assessment of the impacts of any existing or proposed emissions on the environment, including environmental media other than those into which the emissions are to be made.

Full details of the assessment and any other supporting information should form **Attachment I.3.**

I.4 Assessment of impact of ground/groundwater emissions

The scope and detail of this assessment will depend to a large extent on the extent and type of ground emissions at any site, which in turn are related to the risk. Details should be included in **Attachment I.4**. Comprehensive guidelines are contained in the *Application Guidance Note*, and include particular requirements for landfill and brownfield facilities.

Describe the existing groundwater quality. Tables I.4(i) should be completed.

I.5 Ground and/or groundwater contamination

Summary details of known ground and/or groundwater contamination, historical or current, on or under the site must be given.

Full details including all relevant investigative studies, assessments, or reports, monitoring results, location and design of monitoring installations, appropriately scaled plans/drawings (≤A3), documentation, including containment engineering, remedial works, and any other supporting information should be included in **Attachment I.5**.

I.6 Noise Impact.

Give details and an assessment of the impacts of any existing or proposed emissions on the environment, including environmental media other than those into which the emissions are to be made.

Ambient noise measurements

Complete Table I.6(i) in relation to the information required below:

- (i) State the maximum Sound Pressure Levels which will be experienced at typical points on the boundary of the operation. (State sampling interval and duration)
- (ii) State the maximum Sound Pressure Levels which will be experienced at typical noise sensitive locations, outside the boundary of the operation.



(iii) Give details of the background noise levels experienced at the site in the absence of noise from this operation.

Prediction models, appropriately scaled maps (\leq A3), diagrams and supporting documents, including details of noise attenuation and noise proposed control measures to be employed, should form **Attachment I.6.**

I.7 Assessment of Ecological Impacts & Mitigation Measures

The ecology of the site and the surrounding area should be assessed in the vicinity of the largescale waste facilities such as landfill or incinerator developments. An assessment of the ecology should form **Attachment I.7.** Comprehensive guidelines are contained in the *Application Guidance Note*



SECTION J ACCIDENT PREVENTION & EMERGENCY RESPONSE

Describe the existing or proposed measures, including emergency procedures, to minimise the impact on the environment of an accidental emission or spillage.

Also outline what provisions have been made for response to emergency situations outside of normal working hours, i.e. during night-time, weekends and holiday periods.

Describe the arrangements for abnormal operating conditions including start-up, leaks, malfunctions or momentary stoppages.

Supporting information should form Attachment J.

Attachment included	yes 🖂	no	not applicable

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SECTION K REMEDIATION, DECOMMISSIONING, RESTORATION AND AFTERCARE

Describe the existing or proposed measures to minimise the impact on the environment after the activity or part of the activity ceases operation, including provision for post-closure care of any potentially polluting residuals.

For Landfill Applications, capping proposals are required, and reference should be made to the *Landfill Manual on 'Restoration and Aftercare'* published by the Agency, when completing this section.

Attachment included	ves 🖂	no	not applicable





SECTION L STATUTORY REQUIREMENTS

L. 1 Section 40(4) WMA

Indicate how all the requirements of Section 40(4)[(a) to (i)] of the Waste Management Acts 1996 to 2003 will be met.

Applicants should also describe how the proposed facility will comply with the requirements of BAT. In particular reference should be made to the considerations referred to in Annex IV of Council Directive 96/61/EC concerning integrated pollution prevention and control.

Attachment L.1 should contain the documentation requested above, along any relevant additional information.

Attachment included	yes 🖂	no	not applicable
			Es.
L.2 Fit and Proper Person		other differ	•

The WMA in Section 40(4)(d) specifies that the Agency shall not grant a licence unless it is satisfied that the applicant (if the applicant is not a local authority) is a fit and proper person. Section 40(7) of the WMA specifies the information required to enable a determination to be made by the Agency.

- Indicate whether the applicant or other relevant person has been convicted under the Waste Management Acts 1996 to 2003, the EPA Act 1992 and 2003, the Local Government (Water Pollution) Acts 1977 and 1990 or the Air Pollution Act 1987
- Provide details of the applicant's technical knowledge and/or qualifications, along with that of other relevant employees (Link to Section C.1 of the application).
- Provide information to show that the person is likely to be in a position to meet any financial commitments or liabilities that may have been or will be entered into or incurred in carrying on the activity to which the application relates or in consequence of ceasing to carry out that activity (Link to Section K of the application).

Supporting information should be included as **Attachment L 2** with reference to where the information can be found in the application.

Attachment included	yes 🖂	no	not applicable

SECTION M DECLARATION

Declaration

I hereby make application for a licence / revised licence, pursuant to the provisions of the Waste Management Acts 1996 to 2003 and Regulations made thereunder.

I certify that the information given in this application is truthful, accurate and complete.

I give consent to the EPA to copy this application for its own use and to make it available for inspection and copying by the public, both in the form of paper files available for inspection at EPA and local authority offices, and via the EPA's website. This consent relates to this application itself and to any further information, submission, objection, or submission to an objection whether provided by me as Applicant, any person acting on the Applicant's behalf, or any other person.

Signed by: Margan	Burke	Offic Date : 23/12/2008
(on behalf of the organisation) Print signature name:	Morgan Burk	TA, Suy
	a Build diffe	icensing Manager
Position in organisation:	For it dit	icensing Manager
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