Ref: SCML-MLA/EHS/LUM/2023-24/02

Dated: 20/04/2023

To,

The Member Secretary,
Meghalaya State Pollution Control Board,
'ARDEN' Lumpyngngad, Shillong – 793014

Subject

: Submission of Environmental Monitoring Report for the month of March, 2023.

Reference

: MPCB/ONLINE/CTO(R-I)/EJHD/2021/2022-2023/14, Dtd: Shillong, the 30th Aug, 2022.

Dear Sir,

This is in reference to above cited subject, we are hereby submitting the monthly Environmental monitoring reports of Ambient Air Quality monitoring including meteorological data, Fugitive Emission, Surface water monitoring reports of M/s Star Cement Meghalaya Limited over a Mining Lease Area of 42.051 Ha for the month of March, 2023.

This is for your kind information, record and kindly acknowledge receipt of the same.

Thanking You,

Yours truly,

For STAR CEMENT MEGHALAYA LIMITED

Laxmaiah Munjala

Unit Head

Enclosed: a/a

<u>Copy To</u>: 1) The Deputy Director General of Forest (Central), Ministry of Environment Forest & Climate Change, Govt. of India, Regional Office, Shillong, Meghalaya-793021.

2) The Regional Director, Central Pollution Control Board (CPCB), North Eastern Zonal Office, 'TUMSIR', Lower Motinagar, Shillong, Meghalaya-790314.

CIN: U63090ML2005PLC008011



Lumshnong, Meghalaya

Solid Setting				
Date (DD-MM-YYYY)	Pressure (mmHg)	Relative Humidity (%)	Temp. (C)	Manual Rain (mm)
01-03-2023	761.2	65.4	20.5	0
02-03-2023	761	61.3	21.6	0
03-03-2023	760.4	69.0	19.4	0
04-03-2023	760.9	62.1	20.7	0
05-03-2023	762.4	51.3	23.5	0
06-03-2023	763.9	61.4	25.7	0
07-03-2023	763.5	56.1	26.4	0
08-03-2023	763	64.2	24.8	0
09-03-2023	763.2	54.3	21.6	0
10-03-2023	763.2	69.2	22.8	0
11-03-2023	762.5	61.4	23.6	0
12-03-2023	762.2	54.6	26.0	0
13-03-2023	762	55.5	26.0	0
14-03-2023	761	51.2	26.0	0
15-03-2023	760.9	81.6	19.3	6.4
16-03-2023	760.9	85.7	16.8	15
17-03-2023	761	84.9	17.6	8.4
18-03-2023	761.5	77.5	20.0	0
19-03-2023	762.4	81.4	16.9	27.6
20-03-2023	762.7	84.0	15.6	24.8
21-03-2023	762.2	83.0	16.7	59.6
22-03-2023	762.5	89.2	17.2	33.4
23-03-2023	762.2	94.2	20.6	0
24-03-2023	762	84.3	18.1	0
25-03-2023	761	69.2	18.7	0
26-03-2023	760.9	87.6	15.1	34.8
27-03-2023	760.9	84.4	17.2	10.2
28-03-2023	761	86.7	21.3	10.8
29-03-2023	761.5	78.6	18.9	3
30-03-2023	760.9	65.2	19.6	0
31-03-2023	762.4	80.4	19.2	5
			Total	239



STAR CEMENT MEGHALAYA LIMITED (42.051Ha)

Lumshnong, Meghalaya

FUGITIVE EMISSION REPORT

Reference No.	SCML/Env/F – 07 (a)
Issue No.	1
Date of Issue:	01.12.2018
Revision No.	2
Date of Rev.	01.12.2020

Ref: SCML/ENV/FUGITIVE/MONTHLY/2022-23/04

(42.051 Ha)

Month - March 2023

		Fugitive Emission Results	As per CPCB/BIS Guideline		
Date Location	Location		Limit		
		(in µg/m³)	(in µg/m³)		
18.03.2023	Near Lime Stone loading area	1963	5000		

Rani Single

Verified By

Checked By Analyzed By



(MLA 42.051 Ha) Lumshnong, Meghalaya
 Reference No.
 SCML/Env/F - 01

 Issue No.
 1

 Date of Issue:
 24.08.2013

 Revision No.
 5

 Date of Rev.
 01.12.2020

Month: March

AMBIENT AIR QUALITY MONITORING REPORT

Date of Rev.

Reference No.: SCML/ENV/AAQM/MONTHLY/2022-23/04

S Coordinate: 25°10′14 88″N 92°24′52 13″F

Location of Sampling: Mines	Entrance Haul Road	GPS Coordinate: 25°10′14.88″N 92°24′52.13″E						
Sampling Duration:	24 Hrs.	24 Hrs.	24 Hrs.	24 Hrs.				
Date of Sampling	PM ₁₀ (μg/m³)	PM ₂₋₅ (μg/m³)	SO ₂ (μg/m³)	NO₂ (μg/m³)				
18.03.2023	57.24	35.25	14.68	17.35				
NAAQS permissible limits for Rural, Industrial, Residential Area	100 (μg/m³)	60 (μg/m³)	80 (μg/m³)	80 (μg/m³)				

Remarks: All the analyzed parameters are well within the permissible limits of NAAQ Standards, Notification dated 18th November 2009.

Analysed by

Pari Singh

Checked By

Verified By



STAR CEMENT MEGHALAYA LIMITED (MLA 42.051 Ha)

(MLA 42.051 Ha) Lumshnong, Meghalaya
 Reference No.
 SCML/Env/F - 01

 Issue No.
 1

 Date of Issue:
 24.08.2013

 Revision No.
 5

 Date of Rev.
 01.12.2020

AMBIENT AIR QUALITY MONITORING REPORT

Reference No.: SCML/ENV/AAQM/MONTHLY/2022-23/04

Reference No.: SCML/ENV/AAQM/MONTHLY/2022-23/04

Month: March

Location of Sampling: ROC D	riling Point	GPS Coordinate: 25°10′15.92″N 92°24′55.38″E					
Sampling Duration: 24 Hrs.		24 Hrs.	24 Hrs.	24 Hrs.			
Date of Sampling	PM ₁₀ (μg/m³)	PM ₂₋₅ (μg/m³)	SO ₂ (μg/m³)	NO₂ (μg/m³)			
18.03.2023	53.67	34.90	11.14	12.36			
NAAQS permissible limits for Rural, Industrial, Residential Area	100 (μg/m³)	60 (μg/m³)	80 (μg/m³)	80 (μg/m³)			

Remarks: All the analyzed parameters are well within the permissible limits of NAAQ Standards, Notification dated 18th November 2009.

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Pari Singh

Whath Verified By

Checked By



STAR CEMENT MEGHALAYA LIMITED (MLA 42.051 Ha)

(MLA 42.051 Ha)
Lumshnong, Meghalaya

AMBIENT AIR QUALITY MONITORING REPORT

 Reference No.
 SCML/Env/F - 01

 Issue No.
 1

 Date of Issue:
 24.08.2013

 Revision No.
 5

 Date of Rev.
 01.12.2020

Reference No.: SCML/ENV/AAQM/MONTHLY/2022-23/04 Month: March

Location of Sampling: Excava	ator Point	GPS Coordinate : 25°10′16.34″N 92°24′54.97″E 745 m					
Sampling Duration: 24 Hrs.		24 Hrs.	24 Hrs.	24 Hrs.			
Date of Sampling	PM ₁₀ (μg/m³)	PM ₂₋₅ (μg/m³)	SO ₂ (μg/m³)	NO₂ (μg/m³)			
18.03.2023	50.10	36.72	11.12	11.55			
NAAQS permissible limits for Rural, Industrial, Residential Area	100 (μg/m³)	60 (μg/m³)	80 (μg/m³)	80 (μg/m³)			

Remarks: All the analyzed parameters are well within the permissible limits of NAAQ Standards, Notification dated 18th November 2009.

Analysed by

Checked By

Pari Singh

Verified By



STAR CEMENT MEGHALAYA LIMITED (42.051 Ha)

Lumshnong, Meghalaya

NOISE LEVEL MONITORING REPORT

 Document No.
 SCML/EHS/Env/F-03

 Effective Date
 01-05-2019

 Revision No.
 04

 Revision Date
 01-01-2021

Ref: SCML(LM)/ENV/NOISE/MONTHLY/2022-23/002

Date:- 18.03.2023

<u>Limestone Mine - 42.051</u>

Month - March

S. No.	Location	Measured Va	Norms In dB(A)		
		Min.	Max.	Avg.	
	Excavator				
	A) Operator Cabin (Door Open)				
	a) At Low engine RPM	58.5	67.3	62.9	
	b) At High engine RPM	63.3	72.1	67.7	
	B) Operator Cabin(Door Close)				
	a) At Low engine RPM	60.6	66.6	63.6	
	b) At High engine RPM	63.3	70.9	67.1	
	C) Periphery of the Engine				
1	a) At 1 mtr. Distance(At low RPM)	60.8	71.5	66.2	75
	b) At 1 mtr. Distance (At high RPM)	62.0	72.7	67.4	
	c) At 5 mtr. Distance (At low RPM)	56.4	69.6	63.0	
	d) At 5 mtr. Distance (At high RPM)	58.8	70.7	64.7	
	D) Behind the Engine				
	a) At 1 mtr. Distance(At low RPM)	62.4	68.1	65.3	
	b) At 1 mtr. Distance (At high RPM)	69.5	72.1	70.8	
	c) At 5 mtr. Distance (At low RPM)	60.6	63.6	62.1	
	d) At 5 mtr. Distance (At high RPM)	63.3	69.6	66.5	
	Rock Breaker				
	A) Operator Cabin				
	a) At Low engine RPM	64.6	65.3	65.0	
2	b) At High engine RPM	66.9	72.2	69.6	75
2	B) Rock Breaker Point (At 5 mtr. Distance)				/5
	a) Left Side	58.7	66.8	62.8	
	b) Right Side	55.4	68.5	62.0	
	c) Front Side	58.1	70.1	64.1	

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Checked By

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STAR CEMENT MEGHALAYA LIMITED (42.051 Ha) Lumshnong, Meghalaya

NOISE LEVEL MONITORING REPORT

 Document No.
 SCML/EHS/Env/F-03

 Effective Date
 01-05-2019

 Revision No.
 04

 Revision Date
 01-01-2021

Ref: SCML(LM)/ENV/NOISE/MONTHLY/2022-23/002

Date:- 18.03.2023

<u>Limestone Mine - 42.051</u>

Month - March

S. No.	Location	Measured Va	lues dB(A) Day ti 10:00pm)	Norms In dB(A)	
		Min.	Max.	Avg.	
	Drill Machine				
	A) Compressor				
	a) At 1 mtr. Distance	66.3	72.8	69.6	
3	b) At 5 mtr. Distance	62.2	71.4	66.8	75
3	B) Drilling Point (At 5 mtr. Distance)				/3
	a) Left Side	63.3	71.4	67.3	
	b) Right Side	62.3	72.3	67.3	
	c) Front Side	61.3	71.4	66.4	
	Dozer				
	A) Operator Cabin				
	a) At Low engine RPM	57.7	63.3	60.5	
	b) At High engine RPM	63.9	71.6	67.8	
	B) Periphery of the Engine				
	a) At 1 mtr. Distance(At low RPM)	59.6	67.4	63.5	
4	b) At 1 mtr. Distance (At high RPM)	63.6	70.8	67.2	
4	c) At 5 mtr. Distance (At low RPM)	53.8	60.1	57.0	
	d) At 5 mtr. Distance (At high RPM)	60.3	68.3	64.3	
	c) Behind the Engine				
	a) At 1 mtr. Distance(At low RPM)	55.9	62.3	59.1	75
	b) At 1 mtr. Distance (At high RPM)	59.6	66.4	63.0	
	c) At 5 mtr. Distance (At low RPM)	53.5	58.4	56.0	
	d) At 5 mtr. Distance (At high RPM)	57.0	60.4	58.7	
	Dumper				
	A) Empty Dumper				
	a) Open Window	64.8	70.8	67.8	
5	b) Close Window	58.8	64.3	61.6	
	B) Loaded Dumper				
	a) Open Window	66.0	71.3	68.7	
	b) Close Window	61.3	65.6	63.5	

Analyzed by

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Checked by

Verified By



Lumshnong, Meghalaya

Reference No.	SCML/EHS/F-04
Issue No.	1
Date of Issue:	24.08.2013
Revision No.	3
Date of Rev.	01.06.2019

(42.051 Ha)

Reference No.: SCML/ENV/WATER/MONTHLY/2022-23/04

Surface Water Analysis Results

Date of sample collection: - 11.03.2023

Date of Analysis: 11.03.2023 to 14.03.2023

														Date of Amaryons 2	1.03.2023 to 14.03.2023
S.No.	Parameter	Unit	Umtyrngai I	Nallah	Umu	tha Nallah	Umso Nalah	Lunar	Lukha	Seshympa	Umbadoh	Tongseng	Lumshnong	Wahiajer	Standards norms
3.140.	raiametei	Oille	Up Stream	Down Stream	Up Stream	Down Stream	Down Stream		Lukiia Sesiiyiipa	Seasonal Spring / Seasonal Nallah			as per IS 2296		
1	рН	-	7.8	8.3	8.0	8.2	7.9	6.9	6.5	6.7	7.6	7.3	7.2	7.9	6.5 - 8.5
2	Colour	Hazen	Colourless	Colourless	Colourless	Colourless	Colourless	Slightly Mellowish	Colourless	Colourless	Colourless	Colourless	Colourless	Colourless	10
3	Odour	-		Unobjectionable							Unobjectionable				
4	Chloride	mg/L	23	32	17.7	20.6	46.1	40.2	8.3	21.3	35.5	17.7	24.8	23.2	250
5	Total Hardness as CaCO₃	mg/L	40	60	80.0	84.0	79.5	130.2	15.0	39.6	20.0	6.8	10.0	48.1	300
6	Suspended Solids	mg/L	1.0	4.2	1.0	13.8	5.9	54.0	3.0	5.0	2.0	3.2	3.0	5.8	-
7	Total Dissolve Solids	mg/L	232	281	237	290	363	217	53	83	214	9.6	55.0	120.0	500
8	Biochemical Oxygen Demand (For 3 days at 27 °C)	mg/L	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	2.0
9	Oil & Grease	mg/L	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	-
10	Temperature	°C	25.0	25.0	25.0	25.0	25.0	25.0	25.0	25.0	25.0	25.0	25.0	25.0	-
11	Conductivity	μS/cm	422	515.0	431.0	523.0	679	205	110	165	396	16.3	100.3	300.0	-
12	Flow	L / Min	8232.3	10421.6	3433.6	3622.1	23568.2	139902.1	109995.6	356754.8	-	-	370.805	-	-

Analyzed

Checked by

Verified by

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