#### INDIAN BUREAU OF MINES MINERALS DEVELOPMENT AND REGULATION DIVISION

#### MCDR inspection REPORT

#### Bangalore regional office

Mine file No : KNT/BLR/FE/413/BNG Mine code: 30KAR03123

(i)Name of the Inspecting : A101 ) ARUN KUMAR

Officer and ID No.

(ii) Designation : Deputy Controller Mines

(iii) Accompaning mine : 1.Allum Prashant-Mine Owner 2.A P Sing-Mines Manager

Official with

Designation

(iv) Date of Inspection : 11/01/2018 Prev.inspection date : 17/01/2015 (v)

PART-I : GENERAL INFORMATION

(a) Mine Name : SANJEEVARAYANA KOTE

(b) Registration NO. : IBM/4514/2011

: A Other than Fully Mech. (C) Category

(d) Type of Working Opencast

(e) Postal address

> State : KARNATAKA District BELLARY

Village SANJEEVARAYANA KOTE

Taluka BELLARY Post office BELLARY

Pin Code

08392-277845 /08392267666,! FAX No.

E-mail : apmines@yahoo.co.in

08392-267666/274282,083922 Phone

: BELLARY RURAL (f) Police Station

First opening date : 01/09/2001 (g)

Weekly day of rest (h) : SUN

Address for : 11th ward, GADIGI PALACE,

correspondance CAR STREET,

BELLARY, KARNATAKA-583 101.

3. : KAR1200 (a) Lease Number (b) Lease area : 42.89

> Period of lease : 20 (C)

(d) Date of Expiry : 01/12/2020

Mineral worked 4. : IRON ORE Main 5. Name and Address of the

Lessee : ALLUM PRASHANT

GADIGI PALACE, CAR STREET, BELLARY, BELLARY KARNATAKA Phone:08392-274282/ 267666 FAX :08392-277845 /267666

Owner : ALLUM PRASHANT

GADIGI PALACE, CAR STREET, BELLARY, BELLARY KARNATAKA

Phone: 08392-274282 FAX : 08392-277845

Mining Engineer

Name : Anil Kumar P.S., Full Time

Qualification : BE Mining Appointment/ : 01/04/2013

Termination date

Manager

Name : A.P.SINGH

Qualification : II nd CLASS CERTIFICATE

Appointment/ : 01/03/2000

Termination date

PART - II : OBSERVATION/COMMENTS OF INSPECTING OFFICERS

# Exploration :

Sl.No.	Item	Proposals	Actual	work	Remarks
1a	Backlog of previous year	No proposal	NA		In the previous scheme 12 RC drill holes were drilled with a total depth of 400 mts
1b	Exploration over lease area for geological axis 1 or 2		17.07	mineralized area- Ha G1- 9.26 ha	-
1c	Exploration Agencies and Expenditure in lakh rupees during the year	No proposal	NA		Rs. 18 Lakhs has been spent on exploration, carried out by Chaithnya Geo Lynx.in the previous plan period
1d	Balance area to be explored to bring Geological axis in 1 or 2	7.81 На	Nil		Exploration is proposed in 4th year of scheme period 2019-20
1e	Balance reserve as on 01/04/20		4,751 01.04	,441 Tons as on .2017	
1f	General remarks of inspecting officers on geology, exploration etc				There is no proposal for exploration in the reporting year. However 7.81 Ha is the balance area to be explored and is proposed in 2019-20.

## Development :

Sl.No.	Item	Propasals	Actual work	Remarks
2a	Location of development w.r.t.lease area	N 1664214-N 1664315,E 706962-E 707323	Development within the proposed grids.	-
2b	Separate benches in topsoil, overburden and minerals (Rule 15)	-	Separate benches in OB maintained	OB -1 Ore -2 Bench
2c	Stripping ratio or ore to OB ratio	1 :0.15	1 : 0.425	Due to lower recovery

2d	Quantity of topsoil generation in m3	No proposal	NA	No generation of top soil, working within broken up area.
2e	Quantity of overburden generation in m3	9253 Tons	11500 Tons	Low recovery
2f	General remarks of inspecting officers on development of pit w.r.t. type of deposit etc	_	_	The developments were done within the proposed grids with stripping ratio of 1:0.425. Higher stripping ratio due to lower recovery.

# Exploitation:

Sl.No.	Item	Propasals	Actual work	Remarks
3a	Number of pit proposed for production	One	One pit	320M x 40 M x 12 M Approx.pit dimensions
3b	Quantity of ROM mineral production proposed	61371 MT	27000 MT	No market
3с	Recovery of sailable/usable mineral from ROM production	61371 MT	27000 MT	No market & lower recovery
3d	Quantity of mineral reject generation	No proposal	1200 MT	Stocked separately ( crushed fines < 6mm size is mineral rejects)
3e	Grade of mineral rejects generation and threshold value declared.	No proposal	38 Fe%	-
3f	Quantity of sub grade mineral generation.	No proposal	NA	-
3g	Grade of sub grade mineral generation	No proposal	NA	-

3h	Manual / Mechanised method adopted for segregating from ROM	Manual/Mechani zed	Manual/Mechanized (Crusher & Screener)	Manual with deployment of labors by hand sorting & picking.Mechanical ly using Jaw crusher 50 TPH for Hard lumps (50- 80mm)
3i	Any analysis or beneficiation study proposed and carried out for sub grade mineral and rejects.	NO proposal	NA	Study was conducted previously in ore dressing laboratory, IBM
3j	Provision of drilling and blasting in mineral benches	Proposed	Deep hole drilling & Blasting is done through authorized contractors	Wagon drill is used of 110mm dia, Slurry cartridges of 83 mm is used with shock tube detonation system. Spacing - 3mts , burden 2 mts and s.g drilling-0.5 mts
3k	Provision of mining machineries in mineral benches	Proposed, Excav ator-1, Trucks- 4, Drill Machine - 1, Water tanker -1, Crusher & Screener -1	Mining Machineries used as proposed	-
31	Whether height of benches in overburden and mineral suitable for method of mining proposed in MP/SOM	Yes, proposed,6 Mts Height & 8 Mts Width	6 Mts Height& 4 Mts Width	The width of the benches observed less then height of benches, violation pointed out.
3m	Total area covered under excavation/pits	0.860 На	0.870 На	Total broken up area -2.280
3n	Ore to OB ratio for the pit/mine during the year.	1: 0.15	1 : 0.425	low recovery

30	Total area put in use under different heads at the end of year	2.28,Dumps -	Mining -2.28 Ha,Dumps - 03.12Ha ,Infrastructure, workshop etc - 7.80 Ha Others-29.22 Ha	
3p	Production of ROM mineral during the last five year period as applicable	2014-15: 90000 2015-16: 90000	2012-13: Nil 2013-14: 4000 2014-15: 10800 2015-16: 19000 2016-17: 27000	Actual production within the proposed limits. Mine started on 29.11.2013
3q	General remarks of inspecting officers on method of mining etc.			The mineral is worked from one pit as per proposal. Drilling & blasting is carried out in OB bench. The productions are within the quantity approved in the document.

#### Solid Waste Management - Dumping:

Sl.No.	Item	Propasals	Actual work	Remarks
4a	Separate dumping of topsoil, OB and mineral rejects (Rule 32,33)	-	Separate dumping done on 3 Dump -D1	-
4b	Location of topsoil, OB and mineral reject dumps		OB dumped at the earmarked grids as per the proposal.	-
4c	Number of dumps within lease area and outside of lease area		Presently only lnos active dumps D1,	One inactive dump inside the lease area.

4d	Location of dumps w.r.t. ultimate pit limit (Rule 16)	Outside UPL	Dumping is Outside UPL	-
4e	Number of active and alive dumps.	1 nos proposed	One	-
4f	Number of dead dumps.	1 in proposal	One	-
<b>4</b> g	Number of dumps established.	1 nos	1 nos	Stabilized by plantation
4h	Whether Retaining wall or garland drain all along dumps are there.	Yes, proposed	Retaining wall and Garland drain are in place.	_
4i	Length of Retaining wall or garland drain all along dumps	Inactive Dump:AD RW-1 - 100 m,AD GD 1 - 120 m Active dump:TW-2 - 511 m,PD GD 1 - 571 m,SMCD 3 nos,LBCD 4 nos	Active dump:PD RW-1 - 511 m,PD GD 1 - 571 m,SMCD 3 nos,LBCD 4 nos	Completed as per proposal,
4j	Number of settling ponds	No proposal	NA	-
4k	Specific comments of inspecting officer on waste dump management	_	_	Location of the waste dump is as per the proposal. Inactive dump is stabilized by plantation. Retaining wall & garland drain constructed as proposed

# 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	NA	-
5b	Area under backfilling of mined out area	No proposal	NA	-

5c	Concurrent use of topsoil for restoration or rehabilitation of mineral out area (Rule 32)	No proposal	NA	Mineral persists at depth and hence no proposal
5d	Total area fully reclaimed and rehabilitated	No Proposal	NA	-
5e	General remarks of inspecting officers on backfilling and reclamation etc.			There was no proposal for backfilling in the plan period. None of the areas of mined out pits were matured for backfilling due to occurrence of mineral at depth.

#### 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).		Annual report on PMCP not sent	Violation pointed out
6b	Area available for rehabilitation (ha) .	No proposal	NA	-
6h	Compliance on reclamation and rehabilitation by backfilling (i) Voids available for backfilling ( Lx B x D	No proposal	NA	-
61	Compliance on reclamation and rehabilitation by backfilling (v)any other specific means.	No proposal	NA	-
6m	Compliance of rehabilitation of waste land within lease (i)afforestation	No proposal	NA	-

бр	Compliance of environmental monitoring (core zone and buffer zone)	Environmental monitoring (core zone & buffer zone) Done. Air monitoring stations:Core zone- 5,Buffer -3 Water monitoring: Core zone- 1,Buffer -2 Noise monitoring:Core zone- 5,Buffer -3	All the environmental parameters were observed within permissible limits
бq	General remarks of inspecting officers on PMCP compliance and progressive closure operations etc.		PMCP activities were carried out as envisaged in the approved document and plantation done. Environmental monitoring of air, water & noise done.

### Mineral Conservation:

Sl.No.	Item	Propasals	Actual work	Remarks
7a	ROM Mineral dispatch or grade-wise sorting within lease area	Grade wise sorting proposed within the lease area.	Grade wise sorting done within the lease area.	-
7b	Method of grade-wise mineral sorting i.e. manual or mechanical.		Manual/Mechanical sorting adopted	Manual with deployment of labors by hand sorting & picking. Mechanical ly using Saiahaji Jaw crusher 50 TPH for Hard lumps (50-80mm)
7c	Different grade of mineral sorted out at mines.	No proposal	Lumps & Fines < 55 % Fe	-
7d	Any beneficiation process at mines .	No Proposal	NA	-

7e General remarks
of inspecting
officer on
Mineral
conservation and
beneficiation
issues

Mineral conservation is taken care. The mineral reject generated is stacked separately which is having +38%Fe .Lumps and fines are sorted by dry screening in the mines.

#### Environment:

Sl.No.	Item	Propasals	Actual work	Remarks
8a	Separate removal and utilization of topsoil (Rule 32)	No Proposal	No generation of top soil	Work is carried out in broken up area.
8b	Concurrent use or storage of topsoil	No proposal	NA	Earlier generated topsoil is used for plantation
8c	Separate dumps for overburden, waste rock, rejects and fines (Rule 33)	Separate OB dump proposed	Separate OB dump maintained	-
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 and rehabilitation of lands affected by mining operations (Pits, dumps etc)	No proposal	NA	
8f	Baseline information on existence of plantation and additional plantation done (Rule 41)	0.97 ha with 2525plantation	Additional plantation done on 0.97 Ha	40% survival rate
8g	Survival rate	No proposal	40%	-

8h	Water sprinkling Proposition roads to control airborne dust	asures in places	One water tankers of 5000 L capacity used for dust suppression.
8i	General remarks of inspecting officer on aesthetic beauty in and around mines area		Plantations have been done in the lease area. Water tankers of 5000 Lts deployed for suppression of dust .Greenery is maintained in & around the lease area.

# Compliance of Rule 45:

Sl.No.	Item	Propasals	Actual work	Remarks
9a	Status of submission of Monthly and Annual returns		MR submitted up to Dec 2017 AR submitted on 26/08/2017	
9b	Scrutiny of Annual return for information on Mining Engineer, Geologist and Manager	Manager- A P Sing Mininig Engineer-Anil Kumar PS Geologist (I) - Jaganmohan Reddy	Manager,ME & Geologist available as per AR	Notice of appointment of manager and mining engineer has not been sent. Violation pointed out
9c	Scrutiny of Annual return on land use pattern for area under pits, reclaimed area, dumps etc.	Current workings- 2.280 Ha Waste Disposal	Appeared to be correct	
9d	Scrutiny of Annual return on afforestation		Appeared to be correct	

9e	Scrutiny of Annual return on mineral reject generation (Grade and quantity)	mineral rejects with	Appeared to be correct
9f	Scrutiny of Annual return on ROM stock and/or graded ore	OS- 4600Tons	Appeared to be correct
9g	Scrutiny of Annual return on sale value, Ex. Mine price and production cost	Rs. 695/ton Cost of Production -	Appeared to be correct
9h	Scrutiny of Annual return on fixed assets	Rs. 474312/-	Appeared to be correct
9k	Scrutiny of Annual return on mining machineries	Generator -1	All the Machinery used in the mine is not filled in AR.

# 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)	01/02/2018		
MCDR17 Rule 26(2)	01/02/2018		

Date: (ARUN KUMAR)

Indian Bureau of Mines