ANNUAL ENVIRONMENTAL REPORT STARRUS ECO HOLDINGS LTD GOREY BUSINESS PARK, GOREY COUNTY WEXFORD LICENCE NO. W0220-01 JANUARY 2017 – DECEMBER 2017

Prepared For: -

Starrus Eco Holdings Ltd, Fassaroe, Bray, Co. Wicklow

Prepared By: -

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6th April 2018

Project	Annual En	Annual Environmental Report 2017				
Client	Starrus Ec	o Holdings L	td.			
	W0220-01					
Report No	Date	Status	Prepared By	Reviewed By		
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TABLE OF CONTENTS

PAGE

1.	INTRODUCTION	1
2.	SITE DESCRIPTION	2
2.	1 SITE LOCATION & DESCRIPTION	2
2.2	2 WASTE MANAGEMENT ACTIVITIES	2
	2.2.1 Waste Types & Processes	2
	2.2.2 Plant List	3
3.	EMISSION MONITORING	4
3.	1 WASTE WATER PROGRAMME	4
3.2	2 GROUND WATER MONITORING	6
3.3	Noise Monitoring	8
4.	SITE DEVELOPMENT WORKS	10
4.	1 Specified Engineering Works	10
4.2		
4.3	3 TANK AND PIPELINE INTEGRITY TESTING	10
5.	WASTE RECEIVED AND CONSIGNED FROM THE FACILITY	11
6.	ENVIRONMENTAL INCIDENTS AND COMPLAINTS	13
6.	1 Incidents	13
6.2		
7.	ENVIRONMENTAL DEVELOPMENT & CONTROL	14
7.	1 Environmental Management Programme Report	14
	7.1.1 Schedule of Objectives 2017	14
	7.1.2 Schedule of Objectives 2018	14
7.2	2 Management Structure	17
	7.2.1 Staff Training	
7.3		
7.4		
7.5		
7.0		
7.		18
7.8		
\mathbf{D}_{I}	AMAGE	18
8.	OTHER REPORTS	20

APPENDIX 1 - European Pollutant Release and Transfer Register

APPENDIX 2 - Procedures List

1. INTRODUCTION

This is the 2017 Annual Environmental Report (AER) for the Starrus Eco Holdings Ltd (SEHL), Materials Recovery & Transfer facility (MRF) at Gorey Business Park, Ramstown, Gorey, County Wexford. It covers the period from the 1st January 2017 to the 31st December 2017. The transfer of the licence from Greenstar Limited to Starrus Eco Holdings Ltd was completed in March 2014.

The content is based on Schedule F of the Industrial Emissions (IED) Licence (Reg. No. W0220-01) and the report format follows guidelines set in the "Guidance Note for Annual Environmental Report" issued by the Environmental Protection Agency (Agency)¹. Account is also taken of the AER Draft Guidance Document and AER Information Templates issued by the Agency in January 2013².

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¹ EPA (Environmental Protection Agency) 1999 Waste Licensing – Draft Guidance on Environmental Management Systems and Reporting to the Agency

² EPA (Environmental Protection Agency) 2012 Draft AER Guidance Document

2. SITE DESCRIPTION

2.1 Site Location & Description

The installation is located at Gorey Business Park, Ramstown Lower, Gorey, Co Wexford. The site encompasses 3,040m² (0.7 acres) and is accessed by an internal road serving the Business Park.

There are two interconnected steel portal frame buildings, which encompass approximately 1,000m² and comprise the waste transfer building. The remaining area comprises open yard areas, paved with concrete, a weighbridge and associated weighbridge office. An installation office is adjacent to the yard.

2.2 Waste Management Activities

The licence allows SEHL to accept and process up to 30,000 tonnes of waste per annum, comprising commercial/industrial non-hazardous waste, household waste, and construction and demolition wastes. All waste processing takes place inside the waste transfer building, as specified in Condition 8.1 of the licence.

2.2.1 Waste Types & Processes

The installation is licensed to accept the following waste types and quantities, as specified in Schedule A of the Licence: -

- Household Waste (18,000 tonnes),
- Commercial & Industrial and Construction & Demolition (12,000 tonnes).

The key processes carried out at the installation include: -

- Segregation of C&I into different waste streams (paper, cardboard, glass, metal, green waste and wood) for further recovery at an appropriate facility
- Segregation of C&D into clean & dirty waste streams for further recovery purposes,
- Bulking up of domestic wastes (mixed municipal waste & dry mixed recyclables) for further recovery or disposal at an appropriate off-site facility.

Household Waste

Residual or black bin household waste arrives in refuse collection vehicles and is transferred from the vehicles into large bulk transporters for consignment to an appropriately licensed landfill. Source segregated household dry recyclables are stored prior to transfer to permitted/licensed off-site recycling facilities.

Commercial and Industrial Waste

Both mixed and segregated commercial waste is collected from commercial outlets. Commercial waste rich in recyclables (paper, cardboard, glass, metal, green waste and wood) is delivered to the installation both by permitted third party hauliers and by SEHL vehicles. Plastic, card and paper are stored prior to transfer to a suitable permitted/licensed off-site recycling outlet. Biodegradable wastes suitable for composting which is accepted at the installation are sent to an offsite composting facility. The remaining non-recyclable material is bulked and sent to appropriately licensed landfills.

C&D Waste

Waste loads include mixed construction and demolition wastes and soil and stone. The material arrives in skips of varying sizes. The waste loads are inspected and then processed. The majority of the incoming C&D material is recovered and sent off-site either for re-use or recycling. The non-recyclable materials are transferred to a licensed landfill.

2.2.2 Plant List

A list of the plant in use at the installation is in Table 2.1. The plant provides 100% duty and 50% standby for waste processing.

Table 2.1 Existing Plant

No.	Plant	Model	Operational Capacity
1	Weighbridge	Avery Berkel	10m
1	Teleporter/forklift	JCB TLT30D	70 t/hr
1	Loader	JCB 426	70 t/hr

3. EMISSION MONITORING

SEHL implements the environmental monitoring programme specified in the Licence to assess the significance of emissions from site activities. The programme includes groundwater, waste water removed off-site and noise monitoring.

The monitoring locations are shown on Figure 3.1. The monitoring is carried out in accordance with the frequency specified in the Licence. The results are submitted to the Agency at quarterly intervals. An overview of the monitoring results is presented in this Section, with summary tables provided.

3.1 Wastewater Programme

Wastewater is directed to a holding tank located beneath the concrete yard as shown on Figure 3.1. The accumulated liquid is removed as required to an off-site wastewater treatment plant (WWTP) for treatment. The volume removed in 2017 was 10 tonnes. It was tankered by Ormonde Organics Ltd to RILTA Environmental Ltd WWTP in Greenogue Business Park, Rathcoole, Co. Dublin.

Wastewater monitoring is carried out quarterly and the results are included on Table 3.1. Metals and organohalogens are analysed bi-annually and COD, ammonia and chloride are tested quarterly. The results are similar to previous monitoring rounds and indicate the water is suitable for treatment at a WWTP.

 Table 3.1
 Waste Water Results 2017

Parameter	Units	Q1 2017	Q2 2017	Q3 2017	Q4 2017
рН	pH Units	-	6.67	-	6.79
Conductivity	mS/cm	-	1.051	-	2.507
COD	mg/l	828.4	1310	512	1280
Total Ammonia	mg/l	11.03	10.94	53.03	134.68
Chloride	mg/l	1670	78.6	194	195.5
Mercury	mg/l	-	< 0.001	-	< 0.001
Arsenic	mg/l	-	< 0.0025	-	0.0227
Boron	mg/l	-	< 0.0005	-	< 0.0005
Cadmium	mg/l	-	0.0066	-	0.0053
Chromium	mg/l	-	< 0.007	-	< 0.007
Copper	mg/l	-	0.006	-	0.013
Nickel	mg/l	-	0.174	-	0.322
Selenium	mg/l	-	< 0.003	-	< 0.003
Zinc	mg/l	-	< 0.003	-	< 0.003
Total Phenols	mg/l	-	0.4	-	<0.1
VOC#	μg/l	-	n.d. except	-	n.d. except
	μg/1		below		below
Toluene	μg/l	-	30	-	n.d.
Methyl tertiary butyl ether	μg/l	-	n.d.	-	0.3
ethylbenzene	μg/l	-	2	-	1
p/m-Xylene	μg/l	-	5	-	5
o-Xylene	μg/l	-	1	-	2
SVOC*	μg/l	-	n.d. except below	-	n.d. except below
2,4-Dimethylphenol	μg/l	-	2	-	n.d.
4-Methlyphenol	μg/l	-	239	-	118
Phenol	μg/l	-	31	-	19
Naphthalene	μg/l	-	2	-	n.d.
Acenaphthene	μg/l	-	1	-	n.d.
Fluorene	μg/l	-	0.9	-	n.d.
Phenanthrene	μg/l	-	1.4	-	n.d.
Fluoranthene	μg/l	-	0.7	-	n.d.
Pyrene	μg/l	-	0.9	-	n.d.
Bis(2-ethylexyl) phthalate	μg/l	-	58	-	n.d.
Di-n-butyl phthalate	μg/l	-	3.4	-	n.d.
Diethyl phthalate	μg/l	-	7	-	n.d.
Dibenzofuran	μg/l	-	0.8	-	n.d.

n.d. - Not Detected

⁻ Not Required

3.2 Ground Water Monitoring

Schedule C of the Licence requires annual groundwater monitoring. There is an on-site well (MW-1) slightly up-gradient of site activity, which was installed to provide both a potable and process water supply. Testing of the well indicated that it was not suitable for potable use and it is not used for this purpose, but is used for monitoring purposes. The well location is shown on Figure 3.1.

There are no emission limits or trigger levels set in the Licence. The Agency requested that groundwater trigger levels be prepared for this monitoring well. These were prepared and were submitted to the Agency for their approval on the 30th June 2008. The proposed trigger levels were not exceeded.

The results are compared to the Interim Guideline Values (IGV) on groundwater quality published by the Agency. The Table also includes the Groundwater Regulations Threshold Value (GTV), which were introduced in 2010 (S.I. 9 of 2010). The IGV represent typical background or unpolluted conditions; however levels higher than the IGV may occur naturally depending on the local geological and hydrogeological conditions. While the GTV are more appropriate for large scale abstraction wells used for potable supply, they can be used to assess the significance of contamination where present in non-potable groundwater supplies. Because GTVs have not been established for all of the parameters monitored, the relevant IGV was also used for comparative purposes where a GTV does not exist.

The levels of conductivity, sodium, sulphate and chloride exceeded both the respective IGV and TV levels. Faecal coliforms and total coliforms were not detected. The proposed trigger levels were not exceeded.

The groundwater monitoring results for 2017 are similar to those measured during previous monitoring events and the elevated levels are not related to current site activities.

OCM carried out a hydrogeological assessment of the site which was submitted to the Agency in July 2011. The assessment established the site was formerly occupied by a tannery, where salt was used in the curing process. Tanneries are recognised sources of soil and groundwater contamination and the moderately-elevated levels of sodium, chloride, and conductivity detected are consistent with the historic site use, and are not related to the waste transfer activities. In correspondence from May 2012 the Agency acknowledged the report meets their requirements in terms of the level of assessment completed.

 Table 3.2
 Groundwater Monitoring Results – June 2017

Parameter	Units	MW1	Proposed Trigger Level	TV	IGV
рН	pH Units	6.27	6.88	NE	6.5 – 9
Conductivity	mS/cm	2.171	7.84	0.800-1.875	1.000
Ammoniacal Nitrogen	mg/l	<0.03	-	0.065-0.175	0.15
Chloride	mg/l	525.2	2579.38	24-187.5	30
Potassium	mg/l	2.6	6.84	NE	5
Sodium	mg/l	577	1631.25	150	150
Mercury	mg/l	< 0.001	-	0.00075	0.001
Arsenic	mg/l	< 0.0025	-	0.0075	0.01
Boron	mg/l	0.046	-	0.75	1
Cadmium	mg/l	< 0.0005	-	0.00375	0.005
Chromium	mg/l	< 0.0015	-	0.0375	0.03
Copper	mg/l	< 0.007	-	1.5	0.03
Lead	mg/l	< 0.005	-	0.01875	0.01
Nickel	mg/l	0.003	-	0.015	0.02
Selenium	mg/l	< 0.003	-	NE	NE
Zinc	mg/l	0.025	-	NE	0.1
TOC	mg/l	5	-	NE	NE
Fluoride	mg/l	<0.3	-	NE	1
Sulphate	mg/l	239.7	-	187.5	200
ortho Phosphate	mg/l	0.15	-	NE	0.03
Nitrate	mg/l	2.3	-	37.5	25
Nitrite	mg/l	0.12	-	0.375	0.1
TON	mg/l	0.5	-	NE	NE
Total solids	mg/l	1401	-	NE	NE
Dissolved Oxygen	mg/l	9	-	NE	NAC
Total Cyanide	mg/l	< 0.01	-	0.0375	0.01
Total Alkalinity	mg/l	136	-	NE	NAC
Total Phenols	mg/l	<0.1	-	NE	NE
VOC	μg/l	<5	-	Various	NE
SVOC	μg/l	<5	-	Various	NE
Faecal Coliforms	Cfu/100ml	0	-	0	0
Total Coliforms	MPN/100ml	0	-	0	0

3.3 Noise Monitoring

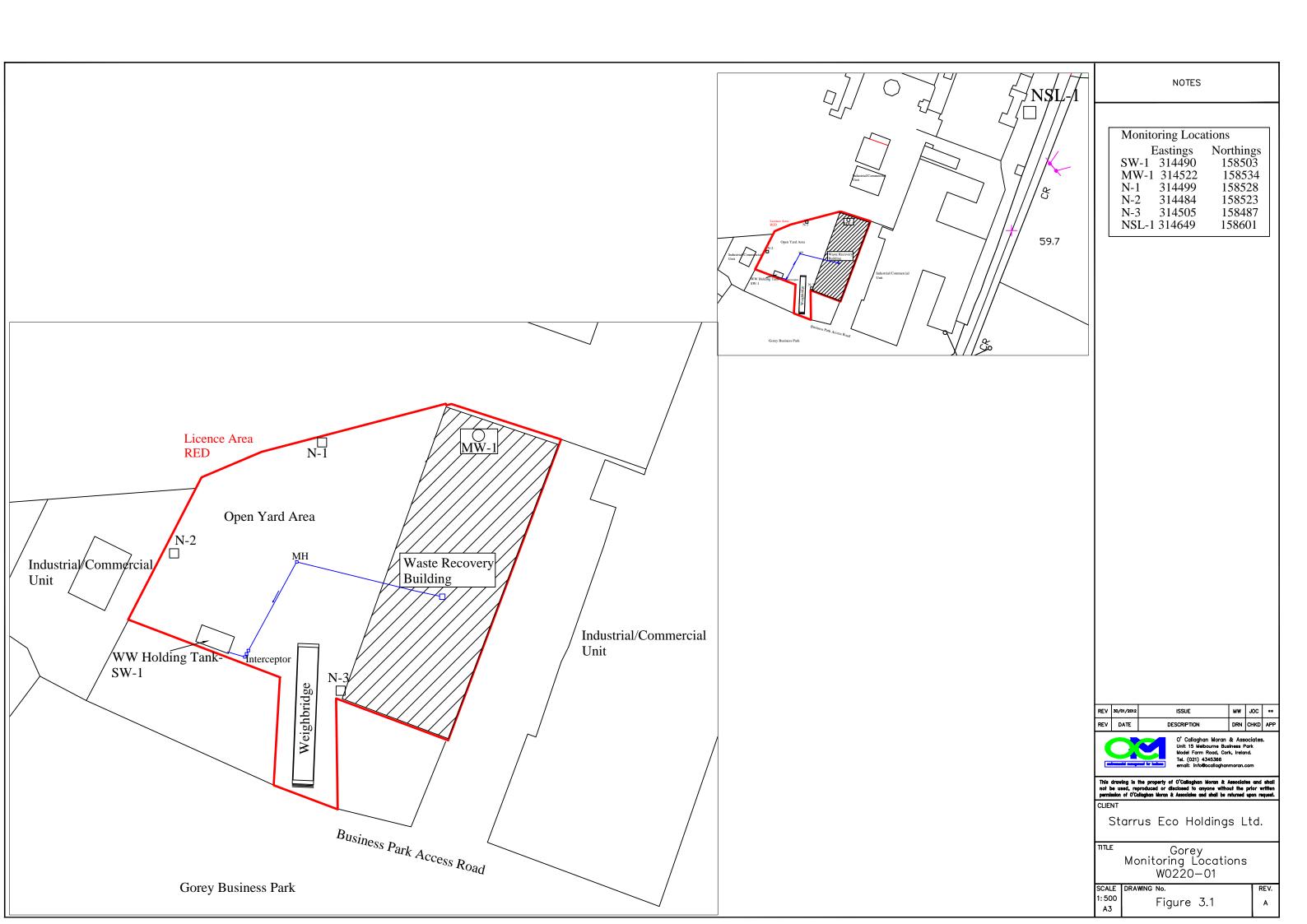
The annual noise survey was conducted in August 2017 at three offsite noise monitoring locations, N1, N2 and N3. The survey concluded that the installation was fully compliant with the licence requirements. A summary of the noise results is shown on Table 3.3.

The licence sets a daytime noise limit of 55 dB with respect to offsite noise sensitive locations. At station N1, the only station not located within the boundaries of Gorey Business Park, no noise emissions were audible from the installation.

Table 3.3 Noise Monitoring Results 2017

Station	Date	Time	Wind vector	$\begin{array}{c} L_{\text{Aeq 30 min}} \\ dB \end{array}$	L _{AF10 30 min} dB	L _{AF90 30 min} dB	Specific L _{Aeq 30 min} dB
	09.08.17	1210- 1240	х	66	70	42	<41
N1	audible. Bir Barking aud	: Intermitt d song/cal lible in dist	ls and air ance.		rustling vegetat		tant traffic also y quite audible.
	09.08.17	1129- 1159	+	56	59	52	<56
N2	Facility: Loader regularly audible at low level, chiefly reversing alarm, but also engine bucket. Sporadic vehicle movements through weighbridge audible at low level. Extraneous: Wind turbine nacelle emissions continuously clearly audible, domin background. Intermittent vehicle movements through surrounding business park dominant present. Specific L _{Aeq T} determination: Local traffic and turbine emissions dominating all param < Leq determination possible only.				ole, dominating dominant when		
	1055					57	
N3	Facility: Loader operation regularly clearly audible, including engine, bucket and reversing alarm. Extraneous: Intermittent traffic movements in business park quite audible, with several local movements dominant when present. Idling engine at 15 m continuously dominant to 1100. Wind turbine blade swish audible at low level during lulls in SEH activity. Specific L _{Aeq T} determination: Leq dominated by loader outside local vehicle movements, from 1100.					ith several local nt to 1100. Wind	

Wind vector: See final appendix. Specific L_{Aeq}: Level considered attributable to source under consideration, determined using real time assessment, field notes, time history profiles, statistical analysis, frequency spectra, spectral statistics and near field correction if applicable. Audibility scale: Inaudible; faintly audible; slightly audible; audible at low level; quite audible; clearly audible; dominant; intrusive; excessive.



4. SITE DEVELOPMENT WORKS

4.1 Specified Engineering Works

In 2017, repairs were carried out on site following storm damage. It is not proposed to carry out any engineering works in 2018.

4.2 Energy Efficiency

An energy audit was carried out in May2016. The installation is not a significant consumer of resources. Table 4.2 presents an estimate of the resources used on-site during the reporting period.

Table 4.2 Estimates of Resources Used On-Site

Resources	2015	2016	2017
Diesel	18,886 litres	18,275 litres	24,221 litres
Odour Control Additive	550 litres	450 litres	350 litres
Hydraulic Oil	125 litres	140 litres	160 litres
Electricity	44,887 kWh	43,566 kWh	52,508 kWh

4.3 Tank and Pipeline Integrity Testing

As per Condition 3.18.5 of the Licence, tank and pipeline testing is to be carried out every three years. Testing was completed in December 2015 and was passed fit for purpose. Bund integrity testing was also carried out in December 2015 and all bunds passed fit for purpose. Testing will be carried out again in 2018. The reports are retained at the installation for Agency inspection.

5. WASTE RECEIVED AND CONSIGNED FROM THE FACILITY

Table 5.1 shows the quantities of wastes accepted and consigned for the reporting period. A more detailed description of the wastes received and consigned in 2017 is presented in the PRTR submission in Appendix 1.

The total quantity of waste received was 29,917 tonnes and the total amount consigned was 29,644 tonnes. The waste received and consigned in 2017 is presented in Tables 5.1. For comparative purposes the amounts of waste received and consigned from 2007 to 2016 are presented in Table 5.2. All the wastes consigned from the site went to authorised recovery and disposal facilities and copies of the relevant Facility Permit or Waste Licences retained on site for Agency inspection.

Table 5.1 Waste Received & Consigned 2017

EWC	Description	Waste In	Waste Out
15 01 01	Paper and cardboard packaging	594.66	545.50
15 01 02	Plastic packaging	6.76	7.06
17 09 04	Mixed C&D wastes	430.38	533.02
19 12 10	Combustible waste (refuse derived fuel)	38.04	
20 01 01	Paper and cardboard	10.48	
20 01 08	Biodegradable kitchen and canteen waste	4.26	
20 01 38	Wood	59.48	
20 01 39	Plastics	76.78	
20 01 40	Metals	3.54	22.391
20 03 01	Mixed municipal waste	23,804.96	23,641.54
20 03 03	Street-cleaning residues	847.31	845.60
20 03 07	Bulky waste	4,040.60	4,048.68
	Total Received	29,917.25	
	Total Consigned		29,643.791
	Total Recovered		18,516.891
	Total Disposed		11,126.90
	Recovery Rate		62.46%

 Table 5.2
 Previous Years Waste Received and Consigned

	Total Received	Total	Total	Total	Recovery Rate
	Received	Consigned	Recovery	Disposed	Nate
2016	29,862	29,879	9,872	20,007	33%
2015	29,975	29,953	9,863	20,090	67.07%
2014	23,851	23,469	9,749	13,719	41.61%
2013	25,618	25,397	13,024	12,373	51.28%
2012	21,756	21,418	6,664	14,753	31%
2011	11,496	11,235	4,027	7,208	35.8%
2010	11,651	11,572	4,214	7,359	36.41%
2009	13,477	13,666	3,614	10,052	26.4%
2008	15,885	16,037	7,421	8,616	46.28%
2007	18,979	19,781	9,229	10,551	46.66%

6. ENVIRONMENTAL INCIDENTS AND COMPLAINTS

6.1 Incidents

There were no incidents during the reporting period.

6.2 Register of Complaints

SEHL maintains a register of complaints received in accordance with Condition 11.9 of the waste licence. No complaints were received in 2017.

7. ENVIRONMENTAL DEVELOPMENT & CONTROL

7.1 Environmental Management Programme Report

SEHL have implemented an Integrated Management System (IMS) in accordance with the requirements of Occupational Health and Safety Assessment Series (OHSAS) 18001:2007 and International Standard Organisation (ISO) 14001:2004 in order to manage the Health, Safety and Environmental performance of their business and to control health and safety risk and to minimise their environmental aspects and impacts.

The IMS has been developed for the achievement of continual improvement taking into the requirements of the Waste Licence Conditions. SEHL has prepared and effectively implement documented procedures and instructions in accordance with the requirements of both the OHSAS 18001:2007 and ISO 14001:2004. The site was accredited to both Standards in June 2012 and this accreditation was retained following an audit in July 2014.

As part of this IMS, SEHL has developed a list of environmental, management, operating and maintenance procedures, details of which are outlined in Appendix 2. The schedule of Objectives and Targets, including their status for 2016 (Table 7.1), as well as the proposed Objectives and Targets for 2017 (Table 7.2) are presented below.

7.1.1 Schedule of Objectives 2017

The objectives that were achieved during this reporting period are outlined in Table 7.1.

7.1.2 Schedule of Objectives 2018

A schedule of targets and objectives for 2018 has been set by the management of the installation. These objectives are outlined in Table 7.2.

Table 7.1 Schedule of Objective and Targets 2017

No	Objective	Target	Timescale	Responsibility	Status
1	Odour management	Ensure odour management plans are followed and potential new sources of odour are identified	Q1 - Q4	Site management	Ongoing
2	Fire prevention	Implement recs from Fire Risk Assessments Update ERP & APP Maintain fire detection equipment	Q1 - Q4	Site management/E HS team	Ongoing
3	Waste storage	Review waste storage practices on each site to ensure that they are in line with licence conditions, fire prevention and insurance recommendations	Q1 - Q4	Site management/E HS team	Ongoing
4	Waste acceptance, classification & records	EWC training for all weighbridge ops. Centralisation of all licences & permits including NWCPs for hauliers.	Q1 - Q4	EHS team	Completed
5	CRAMP, ELRA & Financial Provision	CRAMP, ELRA & Financial Provision to be reviewed	Q2	EHS team	Completed
6	Lighting in MRF buildings	Clean & upgrade where required all light fittings in MRF buildings	Q3	Site management	Completed
7	NWCP exemptions	Implement NWCP exemption declarations	Q1 - Q4	Site management	Completed
8	Electrical Control Panel	Relocate the electrical control panel outside of shed	Q2 – Q4	Site management	Not Completed
9	Replace wind sock	eplace wind sock Replace the windsock at the installation		Site management	Completed
10	Bund Testing	Complete bund testing	Q3	EHS team	Completed

 Table 7.2
 Schedule of Objective and Targets 2018

No	2017 Objective	Target	Timescale	Responsibility
1	Nuisance management	Ensure odour/noise/dust management plans are followed and potential new sources are identified	Q1 - Q4	Site management
2	Fire prevention	Implement recs from Fire Risk Assessments Update ERP & APP where applicable Maintain fire detection equipment	Q1 - Q4	Site management/EHS team
3	Waste storage	Review waste storage practices on each site to ensure that they are in line with licence conditions, fire prevention and insurance recommendations	Q1 - Q4	Site management/EHS team
4	ISO 14001 transition	Transition ISO 14001 to the 2015 standard	Q2	EHS team
5	Paperless project	Implement plans for a paperless office	Q3-Q4	All staff
6	Resource tracking	Sites to track energy usage and other resources in order to conserve wherever possible	Q1 - Q4	Site management/EHS team
7	Hardstand & site infrastructure	Review hardstand and formulate repair plan as required. Record using EF11.	Q1 - Q4	Site management/EHS team
8	Pipeline integrity testing	Complete CCTV review of drainage network	Q3-Q4	EHS Team/site management
9	Purchase new IBC bund		Q2-Q3	Site management

7.2 Management Structure

Details of the site management structure are given below.

Name: Andrew Egan

Responsibility: Depot Manager

Experience: 9 years experience. FÁS waste management course completed.

Name: Esther Kirwan

Responsibility: Administration

Experience: 11 years experience. Has completed FÁS waste management course.

7.2.1 Staff Training

Environmental training is carried out for any new staff employed at the installation as required. Copies of all training records are held in the installation office.

7.3 Communications Programme

Condition 2.2.2.7 requires the establishment of a Communications Programme. SEHL is committed to setting the standard in waste management and ensuring environmental compliance in all operations. In addition, SEHL's updated Environmental and Health & Safety Policy makes a specific commitment to ensuring that the policy itself and records are available to the public and interested parties.

SEHL has drawn up a Communications Programme, which details how members of the public are facilitated in accessing environmental information at the installation.

Records available for public inspection on site include:-

- Environmental Health & Safety Policy,
- Waste Licence,
- Licence Application and Review documentation,
- Monitoring Records,
- Complaints File,
- EPA Correspondence File.

Opening Times for Inspection of Records are from 10 am - 4 pm. Visits to the site should be arranged in advance by ringing the Facility Manager or Supervisor at 1890 600 900.

7.4 Nuisance Control

SEHL has contracted Prokill Ireland South East Ltd (PSE) to carry out vermin inspections at the installation. PSE Ltd visit the installation every two week and inspect for vermin and inspect and maintain the 9 bait boxes and 4 mice boxes on the site. The installation has not had any problem with fly infestations, but should a problem occur, this can be dealt with by PSE Ltd on a call out basis.

7.5 Water Demand

The only water used on the site is for sanitary purposes in the toilets (2 No. staff), the canteen and occasionally for the odour suppression system. The volume of odour suppressants used in 2017 was 350 litres. The total amount of water used in 2017 was 715 m³.

7.6 Waste Generated On-site

All waste generated is source separated and removed off site for recycling or disposal.

7.7 European Pollutant Release and Transfer Register

A copy of the EPRTR return submitted to the Agency via the web-based data reporting system is included in Appendix 1.

7.8 Financial Provision & Measures to Minimise Potential Environmental Damage

A Decommissioning Management Plan (DMP) and Environmental Liabilities Risk Assessment (ELRA) including Financial Provision (FP) were submitted to the Agency in 2013 as part of the transfer of the licence which occurred in Q1 2014. Both the DMP and ELRA have been approved by the Agency. In 2017, the Agency requested a review of the DMP and ELRA, revised copies of the reports were submitted in April.

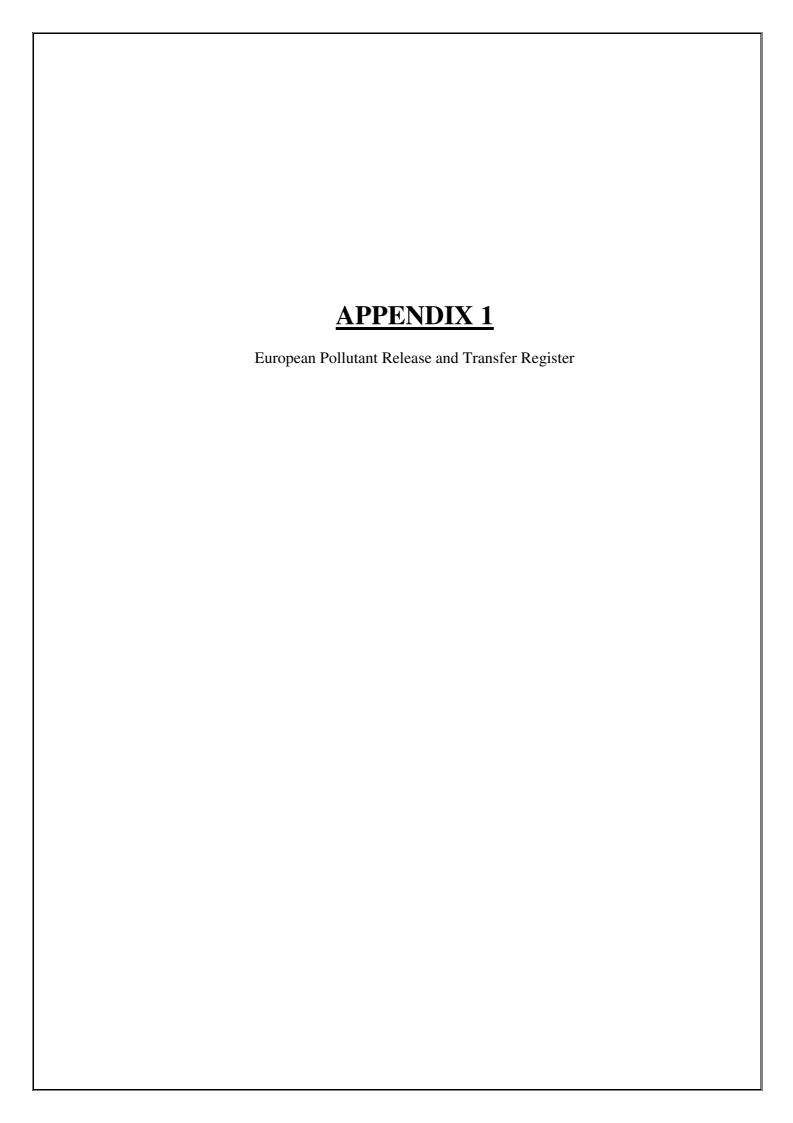
The installation has an Environmental Management Programme (EMP) in place. The EMP serves as a guidance document for installation staff and describes operational control and

management practices that are applied at the installation. The EMP is also the core element of the Environmental Management System (EMS) for the installation and is designed to ensure that management of site activities complies with regulatory requirements and best practice.

The EMS includes a detailed Emergency Response Procedure which sets out the steps to be taken in the event of an incident at the installation with the potential to cause environmental damage. SEHL also implements a comprehensive monitoring programme which will highlight any potential environmental incidents with the potential to cause environmental damage.

8. OTHER REPORTS

No other reports were requested by the Agency for inclusion in the AER during the reporting period.





| PRTR# : W0220 | Facility Name : Starrus Eco Holdings Limited (Gorey) | Filename : W0220_2017.xls | Return Year : 2017 |

Guidance to completing the PRTR workbook

PRTR Returns Workbook

Version 1 1 1

REFERENCE YEAR 2017

1. FACILITY IDENTIFICATION

Parent Company Name	Starrus Eco Holdings Limited
Facility Name	Starrus Eco Holdings Limited (Gorey)
PRTR Identification Number	W0220
Licence Number	W0220-01

Classes of Activity

••,	
o. class_name	No.
- Refer to PRTR class activities below	-

Address 1 Ramstown Address 2 Gorey Address 3 Address 4 Wexford	
Address 3 Address 4	
Address 4	
Wexford	
Wexford	
Country Ireland	
Coordinates of Location -6.30814 52.6661	
River Basin District IESE	
NACE Code 3832	
Main Economic Activity Recovery of sorted materials	
AER Returns Contact Name Sara Smyth	
AER Returns Contact Email Address sara.smyth@greenstar.ie	
AER Returns Contact Position Environmental Engineer	
AER Returns Contact Telephone Number 01 2746236	
AER Returns Contact Mobile Phone Number	
AER Returns Contact Fax Number	
Production Volume	0.0
Production Volume Units	
Number of Installations	0
Number of Operating Hours in Year	0
Number of Employees	5
User Feedback/Comments	
Web Address	

2. PRTR CLASS ACTIVITIES

Activity Number	Activity Name
50.1	General
5(c)	Installations for the disposal of non-hazardous waste
50.1	General

3. SOLVENTS REGULATIONS (S.I. No. 543 of 2002)

Is it applicable?	
Have you been granted an exemption?	
If applicable which activity class applies (as per	
Schedule 2 of the regulations)?	
Is the reduction scheme compliance route being	
used ?	

4. WASTE IMPORTED/ACCEPTED ONTO SITE

Guidance on waste imported/accepted onto site

Do you import/accept waste onto your site for onsite treatment (either recovery or disposal activities)

4.1 RELEASES TO AIR

Link to previous years emissions data

| PRTR# : W0220 | Facility Name : Starrus Eco Holdings Limited (Gorey) | Filename : W0220_2017.xls | Return Year : 2017 |

06/04/2018 14:49

SECTION A : SECTOR SPECIFIC PRTR POLLUTANTS

RELEASES TO AIR					Please enter all quantities in this section in KGs				
POLLUTANT				METHOD		QUANTITY			
		Method Used							
No. Annex II	Name	M/C/E	Method Code	Designation or Description	Emission Point 1	T (Total) KG/Year	A (Ac	cidental) KG/Year	F (Fugitive) KG/Year
					0.0		0.0	0.0	0.0

^{*} Select a row by double-clicking on the Pollutant Name (Column B) then click the delete button

SECTION B: REMAINING PRTR POLLUTANTS

	RELEASES TO AIR					in this section in KG	is		
POLLUTANT			N	IETHOD	QUANTITY				
		Method Used							
No. Annex II	Name	M/C/E	Method Code	Designation or Description	Emission Point 1	T (Total) KG/Year		A (Accidental) KG/Year	F (Fugitive) KG/Year
					0.0		0.0	0.0	0.0

^{*} Select a row by double-clicking on the Pollutant Name (Column B) then click the delete button

SECTION C: REMAINING POLLUTANT EMISSIONS (As required in your Licence)

		Please enter all quantities in this section in KGs								
POLLUTANT			ı	METHOD	QUANTITY					
			Method Used							
Pollutant No.	Name	M/C/E	Method Code	Designation or Description	Emission Point 1	T (Total) KG/Year	A (Accider	ntal) KG/Year	F (Fugitive) KG/Year	
					0.0)	0.0	0.0	0.0	

^{*} Select a row by double-clicking on the Pollutant Name (Column B) then click the delete button

Additional Data Requested from Landfill operators

For the purposes of the National Inventory on Greenhouse Gases, landfill operators are requested to provide summary data on landfill gas (Methane) flared or utilised on their facilities to accompany the figures for total methane generated. Operators should only report their Net methane (CH4) emission to the environment under T(total) KG/yr for Section A: Sector specific PRTR pollutants above. Please complete the table below:

Landfill: Starrus Eco Holdings Limited (Gorev)

Landini.	Startus Eco Floidings Elithted (Gorey)				_	
Please enter summary data on the quantities of methane flared and / or utilised			Metl	nod Used		
				Designation or	Facility Total Capacity m3	
	T (Total) kg/Year	M/C/E	Method Code	Description	per hour	
Total estimated methane generation (as per						
site model)	0.0				N/A	
Methane flared	0.0				0.0	(Total Flaring Capacity)
Methane utilised in engine/s	0.0				0.0	(Total Utilising Capacity)
Net methane emission (as reported in Section						
A above)	0.0				N/A	

4.2 RELEASES TO WATERS

Link to previous years emissions data

| PRTR#: W0220 | Facility Name: Starrus Eco Holdings Limited (Gorey) | Filename: W0220_2017.xls | Return Year: 2017 |

06/04/2018 14:49

SECTION A: SECTOR SPECIFIC PRTR POLLUTANTS

Data on ambient monitoring of storm/surface water or groundwater, conducted as part of your licence requirements, should NOT be submitted under AER / PRTR Reporting as 1

	RELEASES TO WATERS		Please enter all quantities	in this section in KG	is			
POLLUTANT			QUANTITY					
				Method Used				
No. Annex II	Name	M/C/E	Method Code	Designation or Description	Emission Point 1	T (Total) KG/Year	A (Accidental) KG/Year	F (Fugitive) KG/Year
					0.0	0.0	0.0	0.0

^{*} Select a row by double-clicking on the Pollutant Name (Column B) then click the delete button

SECTION B: REMAINING PRTR POLLUTANTS

			Please enter all quanti	ties	in this section in K	Gs				
POLLUTANT			QUANTITY				JANTITY			
			Method Used							
No. Annex II	Name	M/C/E	Method Code Designation or Descrip	tion	Emission Point 1		T (Total) KG/Year	Α (Accidental) KG/Year	F (Fugitive) KG/Yea
						0.0	0	0.0	0.0	C

^{*} Select a row by double-clicking on the Pollutant Name (Column B) then click the delete button

SECTION C: REMAINING POLLUTANT EMISSIONS (as required in your Licence)

	Please enter all quantities	in this section in KG	is					
POLLUTANT			QUANTITY					
				Method Used				
Pollutant No.	Name	M/C/E	Method Code	Designation or Description	Emission Point 1	T (Total) KG/Year	A (Accidental) KG/Year	F (Fugitive) KG/Year
					0.0	0.0	0.0	0.0

^{*} Select a row by double-clicking on the Pollutant Name (Column B) then click the delete button

4.3 RELEASES TO WASTEWATER OR SEWER

Link to previous years emissions data

| PRTR# : W0220 | Facility Name : Starrus Eco Holdings Limited (Gorey) | Filename : W0220_2017.:

06/04/2018 14:50

SECTION A: PRTR POLLUTANTS

	OFFSITE TRANSFER OF POLLUTANTS DESTINED FOR WASTE-WATER TREATMENT OR SEWER						S		
POLLUTANT				METHOD	QUANTITY				
			Method Used						
No. Annex II	Name	M/C/E	Method Code	Designation or Description	Emission Point 1	T (Total) KG/Year		A (Accidental) KG/Year	F (Fugitive) KG/Year
					0.0	0	0.0	0.0	0.0

^{*} Select a row by double-clicking on the Pollutant Name (Column B) then click the delete button

SECTION B : REMAINING POLLUTANT EMISSIONS (as required in your Licence)

	ozonow b : nzimamwa i ozzonam zimodono (uo requireu in your ziocnoc)									
OFFSITE TRANSFER OF POLLUTANTS DESTINED FOR WASTE-WATER TREATMENT OR SEWER						Please enter all quantities	in this section in KG	s		
POLLUTANT			METHOD			QUANTITY				
				Method Used						
	Pollutant No.	Name	M/C/E	/E Method Code Designation or Description		Emission Point 1	T (Total) KG/Year		A (Accidental) KG/Year	F (Fugitive) KG/Year
						0.0		0.0	0.0	0.0

^{*} Select a row by double-clicking on the Pollutant Name (Column B) then click the delete button

Link to previous years emissions data Page 1 of 1

4.4 RELEASES TO LAND

Link to previous years emissions data

| PRTR# : W0220 | Facility Name : Starrus Eco Holdings Limited (Gorey) | Filename : W0220_2017.xls | Return Year : 2017 |

06/04/2018 14:50

SECTION A: PRTR POLLUTANTS

RELEASES TO LAND				Please enter all quantitie	s in this section in KGs		
POLLUTANT			M	ETHOD		QUANTITY	
				Method Used			
No. Annex II	Name	M/C/E	Method Code	Designation or Description	Emission Point 1	T (Total) KG/Year	A (Accidental) KG/Year
					0	.0 C	0.0

^{*} Select a row by double-clicking on the Pollutant Name (Column B) then click the delete button

SECTION B: REMAINING POLLUTANT EMISSIONS (as required in your Licence)

	RELEAS		Please enter all quantities in this section in KGs				
POLLUTANT			ME	THOD			QUANTITY
			Method Used				
Pollutant No.	Name	M/C/E	Method Code	Designation or Description	Emission Point 1	T (Total) KG/Year	A (Accidental) KG/Year
						0.0	0.0 0.0

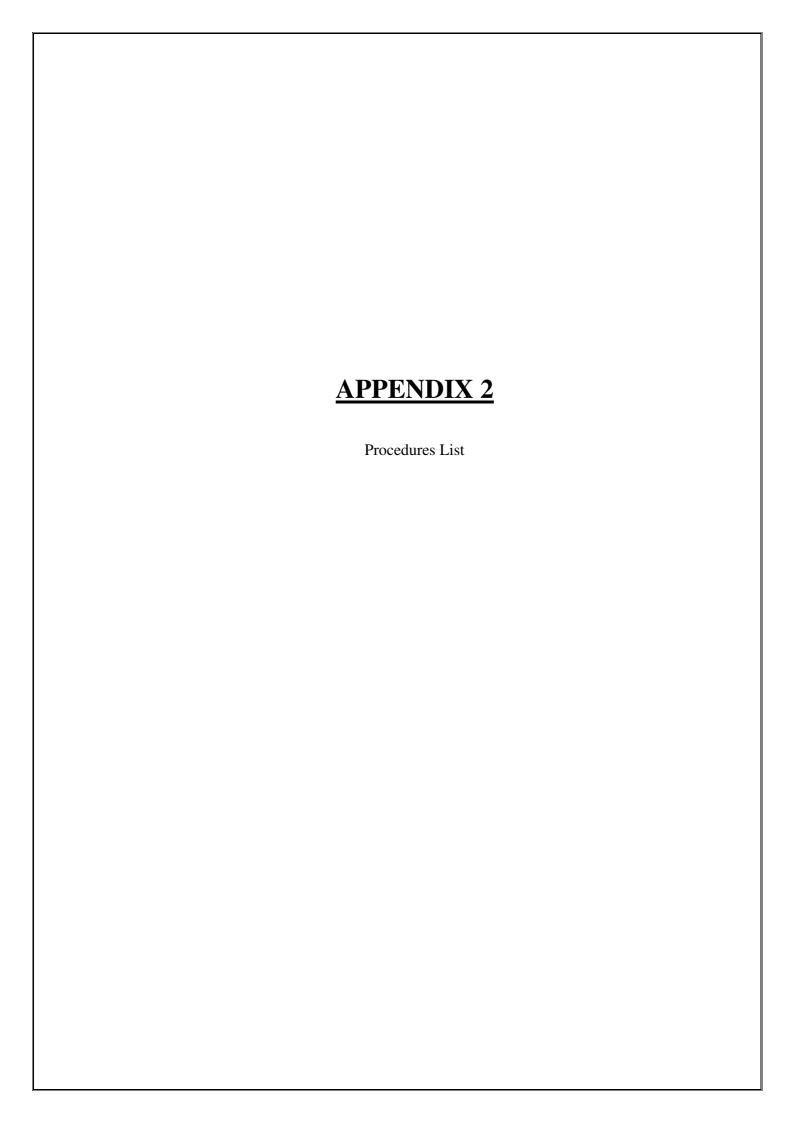
^{*} Select a row by double-clicking on the Pollutant Name (Column B) then click the delete button

5. ONSITE TREATMENT & OFFSITE TRANSFERS OF WASTE | PRTR#: W0220 | Facility Name: Starrus Eco Holdings Limited (Gorey) | Filename: W0220_2017.ds | Return Year: 2017 |

06/04/2018 14:50

			Please enter a	all quantities on this sheet in Tonnes	, ,							0
			Quantity (Tonnes per Year)				Method Used		Licence/Permit No of Next Destination Facility Haz Waste: Name and Licence/Permit No of Recover/Disposer	Haz Waste: Address of Next Destination Facility Non Haz Waste: Address of Recover/Disposer	Name and License / Permit No. and Address of Final Recoverer / Disposer (HAZARDOUS WASTE ONLY)	Actual Address of Final Destination i.e. Final Recovery / Disposal Site (HAZARDOUS WASTE ONLY)
Transfer Destination	European Waste Code	Hazardous		Description of Waste	Waste Treatment Operation	M/C/E	Method Used	Location of Treatment				
										Cappagh		
Within the Country	15 01 01	No	10.32	paper and cardboard packaging	R13	М	Weighed	Offsite in Ireland		Road,Finglas,Dublin 11,.,Ireland Ballymount		
Within the Country	15 01 01	No	535.18	paper and cardboard packaging	R3	М	Weighed	Offsite in Ireland	Irish Packaging Recycling,W0263-01	Road, Walkinstown, Dublin 12,., Ireland Clermont Business		
Within the Country	15 01 02	No		plastic packaging mixed construction and demolition wastes	R13	М	Weighed	Offsite in Ireland	Sean Kinsella Site	,Co. Louth,Ireland Banntown		
Within the Country	17 09 04	No		other than those mentioned in 17 09 01, 17 09 02 and 17 09 03	R5	М	Weighed	Offsite in Ireland	Developments Ltd,WFP-WX- 15-0081-03	,Huntingtown,Gorey,Co. Wexford,Ireland Enniscorthy,,Wexford,Irela		
Within the Country	20 01 40	No	21.54	metals	R4	M	Weighed	Offsite in Ireland	Molloys,WP/08/14B	nd		
Within the Country	20 03 01	No	10281.3	mixed municipal waste	D5	М	Weighed	Offsite in Ireland	Ballynagran Landfill Ltd.,W0165-02	Ballynagran Landfill,Coolbeg & Kilcandra,.,Wicklow,Ireland		
Within the Country	20 03 01	No	59.62	mixed municipal waste	R1	М	Weighed	Offsite in Ireland	Covanta,W0232-01	Pigeon House Road,Poolbeg Peninsula,Dublin 4,,,Ireland Millennium Business		
Within the Country	20 03 01	No	3689.68	mixed municipal waste	R13	М	Weighed	Offsite in Ireland	Starrus Eco Holdings Ltd.,W0183-01 Glanway Ltd,WFP-KK-14-	Park, Grange, Ballycoolin, Dub lin 11, Ireland Belview Port, Co.		
Within the Country	20 03 01	No	4471.66	mixed municipal waste	R13	M	Weighed	Offsite in Ireland		Kilkenny,,,,,lreland		
Within the Country	20 03 01	No	127.38	mixed municipal waste	R13	М	Weighed	Offsite in Ireland	Starrus Eco Holdings Ltd.,W0053-03 Knockharley Landfill	Fassaroe,Bray,.,Co Wicklow,Ireland Knockharley,Co.		
Within the Country	20 03 03	No	38.7	street-cleaning residues	D5	М	Weighed	Offsite in Ireland	Limited,W0146-02	Meath,,ireland		
Within the Country	20 03 03	No	668.3	street-cleaning residues	D5	М	Weighed	Offsite in Ireland	Ballynagran Landfill Ltd.,W0165-02	Ballynagran Landfill,Coolbeg & Kilcandra,.,Wicklow,Ireland		
Minima dia a Carratana	00.00.07	NI-	4004.7	halla and hall	D40		Material	Official in Instrum	Starrus Eco Holdings	Fassaroe,Bray,.,Co		
Within the Country	20 03 07	No	4024.7	bulky waste	R13	М	Weighed	Offsite in Ireland	Murray Waste Recycling	Wicklow, Ireland Coolatore, Ferns, Co		
Within the Country	20 03 07	No	23.98	bulky waste	R13	М	Weighed	Offsite in Ireland	Limited,W0258-01	Wexford,.,Ireland Tullamore,Co.		
Within the Country	20 01 40	No	0.851	metals	R4	М	Weighed	Offsite in Ireland	KMK Metals,W0113-03	Offaly,,,,lreland Ballymount Baling		
Within the Country	20 03 01	No	63.56	mixed municipal waste	R13	М	Weighed	Offsite in Ireland	South Dublin County Council,W0003-03 Dublin City Council,W0238-	Station,Ballymount Road,Walkinstown,Dublin 12,Ireland Merrywell Industrial Estate,Ballymount Road Lower,Ballymount ,Dublin		
Within the Country	20 03 01	No	4948.34	mixed municipal waste	R13	М	Weighed	Offsite in Ireland	01	12,Ireland		
Within the Country	20 03 03	No	138.6	street-cleaning residues	D5	М	Weighed	Offsite in Ireland	Bord Na Mona Drehid,W0201-03	Carbury,Co Kildare,,,Ireland		
,				the Description of Waste then click the delete button								

^{*} Select a row by double-clicking the Description of Waste then click the delete button







Doc. No.: ControlRevision No.: As ShownIssue Date: As ShownApproved By:David Naughton - Group Environmental ManagerPage 1 of 5Joe Nicholson - Group H&S Manager

Integrate	d Procedures - IP	
IP-01	Document & Record Control Procedure	Rev 01, 22/05/17
IP-02	Health & Safety Risk Assessment Procedure	Rev 01, 22/05/17
IP-03	Environmental Aspects & Impacts Procedure	Rev 01, 22/05/17
IP-04	Legal & Regulatory Requirements Procedure	Rev 01, 22/05/17
IP-05	Objectives, Targets & Management Programmes Procedure	Rev 01, 22/05/17
IP-06	Competence, Training & Awareness Procedure	Rev 01, 22/05/17
IP-07	Communication & Consultation Procedure	Rev 01, 22/05/17
IP-08	Monitoring, Measurement & Improvement Procedure	Rev 01, 22/05/17
IP-09	Evaluation of Compliance Procedure	Rev 01, 22/05/17
IP-10	Non Conformances, Corrective/Preventive Actions Procedure	Rev 01, 22/05/17
IP-11	Internal Audit Procedure	Rev 01, 22/05/17
IP-12	Management Review Procedure	Rev 01, 22/05/17
IP-13	Control of Contractors/Visitors Procedure	Rev 01, 22/05/17
IP-14	Health & Safety & Environmental Monitoring	Rev 01, 22/05/17
IP-15	Emergency Preparedness & Response Procedure	Rev 01, 22/05/17
IP-16	Fire Prevention Procedure	Rev 01, 22/05/17
IP-17	Bin Washing Procedure	Rev 01, 22/05/17
IP-18	Accident Prevention Procedure	Rev 01, 22/05/17
IP-19	Fuel Procedure for Tanks & Mobile Plant	Rev 01, 22/05/17

ocedures - SP	
Permit to Work Procedure	Rev 01, 22/05/17
Maintenance & Calibration Procedure	Rev 01, 22/05/17
Mobile Plant Procedure	Rev 01, 22/05/17
Fork Truck Procedure	Rev 01, 22/05/17
Operation of Fixed Plant Procedure	Rev 01, 22/05/17
Lock Out / Tag Out Procedure	Rev 01, 22/05/17
Health & Safety Notification Procedure	Rev 01, 22/05/17
MSW Shredder routine Maintenance & Clearing of Blockages Procedure (SCGT)	Rev 01, 22/05/17
Weighbridge & Tipping Procedure (SCGT)	Rev 01, 22/05/17
Cleaning of Washing Bay (Greenogue)	Rev 01, 22/05/17
	Permit to Work Procedure Maintenance & Calibration Procedure Mobile Plant Procedure Fork Truck Procedure Operation of Fixed Plant Procedure Lock Out / Tag Out Procedure Health & Safety Notification Procedure MSW Shredder routine Maintenance & Clearing of Blockages Procedure (SCGT) Weighbridge & Tipping Procedure (SCGT)



Procedure Listing

Doc. No.: Control	Revision No.: As Shown	Issue Date: As Shown	
Approved By:	David Naughton - Group Environmental Manager	Page 2 of 5	
	Joe Nicholson – Group H&S Manager		

Environmental Procedures - EP						
EP-01	Office Waste & Energy Management Procedure	Rev 01, 22/05/17				
EP-02	Decommissioning and Aftercare Procedure	Rev 01, 22/05/17				
EP-03	Environment Communications Procedure	Rev 01, 22/05/17				
EP-04	Waste Permits & Licences Procedure	Rev 01, 22/05/17				
EP-05	Waste Acceptance Procedure	Rev 01, 22/05/17				
EP-06	Unacceptable Waste Procedure	Rev 01, 22/05/17				
EP-07	Waste & Material Storage Procedure	Rev 01, 22/05/17				
EP-08	Waste Processing Procedure	Rev 01, 22/05/17				
EP-09	Site Infrastructure Procedure	Rev 01, 22/05/17				
EP-10	Nuisance Management Procedure (Site Specific)	(Site Specific)				
		Rev 01, 22/05/17				
EP-11	Civic Amenity Site Procedure	Rev 01, 22/05/17				





Doc. No.: Control Revision No.: As Shown Issue Date: As Shown

Approved By: Malcolm Dowling – Group Compliance Manager Page 3 of 5

Amendment History

Date	Amendment No.	Procedure No:	Revision No:	Comment	Authorised By
05.07.10	01	All	01	Initial Issue	M.D & O.C
13.09.10	02	EP-03	02	Issue of Incident Reports	M.D
20.09.10	03	IP-10	02	Env issues not logged on WIMS Database	M.D
29.10.10	04	IP-13	02	Use of M&M equipment by contractors	M.D & O.C
29.10.10	05	IP-14	02	Use of M&M equipment by contractors	M.D & O.C
29.10.10	06	SP-02	02	Inclusion of Maintenance Schedule	M.D & O.C
05.11.10	07	IP-04	02	Inclusion of other requirements	S.B & O.C
01.02.11	08	SP-08	01	Inclusion of new procedure	O.C
01.02.11	09	IP-10	03	Inclusion of SP-08	O.C
01.02.11	10	IP-15	02	Removal of SF-022	O.C
01.02.11	11	Contents	As shown	EP-10 Site Specific	M.D & O.C
01.02.11	12	IP-06	02	Addressing Agency Staff needs	M.D & O.C
01.02.11	13	Circ List	02	Amendment to document control	M.D & O.C
04.04.11	14	SP-02	03	Inclusion of Site Specific Maintenance schedules	O.C
07.06.11	15	IP-11	02	Inclusion of H&S & Env Internal Audit Schedules	M.D & O.C
14/09/11	16	EP-02	02	Inclusion of decommissioning of plant/equipment	S.B
15/09/11	17	IP-09	02	Inclusion of Statutory Inspections	O.C
01/12/11	18	SP-09	01	Inclusion of new procedure for SCGT	O.C
01/12/11	19	SP-10	01	Inclusion of new procedure for SCGT	O.C
03/05/12	20	SP-01	02	Amendment to remove SF 028	O.C
05/05/12	21	SP-11	01	Inclusion of a new procedure for Greenogue	O.C
28/05/12	22	IP-11	03	General Amendments to internal audit procedure	M.D & O.C
08/06/12	23	IP-13	03	Grammatical amendment	M.D & O.C
15/04/13	24	IP-06	03	Agency staff – sign-off record sufficient proof of training. TMS optional	M.D & O.C





Doc. No.: ControlRevision No.: As ShownIssue Date: As ShownApproved By:Malcolm Dowling - Group Compliance ManagerPage 4 of 5

Date	Amendment No.	Procedure No:	Revision No:	Comment	Authorised By
30/06/13	25	IP-16	01	Inclusion of new procedure	M.D.
09/09/13	26	IP-03	02	Use of Scannell Software Solutions (EnviroManager) instead of IF-03A	M.D & O.C
09/09/13	27	IP-04	30	Use of Scannell Software Solutions (EnviroManager) instead of IF-03A	M.D & O.C
09/09/13	28	IP-05	02	Use of Scannell Software Solutions (EnviroManager) instead of IF-03A	M.D & O.C
16/10/13	29	EP-03	03	Introduction of EPA ALDER Portal	K.B
28/04/14	30	All EP's & IP's	01	Change of Company name and review of all Integrated and Env procedures	M.D & O.C
28/04/14	31	SP's	01	Change of Company name and review of all safety procedures including renumbering & deletion of Motor Claim Notification Procedure – SP 08	O.C
06/05/15	32	EP-09	02	Ref to new form EF-11 added	SS
21/01/16	33	IP-05/IP- 07/IP-12	02	Meeting frequency refs updated	SS
14/11/16	34	IP-18	02	Amended as per EPA instruction	SS
11/01/17	35	IP-19	01	New addition	SS
22/05/17	36	All EP's, SP's & IP's	01	Review of all procedures	DN & JN





setting the standard		
Doc. No.: Control	Revision No.: As Shown	Issue Date: As Shown
Approved By:	Malcolm Dowling – Group Compliance Manager	Page 5 of 5

Circulation List

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