

Permit Number: WP3931SD Operator: Kennametal UK Ltd

Installation: Newport Ceramics Form Number: Air1 / 06/08/2007

**Reporting of emissions to air for the period from 01/01/2015 to 31/12/2015**

Emission Point	Substance / Parameter	Emission Limit Value	Reference Period	Result <sup>[1]</sup>	Test Method <sup>[2]</sup>	Sample Date and Times <sup>[3]</sup>	Uncertainty <sup>[4]</sup>
A1 [Point A1 on site plan in Schedule 2]	Particulate matter	25mg/m <sup>3</sup> on completion of IC1	Spot sample	10	BS EN 13284:1	3/3/15 15:13-16:17	1.14
A1 [Point A1 on site plan in Schedule 2]	Ammonia	30mg/m <sup>3</sup>	Spot sample	10.8	BSEN 14791	3/3/15 13:51-14:51	1.29
A1 [Point A1 on site plan in Schedule 2]	Total Cyanide	-	Spot sample	12.16	EPA CMT033	2/12/15 10:55-11:58	1.46
A1 [Point A1 on site plan in Schedule 2]	Oxides of nitrogen	100mg/m <sup>3</sup>	Spot sample	48.7	BS EN 14792:2005	3/3/15 13:30-14:30	1.91
A1 [Point A1 on site plan in Schedule 2]	Sulphur dioxide	20mg/m <sup>3</sup>	Spot sample	12.2	TGN M21	19/5/15 14:30-15:30	4.65
A1 [Point A1 on site plan in Schedule 2]	Carbon monoxide	200mg/m <sup>3</sup>	Spot sample	129	BS EN 15058:2006	5/3/14 09:18-10:18	8
A2 [Point A2 on site plan in schedule 2]	Particulate matter	25mg/m <sup>3</sup>	Spot sample	Emission point not in use	BS EN 13284:1	Emission point not in use	Emission point not in use
A3 [Point A3 on site plan in schedule 2]	Particulate matter	5mg/m <sup>3</sup>	Spot sample	1.9	BS EN 13284:1	30/11/15 16:20-17:20	1.0
A6 [Point A6 on site plan in Schedule 2]	Particulate matter	25mg/m <sup>3</sup>	Spot sample	79.9	BS EN 13284:1	21/12/15 11:35-12:05	3.44
A7 [Point A7 on site plan in schedule 2]	Particulate matter	5mg/m <sup>3</sup>	Spot sample	1.5	BS EN 13284:1	4/3/15 10:10-11:10	1.03

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Emission Point	Substance / Parameter	Emission Limit Value	Reference Period	Result <sup>[1]</sup>	Test Method <sup>[2]</sup>	Sample Date and Times <sup>[3]</sup>	Uncertainty <sup>[4]</sup>
A8 [Point A8 on site plan in schedule 2]	Particulate matter	25mg/m <sup>3</sup>	Spot sample	5.5	BS EN 13284-1	3/3/15 11:40-12:34	0.85
A8 [Point A8 on site plan in schedule 2]	Ammonia	30mg/m <sup>3</sup>	Spot sample	0.71	BS EN 14791	24/8/15 13:00-14:04	0.086
A8 [Point A8 on site plan in schedule 2]	Total Cyanide	-	Spot sample	0.28	EPA CMT033	24/8/15 14:25-15:29	0.033
A8 [Point A8 on site plan in schedule 2]	Oxides of nitrogen	100mg/m <sup>3</sup>	Spot sample	2.49	BS EN 14792:2005	18/5/15 13:45-14:45	1.71
A8 [Point A8 on site plan in schedule 2]	Sulphur dioxide	20mg/m <sup>3</sup>	Spot sample	7.2	TGN M21	18/5/15 13:45-14:45	4.7
A8 [Point A8 on site plan in schedule 2]	Carbon monoxide	100mg/m <sup>3</sup>	Spot sample	90.9	BS EN 15058:2006	3/3/15 09:30-10:30	2.4

[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 Agency is used, then the appropriate identifier is given. In other cases the principal technique is stated, e.g. 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 T. Asham  
(Authorised to sign as representative of Operator)

Date 26/1/16

Permit Number: WP3931SD      Operator: Kennametal UK Ltd  
Installation: Newport Ceramics      Form Number: Performance1

**Reporting of other performance indicators for the period 01/01/2015 to 31/12/2015**

Parameter	Units	
Water usage	5830/175.07	
Energy usage	8029/175.07	
Effluent released	5247/175.07	
	m3/tonne product	33.30
	MWh/tonne product	45.86
	M3/tonne product	29.97

Operator's comments :  
Effluent released calculated as 90% of total incoming water (mains)

Signed *T. Ashman*      Date *26/1/16*  
(Authorised to sign as representative of Operator)

Permit Number: WP3931SD Operator: Kennametal UK Ltd  
 Installation: Newport Ceramics Form Number: Energy1

**Reporting of Energy Usage for the year 2015**

Energy Source	Energy Usage		Specific Usage (MW/unit output)
	Quantity	Primary Energy (MWh)	
Electricity *	8029 MWh	19270	45.86 MWh/tonne product
Natural Gas	0 tonnes	n/a	n/a
<b>TOTAL</b>	<b>8029 MWh</b>	<b>19270 MWh</b>	<b>45.86 MWh/tonne product</b>

\* Conversion factor for delivered electricity to primary energy = 2.4

Operator's comments :

The specific energy usage has been calculated based on powder production and hot pressing. Although powder production and hot pressing are responsible for the majority of the electricity consumed on site, this is a slight over estimate as some of the electricity used on site is used in the production of other products.

The specific energy usage is higher than last year. However, this figure is significantly affected by differences in the quantities of different products that are produced. Some products require more energy to produce than others.

Signed ..... *J. Johnson* Date... 26/1/16  
 (Authorised to sign as representative of Operator)

Permit Number: WP3931SD Operator: Kennametal Manufacturing UK Ltd

Installation: Newport Ceramics Form Number: WaterUsage1

### Reporting of Water Usage for the year 2015

Water Source	Usage (m <sup>3</sup> /year)	Specific Usage (m <sup>3</sup> /unit output)
Mains water	5830 m <sup>3</sup>	33.3 m <sup>3</sup> /tonne of product

Operator's comments :

Signed Tawsham  
(authorised to sign as representative of Operator)

Date 26/1/16

