

Permit Number: AB3191FR

Operator:

Severn Trent Green Power (Bridgend) Limited

Facility: Parc Stormy AD Facility

Form Number:

Air1 / 17/08/2022

Reporting of emissions to air for the period from 01/01/2023 to 31/12/2023

Emission Point	Substance / Parameter	Emission		Result ^[1]	Test Method ^[2]	Sample Date and Times ^[3]	Uncertainty ^[4]
		Limit Value	Reference Period				
A1	Oxides of nitrogen (NO and NO ₂ expressed as NO ₂)	500 mg/m ³	Hourly mean	434	BS EN 14792	25/10/23 10:00-11:00	+/-19.5
A1	Sulphur Dioxide	350 mg/m ³	Hourly mean	31.3	BS EN 14791	25/10/23 10:00-11:00	+/-1.9
A1	Non-methane Volatile Organic Compounds (VOCs)	75mg/m ³	Hourly mean	73.1	BS EN 12619 or 13526 depending on concentration	25/10/23 10:00-11:00	+/-13.6
A1	Volatile Organic Compounds (VOCs)	1000 mg/m ³	Hourly mean	1346		25/10/23 10:00-11:00	+/-51.6
A1	Carbon monoxide	1400 mg/m ³	Hourly mean	1253	BS EN 15058	25/10/23 10:00-11:00	+/-55.7
A2	Oxides of nitrogen (NO and NO ₂ expressed as NO ₂)	500 mg/m ³	Hourly mean	459	BS EN 14792	25/10/23 10:00-11:00	+/-20.6
A2	Sulphur Dioxide	350 mg/m ³	Hourly mean	25.8	BS EN 14791	25/10/23 10:00-11:00	+/-1.6
A2	Non-methane Volatile Organic Compounds (VOCs)	75mg/m ³	Hourly mean	<0.20	BS EN 12619 or 13526 depending on concentration	25/10/23 10:00-11:00	+/-0.04
A2	Volatile Organic Compounds (VOCs)	1000 mg/m ³	Hourly mean	1170		25/10/23 10:00-11:00	+/-44.8

Emission Point	Substance / Parameter	Emission		Result ^[1]	Test Method ^[2]	Sample Date and Times ^[3]	Uncertainty ^[4]
		Limit Value	Reference Period				
A2	Carbon monoxide	1400 mg/m ³	Hourly mean	1077	BS EN 15058	25/10/23 10:00-11:00	+/-47.8
A5 Biofilter and Scrubber Unit	Hydrogen Sulphide (H ₂ S)	No limit set	Every 6 months	<0.82	US EPA Method 11 (Impinger method) or CEN TS 13649 (Charcoal tube), US EPA Method 15	24/10/23 10:30-11:30	+/-0.024
A5 Biofilter and Scrubber Unit	Ammonia (NH ₃)	20 mg/Nm ³	Every 6 months	<0.13	BS EN 21877	24/10/23 10:300-11:30	+/-0.076

[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 Natural Resources Wales 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: Geraint Lang
(Authorised to sign as representative of Operator)

Date 26/01/24

Permit Number: AB3191FR

Operator: Severn Trent Green Power (Bridgend) Limited

Facility: Parc Stormy AD Facility

Form Number: Water 1 / 01/01/2016

Reporting of Water Usage for the year 2023

Water Source	Usage (m ³ /year)	Specific Usage (m ³ /unit output)
Mains water	493.8	
Borehole	3588	
TOTAL WATER USAGE	4081.8	

Operator's comments:

Water used on site for the biofilter scrubber, pressure washing delivery vehicles, washing the building and general upkeep of site cleanliness.

Mains Water increased due to drivers using welfare facilities daily.

Borehole water decreased due to improvements and upgrades within the reception building (new style hoses etc).

Signed: Geraint Lang
(Authorised to sign as representative of Operator)

Date 26/01/2024

Permit Number: AB3191FR

Operator: Severn Trent Green Power (Bridgend) Limited

Facility: Parc Stormy AD Facility

Form Number: Energy 1 / 03/03/2021

Reporting of Energy Usage for the year 2023

Energy Source	Energy Usage		Specific Usage (MWh/unit output)
	Quantity	Primary Energy (MWh)	
Electricity *	MWh	10.391	
Natural Gas	MWh	N/A	
Gas Oil	Tonnes	10.518	
Recovered Fuel Oil	Tonnes	N/A	
TOTAL	-		

* Conversion factor for delivered electricity to primary energy = 2.4

Operator's comments:

Gas oil is used for fuelling the site telehandler and pressure washer. Usage increased to due site maintenance and projects.

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(Authorised to sign as representative of Operator)

Date 26/01/24

Permit Number: AB3191FR

Operator: Severn Trent Green Power (Bridgend) Limited

Facility: Parc Stormy AD Facility

Form Number: Performance 1 / 17/08/2022

Reporting of other performance indicators for the period 01/01/2023 to 31/12/2023

Parameter	Units
Power output - electricity	25040.2 MWh
Energy efficiency	434.495 MWh/M3 Biogas
Electrical energy exported to the grid	21,988.887 MWh
Electrical energy drawn from the grid	7.991MWh
Total raw material used	66483 Tonnes
Operational time of emergency flare	0.005%
Amount of gas sent to flare	56,376 M3
Amount of biogas combusted in the CHP unit per day	14,903.919 M3/day
Generation of residues	2,700.56 Tonnes
Generation of wastewater	0 M3

Operator's comments: Total amount of raw materials used decreased due to the business securing high value calorific food waste feedstocks therefore reducing the requirement to feed co-product materials.

Total amount of waste and raw materials 66,483.72 tonnes (103.72 raw co-product materials, 66,380 waste)

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(Authorised to sign as representative of Operator)

Date 26/01/24