# Lake Coal

# Report

Site:	Chain Valley Colliery
Department:	HSEC
Report Title:	Monthly Environmental Report - November 2016
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Distribution:	Chain Valley Colliery website



**CVC Monthly Environmental Report** 

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## Introduction

LakeCoal Pty Ltd (LakeCoal) operates the Chain Valley Colliery, an underground coal mine at the southern end of Lake Macquarie.

Chain Valley Colliery operates under the following regulatory instruments;

- A Development Consent, SSD-5465 (as modified) issued under the Environmental Planning and Assessment Act, 1979.
- An Environment Protection Licence (1770) issued under the Protection of the Environment Operations Act, 1997.
- A groundwater bore licence (20BL173107) issued under the Water Act, 1912.

The above development consent/approval and licences require various monitoring and reporting to be undertaken by LakeCoal for Chain Valley Colliery.

This report provides environmental monitoring data from Chain Valley Colliery for the period 1 November 2016 to 30 November 2016.

Details of the Chain Valley Colliery EPL 1770 are provided below.

Chain Valley Colliery Information		
Premises name	Chain Valley Colliery	
Address	Construction Road, Chain Valley Bay, NSW, 2259	
Licensee	LakeCoal Pty Ltd	
EPL#	1770	
EPL location	http://www.epa.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=50980&SYS UID=1&LICID=1770	

The overall purpose of this report is to keep stakeholders informed of the environmental monitoring results at Chain Valley Colliery and maintain a transparent and accountable reporting system.



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### Scope

This report presents the results from the various environmental monitoring programs undertaken for Chain Valley Colliery.

Results in this report are typically only a single month of data, which is due to a legislative requirement introduced by the *Protection of the Environment Legislation Amendment Act 2011*, which requires publishing data publically within 14 days. As LakeCoal is required to undertake monitoring on a monthly basis, each report generally cover a single month of environmental monitoring data.

Where applicable, the results of the monitoring programs are compared with the relevant criteria (from the EPL or Development Consent) to determine compliance.

Monitoring results presented include;

- Water quality
- Water volume
- Depositional dust
- Operational noise
- Weather data

### **Definitions**

dB- decibels

dB(A) – noise level measurement units are decibels (dB). The A-weighting scale is used to approximate human perception of noise

g/m<sup>2</sup>/month – grams per square metre per month

kL- kilolitres

L<sub>Aeq</sub>—the average A-weighted noise energy (in dB) for a measurement period

mg/L – milligrams per litre

μg/L – micrograms per litre

μS/cm – microSiemens per centimetre



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## **References**

ALS Group - Monthly Water Monitoring Results November 2016 - Work Order ES1626455)

ALS Water - Report of Analysis (WN1602403)

Steel River Testing - Dust Deposition Report November 2016 (Report 12456-0)

Development Consent SSD-5465 (as modified)

Environment Protection Licence 1770 (Licence version date: 8 June 2016)

## **Monitoring Results**

Water – Quality

November 2016			
EPL	1770		
Licensee	LakeCoal Pty Ltd		
Premises	Chain Valley Colliery		
Date Sampled	1-Nov-16		
Date Obtained	30-Nov-16		
Date Reported	Refer report date		
Sampling Point	1		

Parameter	Units	Limit	Result
Biochem. Oxygen Den	na mg/L	-	<2
Enterococci	col/100mL	-	33
Faecal Coliforms	CFU/100mL	200	~7
pН	pН	6.5-8.5	7.7
Total Sus. Solids	mg/L	50	9

There was no exceedance of water quality criteria during the month.



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#### Water – Volume

	November 2016	
EPL	1770	
Licensee	LakeCoal Pty Ltd	
Premises	Chain Valley Colliery	
Date Sampled	Daily	
Date Reported	Refer report date	
Discharge volume limit	12161 kilolitres per day	
Sampling Point	1	

Date (24 hour period)	Unit	Volume
1/11/2016	kL	8046
2/11/2016	kL	5018
3/11/2016	kL	4258
4/11/2016	kL	4226
5/11/2016	kL	4161
6/11/2016	kL	6137
7/11/2016	kL	6329
8/11/2016	kL	7028
9/11/2016	kL	7464
10/11/2016	kL	2402
11/11/2016	kL	3216
12/11/2016	kL	5237
13/11/2016	kL	5491
14/11/2016	kL	6751
15/11/2016	kL	8295
16/11/2016	kL	5887
17/11/2016	kL	5389
18/11/2016	kL	5290
19/11/2016	kL	5280
20/11/2016	kL	6859
21/11/2016	kL	6770
22/11/2016	kL	9128
23/11/2016	kL	9248
24/11/2016	kL	4808
25/11/2016	kL	8113
26/11/2016	kL	1898
27/11/2016	kL	2528
28/11/2016	kL	3447
29/11/2016	kL	4803
30/11/2016	kL	5219

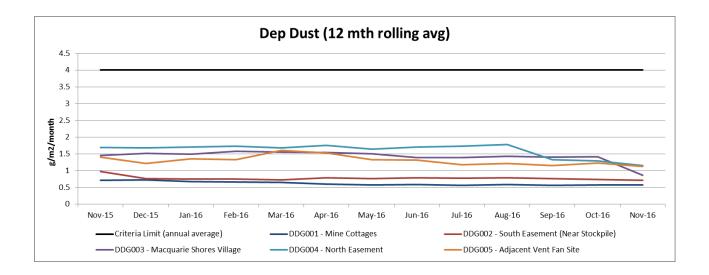
There were no exceedances of the volumetric limits at the Licenced Discharge Point during the month.



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#### **Depositional Dust**

November 2016			
13/10/2016 to	11/11/2016		
Insoluble Matter (g/m²	2/month)		
1.1			
0.8	0.8		
1.2	1.2		
0.8			
0.8			
ons refer to Air Quality Manage	ement Plan		
	13/10/2016 to  Insoluble Matter (g/m2 1.1 0.8 1.2 0.8		



#### **Operational Noise**

Noise monitoring was undertaken in September. No exceedances were recorded. Attended noise monitoring results will be made available in the next website report. The next round of monitoring is scheduled for December 2016.



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Weat	her	Data
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A summary of weather data recorded by an adjacent site meteorological monitoring station at the Colliery is presented below for the year to date.

Monthly Weather Data				
	2016			
EPL	191			
Licensee	LakeCoal Pty Ltd			
Premises	Mannering Collier	у		
Location	W1 (on-site weath	ner station)		
Date published:	Refer report date			
Date sampled:	Daily			
Date obtained:	12/12/2016			
Month	Total Rainfall /	Minimum	Maximum	
	Month (mm)	Temperature (°C)	Temperature (°C)	
Jan-16	329	14.3	36	
Feb-16	17.4	16.4	37.7	
Mar-16	92.2	14.3	30.1	
Apr-16	36.2	12.1	33.5	
May-16	46.6	5.3	27.8	
Jun-16	248.2	3.4	21.4	
Jul-16	73.2	2.5	25	
Aug-16	115	4.5	24.3	
Sep-16	68	7.4	24.2	
Oct-16	61	7.3	33.3	
Nov-16	46.8	10.9	35.2	
Dec-16				