



# Attachment 4.1H - Environmental Monitoring Worksheet

Period: 2/16/2017 - 28/02/2017

Location	Test	Freq	Limit	Units	Sample Date	NSW Environment Protection Licence Requirement	Date Sample Transferred to Laboratory	Date Sample Results Received by Holcim	Date of Remote Data Download	Result	Comments
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min max

NRR = No Result Recorded

## Site: Albion Park Quarry

Environment Protection Licence No.	122
Site Name (As it appears on the licence)	Albion Park Quarry
Site Address (As it appears on the licence)	Albion Park Quarry Woollybutt Drive ALBION PARK RAIL NSW 2527
Link to Licence on EPA Website	<a href="http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=31016&amp;SYSUID=1&amp;LICID=122">http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=31016&amp;SYSUID=1&amp;LICID=122</a>

### Blasting

Underdowns	Overpressure	Per Blast	Limit	Units	Sample Date	NSW Environment Protection Licence Requirement	Date Sample Transferred to Laboratory	Date Sample Results Received by Holcim	Date of Remote Data Download	Result	Comments
		Per Blast	5	mm/s		Y				NRR	No blasting in the reporting period.
		Per Blast	115	dB		Y				NRR	

## Site: "Johnniefelds" Marulan Quarry

Environment Protection Licence No.	1371
Site Name (As it appears on the licence)	Marulan Quarry
Site Address (As it appears on the licence)	Marulan Quarry Brayton Road MARULAN NSW 2579
Link to Licence on EPA Website	<a href="http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=28960&amp;SYSUID=1&amp;LICID=1371">http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=28960&amp;SYSUID=1&amp;LICID=1371</a>

### Blasting

Underdowns	Overpressure	Per Blast	Limit	Units	Sample Date	NSW Environment Protection Licence Requirement	Date Sample Transferred to Laboratory	Date Sample Results Received by Holcim	Date of Remote Data Download	Result	Comments
		Per Blast	115	dB		Y				NRR	No blasting in the reporting period.
	Vibration	Per Blast	5	mm/s		Y				NRR	

## Site: Lynwood Quarry

Environment Protection Licence No.	12939
Site Name (As it appears on the licence)	Lynwood Quarry
Site Address (As it appears on the licence)	Lynwood Quarry 278 Stoney Creek Road, MARULAN NSW 2579
Link to Licence on EPA Website	<a href="http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=29690&amp;SYSUID=1&amp;LICID=12939">http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=29690&amp;SYSUID=1&amp;LICID=12939</a>

### Air

DD	Test	Freq	Limit	Units	Sample Date	NSW Environment Protection Licence Requirement	Date Sample Transferred to Laboratory	Date Sample Results Received by Holcim	Date of Remote Data Download	Result	Comments
DD 5	Insoluble Solids	Monthly	0	4	mg/m2/month	17/2/17	Y		20/2/17	24/2/17	3
DD 8	Insoluble Solids	Monthly	0	4	mg/m2/month	17/2/17	Y		20/2/17	24/2/17	16.6
DD 11	Insoluble Solids	Monthly	0	4	mg/m2/month	17/2/17	Y		20/2/17	24/2/17	5.2
DD 12	Insoluble Solids	Monthly	0	4	mg/m2/month	17/2/17	Y		20/2/17	24/2/17	8.8
DD 13	Insoluble Solids	Monthly	0	4	mg/m2/month	17/2/17	Y		20/2/17	24/2/17	7.2
HVAS 1	PM10	24hr (every 6 days)	0	50	µg/m3	5/2/2017	Y		9/2/2017	14/2/17	14.2
HVAS 1	PM10	24hr (every 6 days)	0	50	µg/m3	11/2/2017	Y		13/2/17	21/2/17	11.7
HVAS 1	PM10	24hr (every 6 days)	0	50	µg/m3	17/2/17	Y		22/2/17	2/3/2017	24.9
HVAS 1	PM10	24hr (every 6 days)	0	50	µg/m3	5/2/2017	Y		9/2/2017	14/2/17	14.2
HVAS 1	PM10	24hr (every 6 days)	0	50	µg/m3	11/2/2017	Y		13/2/17	21/2/17	11.7
HVAS 1	PM10	24hr (every 6 days)	0	50	µg/m3	17/2/17	Y		22/2/17	2/3/2017	24.9

HVAS 2	PM10	24hr (every 6 days)	0	50	µg/m3		Y		9/2/2017	14/2/17	19.9	
HVAS 2	PM10	24hr (every 6 days)	0	50	µg/m3	3/2/2017	Y		13/2/17	21/2/17	16.9	
HVAS 2	PM10	24hr (every 6 days)	0	50	µg/m3	3/2/2017	Y		22/2/17	2/3/2017	29.9	
<b>Blasting</b>												
B3	Peak Particle Velocity	Per Blast	0	5	mm/sec	3/2/2017	Y	3/2/2017	3/2/2017		0	No trigger on the seismic recorder
B3	Overpressure	Per Blast	0	115	dB	3/2/2017	Y	3/2/2017	3/2/2017		0	No trigger on the seismic recorder
B3	Peak Particle Velocity	Per Blast	0	5	mm/sec	7/2/2017	Y	7/2/2017	7/2/2017		0	No trigger on the seismic recorder
B3	Overpressure	Per Blast	0	115	dB	7/2/2017	Y	7/2/2017	7/2/2017		0	No trigger on the seismic recorder
B3	Peak Particle Velocity	Per Blast	0	5	mm/sec	10/2/2017	Y	10/2/2017	10/2/2017		0	No trigger on the seismic recorder
B3	Overpressure	Per Blast	0	115	dB	10/2/2017	Y	10/2/2017	10/2/2017		0	No trigger on the seismic recorder
B3	Peak Particle Velocity	Per Blast	0	5	mm/sec	14/2/17	Y	14/2/17	14/2/17		0	No trigger on the seismic recorder
B3	Overpressure	Per Blast	0	115	dB	14/2/17	Y	14/2/17	14/2/17		0	No trigger on the seismic recorder
B3	Peak Particle Velocity	Per Blast	0	5	mm/sec	21/2/17	Y	21/2/17	21/2/17		0	No trigger on the seismic recorder
B3	Overpressure	Per Blast	0	115	dB	21/2/17	Y	21/2/17	21/2/17		0	No trigger on the seismic recorder
B3	Overpressure	Per Blast	0	5	mm/sec	28/2/17	Y	28/2/17	28/2/17		0	No trigger on the seismic recorder
B3	Peak Particle Velocity	Per Blast	0	115	dB	28/2/17	Y	28/2/17	28/2/17		0	No trigger on the seismic recorder

**Site: Cooma Road Quarry**

Environment Protection Licence No.	<b>1453</b>
Site Name (As it appears on the licence)	Cooma Road Quarry
Site Address (As it appears on the licence)	Cooma Road Quarry Cooma Road Queanbeyan NSW 2620
Link to Licence on EPA Website	<a href="http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLlicence.aspx?DOCID=28929&amp;SYSUID=1&amp;LICID=1453">http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLlicence.aspx?DOCID=28929&amp;SYSUID=1&amp;LICID=1453</a>

<b>Blasting</b>												
Heffernans House	Overpressure	Per blast	0	115	dB		Y				NRR	No blasting in the reporting period.
	Vibration	Per blast	0	5	mm/s		Y				NRR	

**Site: Dubbo Quarry**

Environment Protection Licence No.	<b>2212</b>
Site Name (As it appears on the licence)	Dubbo Quarry
Site Address (As it appears on the licence)	Sheraton Road, Dubbo, NSW,2830
Link to Licence on EPA Website	<a href="http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLlicence.aspx?DOCID=29036&amp;SYSUID=1&amp;LICID=2212">http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLlicence.aspx?DOCID=29036&amp;SYSUID=1&amp;LICID=2212</a>

<b>Blasting</b>												
WARRENS HOUSE	Overpressure	Per blast		120	dB		Y				NRR	No blasting in the reporting period.
	Vibration	Per blast		10	mm/s		Y				NRR	

**Site: Humes - Blacktown**

Environment Protection Licence No.	<b>1310</b>
Site Name (As it appears on the licence)	Humes Blacktown
Site Address (As it appears on the licence)	Humes Blacktown Lot 1 Woodstock Ave ROOTY HILL NSW 2766
Link to Licence on EPA Website	<a href="http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLlicence.aspx?DOCID=28958&amp;SYSUID=1&amp;LICID=1310">http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLlicence.aspx?DOCID=28958&amp;SYSUID=1&amp;LICID=1310</a>

<b>Water</b>												
Sediment Basin	TSS	Daily During Discharge		50	mg/L		Y				NRR	No discharge in the reporting period.
	pH	Daily During Discharge	6.5	8.5	pH		Y				NRR	

**Site: Teven Quarry**

Environment Protection Licence No.	<b>3293</b>
Site Name (As it appears on the licence)	Readymix Teven Quarry
Site Address (As it appears on the licence)	Stokers Lane Teven NSW 2478
Link to Licence on EPA Website	<a href="http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=29168&amp;SYSUID=1&amp;LICID=3293">http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=29168&amp;SYSUID=1&amp;LICID=3293</a>

<b>Blasting</b>											
											No blasting in the reporting period.

<b>Water</b>											
ID #1	pH	Weekly	6.5	8.5	pH	13/2/17	Y				7.8
ID #1	pH	Weekly	6.5	8.5	pH	20/2/17	Y				7.7

**Site: Boambee Quarry**

Environment Protection Licence No.	<b>7094</b>
Site Name (As it appears on the licence)	Boambee Quarry
Site Address (As it appears on the licence)	Boambee Quarry North Boambee Road BOAMBE NSW 2450
Link to Licence on EPA Website	<a href="http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=31235&amp;SYSUID=1&amp;LICID=7094">http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=31235&amp;SYSUID=1&amp;LICID=7094</a>

<b>Blasting (M4 &amp; L2.1 - To determine compliance with L3, measurements to be taken at any point within 1 metre of residential boundary)</b>											
	Overpressure	Per blast	0	120	dB	7/2/2017	Y	7/2/2017	7/2/2017		102
	Vibration	Per blast	0	10	mm/s	7/2/2017	Y	7/2/2017	7/2/2017		1.51

**Site: Tuncurry Sand**

Environment Protection Licence No.	<b>13359</b>
Site Name (As it appears on the licence)	Tuncurry Sand Quarry
Site Address (As it appears on the licence)	Tip Road Tuncurry NSW 2428
Link to Licence on EPA Website	<a href="http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=30945&amp;SYSUID=1&amp;LICID=13359">http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=30945&amp;SYSUID=1&amp;LICID=13359</a>

**Site: Jandra Quarry**

Environment Protection Licence No.	<b>2796</b>
Site Name (As it appears on the licence)	Jandra Quarry
Site Address (As it appears on the licence)	Pacific Highway Possum Brush NSW 2430
Link to Licence on EPA Website	<a href="http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=30958&amp;SYSUID=1&amp;LICID=2796">http://www.environment.nsw.gov.au/prpoeoapp/ViewPOEOLicence.aspx?DOCID=30958&amp;SYSUID=1&amp;LICID=2796</a>

<b>Blasting (To determine compliance with L3, measurements to be taken at any point within 1 metre of residential boundary)</b>											
	Overpressure	Per blast	0	120	dB	24/02/2017	Y	24/02/2017	24/02/2018		106.8
	Vibration	Per blast	0	10	mm/s	24/02/2017	Y	24/02/2017	24/02/2018		2.44