

AGL UPSTREAM INVESTMENTS PTY LTD ROSALIND PARK GAS PLANT Monthly Continuous Air Monitoring Report

Reporting Period: June 2016

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Foreword

PREMISES Rosalind Park Gas Plant

Lot 35 Medhurst Road GILEAD NSW 2560

LICENCE DETAILS Environment Protection Licence 12003

LICENCEE AGL Upstream Investments Pty Limited

LICENCEE'S ADDRESS Locked Bag 1837, North Sydney, NSW 2060

REPORTING PERIOD 01 June 2016 to 30 June 2016

DATE of MONITORING Continuous

OBTAINED DATA DATE 07 July 2016

REPORT DATE 08 July 2016

REPORT PREPARED BY Aaron Clifton

Environment Business Partner

SUMMARY OF ACTIVITY

Rosalind Park Gas Plant, located approximately 60km south west of Sydney, is a natural gas processing and treatment plant, used to process coal seam natural gas from the Camden Gas Project.

Produced natural gas is cleaned, dehydrated, compressed and odourised before being measured and transported by pipeline about 500 metres into the nearby Moomba to Sydney Natural Gas Pipeline. The premises are covered by Environment Protection Licence 12003 which includes all gas wells, gas gathering, reticulation systems, trunk lines and associated effluent storage areas and work areas of the Camden Gas Project.



This Monitoring Report relates to those air monitoring activities specified in Part 5, Monitoring and Recording Conditions, of the Environment Protection Licence. The Licence conditions stipulate air monitoring is required to be carried out at the locations, at the frequency and using the test methods as set out in the tables below.

This report sets out the results of continuous monitoring summarized on a monthly basis. A separate report is issued for quarterly monitoring.

This report is prepared in accordance with the *Requirements for Publishing Pollution Monitoring Data* (EPA, October, 2013) (**Publication Requirements**).

AIR MONITORING LOCATIONS

Point	Location	Monitoring Frequency
1	Exhaust Stack 1 on Compression Engine 1	Continuous
2	Exhaust Stack 2 on Compression Engine 2	Continuous
3	Exhaust Stack 3 on Compression Engine 3	Continuous

Note: monitoring is only undertaken when the compression engines are running.

AIR MONITORING TEST METHODS - POINTS 1, 2 and 3

Parameter	NSW EPA Test Method (Sampling Method)	Reference Method		
Oxides of Nitrogen	CEM-2	USEPA Performance Specification 2		
Temperature	TM-2	USEPA Method 2		
Moisture content	Method approved by EPA in writing	Calibration by reference to TM-22		
Volumetric Flow Rate	CEM-6	USEPA Performance Specification 6		
Oxygen	CEM-3	USEPA Performance Specification 3		

USEPA Method refers to the US Environmental Protection Agency 2000, Code of Federal Regulations, Title 40, Part 60, Appendix A Methods.

USEPA Performance Specification refers to the US Environmental Protection Agency 2000, Code of Federal Regulations, Title 40, Part 60, Appendix B, Performance Specifications.



Air Monitoring Results

Continuous monitoring results are based on test results obtained over a one-hour averaging period as set out in Schedule 5 of the *Protection of the Environment Operations (Clean Air) Regulation* 2010 (NSW).

Monitoring Point	Description	Pollutant	Units of measure	Oxygen correction	Sampling method	Monitoring frequency required by licence	Number of times measured during sampling period	Minimum value	Average value	Maximum value	Concentration Limit
1	Compressor	Oxides of					Compressor Engine 1				
_	Engine 1	Nitrogen (as	Milligrams per				operated from 01 - 28				
	J -	NO₂ equivalent)	cubic metre	7% oxygen	CEM-2	Continuous	June under EPL 12003	303	331	367	461
		Temperature	Degrees Celsius		TM-2	Continuous	Special Condition E1. Results from 1-28 June	335	340	347	Not applicable
					Method approved		will be separately				
		Moisture	Percent		by EPA	Continuous	reported under EPL 12003 Condition E1.11. Results for 29- 30 June are reported.	5.8	6.5	7.3	Not applicable
		Volumetric flow rate	Cubic metres per second		CEM-6	Continuous		3	3	3	Not applicable
		Oxygen	Percent		CEM-3	Continuous		12	12.3	12.6	Not applicable
2	Compressor Engine 2	Oxides of Nitrogen (as NO ₂ equivalent)	Milligrams per cubic metre	7% oxygen	CEM-2	Continuous	Compressor Engine 2 operated from 1-30 June 2016. The CEMS of Compressor Engine 2 was operating for 45 minutes of every one hour period. The remaining 15 minute period was down time for cleaning purposes. See Note 1.	8.91	36.34	99.21	461
		Temperature	Degrees Celsius	, , , ,	TM-2	Continuous		331.13	399.84	505.50	Not applicable
		Moisture	Percent		Method approved by EPA	Continuous		See Note 1	See Note 1	See Note 1	Not applicable
		Volumetric flow rate	Cubic metres per second		CEM-6	Continuous		See Note 1	See Note 1	See Note 1	Not applicable
		Oxygen	Percent		CEM-3	Continuous		0.30	0.53	0.90	Not applicable
3	Compressor Engine 3	Oxides of Nitrogen (as	Milligrams per	70/	CEM-2	Continuous	Compressor Engine 3 operated on 1-3,10,	10.00	FF 24	60.07	461
		NO ₂ equivalent)	cubic metre	7% oxygen	CEM-2	Continuous	14,15,21,22,25-27,30 June 2016. The CEMS	19.80	55.34	68.87	461
		Temperature	Degrees Celsius		TM-2	Continuous	of Compressor Engine 3 was operating for 45 minutes of every one hour period. The remaining 15 minute	306.29	481.23	514.89	Not applicable
		Moisture	Percent		Method approved by EPA	Continuous		See Note 2	See Note 2	See Note 2	Not applicable
		Volumetric flow rate	Cubic metres per second		CEM-6	Continuous		See Note 2	See Note 2	See Note 2	Not applicable
		Oxygen	Percent		CEM-3	Continuous	period was down time for cleaning purposes. See Note 2.	0.69	0.85	1.20	Not applicable



Notes:

 In accordance with Section 3.4.1 of the EPA Publication Requirements, the following data points have not been included for Monitoring Point 2 (Compressor #2 exhaust stack) as AGL knows that the data has been unable to be collected or is incorrect.

Date	Approximate total hours	Pollutant	Justification		
1-30 June 2016	712	Volumetric Flow Rate, Moisture	Data unable to be collected due to component failure. AGL has been unable to repair the failed component and is trialing alternative monitoring methods in consultation with the EPA.		
23 June 2016	9	Oxides of Nitrogen, Oxygen, Temperature	Data unable to be collected due to component failure. AGL was able to repair the failed component.		

 In accordance with Section 3.4.1 of the EPA Publication Requirements, the following data points have not been included for Monitoring Point 3 (Compressor #3 exhaust stack) as AGL knows that the data has been unable to be collected or is incorrect.

Date	Approximate total hours	Pollutant	Justification
1-3, 10, 14- 15, 21-22, 25- 27, 30 June 2016	130	Volumetric Flow Rate, Moisture	Data unable to be collected due to component failure. AGL has been unable to repair the failed component and is trialing alternative monitoring methods in consultation with the EPA.
25 June 2016	4	Oxides of Nitrogen, Oxygen, Temperature	Data unable to be collected due to component failure. AGL was able to repair the failed component.