

**INDIAN BUREAU OF MINES**  
**MINES CONTROL AND CONSERVATION OF MINERAL DIVISION**  
**MCDR INSPECTION REPORT**  
**Guwahati Regional Office**

Mine Code : 38MEG03016

Mine file No : IBM/GHY/MEG/JNH/LST-13  
 Date of Inspection: 09.02.2021

**General:**

S.N.	Particulars	
1	Name of the Mine	<b>LUMSHNONG LIMESTONE MINE</b>
2	Total Lease Area(Ha) with breakup of Non-forest and forest land	70.00 hectares, Forest : 4.82 hectares, Non Forest : 65.18 hectares
3	Mine code	38MEG03016
4	IBM Registration Number under rule 45 of MCDR , 1988	IBM/5471/2011
5	Name of the lessee, Address, phone, email and fax number	Star Cement Limited, Lumshnong Village, East Jaintia Hills District. Email: starmines@starcement.co.in
6	Village	Lumshnong
7	Taluka/Mandal	Khliehriat
8	District	East Jaintia Hills
9	Pincode	793 210
10	State	Meghalaya
11	Post office	Lumshnong
12	Nearest police station	Lumshnong
13	Nearest Railway station	Badarpur
14	Date of Grant of Mining Lease	04.01.2017
15	Date of Execution	10.01.2017
16	Date of opening of Mine	21.09.2017
17	Date of first Renewal, if applicable and its period & expiry	Nil
18	Date of second Renewal, if applicable and its period & expiry	Nil
19	Date of submission of Renewal application if Mining operations are continuing under deemed extension	Nil
20	Name of the Nominated Owner with Address, phone, email, fax number and date of appointment	Shri Prem Kumar Bhajanka Star Cement Ltd Lumshnong Village, East Jaintia Hills District, Meghalaya-793210 Email: pkb@plymail.com Date of appointment: 20.08.2018
21	Name of the Mine Agent with Address, phone, email, fax number and date of appointment	Shri D.V. Ramanayya Vill-Lumshnong, Dist.-East Jaintia Hills, Meghalaya-793 210 Email : dvramanayya@starcement.co.in Mob : 94901-88024 Date of appointment: 11.01.2018
22	Name of the Mines Manager with Address, phone, email, fax number and date of appointment	Shri Sangram Kishore Mallick Vill-Lumshnong, Dist.-East Jaintia Hills, Meghalaya-793 210 Email : sangrammallick@starcement.co.in Mob : 98625-71302 Date of appointment: 20.07.2018
23	Name of the Mining Engineer, Qualification and total experience with Address, phone, email, fax number and date of appointment in mine	Shri Sangram Kishore Mallick Date of appointment : 15.04.2019 Qualification : AMIE Experience : 13 Years Mob : 98625-71302
24	Whether Geologist and Mining Engineer appointed in mines satisfy the rule 42 & carrying out their duties as per rule 43 & 44	<b>YES,</b> <b>Geologist:</b> Hijam Rakesh Singh Date of appointment : 21.09.2017 Qualification : M.Sc. (Earth Science) <b>Mining Engineer:</b> Shri Sangram Kishore Mallick Date of appointment : 15.04.2019 Qualification : AMIE
25	Date of Approval of Mining Plan/Modified Mining Plan with five year period & specific condition in approval letter, if any	Approved the Modification of Mining Plan (2017-18 to 2021-22), vide letter No.IBM/GHY/MEG/EJNH/LST/MP-83, dated 19.06.2017.
26	Date of Approval of Scheme of Mining/ Modified Scheme of Mining with five year period & specific condition in approval letter, if any	NA
27	Mineral(s) granted in lease and proved for mining	Limestone
28	Method of Mining (Opencast, Underground)	Opencast
29	Power used (Fully Mechanised, Others or Manual)	Fully Mechanised
30	Employment (Captive)	Captive



**Mining :**

Details of proposals of approved mining plan/scheme of mining (Duplication of information in existing TMIS data sheets and draft write up has been avoided)

Mining :				
S.N.	Items	Proposals	Actual work	Remarks
	Backlog of previous year	Nil	Nil	
1b	Exploration over lease area for Geological axis 1 or 2	Nil	Nil	
1c	Exploration Agency & Expenditure in lakh Rupees during the year	Nil	Nil	
1d	Balance area to be explored to bring Geological axis in 1 or 2	Nil	Nil	
1e	Balance reserves as on 01.04.2020	Not mentioned	2,94,35,315 MT	
1f	General remarks of inspecting officer on geology, exploration etc.	Exploration over entire lease area has been completed & total lease area is under G1 category.		

**Development:**

S.N.	Items	Proposals	Actual work	Remarks
2a	Location of development w.r.t. lease area	<b>Easting</b> 436149 to 436454 <b>Northing</b> 2783460 to 2784120	<b>Easting</b> 436093 to 436379 <b>Northing</b> 2783464 to 2784065	The lessee has moved beyond the proposal in some portion of development and therefore violation letter has been issued.
2b	Separate benches in topsoil, overburden and mineral (Rule 15)	No proposals	Nil	
2c	Stripping ratio or ore to OB ratio	1: 0.45	1: 0.57	
2d	Quantity of topsoil generation in m <sup>3</sup>	2,84,283	2,54,666	
2e	Quantity of overburden generation in m <sup>3</sup>	1,69,761	22,657	
2f	General remarks of inspecting officer on development of pit w.r.t type of deposit etc.	The lessee has not undergone development as per the proposal and therefore violation letter has been issued for the same reason.		

**Exploitation :**

S.N.	Items	Proposals	Actual work	Remarks
3a	Number of pits proposed for production	1	1	
3b	Quantity of ROM mineral production proposed	25,04,760 MT	8,99,772.42 MT	
3c	Recovery of salable/usable mineral from ROM production	100%	100%	
3d	Quantity of mineral reject generation	1,69,761.0 m <sup>3</sup>	22,656.5 m <sup>3</sup>	
3e	Grade of mineral reject generation and threshold value declared	No proposal	Nil	
3f	Quantity of sub-grade mineral generation	No proposal	Nil	
3g	Grade of sub-grade mineral generation	No proposal	Nil	
3h	Manual/Mechanised method adopted for segregating from ROM.	Mechanised	Mechanised	
3i	Any analysis or beneficiation study proposed & carried out for sub-grade mineral and reject	No proposal	Nil	
3j	Provision of drilling & blasting in mineral benches	Deep hole DTH drilling machine of 115 mm dia	Deep hole DTH drilling machine of 115 mm dia	
3k	Provision of mining machineries in mineral benches	Hydraulic Excavator of 2.6m <sup>3</sup> with dumper of 25 MT	Hydraulic Excavator of 2.6m <sup>3</sup> with dumper of 25 MT	
3l	Whether height of benches in overburden and mineral suitable for method of mining proposed in MP/SOM.	Yes	Yes	
3m	Total area covered under excavation / pits	22.66 Ha.	20.421 Ha.	
3n	Ore to OB ratio for the pit/mine during the year	1: 0.45	1: 0.57	
3o	Total area put in use under different heads at the end of year	Pit: 22.66 Ha. Green Belt: 0.40 Ha.	Pit: 20.421Ha. Green Belt: 0.40 Ha.	
3p	Production of ROM mineral during last five year, as applicable	2016-17: 1,00,012.50 MT 2017-18: 23,01,064.00 MT 2018-19: 25,00,580.00 MT 2019-20: 25,04,760.00 MT	2016-17: Nil 2017-18: 89,71,92.41 MT 2018-19: 89,87,21.13 MT 2019-20: 8,99,772.42 MT	
3q	General remarks of inspecting officer on method of mining etc	Lessee failed to obtain the environmental clearance for the proposed production quantity, and therefore filed to achieve it.		

**Solid Waste Management- Dumping:**

S.N.	Items	Proposals	Actual work	Remarks
4a	Separate dumping of topsoil, OB & mineral reject (Rule 32, 33)	No proposal	NA	
4b	Location of topsoil, OB & mineral reject dumps	No proposal	NA	
4c	Number of dumps within lease area and outside lease area	2 (Soil Dump & Waste Dump)	2 (Soil Dump & Waste Dump)	
4d	Location of dumps w.r.t ultimate pit limit (Rule 16)	<b>Easting</b> 436214 to 436424 <b>Northing</b> 2784204 to 2784423	<b>Easting</b> 436247 to 436375 <b>Northing</b> 2784204 to 2784260	
4e	Number of active & alive dumps	2	2	
4f	Number of dead dumps	No proposal	NA	
4g	Number of dumps stabilised	No proposal	NA	
4h	Whether Retaining wall or garland drain all along dump	Proposed	NA	
4i	Length of Retaining wall or garland drain all along dump	No proposal	NA	
4j	Number of settling ponds	No proposal	NA	
4k	Specific comments of inspecting officer on waste dump management	A violation letter has been issued for non-compliance for the systematic development of the waste dump		



Management- Backfilling:		Proposals	Actual work	Remarks
as on part or full extraction of mineral from mined out area before starting backfilling		No proposal	NA	
under backfilling of mined out area		No proposal	NA	
Concurrent use of topsoil for restoration or rehabilitation of mined out area		No proposal	NA	
Total area fully reclaimed & rehabilitated		No proposal	NA	
je General remarks of inspecting officer on backfilling , reclamation etc				

Progressive Mine Closure Plan:				
S.N.	Items	Proposals	Actual work	Remarks
6a	Whether Annual report on PMCP submitted on time and correctly-Rule 23E(2). Details should be given in the format as given in Annexure-20	As per rule 26(2) Annual PMCP report to be submitted before 1 <sup>st</sup> day of July of Every Year	Submitted through IBM's e-mail on 25.05.2020	
6b	Management of worked /mined out benches i) Area available for rehabilitation (ha) ii) Afforestation done(ha) iii) No. of saplings planted during the year iv) Cumulative no. of plants v) Any other specific method of rehabilitation vi) Cost incurred on watch & care during the year	i) NA ii) NA iii) NA iv) NA v) Nil vi) NA	i) NA ii) NA iii) NA iv) NA v) Nil vi) NA	
6c	Compliance on reclamation and rehabilitation by backfilling i) Voids available for backfilling (L X B X D) ii) Void filled by waste/tailings iii) Afforestation on the backfilled area iv) Rehabilitation by making water reservoir v) Any other specific means	i) NA ii) Nil iii) NA iv) NA v) Nil	i) NA ii) Nil iii) NA iv) NA v) Nil	
6d	Compliance of Rehabilitation of waste land within lease i) Afforestation ii) Area iii) Method of rehabilitation	i) 1000 Nos. of saplings along safety barrier ii) Nil iii) Nil	i) 2500 Nos. of saplings along safety barrier ii) Nil iii) Nil	Rehabilitation yet to be started as mineral is still exist
6e	Compliance of Environmental monitoring (core zone & buffer zone)	Air, Noise and Water quality monitoring will be done during the year within the lease area	Within the limit	
6f	General remarks of inspecting officer on PMCP compliance & progressive closure operations	The lessee has carried out afforestation and environmental monitoring as per the proposal during the reporting year.		

Mineral Conservation:				
S.N.	Items	Proposals	Actual work	Remarks
7a	ROM Mineral dispatch or grade-wise sorting within lease area	Produced ROM will be directly sent to the Crusher from the mine	Produced ROM has directly sent to the Crusher from the mine	
7b	Method of grade -wise mineral sorting i.e manual or mechanical	Mehanical	Mehanical	
7c	Different grade of mineral sorted out at mines	Nil	Nil	
7d	Any beneficiation process at mines	Nil	Nil	
7e	General remarks of inspecting officer on Mineral conservation & beneficiation issues	No proposal for mineral beneficiation was proposed during the reporting year.		

Environment:				
S.N.	Items	Proposals	Actual work	Remarks
8a	Separate removal and utilization of topsoil (Rule 32)	No proposal	NA	
8b	Concurrent use or storage of topsoil	No proposal	NA	
8c	Separate dumps for overburden, waste rock, rejects and fines (Rule 33)	No proposal	NA	
8d	Use of overburden, waste rock, rejects and fines dumps for restoring the land to its original use.	No proposal	NA	
8e	Phased restoration, reclamation & rehabilitation of lands affected by mining operations (pits, dumps etc.)	No proposal	NA	
8f	Baseline information on existence of plantation & additional plantation done (Rule 41)	Within lease- 1000 Nos. of saplings	Within lease- 2500 Nos. of saplings	
8g	Survival rate	No proposals	65.00%	
8h	Water sprinkling on roads to control airborne dust	Water Sprinkling on Haul roads were proposed.	Water sprinkling by water tanker over haul roads has been carried out.	
8i	General remarks of inspecting officer on aesthetic beauty in and around mines area	Lessee has planted 2500 saplings within the lease boundary and had carried out water sprinkling inside the mine area to limit the emission of fugitive dust. This sustains the aesthetic beauty of the mine area.		

Compliance of Rule 45:				
S.N.	Item	Comments		Remarks
9a	Status of submission of Monthly and Annual returns	Monthly Return submitted upto	Submitted upto Jan'2021	
		Annual Return submitted upto	Submitted upto FY 2019-20	
S.N.	Item	Details Given in Annual Return		Observation of I/Officer
9b	Scrutiny of Annual return for information on Mining Engineer, Geologist and Manager	Mines Manager Sangram Kishore Mallick Mining Engineer Sangram Kishore Mallick Geologist Hijam Rakesh Singh	Mines Manager Sangram Kishore Mallick Mining Engineer Sangram Kishore Mallick Geologist Hijam Rakesh Singh	
9c	Scrutiny of Annual return on land use pattern for area under pits, reclaimed area, dumps etc.	Pit : 20.421 Ha.	Pit : 20.421 Ha.	
9d	Scrutiny of Annual return on afforestation	Saplings: Within lease:1000 Nos.	Saplings: Within lease:2500 Nos Survival rate: 65%	
9e	Scrutiny of Annual return on mineral reject generation (Grade & Quantity)	Nil	Nil	
9f	Scrutiny of Annual return on ROM stock and/ or graded ore	Opening Stock: Nil Production: 8,99,772.42 MT Dispatch: 8,99,772.42 MT Closing Stock: Nil There is no separate stock for graded ore	Opening Stock: Nil Production: 8,99,772.42 MT Dispatch: 8,99,772.42 MT Closing Stock: Nil There is no separate stock for graded ore	
9g	Scrutiny of Annual return on sale value, Ex. Mine price & production cost	Ex. Mine Price: Rs. 244.98	Cross checked from the returns found it to be correct	
9h	Scrutiny of Annual return on fixed assets	₹ 74,01,87,748.00	Verified with Asset register during inspection & found it to be correct.	
9i	Scrutiny of Annual return on mining machineries	1) Back Hoe : 06 2) Tipper: 27 3) Dozer: 02 4) Air Compressor: 02 5) Rock Drill: 02 6) Other HEMM: 03 7) Water Tanker: 01 8) Explosive Van: 01 9) Generator Diesel: 04	1) Back Hoe : 06 2) Tipper: 27 3) Dozer: 02 4) Air Compressor: 02 5) Rock Drill: 02 6) Other HEMM: 03 7) Water Tanker: 01 8) Explosive Van: 01 9) Generator Diesel: 04	Verified from submitted annual machinery statement

Details of violations observed during the current inspection and compliance position of earlier violation pointed out:

Violations under Rule 11(1) was pointed out and violation letter has been issued to the lessee on 17.02.2021. Lessee has complied earlier pointed violation under rule 11(4).

*Vibha*  
23/2/21  
Name of Inspecting Officer with Designation and Date

*Mohan*  
23/2/21