

**INDIAN BUREAU OF MINES
MINERALS DEVELOPEMMENT AND REGULATION DIVISION**

MCDR INSPECTION REPORT

Ajmer regional office

Mine file No : RAJ/PALI-36/WOL-CAL-01

Mine code : 63RAJ26001

- (i) Name of the Inspecting : **G021**) **D R GURJAR**
Officer and ID No.
- (ii) Designation : Sr. Asst. Contrl. Mines
- (iii) Accompanying mine : Shri U.P. Pahadia, Nominated Owner
Official with
Designation
- (iv) Date of Inspection : 14-JAN-23
- (v) Prev.inspection date : 28-DEC-21

PART-I : GENERAL INFORMATION

1. (a) **Mine Name** : **KHERATARLA**
- (b) **Registration NO.** : **IBM/462/2011**
- (c) Category : A Mechanised
- (d) Type of Working : Opencast
- (e) Postal address
State : RAJASTHAN
District : UDAIPUR
Village : KHERA
Taluka : KOTRA
Post office : TEJAWAS
Pin Code : 307021
FAX No. : 0294-2494200
E-mail : info@wolkem.com
Phone : 0294-2494200
- (f) Police Station : Kotra
- (g) First opening date : 19-MAR-76
- (h) Weekly day of rest : SUN
2. Address for : Khertala Wollastonite Mine,
correspondance Uparla Khera and Nichla Khera, Tehsil: Bali kotr
District: PAlI and Udaipur (Rajasthan)
3. (a) Lease Number :
- (b) Lease area :
- (c) Period of lease :
- (d) Date of Expiry :
4. Mineral worked : WOLLASTONITE Main

5. Name and Address of the

Lessee : WOLKEM INDUSTRIES LTD
SALUMBER HOUSE AMBAVGARH
UDAIPUR UDAIPUR RAJASTHAN
Phone:0297-222313
FAX :0297-222097

Owner : Sri U.P. Pahadiya
Wolkem Industries Ltd.,
Post Box 21, E-101, Mewar
Industrial area, Madri,
UDAIPUR RAJASTHAN
Phone: 7340064511
FAX : 02942494608

Agent : Sri U.P. Pahadiya
Wolkem Industries Ltd.,
Post Box 21, E-101, Mewar
Industrial area, Madri,
UDAIPUR RAJASTHAN
Phone: 7340064511
FAX : 02942494608

Mining Engineer

Name : Sri M.K. Pitaliya, Full Time
Qualification : BE Mining
Appointment/ : 18-JUN-19 15-SEP-21
Termination date

Mining Engineer

Name : Lalit Singh Chundawat, Full Time
Qualification : B.E. (Mining)
Appointment/ : 15-SEP-21
Termination date

Geologist

Name : Sri Ganpat Singh, Full Time
Qualification : M.Sc-Tech (Applied Geology)
Appointment/ : 11-MAY-16
Termination date

Manager

Name : Sri Amresh Kumar
Qualification : BE Mining
Appointment/ : 30-NOV-19
Termination date

6. Date of approval of Mining	:	Existing rule 11 MCDR1988	08-APR-93
Plan/Scheme of Mining	:	Mining Scheme rule 12 MCDR1988	04-FEB-03
	:	Mining Scheme rule 12 MCDR1988	24-JUL-13
	:	MP modif under MCR 1960	14-JUN-16
	:	MP review under 17(1) MCR 2016	08-DEC-20
	:	MP modif under 17(3) MCR 2016	23-JUL-21
	:	MP modif under 17(3) MCR 2016	15-FEB-22

PART - II : OBSERVATION/COMMENTS OF INSPECTING OFFICERS

Exploration :

Sl.No.	Item	Proposals	Actual work	Remarks
1a	Backlog of previous year	No proposal during the previous year 2020-21.	Not applicable	Nil
1b	Exploration over lease area for geological axis 1 or 2	During the year 2021-22 exploration was proposed by way 01 Bore Holes (210m).	During the year 2021-22, Total 06 Bore holes having 1214m drilling has been carried out.	Nil
1c	Exploration Agencies and Expenditure in lakh rupees during the year	Exploration Agency & Expenditures- Not specified.	Exploration agency- M/s Mastan Baba Drilling Solution Expenditures-Rs. 8 lacs	NIL.
1d	Balance area to be explored to bring Geological axis in 1 or 2	No proposal given during the year.	Entire potential mineralized area has been explored under G1/G2 level.	As per recent approved Mod RMP, Mineralised area- 24.30 Hect (Area under G-22.70 hect, G2-2.27 Hect.) Proposal of exploration drilling incorporated during the year 2022-23 to convert G2 area into G1 leve.
1e	Balance reserve as on 01/04/20	The position of reserve as on 01.04.2021 is 2.60 million tonnes as per approved Mod RMP (approved on 15.02.2022)	The position of reserve as on 01.04.2022 2.5 million tonnes.	Nil
1f	General remarks of inspecting officers on geology, exploration etc			No issue observed related to geology & exploration.

Development :

Sl.No.	Item	Proposals	Actual work	Remarks
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2a	Location of development w.r.t.lease area	East Deposit- E 315298 to 314850 & N- 2740145 to 2739745	Mine development carried out within proposed area.	Nil
2b	Separate benches in topsoil, overburden and minerals (Rule 15)	No proposal of top soil generation. Benches have been proposed in mineral and waste both.	No top soil generation. Separate benches have been observed in mineral and benches.	Nil
2c	Stripping ratio or ore to OB ratio	2021-22: 1:5.87	2021-22: 1:5.71	Nil
2d	Quantity of topsoil generation in m3	No proposal of top soil generation.	No top soil has been generated.	NIL.
2e	Quantity of overburden generation in m3	2021-22: 293360	2021-22: 246190	Nil
2f	General remarks of inspecting officers on development of pit w.r.t. type of deposit etc	Opencast method of the development has been proposed.	Development carried out through open cast method as proposed.	Development has been carried out through open pit. Two pits have been developed for mineral production.

Exploitation:

Sl.No.	Item	Propasals	Actual work	Remarks
3a	Number of pit proposed for production	01	01	Nil
3b	Quantity of ROM mineral production proposed	2021-22: Wollastonite - 169114 T	2021-22: Wollastonite - 145500 T	Nil
3c	Recovery of sailable/usable mineral from ROM production	2021-22: Wollastonite - 169114 T	2021-22: Wollastonite - 145500 T	Nil
3d	Quantity of mineral reject generation	No proposal.	No mineral reject generation during RY. However, material below threshold value containing low grade Wollastonite is stacked for future use.	Nil

3e	Grade of mineral rejects generation and threshold value declared.	Not applicable as no proposal of mineral reject generation. The threshold value of Wollastonite mineral is declared as 35% CaSiO ₃ .	Not applicable as no mineral reject generation during the RY.	NIL.
3f	Quantity of sub grade mineral generation.	Sub-grade mineral is proposed to blend with high grade mineral.	Entire Sub-grade mineral blended with high grade mineral.	Nil
3g	Grade of sub grade mineral generation	Between 30 to 70% CaSiO ₃ .	Between 30 to 70% CaSiO ₃ .	Nil
3h	Manual / Mechanised method adopted for segregating from ROM	Manual method.	Manual method of segregation of mineral from ROM.	Nil
3i	Any analysis or beneficiation study proposed and carried out for sub grade mineral and rejects.	No specific proposal of beneficiation study for sub-grade mineral/reject during RY.	No beneficiation study carried out during RY.	NIL.
3j	Provision of drilling and blasting in mineral benches	Wagon drill/jack hammer drill has been proposed along with ANFO explosive.	Drilling and blasting in mineral benches are being practiced as per proposal.	NIL.
3k	Provision of mining machineries in mineral benches	Back hoe, shovel, Blast hole drill, Dozer, Dumper, JCB Loader, Explosive van, etc.	Back hoe, shovel, Blast hole drill, Dozer, Dumper, JCB Loader, Explosive van, etc.	NIL.
3l	Whether height of benches in overburden and mineral suitable for method of mining proposed in MP/SOM	Height of the benches have been proposed to 8 mts.	Height of the benches has been maintained as per proposal. .	NIL.
3m	Total area covered under excavation/pits	24.30 hect.	24.30 hect.	Up to year 2021-22.

3n	Ore to OB ratio for the pit/mine during the year.	2021-22: 1:5.87	2021-22: 1:5.71	Nil
3o	Total area put in use under different heads at the end of year	Total- 33.3234 ha	Total- 33.3234 ha	Up to year 2021-22.
3p	Production of ROM mineral during the last five year period as applicable	2016-17: 182865MT 2017-18: 185291MT 2018-19: 193612MT 2019-20: 201512MT 2020-21: 200241MT 2021-22: 169114MT 2022-23: 140408MT	2017-18: 140829MT 2018-19: 179323MT 2019-20: 121642MT 2020-21: 103590MT 2021-22: 145500MT 20223-23: 98386MT (up to Dec 2022)	Nil
3q	General remarks of inspecting officers on method of mining etc.	Opencast method of mining has been proposed for the RY.	Opencast method mining was practiced during the RY.	Opencast mechanised mining method adopted which is best suited to the type of deposit. In future proposal of U/G mining method also proposed.

Solid Waste Management - Dumping:

Sl.No.	Item	Propasals	Actual work	Remarks
4a	Separate dumping of topsoil, OB and mineral rejects (Rule 32,33)	No proposal of top soil and Mineral Reject generation. Waste is proposed to dump separately.	Top soil and Mineral Reject has not been generated. Generated waste dumped separately.	NIL.
4b	Location of topsoil, OB and mineral reject dumps	No proposal of top soil generation. Waste dumping proposed over waste dump-F	No top soil and mineral reject generation. Waste dumping as per proposal.	Nil

4c	Number of dumps within lease area and outside of lease area	Within lease area -3 (D, E, & F). An old waste dump has been observed outside of the lease area. No proposal of waste dumping outside of the lease area.	Within lease Area - 3 (D, E, & F). An old waste dump observed outside lease area.	Nil
4d	Location of dumps w.r.t. ultimate pit limit (Rule 16)	Proposed outside ultimate pit limit.	Done as per proposal.	NIL.
4e	Number of active and alive dumps.	Two.	Two.	NIL.
4f	Number of dead dumps.	One.	One.	Nil
4g	Number of dumps established.	No specific proposal.	Waste dump-D has been stabilized partly.	Nil
4h	Whether Retaining wall or garland drain all along dumps are there.	Proposal given.	Retaining wall & garland drain observed at necessary places.	Nil
4i	Length of Retaining wall or garland drain all along dumps	Retaining wall- 330 m Garland drains - 604 m	Retaining wall- 320 m Garland drains - 610 m	Howeve the figures of garland drain proposed & achieved during the year 2021-22 are not correct, hence violation of Rule 26(2) of MCDR 2017 issued vide letter dated 30.01.2023.
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
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5a	Status of part or full extraction of mineral from mined out area before starting backfilling.	After full extraction of mineral backfilling proposed.	During the year 2021-22, backfilling has been carried out as per proposal.	NIL.
5b	Area under backfilling of mined out area	1.0929 hect.	1.0929 hect.	NIL.
5c	Concurrent use of topsoil for restoration or rehabilitation of mineral out area (Rule 32)	No proposal of top soil generation.	No top soil generation.	NIL.
5d	Total area fully reclaimed and rehabilitated	No proposal of full reclamation and rehabilitation of mine out area during the year.	Not applicable.	NIL.
5e	General remarks of inspecting officers on backfilling and reclamation etc.			Backfilling of mined out area has been carried out as per proposal during the reporting year 2021-22.

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 before 1st day of July every year.	PMCP report for the year 2021-22 has been submitted.	NIL.
6b	Area available for rehabilitation (ha) .	0.49 hect.	0.49 hect.	Nil
6c	afforestation done (ha).	2021-22: 0.49 hect.	2021-22: 0.49 hect.	Nil
6d	No. of saplings planted during the year	2021-22: 500 nos.	2021-22: 800 nos.	Nil

6e	Cumulative no .of plants	Not specified	Total 34399 nos. up to year 2021-22.	However in submitted PMCP report, cummulative plantation figures at the end of year 2021-22 are not correct, hence violation of Rule 26(2) of MCDR 2017 issued vide letter dated 30.01.2023.
6f	Any other method of rehabilitation	Other than plantation, no specific proposal of any other method of rehabilitation	Plantation has been carried out as per proposal.	NIL.
6g	Cost incurred on watch and care during the year	Not specified	Not applicable.	NIL.
6h	Compliance on reclamation and rehabilitation by backfilling (i) Voids available for backfilling (Lx B x D	150mx73mx37m	150mx73mx37m	Nil
6i	Compliance on reclamation and rehabilitation by backfilling (ii) Voids filled by waste / tailings	1.0929 hect.	1.0929 hect.	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 making reservoir.	Not applicable	NIL.

6l	Compliance on reclamation and rehabilitation by backfilling (v) any other specific means.	No any other specific proposal.	Not applicable as no proposal.	NIL.
6m	Compliance of rehabilitation of waste land within lease (i) afforestation	It was proposed to plant 500 numbers of saplings.	During the year 800 number of saplings have been planted.	Nil
6n	Compliance of rehabilitation of waste land within lease (ii) Area rehabilitation (ha)	0.49 hect	0.49 hect.	Nil
6o	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 of environment monitoring stations has been given.	Environment monitoring parameters are found to be within permissible limit.	Nil
6q	General remarks of inspecting officers on PMCP compliance and progressive closure operations etc.			following discrepancies were observed in submitted report: 1) Cumulative plantation figures at the end of year 2021-22 are not correct. 2) The figures of garland drain proposed & achieved during the year 2021-22 are not correct. hence violation of Rule 26(2) of MCDR 2017 issued vide letter dated 30.01.2023.

Mineral Conservation:

Sl.No.	Item	Propasals	Actual work	Remarks
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7a	ROM Mineral dispatch or grade-wise sorting within lease area	Grade wise sorting within lease area has been proposed.	Grade wise sorting of ROM has been observed in the lease area.	Nil
7b	Method of grade-wise mineral sorting i.e. manual or mechanical.	Manual.	Manual.	Nil
7c	Different grade of mineral sorted out at mines.	Wollastonite above 35% CaSiO3 and below 35 % CaSiO3.	Wollastonite above 35% CaSiO3 and below 35 % CaSiO3.	Nil
7d	Any beneficiation process at mines .	No proposal of any beneficiation at Mine site.	No beneficiation process observed at the mine.	NIL.
7e	General remarks of inspecting officer on Mineral conservation and beneficiation issues			There is no issue related to mineral conservation. Mineral/material below threshold value containing low grade Wollastonite is stacked for future use.

Environment:

Sl.No.	Item	Propasals	Actual work	Remarks
8a	Separate removal and utilization of topsoil (Rule 32)	No proposal of top soil generation during the year as no fresh area has been proposed for excavation.	No top soil generated during the year.	NIL.
8b	Concurrent use or storage of topsoil	No proposal of top soil generation.	Not applicable as no top soil generated during RY.	NIL.
8c	Separate dumps for overburden, waste rock, rejects and fines (Rule 33)	Yes.	Dumping carried out as per proposal.	NIL.

8d	Use of overburden, waste rock, rejects and fines dumps for restoring the land to its original use	Use of overburden/ waste rock for backfilling aslo during the reporting year.	As per proposal.	NIL.
8e	Phased restoration, reclamation and rehabilitation of lands affected by mining operations (Pits, dumps etc)	Backfilling proposal given of mined out pit.	Backfilling has been carried out as per proposal.	Nil
8f	Baseline information on existence of plantation and additional plantation done (Rule 41)	It was proposed to plant 500 numbers of saplings during the year.	During the year 800 number of saplings have been planted.	NIL.
8g	Survival rate	No specific proposal of survival rate.	Survival rate for the reporting year was around 90%.	As per AR 2021-22
8h	Water sprinkling on roads to control airborne dust	To control the air born dust particle, water sprinkling has been proposed.	Water sprinkling has been observed during the mine inspection.	NIL.
8i	General remarks of inspecting officer on aesthetic beauty in and around mines area			Aesthetic beauty is staisfactory in and around mine area.

Compliance of Rule 45:

Sl.No.	Item	Propasals	Actual work	Remarks
9a	Status of submission of Monthly and Annual returns	As per rule 45 of MCDR, 2017, holder of mining lease should submit Monthly and Annual return.	Monthly and Annual returns are being submitted timely	Nil

9b	Scrutiny of Annual return for information on Mining Engineer, Geologist and Manager	Mining Engineer - Mr. Lalit Singh Chundawat. Geologist - Mr. Ganpat Singh. Manager - Mr. Amresh Kumar	Details are correct	AR 2021-22.
9c	Scrutiny of Annual return on land use pattern for area under pits, reclaimed area, dumps etc.	Covered under current (O/C)Workings 24.300, Used for waste disposal- 4.020, Occupied by plant, buildings, residential, welfare buildings & roads-5.003 etc.	The information furnished in respect of the land use pattern in annual return appears to be correct.	Nil
9d	Scrutiny of Annual return on afforestation	Number of trees planted during the year - 800 Survival rate in percentage - 90%	Seems corrected	Nil
9e	Scrutiny of Annual return on mineral reject generation (Grade and quantity)	No information on mineral reject generation.	No mineral reject generation.	Nil
9f	Scrutiny of Annual return on ROM stock and/or graded ore	ROM Wollastonite closing stock: 135768.570 tonnes.	The information furnished appears to be correct.	NIL.
9g	Scrutiny of Annual return on sale value, Ex. Mine price and production cost	Ex- Mine price & Production cost: 1381.00	Found in order.	NIL.
9h	Scrutiny of Annual return on fixed assets	The value of fixed asset furnished is Rs. 11359428	The information furnished appears to be correct.	NIL.

9k	Scrutiny of Annual return on mining machineries	Air Compressor, Back Hoe, Blast Hole Drill, Dozer, Dumper, Explosive Van, Generator, Rock Drill, Shovel, Water Tanker, Wheel Loader etc.	The information furnished in respect of mining machineries appears to be corrected.	Nil
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Details of violations observed during current inspection and compliance position of violation pointed out

Violation observed			Show couse position		
Rule NO.	Issued on	Compliance on	Rule NO.	Issued on	Compliance on
MCDR17	Rule 26(2)	31-JAN-23			
MCDR17	Rule 31(4)	31-JAN-23			

Date :**(D R GURJAR)**

Indian Bureau of Mines