INDIAN BUREAU OF MINES MINERALS DEVELOPMENT AND REGULATION DIVISION

MCDR INSPECTION REPORT

Gandhinagar regional office

Mine file No : RAJ/CHT/LST-12 Mine code : 38RAJ09011

(i) Name of the Inspecting : ${\tt G021}$) DATA RAM GURJAR

Officer and ID No.

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

(iii) Accompaning mine : Shri Somnath Banerjee, AVP(Mines) & Mine Manager

Official with Designation

(iv) Date of Inspection : 03-MAR-22
(v) Prev.inspection date : 18-JUN-21

PART-I : GENERAL INFORMATION

(a) Mine Name : ARNIYA JOSHI

(b) Registration NO. : IBM/378/20111

(c) Category : A Mechanised

(d) Type of Working : Opencast

(e) Postal address

State : RAJASTHAN

District : CHITTORGARH

Village : ARNIYA JOSHI

Taluka : NIMBAHERA

Post office : ARNIYA JOSHI

Pin Code : 312617

FAX No. : 022-66306510 (F)

E-mail : somnath.banerjee@nuvoco.in

Phone : 01477-225155

(f) Police Station : Nimbaheda(g) First opening date : 14-MAY-10

(h) Weekly day of rest : SUN

2. Address for : VILLAGE ARNIYA JOSHI

correspondance TEHSIL NIMBAHERA

DIST. CHITTORGARH

3. (a) Lease Number : RAJ3940

(b) Lease area : 1476.43

(c) Period of lease : 50

(d) Date of Expiry : 13-MAY-60

4. Mineral worked : LIMESTONE Main

5. Name and Address of the

Lessee : Novaco Vistas Corp Ltd.

Equinex Business Park, Tower 3, East Wing, 4 th Floor, Off Bandra Kula Road, LBS Marg, Kurla Mumbai MUMBAI (SUBURBAN)

MAHARASHTRA

Phone:02267692500 FAX :02266306510

Owner : Jayakumar Krshnaswamy

Equinox Business Park, Tower3, East Wing, 4th Floor, Off Bandra Kurla Road, Kurla (west), Mumbai

MUMBAI (SUBURBAN)

MAHARASHTRA

Phone: 02267692500 FAX : 02266306510

Agent : Sanjay Kumar Tyagi

Nuvoco Vistas Corp. Ltd, Village - Bhawaliya, Tehsil - Nimbahera, Chittorgarh CHITTORGARH RAJASTHAN Phone: 9685013131

FAX : 9685013131

Mining Engineer

Name : Sri Mahendra Kumar Vyas, Full Time

Qualification : BE Mining Appointment/ : 21-APR-18

Termination date

Geologist

Name : Sri Satyanjay Kumar Chaturvedi, Full Tim

Qualification : M. Tech in Geology

Appointment/: 08-JUL-19 30-AUG-21

Termination date

Geologist

Name : Krishan Kumar Sharma, Full Time

Qualification : M. Sc (Tech) in Geology

Appointment/ : 30-AUG-21

Termination date

Manager

Name : Somnath Banerjee

Qualification : B.E.(MIN) Appointment/ : 10-AUG-15

Termination date

6. Date of approval of Mining : Mining Scheme rule 12 MCDR1988 24-APR-15 Plan/Scheme of Mining : MP modif under 17(3) MCR 2016 15-JAN-18 MP review under 17(1) MCR 2016 24-JAN-20

PART - II : OBSERVATION/COMMENTS OF INSPECTING OFFICERS

Exploration :

Sl.No.	Item	Proposals	Actual work	Remarks
1a	Backlog of previous year	2019-20: 24 Bore Holes (1200 mtrs)	2019-20: 18 holes (881 mtrs.)	The drilling of remaining 6 bore holes has been carried out during the year 2020-21.
1b	Exploration over lease area for geological axis 1 or 2	2020-21: 8 Holes (400 mtrs)	Not carried out during the year 2020-21, however it was carried out in the year 2021-22.	Violation of Rule 11(1) of MCDR 2017 waas issued vide letter dated 30.06.2021 during the previous inspection.
1c	Exploration Agencies and Expenditure in lakh rupees during the year	Not specfied in mining plan.	Agency- DSS Infra, Kolhapur Expenditures: 2020-21 - Rs. 90000 (For backlog drilling of FY 2019-20)	Nil
1d	Balance area to be explored to bring Geological axis in 1 or 2	During the year 2020-21 it was proposed that 30.03 hect. area will be covered under G1 level.	2020-21 - 6 holes (300 mtrs - Backlog of FY 2019-20)	Exploration was proposed to cover 115.3 hect. area under G1 level during the year 2020-21 to 20222-23.
1e	Balance reserve as on 01/04/20	No specific proposal given.	Balance reserves as on 01.04.2021: Reserves - 63.952 million tonnes.	Nil
1f	General remarks of inspecting officers on geology, exploration etc			The exploration drilling proposed during the year 2020-21 has been completed during the year 2021-22.

Development :

Sl.No.	Item	Propasals	Actual work	Remarks
2a	Location of development w.r.t.lease area		2020-21 : 469497-469718 E 2730830-2731456 N	All working within proposal limit in Pit.

2b	Separate benches in topsoil, overburden and minerals (Rule 15)	There is no proposal for separate benches for top soil and overburden. Proposal of 3 Benches for Limestone	There are no existing benches for top soil and overburden at present. 3 Benches developed for Limestone	Nil
2c	Stripping ratio or ore to OB ratio	2020-21: 1:0	2020-21: 1:0	No overburden generation.
2d	Quantity of topsoil generation in m3	2020-21 : 174 m3	2020-21 : 145 m3	Top soil generated during the year 2020-21 used for plantation purpose.
2e	Quantity of overburden generation in m3	No proposal	No OB generated.	Nil
2f	General remarks of inspecting officers on development of pit w.r.t. type of deposit etc			Mine development is satisfactory.

Exploitation:

Sl.No.	Item	Propasals	Actual work	Remarks
3a	Number of pit proposed for production	One	One	Nil
3b	Quantity of ROM mineral production proposed	2020-21 : Limestone - 200000 MT	2020-21 : Limestone - 37071.98 MT	Nil
3c	Recovery of sailable/usable mineral from ROM production	100%	100%	Nil
3d	Quantity of mineral reject generation	2020-21 : No proposal	Nil	Nil
3e	Grade of mineral rejects generation and threshold value declared.	2020-21 : No proposal	Nil	Nil
3f	Quantity of sub grade mineral generation.	No proposal	Not generated.	Nil

3g	Grade of sub grade mineral generation	No sub grade generation proposal	None	Nil.
3h	Manual / Mechanised method adopted for segregating from ROM	No proposal	None	ROM is directly dispatched to crusher located at cement plant.
3i	Any analysis or beneficiation study proposed and carried out for sub grade mineral and rejects.	No Proposal	Not applicable	Nil
3j	Provision of drilling and blasting in mineral benches	The drilling of blast holes is being done by down the hole drill machines of 115 mm. diameter operated by compressed air. For blasting slurry cap sensitive explosives, ANFO and SME to be used.	Drilling and blasting as per the proposal.	Nil
3k	Provision of mining machineries in mineral benches	1.Drill machine 115 mm. dia -1 2.Air Compressor 450 cfm -1 3.Excavator 2.4 cum capacity -1 4.Excavator 0.9 cum capacity -1 (standby) 5.Dumpers 16 T capacity - 3 6.Dumpers 22 T capacity - 3 7.Dozer - 1 8.Rock Breaker - 1	1. Drill machine 115 mm. dia - 1 2. Air Compressor 450 cfm - 1 3. Excavator 2.8 cum capacity - 1 4. Dumpers 16 T capacity - 6 5. Dumpers 22 T capacity - 3 5. Dozer - 1 7. Rock Breaker - 1	Nil

31	Whether height of benches in overburden and mineral suitable for method of mining proposed in MP/SOM	Yes	As per proposal	Nil
3m	Total area covered under excavation/pits	Total- 12.85 ha (At the end of plan period i.e. 2024-25)	11.90 ha. up to (31.03.2021)	Nil
3n	Ore to OB ratio for the pit/mine during the year.	1:0	1:0	Nil
30	Total area put in use under different heads at the end of year	At the end of Plan Period: Pit: 12.85 ha, Waste Dump: Nil, Storage of Top Soil: Nil Infrastructure (Office, ANFO mixing Shed, WB, Magazine etc): 2.00 ha.,Roads: 4.00 ha.,Green Belt: 16.0 ha	2020-21: Pit : 11.50 ha Waste Dump: Nil Storage of Top Soil: Nil Infrastructure (Office, ANFO mixing Shed, WB, Magazine etc): 2.00 ha. Roads: 4.00 ha. Green Belt: 15.82	Nil
3p	Production of ROM mineral during the last five year period as applicable	2016-17: 350508T 2017-18: 70000 T 2018-19: 200000T 2019-20: 200000T 2020-21: 200000T 2021-22: 200000 T	2016-17 : 135151 T 2017-18 : 45201.15 T 2018-19 : 160720.30 T 2019-20 : 142574.59 T 2020-21 : 37071.98 T 2021-22 : 72654.41T (Till Feb 2022)	Nil
3q	General remarks of inspecting officers on method of mining etc.			Method of mining is suitable 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)		f No dump of topsoil, OB & Mineral reject observed.	No dumping of Top soil, top soil generated was used for plantation simultaneously.

4b	Location of topsoil, OB and mineral reject dumps	No proposal	No dump observed.	Nil
4c	Number of dumps within lease area and outside of lease area	No proposal	None	Nil
4d	Location of dumps w.r.t. ultimate pit limit (Rule 16)	No proposal	Not applicable	Nil
4e	Number of active and alive dumps.	No proposal	Nil	Nil
4f	Number of dead dumps.	No proposal	None	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	None	Nil
4i	Length of Retaining wall or garland drain all along dumps	No proposal	Not applicable	Nil
4ј	Number of settling ponds	No proposal	None	Nil
4k	Specific comments of inspecting officer on waste dump management			No waste dumps was observed.

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 backfilling proposal during the year 2020-21.	Nil	Nil
5b	Area under backfilling of mined out area	No backfilling proposed	Nil	Nil

5c	Concurrent use of topsoil for restoration or rehabilitation of mineral out area (Rule 32)	For plantation	Topsoil generated during mining is simultaneously used for plantation.	Nil
5d	Total area fully reclaimed and rehabilitated	No proposal given for the year 2020-21.	Nil	Nil
5e	General remarks of inspecting officers on backfilling and reclamation etc.			No backfilling & reclamtion proposed nor carried out during the repeorting year 2020-21.

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).	It should be submitted up to 1 July for the previous financial year.	Submitted on time for the year 2020-21.	Nil
6b	Area available for rehabilitation (ha) .	No proposal	None	Nil
6c	afforestation done (ha).	Area not specified. Gap filling proposal given.	Plantation on 0.27 hect. of new area & carried out for Gap filling.	No proper care & maintainance of plantation was observed during the inspection for the plantation carried out during the year 2020-21 & 2021-22, hence violation of Rule 11(1) of MCDR 2017 issued vide letter dated 05/04/2022.

6d	No. of saplings planted during the year	500 nos.	2370 nos.	No proper care & maintainance of plantation was observed during the inspection for the plantation carried out during the year 2020-21 & 2021-22, hence violation of Rule 11(1) of MCDR 2017 issued vide letter dated 05/04/2022.
6e	Cumulative no .of plants	Not specified	32513 nos. (up to year 2020-21.)	Nil
6f	Any other method of rehabilitation	No proposal	None	Nil
6g	Cost incurred on watch and care during the year	Not specified	Approx Rs. 2.0 lakhs	Nil
6h	Compliance on reclamation and rehabilitation by backfilling (i) Voids available for backfilling (Lx B x D	No proposal	Nil	Nil
6i	Compliance on reclamation and rehabilitation by backfilling (ii) Voids filled by waste / tailings	No proposal	None	Nil
6j	Compliance on reclamation and rehabilitation by backfilling (iii)Afforestati on on backfilled area	No proposal	None	Nil
6k	Compliance on reclamation and rehabilitation by backfilling (iv) Rehabilitation by making water reservoir	No proposal	None	Nil

61	Compliance on reclamation and rehabilitation by backfilling (v)any other specific means.	No proposal	None	Nil
6m	Compliance of rehabilitation of waste land within lease (i)afforestation	500 nos. within ML	2370 nos. within ML	Nil
6n	Compliance of rehabilitation of waste land within lease (ii)Area rehabilitation (ha)	Not specified	0.27 New area & Gap filling of existing plantation.	Nil
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)	Regular monitoring as per EC conditions.	Regular monitoring is being carried out.	Nil
6q 	General remarks of inspecting officers on PMCP compliance and progressive closure operations etc.			PMCP compliances satisfactory.

Mineral Conservation:

Sl.No.	Item	Propasals	Actual work	Remarks
7a	ROM Mineral dispatch or grade-wise sorting within lease area	grade	All ROM Cement grade limestone feed to captive cement plant.	Nil
7b	Method of grade- wise mineral sorting i.e. manual or mechanical.	No proposal	None	Nil
7c	Different grade of mineral sorted out at mines.	No proposal	Not applicable	Nil

7d	Any beneficiation process at mines	No proposal	None	Nil
7e	General remarks of inspecting officer on Mineral conservation and beneficiation issues			No issue was observed related to mineral conservation.

Environment:

Sl.No.	Item	Propasals	Actual work	Remarks
8a	Separate removal and utilization of topsoil (Rule 32)		As per proposal	Nil
8b	Concurrent use or storage of topsoil	Plantation	Plantation	Nil
8c	Separate dumps for overburden, waste rock, rejects and fines (Rule 33)	No proposal	No dumps was observed.	Nil
8d	Use of overburden, waste rock, rejects and fines dumps for restoring the land to its original use	No proposal	None	Nil
8e	Phased restoration, reclamation and rehabilitation of lands affected by mining operations (Pits, dumps etc)	No such proposal given for the year 2020-21.	None	Nil

8f	Baseline information on existence of plantation and additional plantation done (Rule 41)	year 2020-21 total 500nos. plantation was proposed for gap filling	During the year 2020-21 total 2370 nos. sapling planted for gap filling within existing plantation within mining lease area & over 0.27 hectare new area.	Nil
8g	Survival rate	Not specified	70%	As per AR 2020-21.
8h	Water sprinkling on roads to control airborne dust	during	Water sprinkling was observed.	Nil
8i	General remarks of inspecting officer on aesthetic beauty in and around mines area			Aesthetic beauty is good 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	Annual retrun submitted up to yera 2019-20. Monthly return submitted up to Feb 2022. AR submitted for the year 2020-21.	Timely	submission.	Nil
9b	Scrutiny of Annual return for information on Mining Engineer, Geologist and Manager	Somnath	Detail	are correct.	AR 2020-21.

9c	Scrutiny of Annual return on land use pattern for area under pits, reclaimed area, dumps etc.	Pit: 11.50 ha Waste Dump: Nil Storage of Top		Nil
9d	Scrutiny of Annual return on afforestation	2370 nos. plants	Seems to be correct.	Nil
9e	Scrutiny of Annual return on mineral reject generation (Grade and quantity)	No reject generation reported.	Correct.	Nil
9f	Scrutiny of Annual return on ROM stock and/or graded ore	No stoct reported.	Seems to be correct.	Nil
9g	Scrutiny of Annual return on sale value, Ex. Mine price and production cost		Seems to be correct.	Nil
9h	Scrutiny of Annual return on fixed assets	Assets (in	Common with SRK mines located near lease area of same lessee.	Nil
9k	Scrutiny of Annual return on mining machineries	_	Found correct.	Nil

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 11(1)	05-APR-22		

Date :

(DATA RAM GURJAR)

Indian Bureau of Mines