

25 January 2016

Mrs E A Parr
PPC Compliance Assistant
Natural Resources Wales
Rivers House
St Mellons Business Park
St Mellons
CARDIFF
CF3 0EY

Our Ref: W:\Environmental\IPPC\Environment Agency Reporting\Permit Reporting\New Melt Shop\Annual\2015\TP3639BH
EA Annual Returns 2015.doc,

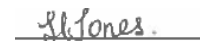
Dear Mrs Parr,

RE: Melt Shop EPR Permit TP3639BH Annual Returns 2015

In accordance with CELSA Manufacturing UK Ltd Environmental Permitting Regulations (EPR) Melt Shop Permit TP3639BH, please find forms A2, E1, PI1, R1, and S1 duly completed for the annual reporting period 2015.

Should you require any further information regarding these works please do not hesitate to contact me.

Yours sincerely



Sara Jones
Environmental Advisor

Enc

Permit Number: EPR/TP3639BH

Operator:

CELSA Manufacturing (UK) Limited

Facility: Tremorfa Melt Shop

Form Number:

Air 2 / 20/09/13

Reporting of emissions to air for the period from1 January 2015 to 31 December 2015

Emission Point	Substance / Parameter	Emission Limit Value	Reference Period	Result ^[1]	Test Method ^[2]	Sample Date and Times ^[3]	% Uncertainty ^[4]
A1	Particulate Matter	10 mg/m ³		4.73 mg/m ³	BS EN 13284-1:2002	13/05/2015, 14.31-15.35	0.21
	Oxides of Nitrogen (as NO _x)	25 mg/m ³		2.55 mg/m ³	EN 14792:2005	12/05/2015, 12.40-16.40	0.31
	Sulphur Dioxide	25 mg/m ³	15 minute average	1.23 mg/m ³	BS EN 1948-1:1997	12/05/2015, 12.10-16.10	0.01
	PCDD/F	0.3 ng/m ³		0.019 ng/m ³	BS EN 1948-1:1997	12/05/2015, 09.28-13.28	0.0059
	VOC	20 mg/m ³		0.66 mg/m ³	BS EN 12619	13/05/2015, 11.52-12.52	0.02
	PAH	No Limit Set		98.09 ug/m ³	ISO 111338-1:2004	13/05/2015, 09.59-11.59	22.03
	PCB	No Limit Set		0.012 ng/m ³	BS EN 1948-1:1997	12/05/2015, 09.28-13.28	0.0035
	Total Metals including:			mg/m ³	EN 13211:2001 or BS EN 14385		
	Ni			0.023 mg/m ³		13/05/2015, 13.02-14.02	0.0034
	As			0.0011 mg/m ³		13/05/2015, 13.02-14.02	0.00014
	Cd			0.0055 mg/m ³		13/05/2015, 13.02-14.02	0.00078
	Cr			0.03 mg/m ³		13/05/2015, 13.02-14.02	0.0038
	Cu			0.025 mg/m ³		13/05/2015, 13.02-14.02	0.0036
	Pb			0.159 mg/m ³		13/05/2015, 13.02-14.02	0.025
	Hg			0.01 mg/m ³		13/05/2015, 13.02-14.02	0.0012

Permit Number: EPR/TP3639BH

Operator: CELSA Manufacturing (UK) Limited

Emission Point	Substance / Parameter	Emission Limit Value	Reference Period	Result ^[1]	Test Method ^[2]	Sample Date and Times ^[3]	% Uncertainty ^[4]
	Fe			0.62 mg/m ³		13/05/2015, 13.02-14.02	0.33
	Zn			1.66 mg/m ³		13/05/2015, 13.02-14.02	0.85
A2	Particulate Matter	10 mg/m ³		0.93 mg/m ³	BS EN 13284-1:2002	01/12/2015, 12.21-13.25	0.15

- [1] The result given is the maximum value (or the minimum value in the case of a limit that is expressed as a minimum) obtained during the reporting period, expressed in the same terms as the emission limit value. Where the emission limit value is expressed as a range, the result is given as the 'minimum – maximum' measured values.
- [2] Where an internationally recognised standard test method is used the reference number is given. Where another method that has been formally agreed with the Environment Agency is used, then the appropriate identifier is given. In other cases the principal technique is stated, for example gas chromatography.
- [3] For non-continuous measurements the date and time of the sample that produced the result is given. For continuous measurements the percentage of the process operating time covered by the result is given.
- [4] The uncertainty associated with the quoted result at the 95% confidence interval, unless otherwise stated.

Signed Sk Jones
 (Authorised to sign as representative of Operator)

Date...29 January 2016

Permit Reference Number: TP3639BH

Operator : CELSA Manufacturing (UK) Ltd

Installation: Tremorfa New Melt Shop

Form Number: E1 [11/05/05]

Reporting of Energy Usage for the year2015.....

Energy Source	Energy Usage		CO ₂ Produced (tonnes)**
	Quantity	Primary Energy (MWh)	
Electricity *	MWh	1184330	
Natural Gas	MWh	51396	9428
TOTAL		1235726	

* Conversion factor for delivered electricity to primary energy = 2.4

**EU ETS annual submission

Trends in Energy Usage			
Year	Parameter		
	Primary Energy usage	CO ₂ produced	CO ₂ per unit output
2011	1,433,752	11,629	0.0103
2012	1,235,708	10,492	0.0095
2013	1,235,708	11212	0.0108
2014	1,094,013	8,422	0.0087
2015	1,235,726	9,428	0.0076

Operator's comments :

Signed St Jones
(authorised to sign as representative of the Operator)

Date...29 January 2016.

Permit Reference Number : TP3639BH

Operator : CELSA Manufacturing (UK) Ltd

Installation : Tremorfa New Melt Shop

Form Number : PI1 [11/05/05]

Reporting of Performance Indicators for the year2015.....

Annual Production	
Production of liquid steel	1,070,729 Tonnes liquid steel

Parameter	Quantity	Units
Electrical energy (delivered)	493,470,731	KWh
Particulates	57,815	Kg
Water	632,490	m ³

Trends in Environmental Performance			
Year	Parameter		
	Electricity consumption (KWh / t LS)	Particulates Released (g / t LS)	Towns / Commercial Water used (m ³ / t LS)
2011	490.35	30.09	0.481
2012	465.62	25.88	0.502
2013	459.94	7.78	0.521
2014	470.96	20.82	0.600
2015	460.87	54.00	0.591

Operator's comments

Signed Sl Jones
(authorised to sign as representative of the Operator)

Date...29 January 2016

Permit Reference Number: TP3639BH Operator: CELSA Manufacturing (UK) Ltd

Installation: Tremorfa New Melt Shop Form Number: R1 [11/05/05]

Reporting of Waste and By-Product Generation

for the period from 01 January 2015 to 31 December 2015

Parameter (tonnes)	Tonnes sent for off-site disposal as special waste	Tonnes sent for off-site disposal as controlled waste	Tonnes sent for off-site recovery or recycling
Ferrous scrap metal			
Non-ferrous scrap metal			
Steel making slag			154003.4
Melting Shop filter dust			19695.17
Other filter dusts including shot-blasting dusts			
General waste			209.8
Waste oils	42.64		
Waste PPE 15.02.02 *			8
Waste solvents			
Metallic scale/iron oxide			2645.29
Refractory waste			
Sludge from waste water treatment			
Aqueous waste			
Other wastes: Paper/Card			0.78
Wood			79.62

Signed: Sk Jones
(authorised to sign as representative of the Operator)

Date: 29 January 2016.

Facility: Tremorfa Melt Shop

Form Number:

Sewer 1 / 20/09/13

Reporting of emissions to air for the period from1 January 2015... to ...31 December 2015.....

Emission Point	Substance / Parameter	Emission Limit Value	Reference Period	Result ^[1]	Test Method ^[2]	Sample Date and Times ^[3]	Uncertainty ^[4]
S1 (when being discharged) ^[5]	Oil / grease	5 mg/l	Spot sample	<0.6	Material soluble in 1,1,2-trichloro-trifluoroethane	17/12/2015, 13.00	
	Suspended Solids	200 mg/l		5.0	The solids shall be separated and dried at 105°C	17/12/2015, 13.00	
	pH	6-10		8.4	BS 6068-2.50:1995, ISO 10523:1994	17/12/2015, 13.00	
	Lead	0.2 mg/l		<0.006	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.00	
	Nickel	0.5 mg/l		<0.003	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.00	
	Arsenic	0.01 mg/l		<0.001	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.00	
	Cadmium	0.05 mg/l		<0.0006	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.00	
	Chromium	0.2 mg/l		<0.002	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.00	
	Copper	0.5 mg/l		<0.009	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.00	
	Zinc	0.5 mg/l		0.05	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.00	
	Mercury	0.02 mg/l		<0.0001	BS 6068-2.74:2002, BS EN ISO 13506 2002	17/12/2015, 13.00	
	Iron Compounds	5 mg/l		0.62	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.00	
	Flow	No Limit Set	Daily total flow		Flow Meter		

Permit Number: EPR/TP3639BH

Operator: CELSA Manufacturing (UK) Limited

S2	Oil / grease	5 mg/l	Spot Sample	<0.6	Material soluble in 1,1,2-trichloro-trifluoroethane	17/12/2015, 13.30	
	Suspended Solids	200 mg/l		6.0	The solids shall be separated and dried at 105°C	17/12/2015, 13.30	
	pH	6-10		8.9	BS 6068-2.50:1995, ISO 10523:1994	17/12/2015, 13.30	
	Lead	0.2 mg/l		<0.006	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.30	
	Nickel	0.5 mg/l		<0.003	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.30	
	Arsenic	0.01 mg/l		<0.001	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.30	
	Cadmium	0.05 mg/l		<0.0006	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.30	
	Chromium	0.2 mg/l		<0.002	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.30	
	Copper	0.5 mg/l		0.049	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.30	
	Zinc	0.5 mg/l		0.04	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.30	
	Mercury	0.02 mg/l		<0.0001	BS 6068-2.74:2002, BS EN ISO 13506 2002	17/12/2015, 13.30	
	Iron Compounds	5 mg/l		0.67	BS 6068-2.60:1988, BS EN ISO 11885 1998	17/12/2015, 13.30	

[1] The result given is the maximum value (or the minimum value in the case of a limit that is expressed as a minimum) obtained during the reporting period, expressed in the same terms as the emission limit value. Where the emission limit value is expressed as a range, the result is given as the 'minimum – maximum' measured values.

[2] Where an internationally recognised standard test method is used the reference number is given. Where another method that has been formally agreed with the Environment Agency is used, then the appropriate identifier is given. In other cases the principal technique is stated, for example gas chromatography.

[3] For non-continuous measurements the date and time of the sample that produced the result is given. For continuous measurements the percentage of the process operating time covered by the result is given.

[4] The uncertainty associated with the quoted result at the 95% confidence interval, unless otherwise stated.

[5] A record of the hourly flow at the time the sample of S1 is taken shall be maintained in the Plant records.

Signed St Jones
(Authorised to sign as representative of Operator)

Date...29 January 2016.