

MCDR INSPECTION REPORT

1.0 GENERAL

SN	Particulars	Details
1	Name of inspecting officer & designation	B.L.Gurjar DCOM Suresh Kumar DCOM (COMCZ) for initiation
2	Date of inspection	23.11.2016
3	Name of the Mine	ParaswaniMimestone Mines
4	Total Lease Area (Ha) with breakup of Non-forest and forest land	997.355 hect. Non- forest
5	Mine code	38MPR28017
6	IBM Registration Number under rule 45 of MCDR, 1988	IBM/441/2011
7	Name of the lessee, Address, phone, email and fax number	UltraTech Cement limited Hirmi Cement Works PO – Hirmi, Dist. BalodaBazar- Bhatapara Phone - 07726281217/18/19/20/21 Fax - 07726-281572
8	Village	Hirmi
8	Taluka/Mandal /District	Simga
10	State	Chhattisgarh
11	Post office & PIN	Hirmi, 493195
12	Nearest police station	Suhela
13	Nearest Railway station	Tilda
14	Date of Grant of Mining Lease	15.12.1992
15	Date of Execution	22.02.1993
16	Date of opening of Mine	01.04.1993
17	Date of first Renewal, if applicable and its period & expiry	22.02.2013 for 30 years and valid up to 21.02.2043
18	Date of second Renewal, if applicable and its period & expiry	NA
19	Date of submission of renewal application if Mining Operations are continuing under deemed extension	09.02.2012
20	Name of the Nominated Owner with Address, phone, email, fax number and date of appointment.	Mr. K.K. Maheshwari Ahura Centre, B Wing, 2nd floor, Mahakali Caves Road Andheri (E) Mumbai 400093. DOA: 03.08.2016
21	Name of the Mine Agent with Address, phone, email, fax number and date of appointment	Shri V. D. Mali UltraTechCement Ltd. Hirmi Cement Works, PO – Hirmi, Dist. BalodaBazar- Bhatapara 09826909505

		Phone - 07726281217/18/19/20/21 Fax - 07726-281572 vijaykumar.mali@adityabirla.com DOA:15.03.2016
22	Name of the Mines Manager with Address, phone, email, fax number and date of appointment in mines	Shri O. R. Khelkar UltraTech cement Ltd. Hirmi Cement Works, PO – Hirmi, Dist. BalodaBazar- Bhatapara 09826300229 Phone - 07726281217/18/19/20/21 Fax - 07726-281572 omprakash.khelkar@adityabirla.com DOA: 24.01.2014
23	Name of the Mining Engineer, Qualification and total experience with Address, phone, email, fax number and date of appointment in mine	Abishek Bharatdwaj B. E Mining UltraTech cement Ltd. Hirmi Cement Works, PO – Hirmi, Dist. BalodaBazar- Bhatapara 09826429066 Phone - 07726281217/18/19/20/21 Fax - 07726-281572 abhishek.bharadwaj@adityabirla.com DOA: 23.11.2012
24	Whether Geologist and Mining Engineer appointed in mines satisfy the rule 42 & carrying out their duties as per rule 43 & 44.	Yes
25	Date of Approval of Mining Plan/Modified Mining Plan with five-year period and specific condition in approval letter, if any.	Date of Approval of Modified Mining Plan 12.08.2015. and valid up to March 2018.
26	Date of Approval of Scheme of Mining/Modified Scheme of Mining with five-year period and specific condition in approval letter, if any.	Date of Approval of Scheme of Mining 28.08.2008
27	Mineral(s) granted in lease and proved for mining	Limestone
28	Method of Mining (Opencast, Underground)	Opencast
29	Category (Fully Mechanised, Others or Manual)	Fully mechanised
30	Captive/Non Captive	Captive mine

Scientific Mining: Compliance of proposals of approved mining plan/scheme of mining.

1.0 Exploration

SN	Item	Proposals	Actual work	Remarks
1a	Backlog of previous year	Nil	Nil	
1b	Exploration over lease area for Geological axis 1 or 2.	G1	G1	
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 01.04.2016		221.71 Million ton (111)	
1f	General remarks of inspecting officer on geology, exploration etc.	Area is fully explored on 15m x 150m grid.		

2.0 Development

SN	Item	Proposals	Actual work	Remarks
2a	Location of development w.r.t. lease area	North pit Mix Bench(282.5-274.5 RL) Ist Bench(274.5-262.7 RL) II nd Bench (262.7-258.1 RL) IIIrd Bench (258.1-250 RL) IV th Bench (250-242 RL) South pit Mix Bench(284-276 RL) Ist Bench(276-268RL)	North pit Mix Bench(281-273 RL) Ist Bench(273-265 RL) II nd Bench (265-257 RL) IIIrd Bench (257-250 RL) South pit Mix Bench(284-280 RL) Ist Bench(280-272RL)	
2b	Separate benches in topsoil, overburden and mineral (Rule 15)	OB bench- 1 nos Mineral bench-5 Nos	OB bench- 1 nos. Mineral bench-4 Nos.	
2c	Stripping ratio or ore to OB ratio	1:0.20	1:0.357	
2d	Quantity of topsoil generation in m ³	20135	38008	
2e	Quantity of overburden generation in m ³	325163	574138	
2f	General remarks of inspecting officer on development of pit w.r.t. type of deposit etc.	Work is being carried out at proposed location.		

3.0 Exploitation

SN	Item	Proposals	Actual work	Remarks
3a	Number of pits proposed for production	02	02	
3b	Quantity of ROM mineral production proposed	44,73,000 T	31,75,761 T	
3c	Recovery of salable/usable mineral from ROM production		30,83,282 T	
3d	Quantity of mineral reject generation	273000 MT	92,479 T	
3e	Grade of mineral reject generation and threshold value declared	<34% CaO	<30 % CaO	
3f	Quantity of sub-grade mineral generation.	-	14000 t	
3g	Grade of sub-grade mineral generation.	-	34-40% CaO	
3h	Manual / Mechanised method adopted for segregating from ROM	Mechanised	Mechanised by wobber and screening plant.	
3i	Any analysis or beneficiation study proposed & carried out for sub-grade mineral and reject	-	Regular analysis of sub-grade mineral and reject are being done.	
3j	Provision of drilling & blasting in mineral benches	Blast hole the primary drilling is done by 150 mm dia crawler mounted DTH drills. Specing-6 M. Burden- 4 M. Depth of hole 8.5 M Subgrade- 0.5 M Blasting is done in staggered pattern with SME, ANFO and NONEL.	As proposed.	
3k	Provision of mining machineries in mineral benches.	Shovel dumper combination .	Shovel PC 1250 CK300-6.5 CUM Dumper 60 tonnes.	
3l	Whether height of benches in overburden and mineral suitable for method of mining proposed in MP/SOM	Yes the height of OB bench- 0-4.5 m Ore bench 6-8 m	Top slicing of mix bench with 3.5 mtr height and OB bench-	

			0-4.5 mt. Ore bench 4-8 mt. height has been maintained.	
3m	Total area covered under excavation/pits	7.90 Ha.	6.108 Ha.	FY 15-16
3n	Ore to OB ratio for the pit/mine during the year	1:0.20	1:0.357	FY 15-16
3o	Total area put in use under different heads at the end of year	Pit- 7.9 Ha Waste/reject- 2.18Ha Others- Backfilling 3.98 Ha	Pit- 6.108 Ha Waste/reject- 3.98Ha Backfilling- 1.51 ha	
3p	Production of ROM mineral during last five-year period, as applicable (in MT)	2011-12- 4200000 2012-13- 4200000 2013-14- 4473000 2014-15- 4473000 2015-16- 4473000	41,59790 38,23560 33,91295 38,98517 31,75761	
3q	General remarks of inspecting officer on method of mining etc.	Production is within proposed target.		

4.0 Solid Waste Management-Dumping

SN	Item	Proposals	Actual work	Remarks
4a	Separate dumping of topsoil, OB & mineral reject (Rule 32, 33)	Concurrent use of top soil proposed and separate dump for has been proposed.	Concurrent use of top soil is being done and separate dumping od OB & reject is being done.	
4b	Location of topsoil, OB & mineral reject dumps	Dump X :- 976.5 to - 1121.78 Y: 1546 to 1648.9 RL : 289 to 299 Peripheral dumping X : 560 to 888.3 Y: 2015.6 to 2221.5 RL : 280 to 286	Dump X : -971.2 to - 1121.2 Y: 1456 to 1759.7 RL : 289 to 293 Peripheral dumping X : 722.2 to 888.3 Y: 2085.3 to 2224.5 RL : 280 to 286	
4c	Number of dumps within lease area and outside lease area	03 nos within lease area	03 within lease area.	
4d	Location of dumps w.r.t. ultimate pit limit (Rule 16)	Covered in 4b	As per proposal	
4e	Number of active & alive dumps	02	02	

4f	Number of dead dumps	01	01	
4g	Number of dumps stabilised	01	01	
4h	Whether Retaining wall or garland drain all along dumps are there	Garland drain provided	Garland drain provided on outside	
4i	Length of Retaining wall or garland drain all along dump	Length of garland drain all along dump is 700mtr.	Length of garland drain all along dump is 710mtr.	
4j	Number of settling ponds	01	01	
4k	Specific comments of inspecting officer	Concurrent backfilling is to be adopted as area has already matured for this purpose.		

5.0 Solid Waste Management-Backfilling

SN	Item	Proposals	Actual work	Remarks
5a	Status on part or full extraction of mineral from mined out area before starting backfilling	Backfilling has been proposed in mined out area.	Backfilling in progress.	
5b	Area under backfilling of mined out area	3.98 Ha	3.49 Ha	
5c	Concurrent use of topsoil for restoration or rehabilitation of mined out area (Rule 32)	yes	yes	
5d	Total area fully reclaimed & rehabilitated	3.98 Ha		
5e	General remarks of inspecting officer on backfilling, reclamation etc	Concurrent backfilling is to be fully adopted even for overburden as area has already matured for this purpose.		

6.0 Progressive Mine Closure Plan

SN	Item	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.	Yes	Yes	
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	3.98 1.22 3050	Nil 0.80 4530 182446	

	v) Any other specific method of rehabilitation vi) Cost incurred on watch & care during the year		155443/-	
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	350 x 170 X 30 3.98 Ha. Nil	1.51 Ha Nil	
6d	Compliance of Rehabilitation of waste land within lease . i) Afforestation ii) Area rehabilitated (ha) iii) Method of rehabilitation	NA Concurrent backfilling and plantation on dump.	Concurrent backfilling and plantation on dump.	
6e	Compliance of Environmental monitoring (core zone & buffer zone)	Regularly monitored	As proposed	
6f	General remarks of inspecting officer on PMCP compliance & progressive	Step proposed in PMCP are found to be in order in implementation.		

7.0 Mineral Conservation

SN	Item	Proposals	Actual work	Remarks
7a	ROM Mineral dispatch or grade-wise sorting within lease area	Note applicable	Based on software & blast hole sampling result different grade material has been marked at site/map/blend plan.	
7b	Method of grade-wise mineral sorting i.e. manual or mechanical	NA	NA	
7c	Different grade of mineral sorted out at mines	Based on software different grade	Based on software & blasthole	

		material has been marked in slice plan.	sampling result different grade material has been marked at site/map/blend plan.	
7d	Any beneficiation process at mines	As such, limestone beneficiation is not required except for screening the clayey-soil in the top bench	Screening (dry Separation) is being done to separate clayey-soil & shale in the limestone before crushing. By using pet cock the quality requirement of plant was decreases hence screen generation was also decreases during the year.	
7e	General remarks of inspecting officer on Mineral conservation & beneficiation issues	Blending and screen are being adopted in this regards by wobbler and screen.		

8.0 Environment

SN	Item	Proposals	Actual work	Remarks
8a	Separate removal and utilization of topsoil (Rule 32)	Yes	Separate removal and utilization of topsoil is being done	
8b	Concurrent use or storage of topsoil	Yes	concurrent utilization of topsoil is being done	
8c	Separate dumps for overburden, waste rock, rejects and fines (Rule 33)	Planned	Separate dumps for overburden/waste rock and rejects.	
8d	Use of overburden, waste rock, rejects and fines dumps for restoring the land to its original use	planned	Part of waste rock, rejects are being used foe concurrent backfilling for restoring the land to its original use.	
8e	Phased restoration, reclamation and rehabilitation of lands affected by mining	As per mining plan.	Being done.	

	operations (Pits, dumps etc)			
8f	Baseline information on existence of plantation & additional plantation done (Rule 41)		Total of 182446 nos plantation in 57.31 hect area up to March 2016. Year-wise	
8g	Survival rate	100%	80%	
8h	Water sprinkling on roads to control airborne dust	28KL and 8KL taker proposed for Water sprinkling on roads	Water sprinkling on roads is being done by 28KL and 8KL tanker to control airborne dust.	
8i	General remarks of inspecting officer on aesthetic beauty in and around mines are	Steps towards environmental improvement taken .		

9.0 Compliance of Rule 45

SN	Item	COMMENTS		Remarks
9a	Status of submission of Monthly and Annual returns	M.R. Submitted upto– October -2016 A.R. submitted upto- 2015-16		
SN	Item	Details GIVEN in A.R.	Observation of I/Officer	Remarks
9b	Scrutiny of Annual return for information on Mining Engineer, Geologist and Manager	Provided worked for 306 days in a year with 95 average daily employment.	Found in order	
9c	Scrutiny of Annual return on land use pattern for area under pits, reclaimed area, dumps etc.	Area already excavated -3.0 ha. Opencast- 146.128 ha Dump-13.98 ha Back filled -3.4	Found in order	
9d	Scrutiny of Annual return on afforestation	4530 within lease and 2680 outside of lease area.	NII	
9e	Scrutiny of Annual return on mineral reject generation (Grade & quantity)	Production-3083282 tonnes	NII	
9f	Scrutiny of Annual return on ROM stock and/or graded ore	Stock –nil	NII	
9g	Scrutiny of Annual return on sale value, Ex. Mine price &	Cost of production Rs-251/t. Captive use	NII	

	production cost			
9i	Scrutiny of Annual return on fixed assets	given	Nil	
9k	Scrutiny of Annual return on mining machineries .	given	Nil	

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

Violation of rule 16(3) of MCDR 1988 is pointed out.- Dumping of overburden/waste is not being concurrently carried out in already worked out area and new area is being used for this purpose. Dumping of overburden/waste shall be backfilled as far as possible.