INDIAN BUREAU OF MINES MINERALS DEVELOPMENT AND REGULATION DIVISION

MCDR INSPECTION REPORT

Ajmer regional office

Mine file No : RAJ/NGR-13/LST-1 Mine code : 38RAJ20001

(i) Name of the Inspecting : G021) D R GURJAR

Officer and ID No.

(ii) Designation : Sr. Asst. Contrl. Mines

(iii) Accompaning mine : Sh. Satish Kumar Rathode, Mining Engineer

Official with Designation

(iv) Date of Inspection : 27-FEB-23
(v) Prev.inspection date : 09-NOV-21

PART-I : GENERAL INFORMATION

(a) Mine Name : GAGARANA

(b) Registration NO. : IBM/7378/2011

(c) Category : A Mechanised

(d) Type of Working : Opencast

(e) Postal address

State : RAJASTHAN

District : NAGAUR

Village : GAGARANA

Taluka : MERTA CITY

Post office : GAGARANA

Pin Code : 341510

FAX No. : 0744-2500178

E-mail : mines@mangalamcement.com

Phone : 07459-232237, 01590-230614

(f) Police Station : Gotan

(g) First opening date : 26-MAR-87

(h) Weekly day of rest : MON

2. Address for : Mangalam Cement Ltd.

correspondance SUB-POST PFFICE - GAGRANA (PO: MERTA CITY)

District- Nagaur.

3. (a) Lease Number : RAJ1487
(b) Lease area : 200
(c) Period of lease : 50

(d) Date of Expiry : 21-OCT-32

4. Mineral worked : LIMESTONE Main

5. Name and Address of the

Lessee : MANGLAM CEMENTS LIMITED

ADITYA NAGER -326517 PO-

MORAK DISTT-KOTA KOTA

RAJASTHAN

Phone:)7459)44237,44262

FAX :

Owner : K. C. Jain

Mangalam Cement Ltd. P. O. Adityanagar, Morak, Distt.

Kota KOTA RAJASTHAN

Phone:

FAX : 07459232156

Agent : Shri P.R. Chaudhary

Mangalam Cement Ltd. PO: Adityanagar-Morak Distt. Kota (Rajasthan) KOTA

RAJASTHAN

Phone: 07459-233146 FAX: 07459-232156

Mining Engineer

Name : Satish Ratod, Full Time

Qualification : B. E. Mining Appointment/ : 21-FEB-14

Termination date

Geologist

Name : Sudanshu Pandey, Full Time

Qualification : M Sc (geo) Appointment/ : 20-MAR-17

Termination date

Manager

Name : Gopal Prajapati

Qualification : Foreman Certificate Holder

Appointment/ : 20-JAN-12

Termination date

| 6. | Date of approval of Mining | : | Existing rule 11 MCDR1988 | 18-FEB-98 |
|----|----------------------------|---|--------------------------------|-----------|
| | Plan/Scheme of Mining | | Mining Scheme rule 12 MCDR1988 | 13-JAN-03 |
| | | | Modif.approved Mining Scheme | 06-JUL-05 |
| | | | Mining Scheme rule 12 MCDR1988 | 02-FEB-07 |
| | | | Mining Scheme rule 12 MCDR1988 | 19-JUL-13 |
| | | | MP review under 17(1) MCR 2016 | 22-MAR-17 |
| | | | MP review under 17(1) MCR 2016 | 27-DEC-21 |

PART - II : OBSERVATION/COMMENTS OF INSPECTING OFFICERS

Exploration :

| Sl.No. | Item | Proposals | Actual work | F | Remarks |
|--------|---|--|---|-------------|---|
| 1a | Backlog of previous year | No exploration proposal during the previous year 2020-21. | None during t | he previous | No backlog of previous year. |
| 1b | Exploration over lease area for geological axis 1 or 2 | No proposal of exploration during the year 2021-22. | None during to 2021-22. | he year | Current inspection has been carried out for modification of RMP, lessee has been asked to submited entire lease area exploration proposal as per norms of MEMC Rules 2015 through scrutiny comments on MPAS portal. |
| 1c | Exploration Agencies and Expenditure in lakh rupees during the year | No proposal of Exploration Agency & expenditure during the year 2021-22. | None during to 2021-22. | he year | Nil |
| 1d | Balance area to be explored to bring Geological axis in 1 or 2 | No proposal on area to be explored to bring Geological axis in 1 or 2. | None during t | he year | Current inspection has been carried out for modification of RMP, lessee has been asked to submited entire lease area exploration proposal as per norms of MEMC Rules 2015 through scrutiny comments on MPAS portal. |
| 1e | Balance reserve as on 01/04/20 | No proposal in this regard. | Balance reser 1.04.2022 4.77109 milli | | Nil |

1f General remarks of inspecting officers on geology, exploration etc

Current inspection has been carried out for modification of RMP, lessee has been asked to submited entire lease area exploration proposal as per norms of MEMC Rules 2015 through scrutiny comments on MPAS portal.

Development :

| Sl.No. | Item | Propasals | Actual work | Remarks |
|--------|--|--|---|--|
| 2a | Location of development w.r.t.lease area | Development has been proposed in Block-A of lease area. | Development has been carried out in Block-A of lease area on proposed location. | Nil |
| 2b | Separate benches in topsoil, overburden and minerals (Rule 15) | Separate benches of OB & Mineral was proposed. | As per proposal | Nil |
| 2c | Stripping ratio or ore to OB ratio | 2021-22: 1:0.89 | 2021-22: 1:0.87 | ROM to OB Ratio |
| 2d | Quantity of topsoil generation in m3 | During the year 2021-22 total 50 T top soil generation proposed. | No top soil generated during the year 2021-22. | Nil |
| 2e | Quantity of overburden generation in m3 | 2021-22: 48612T | 2021-22: 39700Т | Nil |
| 2f | General remarks of inspecting officers on development of pit w.r.t. type of deposit etc | | | Mine development work is satisfactory. |

Exploitation:

| Sl.No. | Item | Propasals | Actual work | Remarks |
|--------|------|-----------|-------------|---------|
| | | | | |

| 3a | Number of pit proposed for production | Block-A,Pit-4 | Block-A,Pit-4 | Nil |
|----|--|---|--|---|
| 3b | Quantity of ROM mineral production proposed | 2021-22: 54505 T | 2021-22: 45485 T | Nil |
| 3с | Recovery of sailable/usable mineral from ROM production | 2021-22: 50468 T | 2021-22: 45485 T | Nil |
| 3d | Quantity of mineral reject generation | 2021-22: 4037T | 2021-22: Nil | No mineral reject reported during the year. |
| 3e | Grade of mineral rejects generation and threshold value declared. | Cao-30-33.51%, Mgo-2.4-11% | Not applicable as no mineral reject generated during the year. | Nil |
| 3f | Quantity of sub grade mineral generation. | No proposal. | No sub-grade generation. | NIL. |
| 3g | Grade of sub grade mineral generation | No proposal. | Not applicable as no sub-grade mineral generation. | NIL. |
| 3h | Manual / Mechanised method adopted for segregating from ROM | Manual Hand sorting of Dolomitic and interstitial clay. | As per proposal | Nil |
| 3i | Any analysis or beneficiation study proposed and carried out for sub grade mineral and rejects. | No proposal. | No beneficiation study carried out during the RY. | NIL. |
| 3j | Provision of drilling and blasting in mineral benches | No proposal of drilling and blasting. | Mineral is being broken by Rock Breaker. | NIL. |
| 3k | Provision of mining machineries in mineral benches | Rock Breaker, Excavator, dumper etc. | Rock Breaker, Excavator, dumper etc. | NIL. |
| 31 | Whether height of benches in overburden and mineral suitable for method of mining proposed in MP/SOM | 2 to 4 mts. | Height of the benches has been maintained as per proposal. | Nil |

| 3m | Total area covered under excavation/pits | | 12.24 hectare at the end of the 2021-22. | Nil |
|----|--|--|--|---|
| 3n | Ore to OB ratio for the pit/mine during the year. | 2021-22: 1:0.89 | 2021-22: 1:0.87 | ROM to OB Ratio |
| 30 | Total area put in use under different heads at the end of year | | 16.398 Hect. at the end of year 2021-22. | As per AR 2021-22. |
| 3р | Production of ROM mineral during the last five year period as applicable | | 2018-19=8140 T 2019-20=36737 T 2020-21=30629 T 2021-22=45485 T 2022-23=28592 T(up to | Nil |
| 3d | General remarks of inspecting officers on method of mining etc. | Opencast method of mining has been proposed. | Opencast method of mining is being practiced. | The open cast mechanized method has been adopted which is best suited to the type of deposit. |

Solid Waste Management - Dumping:

| Sl.No. | Item | Propasals | Actual work | Remarks |
|--------|--|--|---|---------|
| 4a | Separate dumping of topsoil, OB and mineral rejects (Rule 32,33) | dumping of OB & mineral | | Nil |
| 4b | Location of topsoil, OB and mineral reject dumps | waste proposed near pit 3 (western | Dumping of the waste observed near pit 3 (western side) as per proposal. No MR generation during the RY | Nil |

| 4c | Number of dumps within lease area and outside of lease area | One dump in Block-A. No proposal of waste dumping during RY in Block B & C. However, five waste dumps exist in in Block B & C. | One dump in Block-A, Five dumps in Block-B & C(unauthorized working). | Lessee has already informed to officials of the State Govt. for unauthorized working. |
|----|--|--|---|---|
| 4d | Location of dumps w.r.t. ultimate pit limit (Rule 16) | Outside UPL (Block-A) | Outside UPL (Block-A) | NIL. |
| 4e | Number of active and alive dumps. | One. | One. | Nil |
| 4f | Number of dead dumps. | 5 (Block B &C). | 5 (Block B &C). | NIL. |
| 4g | Number of dumps established. | No proposal. | Not applicable. | NIL. |
| 4h | Whether Retaining wall or garland drain all along dumps are there. | No proposal during the RY. | Garland drain observed at necessary places. | NIL. |
| 4i | Length of Retaining wall or garland drain all along dumps | No proposal. | No retaining wall construction during the RY. | Nil |
| 4j | Number of settling ponds | No proposal. | Not applicable. | NIL. |
| 4k | Specific comments of inspecting officer on waste dump management | | | No issue observed related to waste dumping. |

Solid Waste Management - Backfilling:

| Sl.No. | Item | Propasals | Actual work | Remarks |
|--------|---|---|--------------------------------|---------|
| 5a | Status of part or full extraction of mineral from mined out area before starting backfilling. | No proposal of backfilling during the RY. | Not applicable as no proposal. | NIL. |
| 5b | Area under backfilling of mined out area | No area matured for backfilling. | Not applicable. | NIL. |

| 5c | Concurrent use of topsoil for restoration or rehabilitation of mineral out area (Rule 32) | Top soil proposed to use for plantation purpose. | No top soil has been generated during the RY. | No top soil patch encountered during RY. |
|----|---|--|---|---|
| 5d | Total area fully reclaimed and rehabilitated | No proposal of full reclamation and rehabilitation | Not applicable. | No area matured for reclamation and rehabilitation. |
| 5e | General remarks of inspecting officers on backfilling and reclamation etc. | | | No area matured for reclamation and rehabilitation. |

Progressive Mine Clousre Plan:

| Sl.No. | Item | Propasals | Actual work | Remarks |
|--------|--|--|---|---|
| 6a | Whether Annual report on PMCP submitted on time and correctly. Rule 23 E(2). | As per rule 26 of MCDR, 2017 holder of mining lease shall submit PMCP report every year. | PMCP report for the year 2021-22 has been submitted. | PMCP report for the year 2021-22 submitted timely, however some discrepencies observed in submitted PMCP report hence violation of Rule 26(2) of MCDR 2017 issued vide letter dated 13.03.2023. |
| 6b | Area available for rehabilitation (ha). | No proposal | N/A | Nil |
| 6c | afforestation done (ha). | Waste dump: 0.1 hect with 50 saplings and waste land: 0.2 hect with 200 saplings. | Total 150 nos. sapling planted in the year 2021-22. Area of plantation not reported correctly in submitted PMCP report. | Violation of Rule 11(1) of MCDR 2017 issued for shorfall in plantation and Violation of Rule 26(2) of MCDR 2017 issued vide letter dated 13.03.2023 for discrepencies in submitted PMCP report. |

| 6d | No. of saplings planted during the year | 250 nos.(50 nos. over waste dum+200 nos. over virgin area) | 150 nos. | Violation of Rule 11(1) of MCDR 2017 issued for shorfall in plantation vide letter dated 13.03.2023. |
|----|--|--|--|--|
| бе | Cumulative no .of plants | No specific proposal given. | As per submitted PMCP report total 2900 nos. | Nil |
| 6f | Any other method of rehabilitation | No proposal | None | Nil |
| 6g | Cost incurred on watch and care during the year | No proposal. | Approximetly Rs. 10000 | Nil |
| 6h | Compliance on reclamation and rehabilitation by backfilling (i) Voids available for backfilling (Lx B x D | backfilling. | Area not matured for backfilling. | NIL. |
| 6i | Compliance on reclamation and rehabilitation by backfilling (ii) Voids filled by waste / tailings | No proposal. | Not applicable. | NIL. |
| 6j | Compliance on reclamation and rehabilitation by backfilling (iii)Afforestati on on backfilled area | No proposal. | Not applicable. | NIL. |
| 6k | Compliance on reclamation and rehabilitation by backfilling (iv) Rehabilitation by making water reservoir | No proposal. | Not applicable. | NIL. |
| 61 | Compliance on reclamation and rehabilitation by backfilling (v)any other specific means. | No any other specific proposal. | Not applicable. | NIL. |

| 6m | Compliance of rehabilitation of waste land within lease (i)afforestation | Total 200 number of saplings have been proposed to plant during the RY 2021-22. | Total 150 number of saplings have been planted in RY 2021-22. | Violation of Rule 11(1) of MCDR 2017 issued for shorfall in plantation vide letter dated 13.03.2023. |
|----|---|---|--|---|
| 6n | Compliance of rehabilitation of waste land within lease (ii)Area rehabilitation (ha) | 0.2 hect. | Not reported correctly in submitted PMCP report. | Some discrepencies observed in submitted PMCP report hence violation of Rule 26(2) of MCDR 2017 issued vide letter dated 13.03.2023. |
| 60 | Compliance of rehabilitation of waste land within lease (iii)Method of rehabilitation | Plantation. | Plantation. | NIL. |
| 6p | Compliance of environmental monitoring (core zone and buffer zone) | Provision for monitoring of environment parameter has been given. | Environment monitoring is being carried out in core and buffer zone. | NIL. |
| 6q | General remarks of inspecting officers on PMCP compliance and progressive closure operations etc. | | | Violation of Rule 11(1) of MCDR 2017 issued for shorfall in plantation and Violation of Rule 26(2) of MCDR 2017 issued vide letter dated 13.03.2023 for discrepencies in submitted PMCP report. |

Mineral Conservation:

| Sl.No. | Item | Propasals | Actual work | Remarks |
|--------|--|-----------|---|---------|
| 7a | ROM Mineral dispatch or grade-wise sorting within lease area | | All ROM mineral dispatched to captive cement plant. | Nil |
| 7b | Method of grade- wise mineral sorting i.e. manual or mechanical. | Manual | No sorting has been carried out in RY. | Nil |

| 7c | Different grade of mineral sorted out at mines. | tion of mineral reject | No sorting has been carried out in RY, all ROM mineral dispatched to captive cement plant. | Nil |
|----|--|------------------------|--|--|
| 7d | Any beneficiation process at mines . | No proposal | Not applicable | Nil |
| 7e | General remarks of inspecting officer on Mineral conservation and beneficiation issues | | | No issue observed related to mineral conservation. |

Environment:

| Sl.No. | Item | Propasals | Actual work | Remarks |
|--------|---|--|--|---------|
| 8a | Separate removal and utilization of topsoil (Rule 32) | | No top soil generated during RY. | Nil |
| 8b | Concurrent use or storage of topsoil | Top soil proposed to use for plantation purpose. | No top soil generated during RY. | Nil |
| 8c | Separate dumps for overburden, waste rock, rejects and fines (Rule 33) | Proposal given for separate dumping of waste & mineral reject. | Separate dumping of waste at designated place has been carried out. No mineral reject generated. | Nil |
| 8d | Use of overburden, waste rock, rejects and fines dumps for restoring the land to its original use | No proposal. | Not applicable. | NIL. |

| 8e | Phased restoration, reclamation and rehabilitation of lands affected by mining operations (Pits, dumps etc) | No proposal. | Not applicable. | NIL. |
|----|---|--|----------------------------|--|
| 8f | Baseline information on existence of plantation and additional plantation done (Rule 41) | During the year 2021-22 total 250 nos. sapling proposed. | | Violation of Rule 11(1) of MCDR 2017 issued for shorfall in plantation vide letter dated 13.03.2023. |
| 8g | Survival rate | No proposal. | 63% | As reported in AR 2021-22. |
| 8h | Water sprinkling on roads to control airborne dust | sprinkling | Water sprinkling observed. | Nil |
| 8i | General remarks of inspecting officer on aesthetic beauty in and around mines area | | | The general aesthetic beauty of the mine is satisfactory. |

Compliance of Rule 45:

| Sl.No. | Item | Propasals | Actual work | Remarks |
|--------|---|-------------------------------|--|---------|
| 9a | Status of submission of Monthly and Annual returns | of MCDR, 2017 | Monthly and annual returns have been submitted for the RY. | NIL. |
| 9b | Scrutiny of Annual return for information on Mining Engineer, Geologist and Manager | Manager, | Mining Engineer, Geologist and Manager has been appointed in the mine. | Nil |
| 9c | - | Dumps=1.948 ha Infrastructure | land use appears to be | Nil |

| 9d | Scrutiny of Annual return on afforestation | 150 and | During the year 2021-22 total 250 nos. sapling proposed within lease area whereas actual plantation has been carried out 150 nos. within lease area. | Violation of Rule 11(1) of MCDR 2017 issued for shorfall in plantation vide letter dated 13.03.2023. |
|----|---|----------------------------|--|--|
| 9e | Scrutiny of Annual return on mineral reject generation (Grade and quantity) | No mineral reject reported | Detail seems corrected. | Nil |
| 9f | Scrutiny of Annual return on ROM stock and/or graded ore | wise stock | Details seems corrected. | Nil |
| 9g | Scrutiny of Annual return on sale value, Ex. Mine price and production cost | _ | Seems corrected | Nil |
| 9h | Scrutiny of Annual return on fixed assets | | Contractual work, hence, no fixed asset. | Nil |
| 9k | Scrutiny of Annual return on mining machineries | | Correct details furnished. | Nil |

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

| Violation | n observed | Show couse position | |
|-------------------|-------------------------|---------------------|-------------------------|
| Rule NO. | Issued on Compliance on | Rule NO. | Issued on Compliance on |
| MCDR17 Rule 11(1) | 13-MAR-23 | | |
| MCDR17 Rule 26(2) | 13-MAR-23 | | |

Date: (D R GURJAR)

Indian Bureau of Mines