OXIGEN ENVIRONMENTAL

Annual Environmental Report 2011

W0208-01

Materials Recovery Facility
At
Merrywell Industrial Estate
Ballymount Road Lower
Dublin 22

PREPARED BY MARIA BYRNE, OXIGEN ENVIRONMENTAL

MARCH 2012

Table of Contents

	Introduction	
1	**Facility Location, Description and Waste Activities**	5
1.1	Description of the Site	
1.2	Waste Licenced Activities	
1.3	Waste Recovery Activities	
2	**Emissions from the Facility**	9
2.1	Noise Monitoring Summary	
2.2	Monthly Foul Water Monitoring Results Summary	
2.3	Quarterly Surface Water Monitoring Results	
2.4	Bi-Annual Dust Monitoring Results	
3	**Waste Management Record**	12
3.1	Maintenance	
3.2	Office Paper	
3.3	Canteen	
4	**Quantity and Composition of Waste Recovered, Received and Disposed of During the Reporting Period.**	14
4.1	Waste Received	
4.2	Waste Recovered, Recycled and Disposed	
5	**Procedures Developed in 2011**	20
5.1	Environmental Management System Procedures	
6	**Review of Nuisance Controls**	22
7	**Resource Consumption Summary**	24
8	**Energy Efficiency Audit Report Summary**	28
9	**Complaints Summary**	30
10	**Reported Incidents Summary**	32
11	**Schedule of Environmental Objectives & Targets.**	34

12	**Environmental Management Programme**	41
12.1	Report for Previous Year.	
12.2	Report for Current Year.	
13	**Development/Infrastructural Works Summary (completed in previous year or prepared for current year)**	48
13.1	Development Works 2011	
13.2	Development Works 2012	
14	**Financial Provision**	50
15	**Tank, Drum, Pipeline & Bund Inspection Report**	52
16	**Programme for Public Information**	54
17	**Management &Staffing Structure at the Facility**	56
18	**Closure & Decommissioning Management Plan**	58

Introduction

Oxigen Environmental Ltd. (Oxigen) was granted waste licence W208-01 in March 2006 and began operating under this licence on 1st July 2006. Oxigen operate a dry recycling, C&D and general skip waste recovery facility at Merrywell Industrial Estate, Ballymount, Dublin 22. Oxigen also operate as a transfer station for Hazardous Waste, mainly asbestos.

In accordance with the requirements of Condition 11.8 of the waste licence, an Annual Environmental Report (AER) for the facility must be submitted to the Environmental Protection Agency (The Agency).

This is the sixth AER for the facility, covering the period from 1st January 2011 to 31st December 2011.

The Facility is located at:-

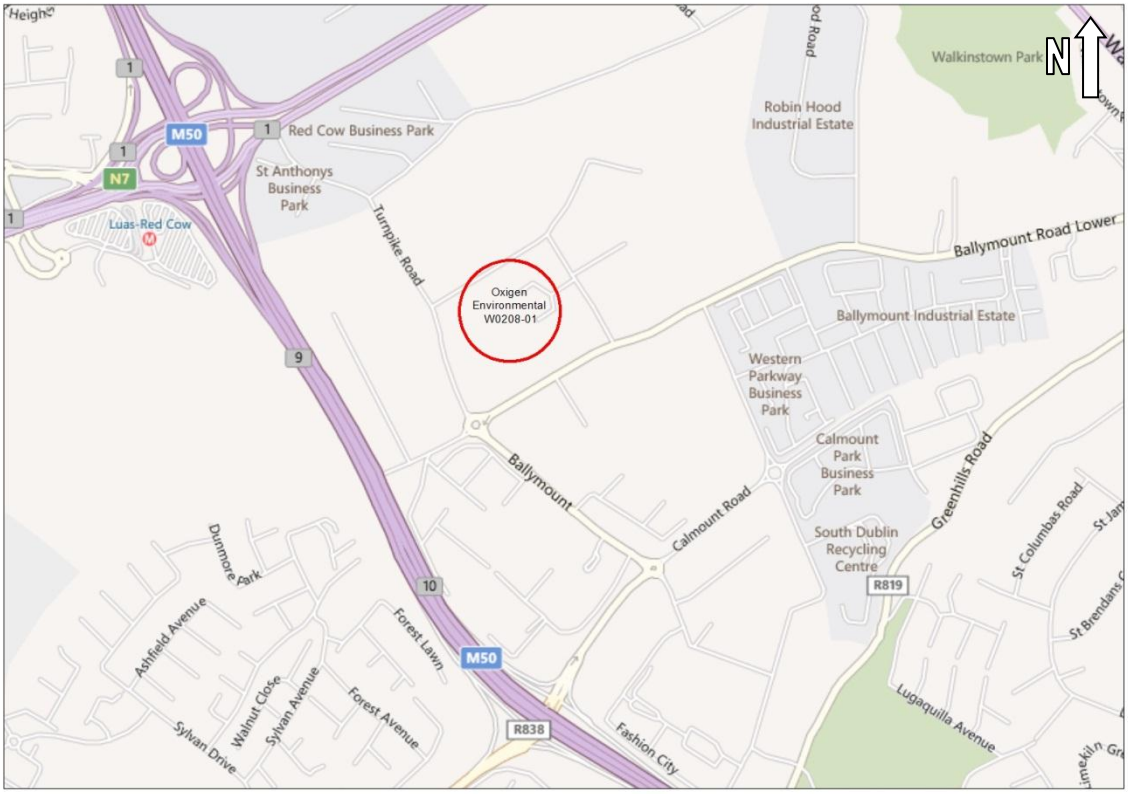
Oxigen Environmental Ltd,
Merrywell Industrial Estate,
Ballymount Road,
Ballymount,
Dublin 22.

Tel: (01) 4263118 Fax: (01) 4567192

The National Grid co-ordinates for the location of the facility are: E309627 N230736.

1. FACILITY LOCATION, DESCRIPTION AND WASTE ACTIVITIES

Figure 1.1 Location Ma



Bing Maps 2012

1.1 Description of the Site

The site was historically used as a steel works operated by Corus Steel (formerly The Irish Steel Company), until 2003 when it was purchased by Oxigen. The site then operated under Waste Facility Permit number W041 issued by South Dublin County Council.

The total area of the site is thirteen acres. A technical amendment to the licence was granted in May 2008 to reduce the waste acceptance quantities by 100,000 tonnes and to reduce the site boundary.

The facility is part of the overall Ballymount Industrial Estate and is surrounded on all four sides by commercial/industrial units. Three roads border the site, the Turnpike Road, the other two roads are unnamed internal estate roads. The main entrance to the site is located to the northeast of the facility off one of the internal estate roads. The nearest residential dwelling is located approximately 180m north -west of the facility.

The site is zoned "E – to provide for enterprise, employment and related uses" under the County Development Plan 2004 – 2010.
The site is located within the River Liffey catchment, in the sub-catchment of the River Camac, via the Robinhood Stream. The bedrock consists of Calp Limestone and is overlaid by glacial till, which consists of firm to stiff sandy gravely clays with clasts present. The site is

predominantly flat, with earth mound along the southern and western boundaries. The topographical level ranges from 59.27m OD to 64.48m OD, with the buildings heights being 72.97m OD.

The licensed waste handling activities, permitted under the Third and Fourth Schedule of the Waste Management Acts 1996 to 2005 are detailed below:

1.2 Waste Licensed Activities

Class 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 paragraphs 8 to 10 of this schedule (including evaporation, drying and calcination)

Class 11 Blending or mixture prior to submission to any activity referred to in a preceding paragraph

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

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

1.3 Waste Recovery Activities

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

Class 3 Recycling or reclamation of metals and metal compounds

Class 4 Recycling or reclamation of other inorganic materials

Class 11 Use of waste obtained from any activity referred to in a preceeded paragraph of this schedule

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

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

2. EMISSIONS FROM THE FACILITY

2 Emissions from the Facility

All emissions from the facility in 2011 were monitored by BHP Laboratories Ltd. Foul water, surface water and dust were all monitored in 2011. The results of all monitoring have been summarised in the tables below. The full monitoring reports are available for inspection at the facility. There is a high level of compliance with the standards set in the licence.

2.1 Noise Monitoring Summary

Noise monitoring was carried out on the 9th June 2009. The noise contribution made by operations at Oxigen did not exceed the daytime background limit by more than 10dB. The night time limit of 45dB was not breached by Oxigen's operations. There was no evidence of a tonal or impulsive component to the noise attributable to the plant operations.

2.2 Foul Water Monthly Monitoring Results Summary 2011

Parameter	Units	ELV	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Temperature	*C	42	Dry	Dry	Dry	Dry	14.2	17.1	15.8	16.5	15.4	15.4	15.9	9.8
pH	pH Units	6-10	Dry	Dry	Dry	Dry	7.41	8.87	7.01	6.12	6.22	7.67	6.51	8.32
BOD	mg/l	1000	Dry	Dry	Dry	Dry	26	87	68	156	212	10	125	45
COD	mg/l	3000	Dry	Dry	Dry	Dry	45	207	81	188	513	110	401	311
Total Suspended Solids	mg/l	1000	Dry	Dry	Dry	Dry	5	153	22	44	95	56	67	236
Sulphates (as SO4)	mg/l	1000	Dry	Dry	Dry	Dry	80.4	50.1	38.1	81.4	65.2	87.9	72.1	58
Oils, Fats & Grease	mg/l	100	Dry	Dry	Dry	Dry	1.3	41	11	9	11	<1	5	<1
Mineral Oils	mg/l	10	Dry	Dry	Dry	Dry	<0.01	<0.01	<0.1	<0.01	<0.1	<0.01	<0.1	<0.01
Detergents	mg/l	100	Dry	Dry	Dry	Dry	<0.001	0.268	0.195	0.154	0.084	0.01	0.127	3
Zinc	mg/l	5	Dry	Dry	Dry	Dry	<0.001	0.018	0.021	0.052	0.048	0.012	0.051	0.021
Copper	mg/l	5	Dry	Dry	Dry	Dry	<0.007	0.06	<0.001	0.087	0.022	0.003	0.036	<0.001
Flow	m3/hr	5	Dry	Dry	Dry	Dry	0.38					0.65		0.51

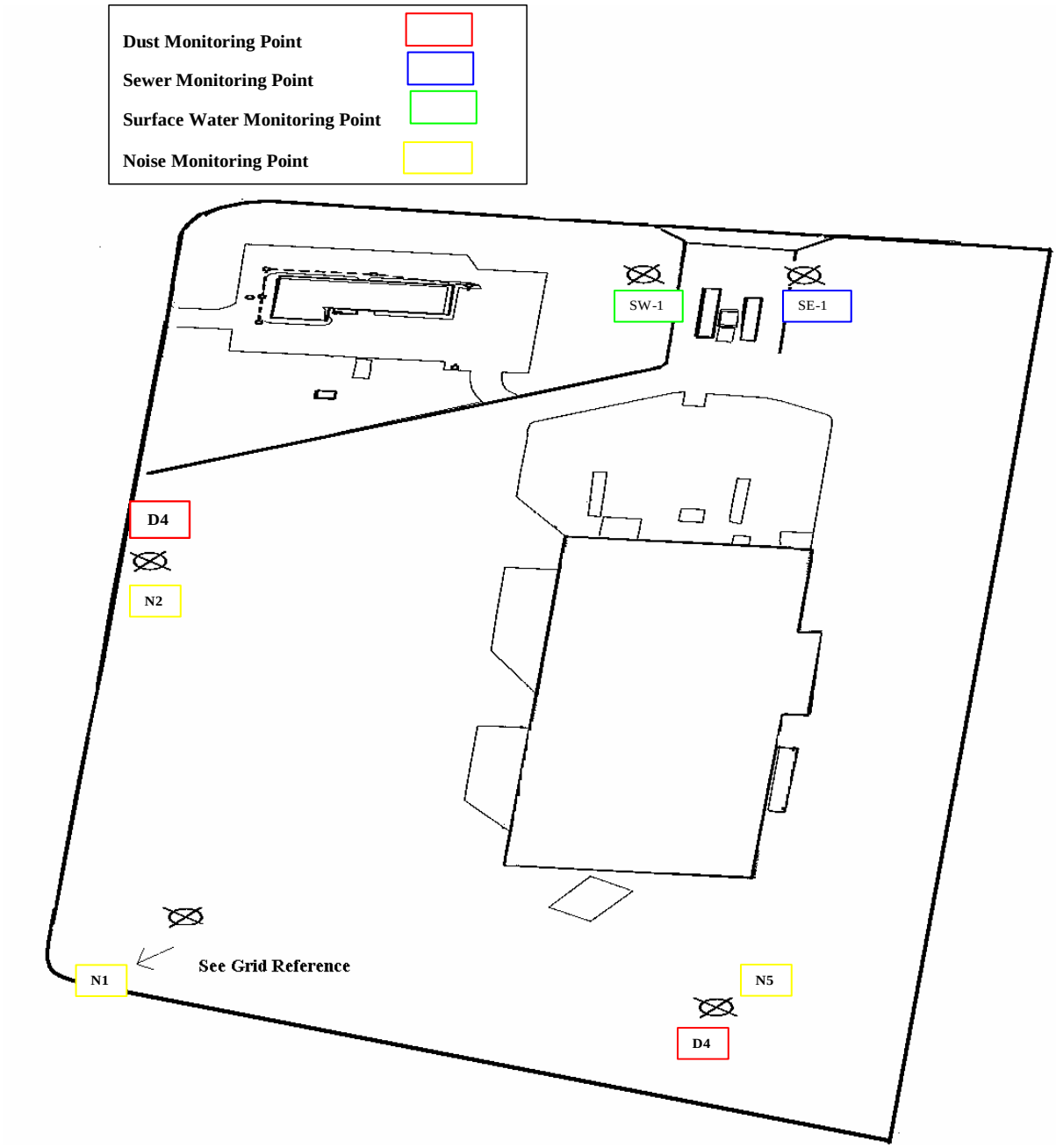
2.3 Quarterly Surface Water Monitoring Results Summary

Parameters	Units	January	May	September	November
Temperature	*C	9.4	10.2	12.8	14.1
pH	pH units	7.83	7.32	6.1	6.26
Conductivity	uScm -1	695	1460	820	702
BOD	mg/l	10	6	4	3
COD	mg/l	48	52	33	21
Suspended Solids	mg/l	56	122	28	11
Ammonia (as N)	mg/l	0.37	1.75	1.7	0.42
Mineral Oils	mg/l	<0.01	<0.01	<0.01	<0.01

2.4 Bi annual Dust Monitoring Results Summary

	D1	D2	D3
Results 1 (March)	270	199.4	134.4
Results 2 (August)	260.9	109	73.5
Results 3 (September)	71.6	45.2	30.5
Results 4 (Oct)	9.9	14.6	9.8
Results 5 (December)	40.1	38.9	26.2

Figure 3. Oxigen Ballymount Monitoring Locations



3. WASTE MANAGEMENT RECORD

3 Waste Management Record

Oxigen Environmental Ballymount create various waste streams arising from the operation of the facility, mostly attributed to staff activity and maintenance. Oxigen ensure that recycling of each waste stream is promoted, through provision of facilities and through staff education.

3.1 Maintenance

The waste arising from the mechanics shed consists of oily solid waste, waste oil, waste coolant, break fluid and lead acid batteries collected by an approved contractor for recycling.

3.2 Office paper

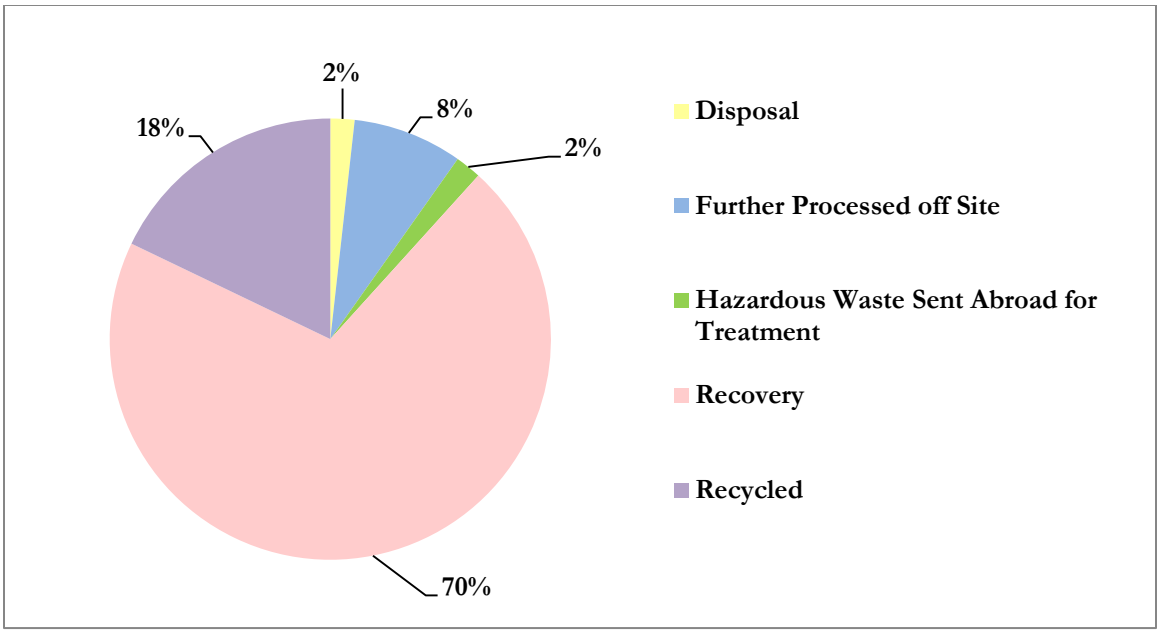
The office paper waste arising in the office building is shredded and placed in the green recycling bins provided in each office. Bins are collected as part of a larger dry recyclables collection route carried out by Oxigen, and deposited at the Oxigen Ballymount Facility for segregation and recycling.

3.3 Canteen Waste

Canteen waste which arises from the office building and the canteen in the processing shed is collected as part of a larger municipal waste collection route carried out by Oxigen and transferred to Oxigen, Robinhood facility. Green bins are also provided for recyclable canteen waste.

4. QUANTITY AND COMPOSITION OF WASTE RECOVERED, RECEIVED AND DISPOSED OF DURING THE REPORTING PERIOD

4. Quantity and Composition of Waste Recovered, Received and Disposed of During 2011



4.1 Tonnage of Waste Received at Oxigen Ballymount for the period of 1st January to 31st December 2011

Table 4.1.1 Total Mixed Waste Received 2011

Material Type	EWC Code	Weight (Tonnes)
BULKY WASTE	20 03 07	28,377.80
STREET SWEEPING	20 03 03	6,074.44
MIXED C & D	17 09 04	41,213.21
DRY MIXED RECYCLING	20 03 01	19,994.14
Total		**95,659.59**

Table 4.1.2 Total Source Segregated Waste Received 2011

Material Type in	EWC Code	Weight (tonnes)
FLAT GLASS	20 01 02	17,280
HARD PLASTIC	17 02 03	74,700
PLASTIC PACKAGING	15 01 02	1,940,320
WOOD	02 01 38	1,608,800
GREEN BIODEGRAGABLE WASTE	20 02 01	2,941,860
STEEL CANS	15 01 04	27,780
TETRAPAK	15 01 05	44,120
FRAG FEED	20 01 40	763,220
PLASTERBOARD /GYPSUM	17 08 02	118,720
RUBBLE EWC	19 12 12	4,100
MIXED WEEE	20 01 36	10,940
SOIL AND STONES	17 05 04	256,100
END OF LIFE TYRES	16 01 03	2,760
GARDEN AND PARK (INC. CEMETARY) WASTE	20 00 00	1,024,120
GLASS	15 01 07	4,620
CARDBOARD	15 01 01	4,403,670
GREEN GLASS	15 01 07	295,600
BROWN GLASS	15 01 07	141,840
CLEAR GLASS	15 01 07	330,500
PLASTIC BOTTLES	15 01 02	222,520
WHITE PAPER	20 01 01	21,980
SHREDDED PAPER	20 03 01	1,420
CABLE EWC	17 04 11	16,880
DUST FROM MECHANICAL TREATMENT	19 12 12	174,840
S.R.F (SOLID RECOVERED FUEL)	19 12 10	465,200
TEXTILES EWC	20 01 11	4,880
POLYSTYRENE EWC	15 01 02	1,980
PLASTICS EWC	20 01 39	18,360
TIMBER PACKAGING	15 01 03	1,428,040
ALUMINIUM	15 01 04	36,180
Total		**16,403,330**

Table 4.1.3 Total Hazardous Waste Received 2011

EWC Code	Waste Type	Weight (Tonnes)
07 05 01*	Aqueous washing liquids and mother liquids	4.23
07 05 13*	Solid wastes containing dangerous substances	0.32
15 01 10*	Packaging containing residues of or contaminated by dangerous substances	2.34
15 02 02*	Absorbents, filter materials, wiping cloths, protective clothing contaminated by dangerous substances	0.07
16 05 04*	Gases in pressure containers containing dangerous substances	7.27
16 05 08*	Discarded organic chemicals consisting of or containing dangerous substances	5.18
18 01 03*	Wastes whose collection and disposal is subject to special requirements in order to prevent infection	0.08
19 12 11*	Other wastes from mechanical treatment of waste containing dangerous substances	5.12
20 02 13*	Solvents	0.00
20 01 19*	Pesticides	0.20
20 01 27*	Paint, inks, adhesives and resins containing dangerous substances	344.53
17 06 01*	insulation materials containing asbestos	77.40
17 06 05*	construction materials containing asbestos	1,739.45
13 07 03*	other fuels (including mixtures)	14.88
16 03 03*	inorganic wastes containing dangerous substances	41.75
16 03 05*	organic wastes containing dangerous substances	1.70
07 05 01*	aqueous washing liquids and mother liquors	0.26
20 01 21*	fluorescent tubes and other mercury-containing waste	0.05
20 01 32	medicines other than those mentioned in 20 01 31	0.47
17 05 03*	soil and stones containing dangerous substances	37.34
	Total	**2,282.64**

4.2 Tonnage of Waste Recovered, Recycled and Disposed of at Oxigen Ballymount for the period of 1st January to 31st December 2011

Table 4.2.1 Tonnage of Waste Recycled 2011

Material Type in	EWC Code	Weight (Tonnes)
DRY MIXED RECYCLING	20 03 01	7,360.92
MIXED PAPER WASTE	20 01 01	5,094.04
STEEL CANS EWC	15 01 04	148.04
TETRAPAK EWC	15 01 05	39.72
FRAG FEED	20 01 40	1,058.16
SHREDDED FERROUS METAL	19 12 02	1,597.50
CARDBOARD	15 01 01	4,777.40
GREEN GLASS	15 01 07	321.44
BROWN GLASS	15 01 07	123.82
CLEAR GLASS	15 01 07	344.50
PLASTIC BOTTLES	15 01 02	354.02
MIXED C & D	17 09 04	62.80
ALUMINIUM	15 01 04	52.24
	Total	**21,334.60**

Table 4.2.2 Tonnage of Waste Recovered 2011

Material Type in	EWC Code	Weight (Tonnes)
PLASTIC PACKAGING	15 01 02	17.88
RUBBLE EWC	19 12 12	31,827.48
MIXED WEEE	20 01 36	116.38
SOIL AND STONES	17 05 04	384.72
C&D FINES EWC	19 12 09	13,081.86
MIXED C&D (PROCESSED)	19 12 12	6,802.98
(SOLID RECOVERED FUEL)	19 12 10	31,800.70
GAS CYLINDERS	02 01 40	8.36
	Total	**84,040.36**

Table 4.2.3 Tonnage of Waste Disposed 2011

Material Type in	EWC Code	Weight (Tonnes)
BULKY WASTE	20 03 07	2,057.64
RESIDUE	02 03 01	49.50
	Total	**2,107.14**

Table 4.2.4 Tonnage of Waste sent Off Site for Further Processing 2011

Material Type in	EWC Code	Weight (Tonnes)
HARD PLASTIC EWC	17 02 03	135.86
WOOD	20 01 38	5,952.84
GREEN BIODEGRAGABLE WASTE	20 02 01	3,404.94
END OF LIFE TYRES	16 01 03	91.68
PLASTICS EWC	20 01 39	1.50
	Total	**9,586.82**

Table 4.2.5 Tonnage of Hazardous Waste sent Abroad for Treatment 2011

Waste Type	EWC Code	Weight (Tonnes)
Paint and paint related	20 01 27*	312.00
Aqueous washings	07 05 01*	8.40
Mixed waste	19 12 11*	29.20
Solvents	20 01 13*	1.00
Pharma waste	07 05 13*	4.50
Absorbents	15 02 02*	2.70
Asbestos (bonded)	17 06 05*	1,777.47
Asbestos (un-bonded)	17 06 01*	30.70
Soil and Stones (Excavated containing asbestos)	17 05 03*	38.00
Off specification/Unused waste	16 03 03 *	41.70
	Total	**2,245.67**

5. OPERATIONAL PROCEDURE DEVELOPED IN 2011

5 Procedures Developed in 2011

5.1 Environmental Management System Procedures Log

In compliance with the conditions of licence no. W0208-01, and in order to achieve the objectives and targets set out in the Oxigen Ballymount Facility Environmental Management System, procedures were developed by Oxigen in 2006. In order to improve the Environmental Management System (EMS) and to achieve ISO 14001 Standard Certification, the EMS was reviewed and amended in 2008. In May 2009, Oxigen was independently assessed and certified to the ISO14001 Standard by Certification Europe. Some amendments were made to the EMS. A full procedure list was then submitted in the AER for 2009. The full title and written summary of each new procedure developed in 2011 is detailed below. All the procedures are available for inspection at the facility.

OXEP 32 Fines Sampling Procedure

This procedure was developed in April 2011 to ensure that standard principles are followed by all staff for the collection of composite samples of C&D fines which are send for external laboratory analysis. Standard sampling techniques used are in line with published procedure 'Characterisation of Waste - Sampling of waste materials - Part 2: Guidance on sampling techniques' as drawn up by the Technical Committee CEN/TC 292 in 2006.

6. REVIEW OF NUISANCE CONTROLS

6. Review of Nuisance Controls

Eastern Pest Control (EPC) carried out the pest control at the facility in 2011. Daily and weekly inspections are carried out by the facility manager and the compliance officer on site, which highlight any nuisances on site, such as litter, pests, noise, flies, odour or dust. Should any such nuisances be recorded, then appropriate measures are undertaken. There are procedures in place to deal with any such nuisances at the facility.

In 2011, EPC visited the site 94 times to spray for flies, this was mainly in early spring and summer. Facility was no Sprayed for flies at all in Jan and Dec due to cool weather conditions. In the months February, March October and November, the Ballymount facility was sprayed once per week and between April and September the facility was sprayed three times per week (Mon – Wed and Fri). Stock levels were kept as low as possible and the floor of the processing shed was cleared and cleaned regularly.

EPC visited the site on 13 occasions to monitor rodent activity onsite. Bait boxes were placed in strategic locations and were topped up as needed. Bait points were increased in 2011 to cover the area to the rear of the site at the location of the new Electricity substation and also the Civic Amenity site. Nuisance control measures currently in place are found to be adequate.

In 2011, EPC implemented a new barcoding system at the Ballymount Site. All visits with regard to pest control are logged and signed off by use of a handheld device at time of site action. All visits to site will have a time and date stamp and a description of level of pest activity. The activity log can be accessed by Oxigen Environmental at any time and all records are available to the Agency upon request.

7 RESOURCE CONSUMPTION SUMMARY

7 Resource Consumption Summary

Oxigen Ballymount use gas oil, electricity and water in the operation of the facility. Waste processing operations on site do not require water. The main uses of water are for dust control, bin washing and truck washing.

Gasoil and electricity are the two forms of energy used on site. This energy is used to power machinery used in the processing of the waste and to illuminate the working area. Electricity is also used in the day to day staff activity for example lighting in common areas and water heating in canteen.

Table 7 Summary of resource consumption for the reporting period

Site Resource Usage Jan - Dec 2011	Quantity	Units
Gasoil	551,922	Litres
Electricity	1,178,372	kWh
Water	1,850,000	Litres

Table 7.1 Summary of Electricity Usage for the Reporting Period

2011	kWh
January	101343
February	93114
March	104645
April	87223
May	89783
June	85618
July	90590
August	99769
September	92750
October	106602
November	119104
December	107831

Figure 7.1 Graph of Electricity Usage Comparison 2010 and 2011

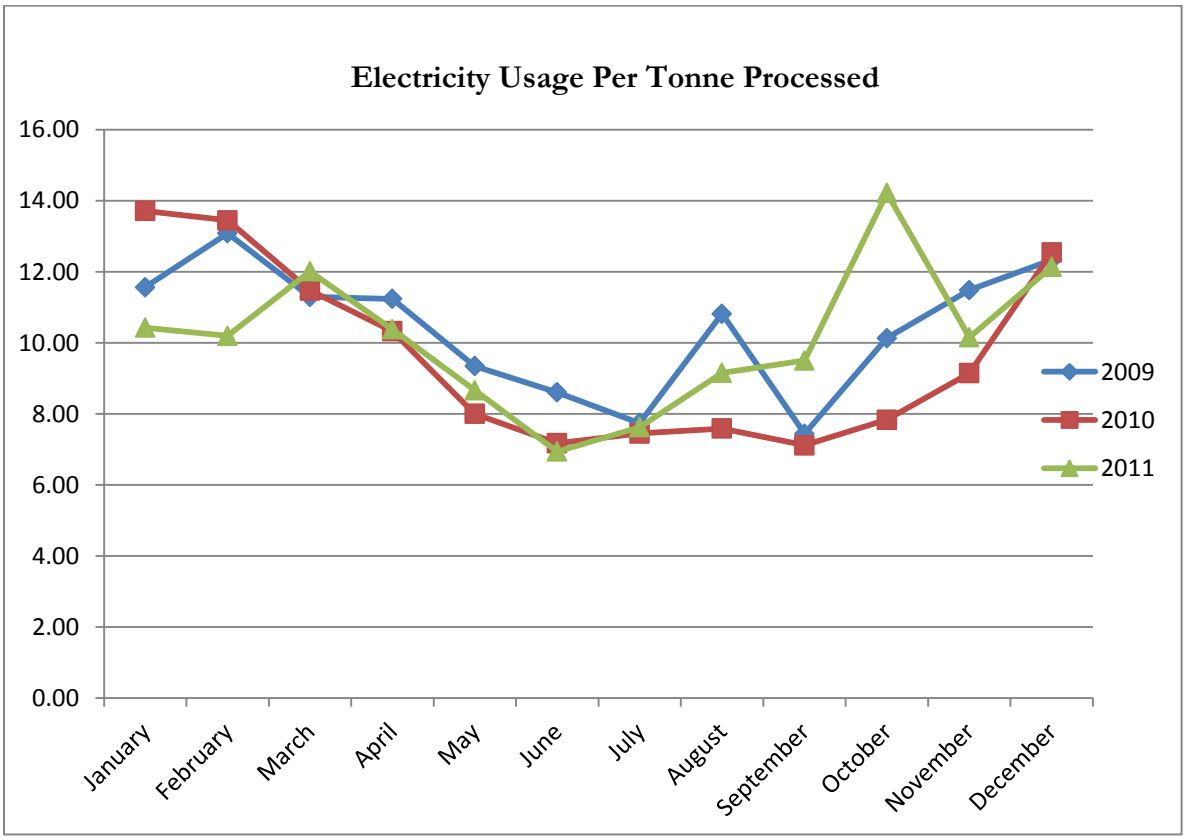
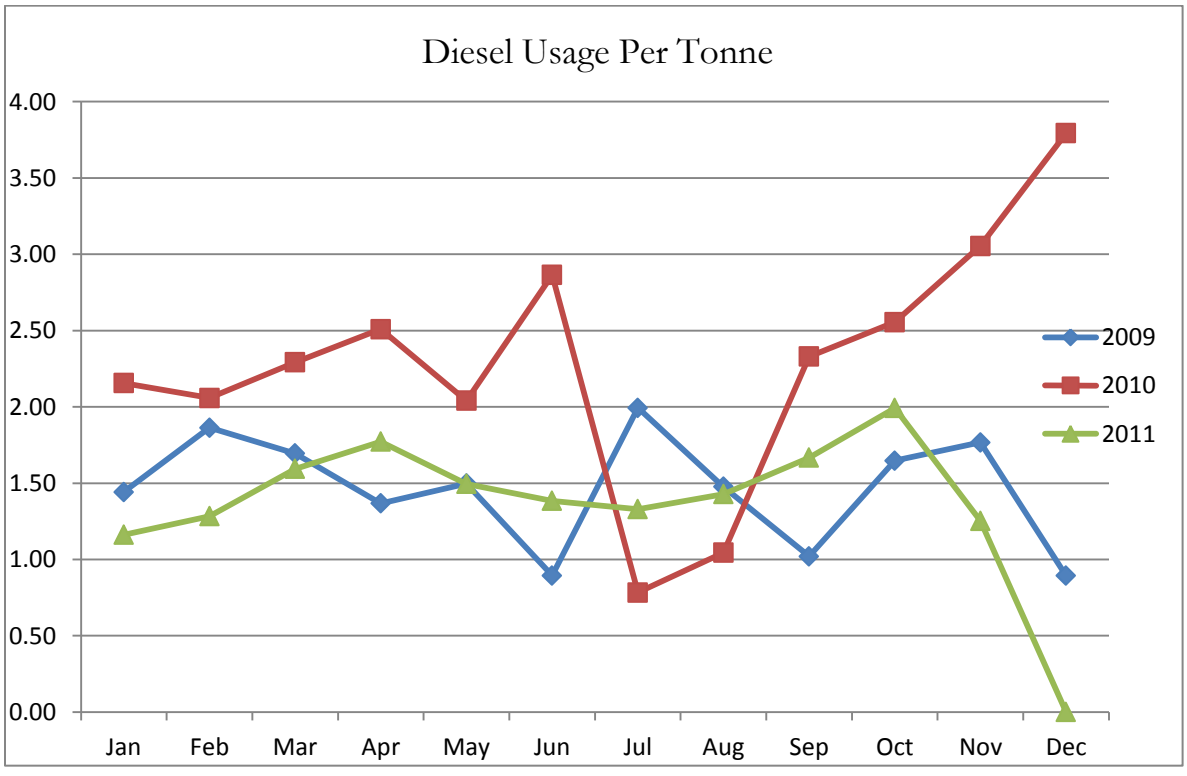


Table 7.2 Summary of Diesel usage (litres) for the reporting period

Month	Litres
Jan 2011	38868
Feb 2011	40196
Mar-11	50030
Apr-11	47207
May-11	57000
Jun-11	68908
Jul-11	68148
Aug-11	67649
Sep 2011	62914
Oct-11	63226
Nov 2011	75628
Dec 2011	37296

Figure 7.2 Graph of Diesel Usage Comparison 2009, 2010 and 2011



8 ENERGY EFFICIENCY AUDIT REPORT SUMMARY

8 Energy Efficiency Audit Report Summary

Figure 7.1 shows the electricity usage from 2009 to 2011 per tonne processed. It can be seen that the usage in 2011 rose from June to October. This can attributed to extra shift work at the facility due to increase stock level. Overall in 2011, there was no significant change in electricity usage per tonnes at the facility.

Figure 7.2 shows that diesel usage from 2009 to 2011. Two diesel generators were used on site to power the Construction and Demolition (C&D) line shredder and the Solid Recovered Fuel (SRF) plant. The generator powered the C&D shredder was a 500Kva generator and the SRF plant was powered with a 1200Kva generator. As the operation of these static machines relied on diesel throughout the year this resulted in the use of a significant amount of fuel per tonne processed. In April 2011, works commenced on a substation at the rear of the site, this involved in extensive upgrading a replacement of power cables on site. In November 2011, decommissioning phase of the diesel generators began and the substation was then commissioned bringing Medium Voltage power on site. The Diesel usage for static plant fell in December 2011 significantly and currently only the rolling plant on site are powered with diesel.

Oxigen Environmental are committed to reducing energy per tonne at the facility. The complete power needs of Oxigen Environmental is now served by fixed line infrastructure using 100% renewable sourced electricity, this has greatly reduced the carbon footprint of this site.

9 COMPLAINTS SUMMARY

9 Complaints summary

All the issues relating to the complaints summarised below were rectified and closed out. The detailed complaints record is available for inspection at the facility.

Number	Date	Communication Method	Issue
1	08.03.2011	Complaint direct from Company	Odour
2	17.05.2011	Telephone call from EPA	Flies
3	24.05.2011	Telephone call from EPA	Flies
4	05.10.2011	Telephone call from EPA	Odour

10 REPORTED INCIDENTS SUMMARY

10 Reported Incidents Summary

There were no environmental incidents reported to the EPA during 2011.

11. SCHEDULE OF ENVIRONMENTAL OBJECTIVES & TARGETS

11. Schedule of Environmental Objectives & Targets

Oxigen Environmental began operating under Licence 208-1 in July 2006. A schedule of environmental objectives & targets were submitted to the Agency under condition 2.2.2. (See Environmental Management Programme) as part of the facility's overall Environmental Management System. These objectives and targets have been reviewed as part of the Facility AER for 2011 and updated for 2012.

11.1.0 Purpose

Under condition 2.2.2.2 of Waste License W0208-01, Oxigen Environmental Ltd. are required to propose a schedule of Objectives and Targets to ensure that the process of continual improvement of the facility's environmental performance is formalised and clearly set out. This schedule shall address a five-year period as a minimum.

The Objectives and Targets are set taking into account the significant environmental aspects and will be reviewed continually according to the Methodology for Review of Objectives and Targets to assess the compliance of the company with them. Upon review, new Objectives and Targets will be set and any modifications to those previously set will be made.

Objectives and Targets are set within the timescale of one year. Appropriate time-scales within the year are applied to each target.

The Schedules of Objectives and Targets over a five year period are displayed below.

Table 11.1 ***Summary of Objectives and Targets for W0208-01, 2008***

Objective	Description	Target
1	Improvement of yard infrastructure.	1.1 Install silt Trap and interceptor on surface water drain 1.2 Improve C&D Recycling Plant 1.3 Install Truck Wash
2	To increase recycling figures	2.1 C&D 2.2 Bulky Skip Waste 2.3 Packaging
3	Training	3.1 Continue Training Programme
4	Continually improve the EMS	4.1 Review on an annual basis
5	Improved quality	5.1 Develop quality oriented processing 5.2 Use of better technologies 5.3 Stricter standards
6	Cleaner technology	6.1 Cleaner technology & cleaner production systems
7	Energy Efficiency	7.1 Conduct an energy audit & improve efficiency 7.2 Improve energy efficiency rates in the processing shed

Table 11.2 ***Summary of Objectives and Targets for W0208-01, 2009***

Objective	Description	Target
1	Reduction of tonnage to landfill to 18% from 20% in 2008	1.1 Commission new C&D plant. 1.2 Install wind shifter.
2	Training	2.1 W.A.M.I.T.A.B 2.2 On site training in use of spill kits. 2.3 Continued environmental training as per training schedule and individual training programs as per new Environmental Training Procedure
3	Site Upgrade	3.1 Assess and upgrade concrete hardstand – schedule for submission to EPA 3.2 Screen site. 3.3 Signage on site
4	Site Security Programme	4.1 Install CCTV 4.2 Upgrade site fencing
5	New Pest Control System	5.1 Install 3 probes in Dry recycling shed for controlled application of insecticides over in feed and loading bags.

Table 11.3 ***Summary of Objectives and Targets for W0208-01, 2010***

Objective	Description	Target
1	Training	1.1 Update Training Schedule
2	Site Upgrade	2.1 Screen Site
3	Energy Use Reduction	3.1 Identify potential reductions from SEI Report 3.2 Implement changes
4	Provision of CA Site	4.1 Obtain Planning to follow EPA approval 4.2 Construct
5	Upgrade Office Recycling System	5.1 Identify requirements & source equipment 5.2 Implement system and awareness program
6	Integrate Hazardous Waste Procedures into EMS	6.1 Produce draft Hazardous Waste Procedures 6.1 Implement and number as part of overall ISO14001 system

Table 11.4 ***Summary of Objectives and Targets for W0208-01, 2011***

Objective	Description	Target
1	Reduce risk of Surface Water Pollution on Site	1.1 Install protective barrier at diesel tank. 1.2 Set up large static spill kit at diesel tank. 1.3 Divert surface water drainage from under processing shed and install drainage system at wood bay that will prevent blockages occurring. 1.4 Carry out extensive drain survey
2	Pest Control	2.1 Flies. Look into redesigning MRF to increase capacity to process dry recyclables more quickly. Increase to 28 tonnes per hour from 14. 2.2 Rodents. Introduce enhanced pest control monitoring service to include bar coding of all bait points and electronic reporting to aid internal monitoring of pest activity and establish on-site trends if any.
3	Reduce Water Usage	3.1 Investigate feasibility of harvesting rain water from processing shed roofs for use on site.
4	Dust Control	4.1 Install sprinkler systems at corner of processing sheds to damp down site roadways in dry weather.
5	Reduce waste produced and tonnage of waste to landfill	5.1 Divert all suitable residue to SRF Plant 5.2 Upgrade Dry Recycling plant to reduce quantity of residue produced by 5%. 5.3 Introduce tyre pressure and maintenance programme to increase life of tyres and reduce the quantity of waste tyres produced.
6	Reduce Diesel Consumption	6.1 Increase Maximum Import Capacity-switch to medium voltage and remove diesel generators. 6.2 Reduce road diesel consumption by 5% by managing tyre pressure in waste collection vehicles.

Table 11.5 ***Summary of Objectives and Targets for W0208-01, 2012***

Objective	Description	Target
1	Seal processing building to reduce risk of fugitive dust and odours in the surrounding area	1.1 Source and install new doors for Dry Recycling Building 1.2 Design and source materials for new wall to be erected at D4 1.3 Construct new wall at D4 1.4 Source and install new doors for C&D shed
2	Reduce Carbon Footprint	2.1 Carry out a lighting audit to reduce the energy usage from lighting in processing shed.
3	Reduce risk of discharge to water	3.1 Source and install a Composite Sampler on site to increase accuracy of water monitoring 3.2 Inspection of the existing hardstand within and around the processing building 3.3 Works program established to remediate any issues with concrete hardstand
4	Reduce risk of local nuisance in the surrounding area.	4.1 Review Fly fogging at the facility, investigate alternative pesticide/review frequency 4.2 Increase load inspection at facility by employing a banksman to ensure that no putrescible waste enters facility giving rise to fly or odour nuisance. 4.3 Carry out audit on building fabric around offices within the Processing shed and seal as necessary to reduce fly nuisance in staff canteen and surrounding area. 4.4 Carry out site works to site boundary and remove all unused vehicles to improve the aesthetics
5	Increase Recycling/recovery rates	5.1 Research and investigate increasing recycling rates at the facility. 5.2 Increase Quality Control on processing lines to increase segregation of materials and reduce level of contaminants to recover hard core.

12. ENVIRONMENTAL MANAGEMENT PROGRAMME

12. Environmental Management Programme

12.1– Report for previous year.

A summary report on the EMP set out for 2011 is outlined below.

Objectives and Targets Schedule for 2011

Objective	Description	Target
1	Reduce risk of Surface Water Pollution on Site	1.1 Install protective barrier at diesel tank. **SCHEDULED FOR 2012**
		1.2 Set up large static spill kit at diesel tank. **COMPLETE**
		1.3 Divert surface water drainage from under processing shed and install drainage system at wood bay that will prevent blockages occurring. **ONGOING**
		1.4 Carry out extensive drain survey **COMPLETE**
2	Pest Control	2.2 Rodents. Introduce enhanced pest control monitoring service to include bar coding of all bait points and electronic reporting to aid internal monitoring of pest activity and establish on-site trends if any. **COMPLETE**
3	Reduce Water Usage	3.1 Investigate feasibility of harvesting rain water from processing shed roofs for use on site. **COMPLETE**
4	Dust Control	4.1 Install sprinkler systems at corner of processing sheds to damp down site roadways in dry weather. **SCHEDULED FOR 2012** new water hose install at td3 and d4
5	Reduce waste produced and tonnage of waste to landfill	5.1 Divert all suitable residue to SRF Plant. **COMPLETE**
		5.2 Upgrade Dry Recycling plant to reduce quantity of residue produced by 5%. POSPONED
		5.3 Introduce tyre pressure and maintenance programme to increase life of tyres and reduce the quantity of waste tyres produced. **COMPLETE**
6	Reduce Diesel Consumption	6.1 Increase Maximum Import Capacity- switch to medium voltage and remove diesel generators. **COMPLETE**
		6.2 Reduce road diesel consumption by 5% by managing tyre pressure in waste collection vehicles. **COMPLETE**

OBJECTIVE 1: Reduce risk of Surface Water Pollution on Site

Project Summary
1.1 Install protective barrier at diesel tank. **SCHEDULED FOR 2012** 1.2 1.2 Set up large static spill kit at diesel tank. **COMPLETE** 1.3 1.3 Divert surface water drainage from under processing shed and install drainage system at wood bay that will prevent blockages occurring. **ONGOING** 1.4 1.4 Carry out extensive drain survey **COMPLETE**
Designation of Responsibility: Environmental Compliance Officer & Operations Team
Progress Report Protective barrier installed at diesel pumps, barrier not yet erected at diesel tank. Barrier works scheduled as part of site upgrade and maintenance works for 2012. Spill Kit was set up at the Diesel tank area in March 2011 The diversion of surface water draining from under processing shed is 80& complete. Completion date expected 01/05/12 Drainage survey took place on site in November 2012 by in house Engineer.

OBJECTIVE 2: Increase Pest Control

Project Summary
2.1 Introduce enhanced pest control monitoring service to include bar coding of all bait points and electronic reporting to aid internal monitoring of pest activity and establish on-site trends if any. **COMPLETE**
Designation of Responsibility: Environmental Compliance Officer & Operations Team
Progress Report In April 2011, EPC implemented a new barcoding system at the Ballymount Site. All pest control visits are logged and signed off using a handheld device at time of site action. All visits to site will have a time and date stamp and a description of level of pest activity. The activity log can be accessed by Oxigen Environmental at any time and all records are available to the Agency upon request.

OBJECTIVE 3 : Reduce Water Usage

Project Summary
3.1 Investigate feasibility of harvesting rain water from processing shed roofs for use on site. **COMPLETE**
Designation of Responsibility: Environmental Compliance Officer & Operations Team
Progress Report Feasibility studies were carried out in June 2011 to investigate if water from processing shed roofs could be used for use on site by means of rain water harvesting. The development was not feasible 2011 as there were other works that took priority. The possibility of rain water harvesting will be revisited in 2012. Oxigen will continue to investigate other method of reduce resource consumption.

OBJECTIVE 4: Dust Control

Project Summary
4.1 Install sprinkler systems at corner of processing sheds to damp down site roadways in dry weather. **COMPLETE**
Designation of Responsibility: Environmental Compliance Officer & Operations Team
Progress Report In June 2011, new water hoses were installed at D3 and D4 in C&D Shed. These hoses are used to for damping site and have proved to be very effective in doing so.

OBJECTIVE 5: Reduce waste produced and tonnage of waste to landfill

Project Summary
5.1 Divert all suitable residue to SRF Plant. **COMPLETE** 5.2 Upgrade Dry Recycling plant to reduce quantity of residue produced by 5%. **POSTPONED** 5.3 Introduce tyre pressure and maintenance programme to increase life of tyres and reduce the quantity of waste tyres produced. **COMPLETE**
Designation of Responsibility: Environmental Compliance Officer & Operations Team
Progress Report As can be observed from Section 4. Waste Records and Quantities, 70 % of the material at the Ballymount facility is now recovered thought our SRF plant. In 2011, only 2% of material was consigned to Landfill and The residue from the Dry Recycling Plant is not put through the SRF plant also which drastically reduces the tonnage to landfill. Due to economic uncertainties, the Dry Recycling plant was not upgraded in 2011. The Recycling rates at the plant however still remain high at 18% and all residues are recovered though the production of SRF. The tyre monitoring program was implemented in April 2011and has proven very successful company wide. This program set out tyre pressure guidelines for all vehicles in the fleet. All vehicles are checked daily by supervisors and spot check also takes place by management periodically. Oxigen Environmental have replaced all new tyres with high quality tyres supplied by a third party contractor. All vehicles are audited by the contractor on a monthly basis to ensure that all vehicles comply with statutory regulations and to ensure tyre life maximisation. The implementation of the tyre program had resulted in major saving for the company as a whole. A financial saving of over 40%, a increase of 30-40 % in tyre life, and also a 6% saving in fuel costs is experienced in 2012

OBJECTIVE 6: Reduce Diesel Consumption

Project Summary
6.1 Increase Maximum Import Capacity- switch to medium voltage and remove diesel generators. **COMPLETE** 6.2 Reduce road diesel consumption by 5% by managing tyre pressure in waste collection vehicles. **COMPLETE**
Designation of Responsibility: Environmental Compliance Officer & Operations Team
Progress Report The Medium Voltage Connect project began in April 2011 and was completed in Dec 2011. The implementation of medium voltage had allowed the diesel powered generator to be removed thus reducing the diesel costs. The complete power needs of Oxigen Environmental is now served by fixed line infrastructure using 100% renewable sourced electricity, this has greatly reduced the carbon footprint of this site. The monitoring of tyre pressure set out in the new tyre program has resulted in an expected 6% reduction in fuel costs.

12.2– Proposal for Current Year.

Table 12.2 1 Summary of Objectives and Targets for W0208-01, 2012

Objective	Description	Aspect	Target	Person Responsible	Completion Date
1	Seal processing building to reduce risk of fugitive dust and odours in the surrounding area	Odour & Dust	1.2 Source and install new doors for Dry Recycling Building 1.2 Design and source materials for new wall to be erected at D4 1.3 Construct new wall at D4 1.4 Source and install new doors for C&D shed	Eng/Development Team Eng/Development Team Operations Manger Operations Manager	16/01/12 02/04/12 03/06/12 03/06/12
2	Reduce Carbon Footprint	Natural Resources	2.2 Carry out a lighting audit to reduce the energy usage from lighting in processing shed.	Operations Manger	01/06/12
3	Reduce risk of discharge to water	Discharge to water	3.1 Source and install a Composite Sampler on site to increase accuracy of water monitoring 3.2 Inspection of the existing hardstand within and around the processing building 3.3 Works program established to remediate any issues with concrete hardstand	Environmental Compliance Officer Operations Manager Eng/Development Team/Operations manager	01/05/12 20/03/12 11/05/12
4	Reduce risk of local nuisance in the surrounding area.	Local nuisance	4.1 Review Fly fogging at the facility, investigate alternative pesticide/review frequency 4.2 Increase load inspection at facility by employing a banksman to ensure that no putrescible waste enters facility giving rise to fly or odour nuisance. 4.3 Carry out audit on building fabric around offices within the Processing shed and seal as necessary to reduce fly nuisance in staff canteen and surrounding area. 4.4 Carry out site works to site boundary and remove all unused vehicles to improve the aesthetics	En. Compliance Officer Operations Manger Eng/Development Team	01/05/12 01/05/12 01/05/12
5	Increase Recycling/recovery rates	Releases to Land/Natural Resources	5.1 Research and investigate increasing recycling rates at the facility. 5.2 Increase Quality Control on processing lines to increase segregation of materials and reduce level of contaminants to recover hard core.	Facility Manager/Operations Director	01/05/12

13. DEVELOPMENT WORKS

13.1 Development Works 2011

13.1.1 Medium Voltage

In 2011, Oxigen Environmental, due to rapid expansion of the processing line Oxigen Environmental were generating additional power needs by the use of diesel generator.
It was proposed to construct a SUB station at the rear of the site to bring Medium Voltage power on site.

The Medium Voltage Connect project began in April 2011 and was completed in Dec 2011. The implantation of medium voltage had allowed the diesel powered generator to be removed thus reducing the diesel costs as set out in Objectives and targets for 2011.The complete power needs of Oxigen Environmental is now served by fixed line infrastructure using 100% renewable sourced electricity, this has greatly reduced the carbon footprint of this site.

13.2 Development Works 2012

There are currently no Specified Engineering Works applied for in 2012.

Any proposed development of the facility will be submitted in writing to the Agency during the course of the year as required.

14. FINANCIAL PROVISION

14. Financial Provision

An Environmental Liabilities Risk Assessment was forwarded to the Agency in March 2003. Details of costs for the Financial Provision for Closure, Restoration and Aftercare were included as part of this report.

At present Oxigen Environmental have sufficient turnover and company assets to offset environmental liabilities in the event that they may be incurred during the course of the Facility Operations or in the event that the facility is closed. This will include the covering of costs associated with abatement installation, control & monitoring; closure & remediation of the site; clean-up following a plausible accident/incident and/or long-term aftercare for residual environmental liabilities. Oxigen Environmental has Pollution Cover of up to €13M with Brit Insurance, Policy No: F10028792E.

15. TANK, DRUM, PIPELINE AND BUND INSPECTION REPORT

15. Tank, Drum, Pipeline and Bund Inspection Report

Portable bunds are maintained on site for the storage of hydraulic oil, engine oil, waste oil, diesel, coolants and waste chemicals. These bunds have all been certified for integrity by the suppliers for a period of 3 years from the date of purchase. A copy of these certificates are held on file and available for inspection.

All bunds with outdated certificates were tested on site as per EMS Procedure 'OXEP 03 Procedure for Testing of Bunded Areas'. All tests were recorded on EMS Log Sheet 'OXEP106 Testing of Bunded Area Log Sheet'. These log sheets are kept on file along with original certificates.

16. PROGRAMME FOR PUBLIC INFORMATION

16. Programme for Public Information

A program for public information is in place at the facility. During the reporting period there were no requests from the public to inspect any of the records and files listed in the submission.

The lists of documents available for inspection in the Communication Folder are as follows:

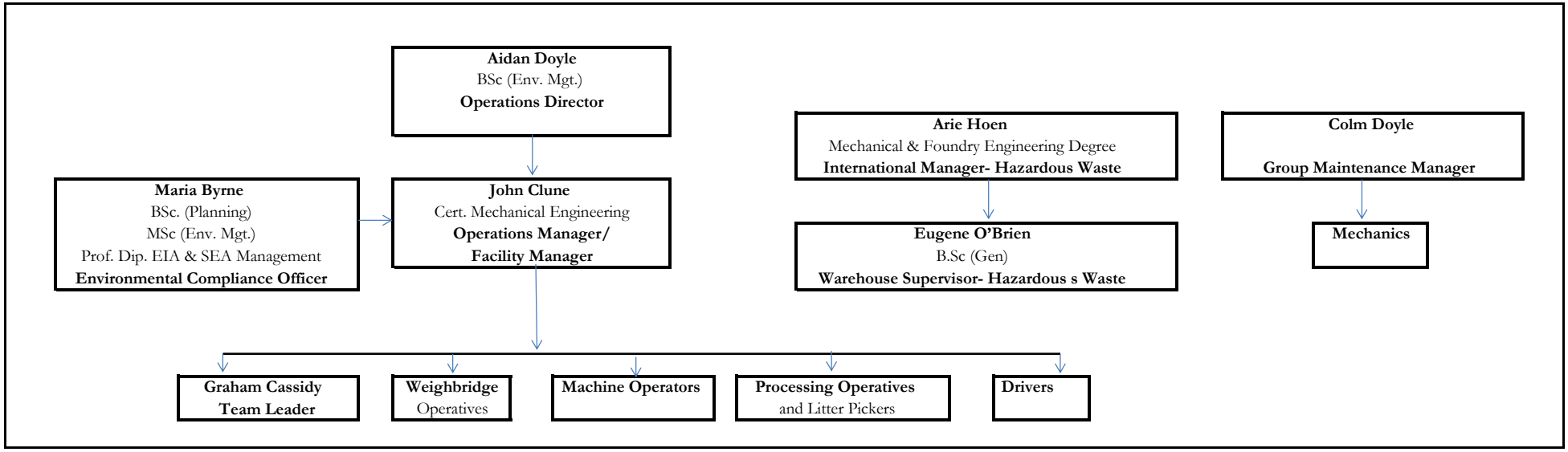
- Waste Licence W0208-01
- Environmental Policy
- Unacceptable Waste List
- Pest/Vermin Control Records
- Waste Licences/Permits of Facilities
- Environmental Monitoring Results for the current year
- Complaints Register

Members of the public who wish to inspect these files may do so at any reasonable time by making an appointment either with the Facility Manager or Compliance Officer at the telephone number posted on the main facility entrance sign erected in accordance with Condition 2.2.2.7.

MANAGEMENT STRUCTURE

W0208-01

17. Management and Staffing Structure at the Facility



18. CLOSURE AND DECOMMISSIONING MANAGEMENT PLAN

18. Closure and Decommissioning Management Plan

The Residuals Management Plan was submitted with the previous AER for the 2009 reporting period. No changes were made to the plan in 2011.

Environmental Protection Agency

Guidance to completing the PRTR workbook

AER Returns Workbook

Version 1.1.13

REFERENCE YEAR	2011

1. FACILITY IDENTIFICATION

Parent Company Name	Oxigen Environmental Limited
Facility Name	Oxigen Environmental Limited
PRTR Identification Number	W0208
Licence Number	W0208-01

Waste or IPPC Classes of Activity

No.	class_name
4.4	Recycling or reclamation of other inorganic materials.
3.11	Blending or mixture prior to submission to any activity referred to in a preceding paragraph of this Schedule.
3.12	Repackaging prior to submission to any activity referred to in a preceding paragraph of this Schedule.
3.13	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.
3.7	Physico-chemical treatment not referred to elsewhere in this Schedule (including evaporation, drying and calcination) which results in final compounds or mixtures which are disposed of by means of any activity referred to in paragraphs 1. to 10. of this Schedule.
4.11	Use of waste obtained from any activity referred to in a preceding paragraph of this Schedule.
4.12	Exchange of waste for submission to any activity referred to in a preceding paragraph of this Schedule.
4.13	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.
4.2	Recycling or reclamation of organic substances which are not used as solvents (including composting and other biological transformation processes).
4.3	Recycling or reclamation of metals and metal compounds.

Address 1	Merrywell Industrial Estate
Address 2	Ballymount Road Lower
Address 3	Clondalkin
Address 4	Dublin 22
	Dublin
Country	Ireland
Coordinates of Location	-6.35743 53.3149
River Basin District	IEEA
NACE Code	3832
Main Economic Activity	Recovery of sorted materials
AER Returns Contact Name	Maria Byrne
AER Returns Contact Email Address	mabyrne@oxigen.ie
AER Returns Contact Position	Environmental Compliance Officer
AER Returns Contact Telephone Number	01 4263129
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	0
User Feedback/Comments	
Web Address	

2. PRTR CLASS ACTIVITIES

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

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 (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

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 (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)

RELEASES TO AIR					Please enter all quantities in this section in KGs						
POLLUTANT		METHOD			QUANTITY						
			Method Used								
Pollutant No.	Name	M/C/E	Method Code	Designation or Description	Emission Point 1	Emission Point 2	Emission Point 3	Emission Point 4	T (Total) KG/Year	A (Accidental) KG/Year	F (Fugitive) KG/Year
210	Dust	M	ALT	Bergerhoff Methos	412.35	257.27	173.41	0.0	843.03	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: Oxigen Environmental Limited

Please enter summary data on the quantities of methane flared and / or utilised			Method Used			
	T (Total) kg/Year	**M/C/E**	**Method Code**	**Designation or Description**	**Facility Total Capacity m3 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

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 this only concerns Releases from your facility

RELEASES TO WATERS					Please enter all quantities in this section in KGs			
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
76	Total organic carbon (TOC) (as total C or COD/3)	M	ALT	Apha-5220-D	36.18	36.18	0.0	0.0
					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 PRTR POLLUTANTS

RELEASES TO WATERS					Please enter all quantities in this section in KGs			
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 C : REMAINING POLLUTANT EMISSIONS (as required in your Licence)

RELEASES TO WATERS					Please enter all quantities in this section in KGs			
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
306	COD	M	ALT	Apha-5220-D	726.75	726.75	0.0	0.0
303	BOD	M	ALT	Apha-5210-B	108.54	108.54	0.0	0.0
240	Suspended Solids	M	ALT	Apha-2540-B	1024.05	1024.05	0.0	0.0
324	Mineral oils	M	ALT	GC-FID	0.1	0.1	0.0	0.0
238	**Ammonia (as N)**	M	ALT	Apha-4500-NH3-D	20.01	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

SECTION A : PRTR POLLUTANTS

OFFSITE TRANSFER OF POLLUTANTS DESTINED FOR WASTE-WATER TREATMENT OR SEWER					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 (Accidental) KG/Year	F (Fugitive) KG/Year
76	Total organic carbon (TOC) (as total C or COD/3)	M	ALT	Apha-5220-D	125.07	125.07	0.0	0.0
20	Copper and compounds (as Cu)	M	ALT	Apha-3120-B	0.04	0.04	0.0	0.0
24	Zinc and compounds (as Zn)	M	ALT	Apha-3120-B	0.05	0.05	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)

OFFSITE TRANSFER OF POLLUTANTS DESTINED FOR WASTE-WATER TREATMENT OR SEWER					Please enter all quantities in this section in KGs			
POLLUTANT		METHOD			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
303	BOD	M	ALT	Apha-5210-B	147.38	147.38	0.0	0.0
306	COD	M	ALT	Apha-5220-D	375.22	375.22	0.0	0.0
240	Suspended Solids	M	ALT	Apha-2540-B	137.07	137.07	0.0	0.0
343	Sulphate	M	ALT	Apha-4110-B	107.8	107.8	0.0	0.0
314	Fats, Oils and Greases	M	ALT	Apha-5520-B	15.83	15.83	0.0	0.0
324	Mineral oils	M	ALT	GC-FID	0.0	0.0	0.0	0.0
308	**Detergents (as MBAS)**	M	ALT	Apha-5540-C	0.78	0.78	0.0	0.0

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

SECTION A : PRTR POLLUTANTS

RELEASES TO LAND					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 (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

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

RELEASES TO LAND					Please enter all quantities in this section in KGs		
POLLUTANT		METHOD			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

Transfer Destination	European Waste Code	Hazardous	Quantity (Tonnes per Year)	Description of Waste	Waste Treatment Operation	Method Used		Location of Treatment	Haz Waste : Name and Licence/Permit No of Next Destination Facility Non 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)
						M/C/E	Method Used					
Within the Country	15 01 04	No	72.2	metallic packaging	R4	M	Weighed	Offsite in Ireland	Midlands Scrap Metals,W079-01	41 Cookstown Industrial Estate,Tallaght,Dublin 24,.,Ireland		
To Other Countries	15 01 04	No	4.28	metallic packaging	R4	M	Weighed	Abroad	Howarth Metals LTD,n/a	Howarth Metals ,22 Rondin Road,Ardwick,Mancherter M12 6BF,United Kingdom		
Within the Country	15 01 04	No	66.24	metallic packaging	R4	M	Weighed	Offsite in Ireland	Multimetals Recycling LTD,WFP-WW-09-0014-01	Bollarney,The Murrough,Wicklow,Co. Wicklow,Ireland		
To Other Countries	15 01 04	No	5.32	metallic packaging	R4	M	Weighed	Abroad	Tandem Metallurgival Group Ltd,n/a	Radnor Park Industrial Estate,Congleton,Cheshire, CW12 4XE,United Kingdom		
Within the Country	15 01 05	No	39.72	composite packaging	R3	M	Weighed	Offsite in Ireland	Tetra Pak Ireland,n/a	Fifth Floor 1 Tuamsgate,Balgard Square East,Tallaght,Dublin 24,Ireland		
To Other Countries	15 01 01	No	540.38	paper and cardboard packaging	R3	M	Weighed	Abroad	North West Fibres,n/a	3525 Colby Avenue,Everett,WA 98201-4782,.,United Kingdom		
Within the Country	15 01 01	No	95.82	paper and cardboard packaging	R3	M	Weighed	Offsite in Ireland	Irish Packaging Recycling T/A Panda Waste,WPR021-02	Ballymount Road,Walkinstown,Dublin 12,.,Ireland		
To Other Countries	15 01 01	No	4141.2	paper and cardboard packaging	R3	M	Weighed	Abroad	Peute Papier Recycling BV,n/a	Baanhoekweg 4,3313 LA Dordreacht ,.,.,Netherlands		
To Other Countries	15 01 04	No	17.16	metallic packaging	R4	M	Weighed	Abroad	Tandem Metallurgival Group Ltd,n/a	Radnor Park Industrial Estate,Congleton,Cheshire, CW12 4XE,United Kingdom		
To Other Countries	15 01 04	No	10.24	metallic packaging	R4	M	Weighed	Abroad	Howarth Metals LTD,n/a	Howarth Metals ,22 Rondin Road,Ardwick,Mancherter M12 6BF,United Kingdom		
Within the Country	15 01 04	No	24.84	metallic packaging	R4	M	Weighed	Offsite in Ireland	Midlands Scrap Metals,W079-01	41 Cookstown Industrial Estate,Tallaght,Dublin 24,.,Ireland		
To Other Countries	15 01 02	No	121.34	plastic packaging	R3	M	Weighed	Abroad	Alternative Waste Solutions Ltd,n/a	Hanger 4,Caenby Corner Estate ,Hemswell,Lics DN21 5TL,United Kingdom		
To Other Countries	15 01 02	No	114.96	plastic packaging	R3	M	Weighed	Abroad	Cherry Polymers,n/a	Unit 5 Nutts Corner Business Park,Dundrod Road,Crumlin,BT29 4SR,United Kingdom		
Within the Country	15 01 02	No	28.92	plastic packaging	R3	M	Weighed	Offsite in Ireland	JFC Plastic,n/a	JFC Manufacturing Co Ltd,Weir Road,Tuam,Co Galway,Ireland		
Within the Country	15 01 02	No	88.8	plastic packaging	R3	M	Weighed	Offsite in Ireland	The Shabra Group,n/a	Killycard Industrial Estate,Bree,Castleblayney,C o Monaghan,Ireland		
Within the Country	15 01 02	No	19.38	plastic packaging	R3	M	Weighed	Offsite in Ireland	Retech Processing Ltd,WP07/04	IDA Industrial Estate,Cavan Road,Cootehill,Co Cavan,Ireland		
To Other Countries	20 01 01	No	2440.64	paper and cardboard	R3	M	Weighed	Abroad	Asia Globa; Trade,n/a	7 Westbourne Gardens,London W2 5NR,uk,.,United Kingdom		
To Other Countries	20 01 01	No	2138.94	paper and cardboard	R3	M	Weighed	Abroad	Peute Papierrecycling BV,n/a	Baanhoekweg 4,3313 LA Dordrecht,The Netherlands,.,Netherlands		

To Other Countries	20 01 01	No	514.46	paper and cardboard	R3	M	Weighed	Abroad	VIPA Lausanne SA,n/a	Galeries Benjamin,Constant 1,PO Box7700,1002 Lausanne,Switzerland
Within the Country	17 02 03	No	135.86	plastic	R3	M	Weighed	Offsite in Ireland	Retech Processing Ltd,WP07/04	IDA Industrial Estate,Cavan Road,Cootehill,Co Cavan,Ireland
Within the Country	19 12 07	No	78.16	wood other than that mentioned in 19 12 06	R3	M	Weighed	Offsite in Ireland	Conroy Recycling Company,WFP/WH/2009/002/01	Kildallen,Mullingar,Co Westmeath,.,Ireland
Within the Country	19 12 07	No	33.2	wood other than that mentioned in 19 12 06	R3	M	Weighed	Offsite in Ireland	Enrich Environmental Ltd,WMP2004/57	Larch Hill Stud,Kilcock,Co Meath,WMP2004/57,Ireland
Within the Country	19 12 07	No	2709.0	wood other than that mentioned in 19 12 06	R3	M	Weighed	Offsite in Ireland	Panda Waste,W0140-03	Rathdrinagh,Beauparc,Navan,Co Meath,Ireland
Within the Country	19 12 07	No	47.28	wood other than that mentioned in 19 12 06	R3	M	Weighed	Offsite in Ireland	Clonmel Waste Disposal,WP008-02	Cashel Road Recycling Centre,Lawless Road,Clonmel ,Co Tipperary,Ireland
Within the Country	19 12 07	No	1711.3	wood other than that mentioned in 19 12 06	R3	M	Weighed	Offsite in Ireland	Oxigen Env,WFP-10-OY-0183-02	Daingean,Tullamore,Co Offaly,.,Ireland
Within the Country	19 12 07	No	1373.9	wood other than that mentioned in 19 12 06	R3	M	Weighed	Offsite in Ireland	Padraig ThorntonWaste Disposal Ltd T/A Thorntons Recycling,WP291/2007	Kill,Co Kildare,.,.,Ireland
Within the Country	20 03 07	No	131.82	bulky waste	D5	M	Weighed	Offsite in Ireland	Scotch Corner Landfill,W0020-01	Annyally,Castleblaney,Co Monaghan,.,Ireland
Within the Country	20 03 07	No	501.18	bulky waste	D5	M	Weighed	Offsite in Ireland	Drehid Waste Management Facility,W0203-03	Carbury,Co Kildare,.,.,Ireland
Within the Country	20 03 07	No	1392.8	bulky waste	D5	M	Weighed	Offsite in Ireland	Derryclure Landfill,W0029-02	Tullamore,Co Offaly,.,.,Ireland
Within the Country	20 03 07	No	31.84	bulky waste	D5	M	Weighed	Offsite in Ireland	Whiteriver Landfill,W0060-02	Dunleer,Co Louth,.,.,Ireland
Within the Country	20 02 01	No	3404.94	biodegradable waste	R5	M	Weighed	Offsite in Ireland	Enrich Environmental Ltd,WMP2004/57	Larch Hill Stud,Kilcock,Co Meath,WMP2004/57,Ireland
Within the Country	20 03 01	No	413.14	mixed municipal waste	R12	M	Weighed	Offsite in Ireland	Killarney Waste Dsiposal,W0217-01	Aughacureen,Killarney ,Co Kerry,.,Ireland
Within the Country	20 03 01	No	6947.78	mixed municipal waste	R12	M	Weighed	Offsite in Ireland	Oxigen Environmental,W0144-01	Coes Road,Dundalk,Co. Louth,.,Ireland
Within the Country	19 12 09	No	316.68	minerals (for example sand, stones)	R5	M	Weighed	Offsite in Ireland	Arthurstown Landfill,W0003-03	Kill,Co Kildare,.,.,Ireland
Within the Country	19 12 09	No	25.02	minerals (for example sand, stones)	R5	M	Weighed	Offsite in Ireland	Farmer Dillionstown,n/a	Dillionstown,Dunleer,Co. Louth,.,Ireland
Within the Country	19 12 09	No	4606.74	minerals (for example sand, stones)	R5	M	Weighed	Offsite in Ireland	Drehid Waste Management Facility,W0203-03	Carbury,Co Kildare,.,.,Ireland
Within the Country	19 12 09	No	7705.3	minerals (for example sand, stones)	R5	M	Weighed	Offsite in Ireland	Derryclure Landfill,W0029-02	Tullamore,Co Offaly,.,.,Ireland
Within the Country	19 12 09	No	428.12	minerals (for example sand, stones)	R5	M	Weighed	Offsite in Ireland	Whiteriver Landfill,W0060-02	Dunleer,Co Louth,.,.,Ireland
Within the Country	20 01 36	No	3.62	discarded electrical and electronic equipment other than those mentioned in 20 01 21, 20 01 23 and 20 01 35	R4	M	Weighed	Offsite in Ireland	KMK Metals recycling Ldt,W0113-03	Cappincur Industrial Estate,Daingean Road,Tullamore,Co. Offaly,Ireland
Within the Country	16 01 03	No	91.68	end-of-life tyres	R5	M	Weighed	Offsite in Ireland	Crumb Rubber Ireland Ltd,WP2007/01	Mooretown,Dromiskin,Dundalk,Co Louth,Ireland
Within the Country	**15 01 11**	**Yes**	4.52	metallic packaging containing a dangerous solid porous matrix (for example asbestos), including empty pressure containers	R4	M	Weighed	Offsite in Ireland	Calor Gas,WPR	Long Mile Road,Dublin 12,Dublin 12,Dublin 12,Ireland
Within the Country	15 01 11	Yes	3.84	metallic packaging containing a dangerous solid porous matrix (for example asbestos), including empty pressure containers	R4	M	Weighed	Offsite in Ireland	Flogas ireland Ltd,n/a	Knockbrack House,Matthews Lane,Donore Road,Drogheda,Ireland
Within the Country	17 09 04	No	62.8	mixed construction and demolition wastes other than those mentioned in 17 09 01, 17 09 02 and 17 09 03	R12	M	Weighed	Offsite in Ireland	Padraig Thornton Waste Disposal T/A Thorntons Recycling,W0044-02	Kileen Road,Dublin 12,.,.,Ireland

Within the Country	17 05 04	No	384.72	soil and stones other than those mentioned in 17 05 03	R5	M	Weighed	Offsite in Ireland	Farmer Castle Lane,n/a	Castle Lane,Dillionstown,Dunleer,Co Louth,Ireland
To Other Countries	19 12 10	No	25621.64	combustible waste (refuse derived fuel)	R1	M	Weighed	Abroad	Cemex SIA,n/a	Rupnicas str,10 3854,Bronceni,Latvia,Latvia
Within the Country	19 12 10	No	5685.1	combustible waste (refuse derived fuel)	R1	M	Weighed	Offsite in Ireland	Irish Cement,P0030-04	Platin,Drogheda,Co Louth,.,Ireland
Within the Country	19 12 10	No	493.96	combustible waste (refuse derived fuel)	R1	M	Weighed	Offsite in Ireland	Padraig Thornton Waste Disposal T/A Thorntons Recycling,W0044-02	Kileen Road,Dublin 12,.,.,Ireland
Within the Country	15 01 07	No	769.86	glass packaging	R5	M	Weighed	Offsite in Ireland	Glassco,WPN247/2006	Unit 4 Obserstown Industrual Park,Caragh Road,Naas,Co Kildare,Ireland
Within the Country	15 01 07	No	19.9	glass packaging	R5	M	Weighed	Offsite in Ireland	Rehab Recycling,WPR004	Ballymount ,Dublin 22,.,.,Ireland
Within the Country	19 12 12	No	47.14	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	R5	M	Weighed	Offsite in Ireland	Scotch Corner Landfill,W0020-01	Annyally,Castleblaney,Co Monaghan,.,Ireland
Within the Country	19 12 12	No	1531.98	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	R5	M	Weighed	Offsite in Ireland	Drehid Waste Management Facility,W0203-03	Carbury,Co Kildare,.,.,Ireland
Within the Country	19 12 12	No	4889.16	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	R5	M	Weighed	Offsite in Ireland	Derryclure Landfill,W0029-02	Tullamore,Co Offaly,.,.,Ireland
Within the Country	19 12 12	No	334.7	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	R5	M	Weighed	Offsite in Ireland	Whiteriver Landfill,W0060-02	Dunleer,Co Louth,.,.,Ireland
Within the Country	20 03 01	No	11.42	mixed municipal waste	D13	M	Weighed	Offsite in Ireland	Oxigen Environmental,W0152-03	Robinhood Industrial Estate,Robinhood Road,Dublin 12,.,Ireland
Within the Country	20 03 01	No	38.08	mixed municipal waste	D1	M	Weighed	Offsite in Ireland	Scotch Corner Landfill,W0020-01	Annyally,Castleblaney,Co Monaghan,.,Ireland
Within the Country	19 12 02	No	902.66	ferrous metal	R4	M	Weighed	Offsite in Ireland	Hammond Lane Metals,WP98050	Pigeon House Road,Ringsend,Dublin 2,.,Ireland
Within the Country	19 12 02	No	694.84	ferrous metal	R4	M	Weighed	Offsite in Ireland	Multimetals Recycling LTD,WFP-WW-09-0014-01	Bollarney,The Murrough,Wicklow,Co. Wicklow,Ireland
Within the Country	20 01 40	No	345.38	metals	R4	M	Weighed	Offsite in Ireland	Hammond Lane Metals,WP98050	Pigeon House Road,Ringsend,Dublin 2,.,Ireland
Within the Country	20 01 40	No	712.78	metals	R4	M	Weighed	Offsite in Ireland	Multimetals Recycling LTD,WFP-WW-09-0014-01	Bollarney,The Murrough,Wicklow,Co. Wicklow,Ireland
Within the Country	19 12 12	No	15775.0	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	R5	M	Weighed	Offsite in Ireland	Arthurstown Landfill,W0003-03	Kill,Co Kildare,.,.,Ireland
Within the Country	19 12 12	No	3280.48	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	R5	M	Weighed	Offsite in Ireland	Corranure Landfill,W0077-02	Corranure ,Co Cavan,.,.,Ireland
Within the Country	19 12 12	No	1004.84	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	R5	M	Weighed	Offsite in Ireland	Cavan Waste Disposal,W0207-01	Killygarry,Co Cavan,.,.,Ireland
Within the Country	19 12 12	No	1713.67	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	R5	M	Weighed	Offsite in Ireland	Drehid Waste Management Facility,W0203-03	Carbury,Co Kildare,.,.,Ireland

Within the Country	19 12 12	No	913.8	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	R5	M	Weighed	Offsite in Ireland	Farmer,N/A	Ballylow,Kilbride,Co Wicklow,.,Ireland
Within the Country	19 12 12	No	108.12	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	R5	M	Weighed	Offsite in Ireland	Derryclure Landfill,W0029-02	Tullamore,Co Offaly,.,.,Ireland
Within the Country	19 12 12	No	146.68	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	R5	M	Weighed	Offsite in Ireland	Oxigen Env,WFP-10-OY-0183-02	Daingean,Tullamore,Co Offaly,.,Ireland
Within the Country	19 12 12	No	8533.07	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	R5	M	Weighed	Offsite in Ireland	Farmer,n/a	Dillionstown,Dunleer,Co Louth,.,Ireland
Within the Country	19 12 12	No	351.82	other wastes (including mixtures of materials) from mechanical treatment of wastes other than those mentioned in 19 12 11	R5	M	Weighed	Offsite in Ireland	Farmer,n/a	Vicarstown,Co Laois,.,.,Ireland
To Other Countries	20 01 27	Yes	312.0	paint, inks, adhesives and resins containing dangerous substances	R1	M	Weighed	Abroad	ATM BV,n/a	Viasweg 12,NL-4782 PW,Moerdidijk,.,Netherlands
To Other Countries	07 05 01	Yes	8.4	aqueous washing liquids and mother liquors	D9	M	Weighed	Abroad	ATM BV,n/a	Viasweg 12,NL-4782 PW,Moerdidijk,.,Netherlands
To Other Countries	19 12 11	Yes	29.2	other wastes (including mixtures of materials) from mechanical treatment of waste containing dangerous substances	R1	M	Weighed	Abroad	ATM BV,n/a	Viasweg 12,NL-4782 PW,Moerdidijk,.,Netherlands
To Other Countries	20 01 13	Yes	1.0	solvents	R1	M	Weighed	Abroad	ATM BV,n/a	Viasweg 12,NL-4782 PW,Moerdidijk,.,Netherlands
To Other Countries	07 05 13	Yes	4.5	solid wastes containing dangerous substances	R1	M	Weighed	Abroad	ATM BV,n/a	Viasweg 12,NL-4782 PW,Moerdidijk,.,Netherlands
To Other Countries	15 01 10	Yes	2.7	packaging containing residues of or contaminated by dangerous substances	R1	M	Weighed	Abroad	ATM BV,n/a	Viasweg 12,NL-4782 PW,Moerdidijk,.,Netherlands
To Other Countries	17 06 05	Yes	1777.47	construction materials containing asbestos (18)	D1	M	Weighed	Abroad	ATM BV,n/a	Viasweg 12,NL-4782 PW,Moerdidijk,.,Netherlands
To Other Countries	17 06 01	Yes	30.7	insulation materials containing asbestos	D1	M	Weighed	Abroad	Richard Buhck GmbH,n/a	Rappenberg,DE-21502,Weirshop,Germany,Germany
To Other Countries	17 05 03	Yes	38.0	soil and stones containing dangerous substances	D1	M	Weighed	Abroad	Richard Buhck GmbH,n/a	Rappenberg,DE-21502,Weirshop,Germany,Germany
To Other Countries	16 03 03	Yes	41.7	inorganic wastes containing dangerous substances	R4	M	Weighed	Abroad	Richard Buhck GmbH,n/a	Rappenberg,DE-21502,Weirshop,Germany,Germany

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

Link to previous years waste data
Link to previous years waste summary data & percentage change