Submission of six monthly reports on status of compliance of the conditions stipulated in Environment Clearance .
Reference:
1. EC letter no. J-11015/389/2006-IA.II (M) Dated 25.06.2007.
2. EC letter no. J-11015/384/2012-IA. II(M) Dated 12/12/2014.
3. Amendment in EC letter no . J-11015/384/2012-IA. II(M) Dated 26/05/2016.
4. EC letter no. J-11015/384/2012-IA. II(M) Dated 23/06/2021.

Gpil Environment to: iro.raipur-mefcc, EC Compliance Chhattisgarh 20-06-2023 12:50

Cc: Sanjay Srivastava

Dear Sir,

With reference to the above letters, we are submitting herewith the status of progress on compliance of the conditions stipulated in Environment Clearances granted vide EC letter no. J-11015/389/2006-IA.II (M) Dated 25.06.2007, EC letter no. J-11015/384/2012-IA. II(M) Dated 12/12/2014 & Amendment in EC letter no. J-11015/384/2012-IA. II(M) Dated 26/05/2016 and EC letter no. J-11015/384/2012-IA. II(M) Dated 23/06/2021 for Iron Ore Mines at Village - Kachche, Tehsil - Bhanupratapur, Distt. - Kanker (C.G.) of Godawari Power & Ispat Limited at Siltara - Raipur, for the **period of Oct, 2022 to Mar, 2023**.

Aridongri Iron Ore Mines Six Monthly EC compliance status report Oct, 22 to Mar, 23_11zon.pdf

This is for your kind information and necessary record please .

Regards,
Environment Management System - GPIL

HIRA
GODAWARI POWER & ISPAT

428/2, Phase-1, Industrial Area, Siltara,
Raipur – 493111, Chhattisgarh, India
T: +91 771 4082186 | F: +91 771 4082333 | M: +91 97524 99619

स्वच्छ भारत
एक कदम स्वच्छता की ओर

HIRA
GODAWARI POWER & ISPAT

Great Place To Work. Certified DEC 2021-DEC 2022 INDIA

File No. GPIL/EMS/23-24/ 289

Date: 01.06.2023

To
The Regional Officer,
Ministry of Environment, Forest & Climate Change
Integrated Regional Office, Aranya Bhawan
North Block, Sector-19
Naya Raipur, Atal Nagar,Chhattisgarh- 492002
Email ID - iro.raipur-mefcc@gov.in

Subject: Submission of six monthly reports on status of compliance of the conditions stipulated in Environment Clearance.

Reference:

1. EC letter no. J-11015/389/2006-IA.II (M) Dated 25.06.2007.
2. EC letter no. J-11015/384/2012-IA. II(M) Dated 12/12/2014.
3. Amendment in EC letter no. J-11015/384/2012-IA. II(M) Dated 26/05/2016.
4. EC letter no. J-11015/384/2012-IA. II(M) Dated 23/06/2021.

Dear Sir,

With reference to the above letters, we are submitting herewith the status of progress on compliance of the conditions stipulated in Environment Clearances granted vide EC letter no. J-11015/389/2006-IA.II (M) Dated 25.06.2007, EC letter no. J-11015/384/2012-IA. II(M) Dated 12/12/2014 & Amendment in EC letter no. J-11015/384/2012-IA. II(M) Dated 26/05/2016 and EC letter no. J-11015/384/2012-IA. II(M) Dated 23/06/2021 for Iron Ore Mines at Village - Kachche, Tehsil - Bhanupratapur, Distt. - Kanker (C.G.) of Godawari Power & Ispat Limited at Siltara - Raipur, for the **period of Oct, 2022 to Mar, 2023**.

This is for your kind information and necessary record please.

Thanking you,

Yours faithfully,
For, **GODAWARI POWER & ISPAT LTD.**

Saya
01/06/23
(Authority Signature)

SIX MONTHLY COMPLIANCE REPORT

PART-I: DATA SHEET

1	Project Type: River-valley/ Mining / Industry / Thermal / Nuclear/Other (Specify)	Mining
2	Name of the project	Environmental Clearance for Aridongri Iron Ore Mine of M/s Godawari Power and Ispat Limited for enhancement of iron ore production from 1.405 MTPA to 2.35 MTPA (Iron Ore 1.8 MTPA & BMQ 0.55 MTPA), Dolerite OB 3.949 MTPA, interburden (IB) 3.071 MTPA (Total Excavation 9.37 MTPA) along with setting up of Banded Magnetite Quartizite (BMQ) Beneficiation plant of 0.6 MTPA capacity, 250 TPH Iron Ore Screening Plant with magnetic separator for processing of low grade material and 2 MTPA Dolerite Crushing & Screening Plant in 2 modules of 1 MTPA, within the existing mining lease of 138.96 Ha at Village Kachche, Tehsil Bhanupratppur, District Uttar Baster (Kanker), Chhattisgarh
3	Clearance Letter(s)/OM No. and date	F.No. J-11015/339/2006-IA.II(M) dated 25.06.2007 F. No. J-11015/384/2012.IA.II(M) Dated 12.12.2014 and 26.05.2016 & F. No. J-11015/384/2012.IA.II(M) dated 23.06.2021
4	Location	
	a. District (s)	Uttar Bastar (Kanker)
	b. State (s)	Chhattisgarh
	c. Latitude/ Longitude	N 20°24'09.33642" to N 20°25'01.5145"/ E 81°03'33.73692" to E 81°04'13.28954"
5	Address for correspondence	
	a. Address of the Concerned Project Chief Engineer (With Pin Code & Telephone/ Telex/ Fax Numbers)	Mr. Ganga Ram Verma, VP – Mines& Agent Kachche Ari Dongri Iron Ore Mines, Village Kachche, Tehsil Bhanupratappur, District Kanker (C.G.) Mob. No. 7004502568
6	Salient Features	Iron Ore Captive Mining
	a. of the project	Area: 138.96 ha. (Amalgamated lease area) Highest Latitude- 503 Meter Lowest Latitude- 405 Meter

		Average Ground RL- 454 Meter
	b. of the environmental management plans	1. Solid waste management • Dumping of OB at Designated places • Proper terracing of OB Dumps 2. Existing land use planning 3. Afforestation and landscape development 4. Air Pollution and Measure and Control • Wet drilling at mines • Regular water sprinkling at mines, haul roads, crushing & screening plant, dispatch road etc. 5. Water Pollution Control • Water harvesting is being done through recharge pond, settling ponds etc.. • Retaining walls and garland drains have been provided at the toe of Dumps and also along the haul roads etc. • Series of Settling pond inter-connected with garland drains have been provided to arrest total suspended solids. 6. Noise Pollution measure by taking average day/night reading and providing ear muff where ever applicable. 7. Control blasting is being done and NONEL are being used to keep the maximum charge per delay to a minimum for keeping the ground vibration level i.e. PPV within the permissible limit. There is no fly rocks. 8. Periodical health camps are being organizedfor employees 9. Socio-economic measures have been undertaken by providing 90% employment to local people
7	Break-up of the project area	
	a. Submergence Area: Forest & Non-Forest	Forest Area: 127.40 Hectare, Non-Forest Land : 11.56 Hectare (Forest Compartment: Kachche RF 608)
	b. Other	
	c. Total Plot Area	138.96 ha.
	d. Built-up Area (Including Road)	16.11 ha.
	e. Open Space available	80.310 ha.
	f. Green belt area	42.54 ha.
8	Break-up of the Project affected population with enumeration of those losing houses/dwelling units only, agricultural land only, Both dwelling units & agricultural land and landless laborers/artisans. a. SC, ST/Adivasis b. Others	NA

9	Financial Details	
	a. Project cost as originally planned and subsequent revised estimates and the year of price reference	6147 Lakhs (As per EC)
	b. Allocations made for environmental management plans with item wise and year-wise breakup.	EMP Cost: -

Sl. No.	Environmental Protection Measures	Capital Cost (Rs. In lakhs)	Recurring Cost (Rs. In lakhs/yr)
1	**Air Pollution Control Measures** Dry fog Dust Suppression Systems at BMQ Beneficiation Plant, Dolerite C&S Plant and 250 tph Screening Plant	20	1
2	**Water Pollution Control Measures**		6.41
	Construction of Garland drain	1.709	
	Construction of Retaining Wall	136.952	
	Construction of Settling Pond	24.551	
3	Noise Pollution Control Measures	5.66	
4	Greenbelt Development	45.381	10.3
5	Rain Water Harvesting	15	1
6	Fire Fighting and Safety measures	20	10
	Total	**269.253**	**28.71**

	c. Benefit cost ratio/ Internal Rate of Return and the year of assessment	NA
	d. Whether c, includes the cost of environmental management as shown in the above	Yes
	e. Actual expenditure incurred on the project so far	Approximate Rs. 65 Crores (as on 31.03.2023)

	f. Actual expenditure incurred on the environmental management plan so far	**Capital Cost Details with Break up:** • Installation of Continuous Ambient Air Quality Monitoring Stations : Rs. 122 Lakh • Installation of Water Sprinklers and piping network for duct suppression : Rs. 15 .50 Lakh • Construction of Retaining Wall : Rs. 17.50 Lakh • Construction of Garland Drains : Rs. 4.95 Lakh • Construction of Settling Ponds :Rs. 2.64 Lakh • Noise Pollution, Ground Vibration Monitoring Equipment : Rs. 6.00 Lakh • Green Belt Development : Rs. 11.54 Lakh • Construction of Rainwater Harvesting structures and Check dams : Rs. 8.066 Lakh
10	Forest land requirement	127.40 ha.
	a. The status of approval for diversion of forest land for non-forestry use.	Entire forest land has been diverted and forest clearance for entire forest land has been accorded by MOEF&CC
	b. The status of clearing felling.	Forest area already been exploited by erstwhile leaseholder SAIL BSP.
	c. The status of compensatory afforestation, if any	Compensatory Afforestation amount has been deposited in CAMPA.
11	The status of clear felling in non-forest areas (such as submergence area of reservoir, approach roads), if any with quantitative information required.	NA
12	Status of construction (Actual &/or Planned)	NA
	a. Date of commencement (Actual &/or Planned)	Mine is in operation (106.60 ha lease) since 16.01.2009. After amalgamation of 32.36 Ha lease with 106.60 ha lease, the mine is under operation From 2016 with respect to EC dated 12.12.2014, lease area 138.96 ha. However, with respect to EC dated 23.06.2021, production from mines for expanded capacity of 2.35 MTPA has been started from 17.08.2021, whereas operation of screening plant with magnetic separator has been started from 26.11.2021 after obtaining CTO. Dolerite crushing & screening plant has been started from 09.03.2022. Proposed BMQ Beneficiation Plant incl. crushing & screening facilities are expected to be 31st Oct, 2023.

	b. Date of Completion (Actual &/ or Planned)	Part of the project activity such as Beneficiation plant for Banded Magnetite Quartzite (BMQ) is under construction stage. The commissioning of BMQ Beneficiation Plant incl. crushing & screening facilities are expected to be 31st Oct, 2023.
13	Reasons for the delay if the project is yet to start.	No delay
14	Dates of site visits a) The dates on which the project was monitored by Regional Office on previous occasions, if any	15.02.2013, 05.10.2018, 10.10.2020 & 17.12.2022
	b) Date of site visit for this monitoring Report.	17.12.2022
15	Details of correspondence with project authorities for obtaining action plans/ information on status of compliance to safeguards other than the routine letters for logistic support for site visits.	Given as below:

Sl. No.	Uploaded Date	Proposal No.	Uploaded copy of compliance Report	Remarks
1.	27.07.2016	IA/CG/MIN/8822/2012	07272016F871LBLY Six monthly Compliance October 2015 – March 2016 Aridongri Iron Ore Mining EC of 2014.	Compliance report duly submitted to MoEF, RO, Nagpur Zonal Office, CPCB, Bhopal & Member Secretary, CECB, Raipur.
2.	02.01.2017	IA/CG/MIN/8822/2012	01022017YW6ARZ0Q Aridongri Iron Ore Mining EC of 2014 compliance report April 2016 – September 2016.	Compliance report duly submitted to MoEF, RO, Nagpur Zonal Office, CPCB, Bhopal & Member Secretary, CECB, Raipur.
3.	16.06.2017	IA/CG/MIN/8822/2012	06162017DU0QP0Q Aridongri Iron Ore Mining EC of 2014-2016 compliance October 2016 – March 2017.	
4.	20.01.2018	IA/CG/MIN/8822/2012	01202018K1KPCP5S Aridongri Iron Ore Mining EC compliance April to September 2017.	Half yearly compliance report for the period from April 2017 to September, 2017.
5.	28.06.2018	IA/CG/MIN/8822/2012	06282018AJU41MLB Six	Half yearly compliance

			monthly EC Compliance Report of Aridongri Iron Ore Mines.	report for the period from October 2017 to March, 2018.
6.	03/01/2019	IA/CG/MIN/8822/2012	01032019AE1BYFXF Aridongri miningsixmonthlyECCompliance Report.pdf	Half yearly compliance report for the period from Apr, 2018 to September, 2018.
7.	14/06/2019	IA/CG/MIN/8822/2012	061420191PELHG6LAridongariIronOreMinesSixmonthlyECComplianceReport.pdf	Half yearly compliance report for the period from October, 2018 to March, 2019
8.	30/12/2019	IA/CG/MIN/8822/2012	12302019VT0QKNDLAridongriIronOreMines-SixMonthlyECcompliance Aprto Sept,19_compressed.pdf	Half yearly compliance report for the period from April, 2019 to September, 2019
9.	02/07/2020	IA/CG/MIN/8822/2012	07022020IH5UPFGDCompliance Report from Oct2019 to March 2020 of AriDongri Iron Ore Mines EC 2014.pdf	Half yearly compliance report for the period from Oct, 2019 to Mar, 2020
10.	30/11/2020	IA/CG/MIN/8822/2012	113020206MD450Q8SixMonthlyECcompliancereport-AridongriIronOreMines(1).pdf	Half yearly compliance report for the period from Apr, 20 to Sept, 2020
11.	01/06/2021	IA/CG/MIN/203724/2021	Submission of status of compliance of the conditions stipulated in Environment Clearance.	Half yearly compliance report for the period from Oct, 20 to Mar, 21
12.	24/12/2021	IA/CG/MIN/203724/2021	Submission of status of compliance of the conditions stipulated in Environment Clearance.	Half yearly compliance report for the upto September, 2021.
13.	29/06/2022	IA/CG/MIN/203724/2021	Submission of Six monthly compliance report of EC granted vide No. J-11015/384/2012-IA.II(M) dated 23rd June 2021	Half yearly compliance report for the period from Oct, 21 to Mar, 22.

14.	23/12/2022	IA/CG/MIN/203724/2021	Submission of Six Monthly Compliance Report of EC Conditions granted vide letter no. J-11015/384/2012-IA.II (M) dated 23.06.2021 for expansion of Aridongri Iron Ore Mines of Godawari Power & Ispat Ltd	Half yearly compliance report for the period from Apr, 22 to Sept, 22

COMPLIANCE STATUS OF CONDITIONS STIPULATED BY MOEF IN ENVIRONMENTAL CEARANCE ACCORDED VIDE LETTER NO.J-11015/339/2006-1A. II(M) DATED 25TH JUNE, 2007 TO ARI DONGRI IRON ORE MINES OF GODAWARI POWER AND ISPAT LIMITED.

A.Specific Conditions:

Sl.No.	Conditions	Compliance (As on 31st March 2023)
(i)	Top soil shallbe stacked properly with proper slope with adequate safeguards and shall be backfilled for reclamation and rehabilitation of mined out area.	At present top soil generation is nil. However, topsoil generated in future will be stacked separately and will be utilised for plantation purpose. OB generated during mining is being stacked at earmarked places with proper terracing as per the approved Review of Mining Plan.
(ii)	Over burden shall be stacked at earmarked dump site(s) only shall not be kept active for long period. The maximum height of the dump shall not exceed 20 m; each stage shall preferably be of 10 m and over all slope of the dump shall not exceed 28º. The mine pit area shall be reclaimed by back filling the OB in a phased manner. The OB dumps shall be scientifically vegetated with suitable native species to prevent erosion and surface run off. Monitoring and management of rehabilitated areas shall continue until the vegetation becomes self-sustaining. Compliance status shall be submitted to the Ministry of Environment & Forests on six monthly basis.	Waste dump has been formed by proper terracing (Benching) with average height of individual terrace as 10 m. Average dump slope is 26.07° which is within range and below 28° as permitted. Waste Dump stability analysis has been carried out by Department of Mining Engineering, NIT Raipur Photographs showing the existing waste dump with proper terracing are enclosed as **Annexure - 8.** Plantation in the inactive terraces of waste dumps are being carried out. To stabilize the inactive terraces of dumps seeding of StyloHamata Grass was also done during the monsoon period. Photographs showing the plantation carried out in waste dumps are enclosed as **Annexure – 9.**
(iii)	Garland drains shall be constructed to arrest silt sediment flows from soil and mineral dumps. The water so collected shall be utilized for watering the mine area, roads, green belt	Garland drains of approx. 6247 m length having 1.5 to 2 m depth and 1.0 – 2 m width have been constructed inside the mining lease and at the periphery of the

Sl.No.	Conditions	Compliance (As on 31st March 2023)
	development etc. The drains shall be regularly desilted particularly after monsoon and maintained properly. Garland drain (Size, gradient and length) shall be constructed for both mine pit and for waste dump and sump capacity shall be designed keeping 50% safety margin over and above peak sudden rainfall (based on 50 years data) and maximum discharge in the area adjoining the mine site. Sump capacity shall also provide adequate retention period to allow proper setting of silt material. Sedimentation pits shall be constructed at corners of the garland drains and desilted at regular intervals.	mining lease. Out of which 2230 m length of drains have been constructed connecting the series of settling pits, 2877 m long drains have been constructed along the haul roads and 1140 m long drain have been constructed at the periphery of the mining lease to arrest silt and surface run off. Adequacy assessment of these Garland drains and settling pits have already been carried out by NIT Raipur in 2021. Depending upon the drainage pattern of the area, retaining walls and Garland drains around OB dumps and mineral dumps have already been constructed with siltation ponds to arrest surface run off. Silts and sediments are cleaned and maintained regularly. Check dams followed by ground water recharge structures have been constructed in the garland drains connecting settling pits to arrest the silts and recharge the clean water.
(iv)	Drilling and blasting shall be by using dust extractors / wet drilling.	Measures being adopted during drilling and blasting are as under: • Wet drilling is being carried out. • Control Blasting using NONEL is being carried out.
(v)	Plantation shall be raised in an area of 54.30 ha including green belt of adequate width by planting the native species around the ML area, roads, OB dump sites etc. in consultation with the local DFO /Agriculture Department. The density of the trees shall be around 2500 plants per ha.	100135 nos. saplings planted covering an area on 37.02 Hec. inside of the mining lease areas Plantation in the 7.5 m safety zone has been carried out. In addition to the above, plantation of 20100 saplings covering an area of 6.70ha during the FY 2021-22 & 13000 saplings in

Sl.No.	Conditions	Compliance (As on 31st March 2023)
		3.5 ha land during FY 2022-23 have also been carried out within the premises.
(vi)	The company shall obtain forestry clearance under Forest (Cons.) Act. 1980 for diversion of forests land.	Forest clearance has already been obtained vide letter no. under Forest (Cons.) Act. 1980 for diversion of forests land.
(vii)	The project authority shall implement suitable conservation measures to augment ground water resources In the area in consultation with the Regional Director, Central Ground water Board.	Ground water recharge is being carried out through recharge ponds, collecting rain water in mine sump, ground water recharge structures with boulder check dams and roof top rain water harvesting structures. Following Rain water harvesting measures have been adopted by GPIL in the Kachche Aridongri Iron Ore Mines. a)Two nos. of ponds has already been constructed by project proponent which is capable of recharging 33150 cu.m water annually. b)111457.50 cu.m/year rain water is being recharged through mine sump constructed at the bottommost bench of the quarry. c) 13 nos. of recharge structure of 1 m dia. & 2.0 m depth has been constructed at Aridongri Mines which is capable of recharging of 1560 cu.m water per year. d)6 Nos. of recharge structure of 1.5 m dia. & 2.0 m depth with check dams have been constructed at Aridongri Mines which is capable of recharging of 30000 cu.m water per year.
(viii)	Regular monitoring of ground water level and quality shall be carried out by establishing a network of existing wells and constructing new piezometers during the mining operation. The monitoring shall be carried out four times In a year- pre-monsoon (April-May) monsoon (August) post-monsoon (November) an winter (January) and the data thus collected may be sent regularly to MOEF, Central Ground Water	Monitoring of ground level & quality is being carried out in all four seasons by establishing a network of wells in Buffer Zone & Core Zone. The water quality analysis is enclosed in Annexure 1(a) to 1(d) and the monitoring data of post-monsoon and winter season water level is enclosed in **Annexure 5.**

Sl.No.	Conditions	Compliance (As on 31st March 2023)
	Authority and Regional Director Central Ground Water Board.	
(ix)	Prior permission from the competent authority shall be obtained for drawl of ground water, if any.	NOC has been obtained from CGWA for ground water withdrawal of 300m3/day copy of NoC is enclosed as **Annexure 14.**
(x)	Vehicular emission shall be kept under control and regularly monitored. Measures shall be taken for maintenance of vehicles used in mining operations and in transportation of mineral. The vehicles shall be covered with a tarpaulin and shall not be overloaded.	Pollution testing certificate of all machinery is being verified regularly to check vehicular emission. Further emission level is kept under control by rigorous maintenance of all engines and changing of lubricants as per the recommendation of the manufacturer. All the transporting vehicles are being covered with tarpaulin and over loading are strictly avoided.
(Xi)	A final Mine closure plan, along with details of corpus fund shall be submitted of the Ministry of Environment & Forests 5 years in advance of final mine closures for approval.	The same will be submitted in due time to MOEF for approval.

B. General Conditions:

Sl. No.	Conditions	Compliance (As on 31.03.2023)
I	No change In mining technology and scope of working shall be made without prior approval of the Ministry of Environment & Forests.	Prior approval of the Ministry of Environment & Forests will be obtained for any change In mining technology and scope of working.
ii	No change in the calendar plan including excavation, quantum of mineral iron ore shall be made.	Change in the calendar plan including excavation, quantum of mineral iron ore will not be made.
iii	Conservation measures for protection of flora and fauna in the core & buffer zone shall be drawn up in consultation with the local forests and wildlife department.	As per the advice of Forest Department, we have provided vehicles, watchman and infrastructural facility as measures to protect Flora & Fauna in core & buffer zone.
iv	Four ambient air quality- monitoring stations shall be established in the core zone as well as in the buffer zone for RPM,SPM,SO2,NOX monitoring. Location of the stations should be decided based on the meteorological data,	Ambient air quality monitoring is being carried out periodically at four locations in the core zone as well as buffer zone for measurement of PM10, PM2.5, SO2, NOx

Sl. No.	Conditions	Compliance (As on 31.03.2023)
	topographical features and environmentally and ecologically sensitive targets and frequency should be undertaken In consultation with the State Pollution Control Board.	Further, Three nos. of Continuous Online Ambient Air Quality Monitoring Stations (One in upwind direction and Two nos. in Downwind direction) for monitoring PM_{10}, $PM_{2.5}$, SO_2, NO_2 etc. have been installed in the lease area. These continuous Online Ambient Air Quality Monitoring Stations have been connected with the CECB Servers.
v	Data on ambient air quality (RPM,SPM,SO2,NOX) should be regularly submitted to the Ministry including its Regional office located at Bhopal and the state pollution control Board/Central pollution Control Board once in six month.	Ambient air quality monitoring is being carried out periodically at four locations in the core zone as well as buffer zone for measurement of PM10, PM2.5, SO2, NOx. Monitoring reports being submitted to CECB on monthly basis. Further, Three nos. of Continuous Online Ambient Air Quality Monitoring Stations (One in upwind direction and Two nos. in Downwind direction) for monitoring PM_{10}, $PM_{2.5}$, SO_2, NO_2 etc. have been installed in the lease area. These continuous Online Ambient Air Quality Monitoring Stations have been connected with the CECB Servers.
vi	Fugitive dust emission from all the sources shall be controlled regularly. Water spraying arrangement on haul roads, loading and unloading and at transfer points shall be provided and properly maintained.	To avoid the dust inhalation by workers and pollution control measures being adopted during drilling and blasting are as under: • Wet drilling is being carried out. • Control Blasting using NONEL is being carried out. • Fixed type of water sprinklers have been provided at haul road. • Sprinkling of water at regular interval on haul roads is being done to avoid dust emission during vehicle movement. • DFDS System have been also installed in Crushing & Screening Plant • The speed of dumpers plying on the haul road limited to avoid emission

Sl. No.	Conditions	Compliance (As on 31.03.2023)
		of dust. • Regular Maintenance of haul roads, internal roads, despatch roads etc. are being carried out to avoid formation of potholes etc. • Water spray in the form of Mist is being done at Feed Hopper, feed and discharge conveyors, transfer points etc. of Crushing and Screening Plant. • Fixed type water sprinklers system have been provided in Crushing & screening plant. • Dry Fog Dust Suppression System installed in the Crushing & Screening Plant and the same will be installed in the proposed BMQ Beneficiation Plant. • Mineral Ore is being transported in Tarpaulin covered trucks. Regular monitoring of air quality within the lease area and surround area is being carried out.
vii	Measures shall be taken for control of noise levels in the work environment. Workers engaged in operations of HEMM, etc. shall be provided with earplugs/ muffs.	Control measures such as maintenance of all machines including checking of silencers regularly, controlled blasting using delay detonators, installing immovable machinery on foundations and closed rooms is beingprovided. The workers engaged at noisy areas are being providing with ear plugs/muffs.
viii	Industrial waste water (workshop and waste water from the mine) should be properly collected, treated so as to conform to the standards prescribed under GSR 422 (E) dated 19th May, 1993 and 31st December, 1993 or as amended from time to time. Oil and grease trap shall be installed before discharge of workshop effluent.	No waste water is generated as open cast mining activity is going on much above the ground level and Ground water table will not be intersected dusring ensuing plan period. Oil & grease trap is not required as all mining machinery is being deployed on contractual basis and the repair and maintenance of the same carried out by the concerned contractor at out side workshop only.

Sl. No.	Conditions	Compliance (As on 31.03.2023)
ix	Personal working in dusty areas shall wear protective respiratory devices and they shall be provided with adequate training and information on safety and health aspects.	In addition to water spraying to suppress dust generation, workers engaged in dusty areas are being provided with nose masks as a precautionary measure. Training & information on safety, health hazards are being given to all categories of deserved workers.
x	Occupational health surveillance program of the workers shall be undertaken periodically to observe any contraction due to exposure to dust and take corrective measures, if needed.	Occupational health surveillance programme of all categories of workers and employees are being conducted periodically.So far no such contraction has been observed.
xi	A separate environmental management cell with suitable qualified personal shall be set-up under the control of a Senior Executive, who will report directly to the Head of the Organization.	A separate Environment Management Cell with suitable qualified personnel and well equipped Environment Engineering Laboratory is functioning under the control of Senior Executive, who reports directly to the Head of the Organization.
xii	The funds earmarked for environmental protection measures shall be kept in separate account and should not be diverted for other purpose. Year wise expenditure shall be reported to the Ministry and its Regional Office located at Bhopal.	Separate funds provision has been made for implementation of environmental protection measures. As on date, nearly Rs.188.196 Lakh have been utilized for safe guard of environment.

PART-II

POINT WISE COMPLIANCE STATUS

SUBJECT : Aridongri Iron Ore Mine of M/s Godawari Power and Ispat Ltd. at Village Kachche , Tehsil Bhanupratappur, Distt. Uttar Bastar (Kanker), Chhattisgarh (106.60 ha to 138.96 ha) with addition of 7.0 lakh tones/annum in existing capacity of 7.05 lakh tones/annum with total 14.05 lakh TPA production.

REFERENCE :

1. EC letter no. J-11015/384/2012-IA.II (M) Dated 12.12.2014.
2. EC letter no. J-11015/384/2012-IA. II(M) Dated 26/05/2016.

S.N.	SPECIFIC CONDITION	COMPLIANCE STATUS AS ON 31.03.2023
i	This environmental clearance shall be operative only from the date of execution of amalgamated lease deed.	This has already been complied, Amalgamated lease deed was executed on 03.09.2015.
ii	No work preliminary or otherwise should be permitted in 32.36ha or expansion of production before amalgamated lease deed execution and before submission of approved integrated mine plan of amalgamated area of 138.96 ha.	Complied, Amalgamated Lease deed was executed on 03.09.2015 and approved amalgamated mine plan from IBM Nagpur vide KNK/FE/MPLN/NGP dated 03/07/2015 lease area 138.96 ha. has been submitted.
iii	The project proponent shall obtain Consent to Establish and Consent to Operate from the State Pollution Control Board and effectively implement all the conditions stipulated therein.	We have obtained consent from Chhattisgarh Environment Conservation Board, and being complied with all the conditions as stipulated therein. Amendment in Consent to establish vide letter no. 4928/TS/CECB/2016 dated 07.12.2016.
iv	The mining operations shall be restricted to above ground water table and it should not intersect the groundwater table.	Open cast mining activity is going on much above the ground level and ground water table will not be intersected during ensuing plan period
v	The loose solids should be kept separately from flowing water and flow of effluents to nearby areas outside the leasehold shall be prevented. These paved drains along with arrangements for Over Burden Dumps and their drainage may be clearly depicted on a contoured map of the mining area.	Garland drains around OB dumps and mineral dumps have already been constructed with siltation ponds to arrest surface run off. Silts and sediments are being cleaned and maintained regularly.
vi	The project proponent shall ensure that no	Being complied.

	natural watercourse and/or water resources shall be obstructed due to any mining operations. Adequate measures shall be taken for conservation and protection of the 1st&2nd order streams, emanating or passing through the mine lease during the course of mining operation.	No natural watercourse or water resources is being obstructed due to mining operations. Adequate measures are being taken for conservation and protection of the 1st and 2nd order streams, emanating or passing through the mine lease during the course of mining operation.
vii	The top soil, if any shall temporarily be stored at earmarked site(s) only and it should not be kept un-utilized for long. The topsoil shall be used for land reclamation and plantation.	At present top soil generation is nil. However, topsoil generated in future will be stacked separately and will be utilised for plantation purpose. OB generated during mining is being stacked at earmarked places with proper terracing.
viii	Appropriate safeguard measures shall be taken to ensure stability and drainage of dump so that no solid waste/debris flows into the nallah.	Garland drains of approx. 6247 m length having 1.5 to 2 m depth and 1.0 – 2 m width have been constructed inside the mining lease and at the periphery of the mining lease. Out of which 2230 m length of drains have been constructed connecting the series of settling pits, 2877 m long drains have been constructed along the haul roads and 1140 m long drain have been constructed at the periphery of the mining lease to arrest silt and surface run off. Adequacy assessment of these Garland drains and settling pits have already been carried out by NIT Raipur in 2021. Depending upon the drainage pattern of the area, retaining walls and Garland drains around OB dumps and mineral dumps have already been constructed with siltation ponds to arrest surface run off. Silts and sediments are cleaned and maintained regularly. Check dams followed by ground water recharge structures have been constructed in the garland drains connecting settling pits to arrest the silts and recharge the clean water.

ix	The over burden (OB) generated during the mining operation shall be stacked at earmarked dump site(s) only and it should not be kept active for a long period of time and their phase-wise stabilization shall be carried out. Proper terracing of OB dump(s) shall be carried out so that the overall slope shall not exceed 28^0. The over burden dump(s) shall be scientifically vegetated with suitable native species to prevent erosion and surface run off. In critical areas, use of geo textiles shall be undertaken for stabilization of the dumps. Monitoring and management of rehabilitated areas should continue until the vegetation becomes self-sustaining. Compliance status should be submitted to the Ministry of Environment & Forests and its Regional Office, Bhopal on six monthly basis.	At present top soil generation is nil. However, topsoil generated in future will be stacked separately and will be utilised for plantation purpose. OB generated during mining is being stacked at earmarked places with proper terracing. All the guidelines are being strictly complied with.
x	Catch drains and siltation ponds of appropriate size shall be constructed for the working pit, temporary OB and mineral dumps to arrest flow of silt and sediment directly into the adjoining River and other water bodies. The water so collected should be utilized for watering the mine area, roads, green belt development etc. The drains should be regularly desilted particularly after the monsoon and maintained properly.	Garland drains of approx. 6247 m length having 1.5 to 2 m depth and 1.0 – 2 m width have been constructed inside the mining lease and at the periphery of the mining lease. Out of which 2230 m length of drains have been constructed connecting the series of settling pits, 2877 m long drains have been constructed along the haul roads and 1140 m long drain have been constructed at the periphery of the mining lease to arrest silt and surface run off. Photographs showing the garland drains is enclosed as **Annexure –11.**
xi	Dimension of the retaining wall at the toe of the OB dump(s) and the OB benches within the mine to check run-off and siltation should be based on the rain fall data.	Waste dump has been formed by proper terracing (Benching) with average height of indivisiual terrace as 10 m. Average dump slope is 26.07° which is within range and below 28° as permitted. Photographs showing the existing waste dump with proper terracing is enclosed as **Annexure -8.**
xii	Plantation shall be raised in an area earmarked including a 7.5 m wide green belt in the safely zone around the mining lease, OB dump(s), along the roads, etc. by planting the native	100135 nos. saplings planted covering an area on 37.02 Hec. inside of the mining lease areas Plantation in the 7.5 m safety zone has been

	species in consultation with the local DFO/ Agriculture Department. In addition, plantation shall also be raised in the backfilled and reclaimed area and around water body. The density of the trees should be around 2500 plants per ha.	carried out. In addition to the above, plantation of 20100 saplings covering an area of 6.70 ha during the FY 2021-22 & 13000 saplings in 3.5 ha land during FY 2022-23 have also been carried out within the premises. (Certified copy of green belt development is enclosed as **Annexure – 12.**
xiii	Effective safeguard measures, such as regular water sprinkling shall be carried out in critical areas prone to air pollution and having high levels of particulate matter such as around crushing and screening plant, loading and unloading point and all transfer points. Extensive water sprinkling shall be carried out on haul roads. It should be ensured that the Ambient Air Quality parameters conform to the norms prescribed by the Central Pollution Control Board in this regard.	Continuous water sprinkling is being done through water tankers on haul roads and other dust generating points. Permanent fixed type of water sprinklers have been installed in haul road. Waster sprinkling in the form of mist through DFDS system is also being done at feed hopper, transfer points, loading and unloading points of crushing & screening plants. Ambient air quality monitoring is being done and reports are being submitted to Regional Office of CECB at Jagdalpur (C.G.) regularly. The Ambient Air Quality Monitoring Report is enclosed as **Annexure -5.**
xiv	Regular monitoring of water quality upstream and downstream of perennial nallahs falling in the impact zone shall be carried out and record of monitoring data should be maintained and submitted to Ministry of Environment and Forests, its Regional Office , Bhopal, Central Groundwater Authority, Director, Central Ground Water Board, State Pollution Control Board & Central Pollution Control Board	Regular Monitoring is being done as per guidelines. Record of Monitoring Data is being maintained and submitted to MoEF Regional Office, CGWB, CECB and CPCB.

<table>
<tr>
<td>xv</td>
<td>Appropriate measures shall be taken for treatment of the upper catchment of the mine lease area.</td>
<td>Five Nos. of siltation ponds having following size having adequate silt storage capacity have been provided at mines:

<table>
<tr><th>Sl. No.</th><th>Settling Pit Location</th><th>Area</th><th>Unit</th></tr>
<tr><td>1</td><td>Settling Pit near WB No. 6 at the toe of waste dump</td><td>4591.935</td><td>Sq.m</td></tr>
<tr><td>2</td><td>Settlin Pit near WB No. 6 at the toe of waste dump 2</td><td>3188.977</td><td>Sq.m</td></tr>
<tr><td>3</td><td>Settling Pit on Western side of Weighbridge 5</td><td>13190.24</td><td>Sq.m</td></tr>
<tr><td>4</td><td>Settling Pit in North Western part of lease</td><td>4621.362</td><td>Sq.m</td></tr>
<tr><td>5</td><td>Settling Pit in Northern part of lease at the toe of waste dump WD1</td><td>400</td><td>Sq.m</td></tr>
</table>

Photograph showing siltation pond within the mining lease is enclosed as Annexure – 10.</td>
</tr>
<tr>
<td>xvi</td>
<td>The project authority should implement suitable conservation measures to augment ground water resources in the area in consultation with the Regional Director, Central Ground Water Board.</td>
<td>Ground water recharge is being carried out through recharge ponds, collecting rain water in mine sump, ground water recharge structures with boulder check dams and roof top rain water harvesting structures. Following Rain water harvesting measures have been adopted by GPIL in the Kachche Aridongri Iron Ore Mines.

a) Two nos. of ponds has already been constructed by project proponent which is capable of recharging 33150 cu.m water annually.
b) 111457.50 cu.m/year rain water is being recharged through mine sump constructed at the bottommost bench of the quarry.
c) 13 nos. of recharge structure of 1 m dia. & 2.0 m depth has been constructed at</td>
</tr>
</table>

		Aridongri Mines which is capable of recharging of 1560 cu.m water per year. d)6 Nos. of recharge structure of 1.5 m dia. & 2.0 m depth with check dams have been constructed at Aridongri Mines which is capable of recharging of 30000 cu.m water per year. (Rain water harvesting report &Photographs enclosed as **Annexure- 6**).
xvii	Regular monitoring of ground water level and quality shall be carried out in and around the mine lease by establishing a network of existing wells and installing new piezometers during the mining operation the periodic monitoring [(at least four times in a year –pre-monsoon(April-May), monsoon(August), post-monsoon (November) and winter(January); once in each season)] shall be carried out in consultation with the State Ground Water Board/ Central Ground Water Authority and the data thus collected may be sent regularly to the Ministry of Environment and Forests and its Regional Office Bhopal ,the Central Ground Water Authority and the Regional Director , Central Ground Water Board. If at any stage, it is observed that the groundwater table is getting depleted due to the mining activity, necessary corrective measures shall be carried out.	Monitoring of ground water level & quality is being carried out in all four seasons by establishing a network of wells in Buffer Zone & Core Zone. The Water quality analysis report and the ground water level monitoring report are enclosed as **Annexure– 5.**
xviii	The project proponent shall obtain necessary prior permission of the competent authorities for drawl of requisite quantity of water, required for the project.	NOC has been obtained from CGWA for ground water withdrawal of 300m3/day. Copy of the same is enclosed as **Annexure- 14**.
xix	Suitable rainwater harvesting measures on long term basis shall be planned and implemented in consultation with the Regional Director, Central Ground Water Board.	Ground water recharge is being carried out through recharge ponds, collecting rain water in mine sump, ground water recharge structures with boulder check dams and roof top rain water harvesting structures. Following Rain water harvesting measures have been adopted by GPIL in the Kachche Aridongri Iron Ore Mines. e)Two nos. of ponds has already been

		constructed by project proponent which is capable of recharging 33150 cu.m water annually. f) 111457.50 cu.m/year rain water is being recharged through mine sump constructed at the bottommost bench of the quarry. g)13 nos. of recharge structure of 1 m dia. & 2.0 m depth has been constructed at Aridongri Mines which is capable of recharging of 1560 cu.m water per year. h)6 Nos. of recharge structure of 1.5 m dia. & 2.0 m depth with check dams have been constructed at Aridongri Mines which is capable of recharging of 30000 cu.m water per year. (Rain water harvesting report &Photographs enclosed as **Annexure- 6**)
xx	Appropriate mitigative measures should be taken to prevent pollution of nearby River in consultation with the State Pollution Control Board.	Being complied. No river flows within 5 km radius of the lease. Appropriate mitigative measures have been taken to prevent pollution of nearby river in consultation with CECB.
xxi	Vehicular emissions shall be kept under control and regularly monitored. Measures shall be taken for maintenance of vehicles used in mining operations and in transportation of minerals. The mineral transportation shall be carried out through the covered trucks only and the vehicles carrying the mineral shall not be overloaded.	Pollution testing certificate of all machinery is being verified regularly to check vehicular emission. Further, emission level is kept under control by rigorous maintenance of all engines and changing of lubricants as per the recommendation of the manufacturer. All the transporting vehicles are being covered with tarpaulin and over loading is strictly avoided.
xxii	Controlled blasting shall be practiced. The mitigative measures for control of ground vibrations and to arrest fly rocks and boulders should be implemented.	Being complied. Controlled blasting is being done. Mitigative measures have been taken for control of ground vibration and to arrest fly rocks and boulders.
xxiii	Drills shall either be operated with dust extractors or equipped with water injection system.	Wet drilling is being carried out.
xxiv	Mineral handling area shall be provided with the adequate number of high efficiency dust extraction system. Loading and unloading areas including all the transfer points should also have efficient dust control arrangements. These should be properly maintained and operated.	Control of fugitive dust emission is being carried out by water sprinkling on haul roads, loading and unloading points and iron ore handling yard on regular basis. Besides, all the conveyors and transfer points are covered with canopy.

xxv	Sewage treatment plant shall be installed for the colony. ETP shall also be provided for the workshop and wastewater generated during the mining operation.	There is no residential colony for workers & staff of mines. Vehicles are hired from private transporters and maintenance of vehicles is being done at authorized work shop of vehicle manufacture.
xxvi	Pre-placement medical examination and periodical medical examination of the workers engaged in the project shall be carried out and records maintained. For the purpose schedule of health examination of the workers should be drawn and followed accordingly.	As per Mines rules, periodical medical examination of total1104(FY 2022 -23) workmen has been done and record is being maintained. Schedule of health examination of the workers have been drawn and are being followed accordingly.
xxvii	Regular monitoring of free silica in the dust will be carried out and records maintained. It shall be ensured that the levels of silica do not exceed the prescribed limit. The workers will be provided with personal protective measures to guard against inhaling silica dust.	Regular monitoring is being done in the mines area for free silica in the dust and we are using water sprinkling system at the working site and haul roads for dust suppression. We are also providing dust mask to all the mine workers. In our mines area, the silica concentration in dust is very low.**A scientific Study on Determination of % of Free silica in mines has been done by IIT Kharagpur.**
xxviii	Provision shall be made for the housing of construction labour within the site with all necessary infrastructure and facilities such as fuel for cooking, mobile toilets, mobile STP, safe drinking water, medical health care , crèche etc. The housing may be in the form of temporary structures to be removed after the completion of the project.	Most of the workers have been deployed from local neighbouring villages, therefore, there is no residential colony for worker & staff in mine area.
xxix	The project proponent should take all precautionary measures during mining operation for conservation and protection of endangered flora as well as endangered fauna spotted in the study area. Action plan for conservation of flora and fauna shall be prepared and implemented in consultation with the State Forest and Wildlife Department. Necessary allocation of funds for implementation of the conservation plan shall be made and the funds so allocated shall be included in the project cost. Copy of action plan may be submitted to the Ministry and its Regional Office at Bhopal within 3 months.	Separate funds have been provided for implementation of environmental protection measures.
xxx	The critical parameters such as RSPM	Four nos. of ambient air quality monitoring

	(Particulate matter with size less than 10 microns i.e. PM10and NOx in the ambient air within the impact zone, peak particle velocity at 300m distance or within the nearest habitation, whichever is closer shall be monitored periodically. Further, quality of discharged water shall be monitored [(TDS, DO, PH and Total Suspended solids (TSS)]. The monitored data shall be uploaded on the website of the company as well as displayed on a display board at the project site at a suitable location near the main gate of the Company in Public domain. The Circular No J-20012/1/2006-IA. II(M) dated 27.05.2009 issued by Ministry of Environment and Forests, which is available on the website of the Ministry www.envfor.nic.inshall also be referred in this regard for its compliance.	stations are established in the core zone as well as in the buffer zone for measurement of PM10, PM2.5, SO2, NOx. Copy of Monitoring report is enclosed as **Annexure –5.** There is no waste water discharge from the mines. Ground vibration monitoring study has also been carried out by NIT Raipur for establishing site specific predictor equation for Ground Vibration. The monitored data along with six monthly EC compliance report is being uploaded on the website of the company as well as www.envfor.nic.in.
xxxi	A Final Mine Closure Plan along with details of Corpus Fund should be submitted to the Ministry of Environment & Forests 5 years in advance of final mine closure for approval.	Presently mine is operational since FY 2009. Upon approval of the Final Mine Closure Plan by Indian Bureau of Mines, the approved Final Mine Closure Plan alongwith details of corpus fund will be submitted to the Ministry of Environment & Forests in due course of time.
xxxii	The project proponent shall undertake all the commitments made during the public hearing and effectively address the concerns raised by the locals in the public hearing as well as during consideration of the project, while implementing the project.	Agreed, undertaking submitted and being complied with.

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B. General Conditions

SN	GENERAL CONDITION	COMPLIANCE STATUS AS ON 31.03.2023
i	No change in mining technology and scope of working should be made without prior approval of the Ministry of Environment & Forests.	Agreed, undertaking submitted.
ii	No change in the calendar plan including excavation, quantum of mineral and waste should be made.	Agreed and being complied with.
iii	Four ambient air quality-monitoring stations should be established in the core zone as well as in the buffer zone for RSPM (Particulate matter with size less than 10micron i.e. PM_{10}) and NOx monitoring. Location of the stations should be decided based on the meteorological data, topographical features and environmentally and ecologically sensitive targets and frequency of monitoring should be undertaken in consultation with the State Pollution Control Board.	Four ambient air quality monitoring stations are established in the core zone as well as in the buffer zone for measurement of PM_{10}, $PM_{2.5}$, SO_2, NOx. The Monitoring report from Oct, 2022 to Mar, 2023 is enclosed as **Annexure – 5.**
iv	Data on ambient air quality RSPM(Particulate matter with size less than 10micron i.e. PM10)& NOx should be regularly submitted to the Ministry of Environment and Forests including its Regional office located at Bhopal and the State Pollution Control Board/ Central Pollution Control Board once in six months.	Ambient air quality monitoring is being carried out periodically at four locations in the core zone as well as buffer zone for measurement of PM10, PM2.5, SO2, NOx. Monitoring reports being submitted to CECB on monthly basis. Further, Three nos. of Continuous Online Ambient Air Quality Monitoring Stations (One in upwind direction and Two nos. in Downwind direction) for monitoring PM_{10}, $PM_{2.5}$, SO_2, NO_2 etc. have been installed in the lease area and these stations are connected with CECB Servers.
v	Fugitive dust emissions from all the sources should be controlled regularly. Water spraying arrangements on haul roads, loading and unloading and at transfer points should be provided and properly maintained.	To avoid the dust inhalation by workers and pollution control measures being adopted during drilling and blasting are as under: • Wet drilling is being carried out. • Control Blasting using NONEL is being carried out.

		• Fixed type of water sprinklers have been provided at haul road. • Sprinkling of water at regular interval on haul roads is being done to avoid dust emission during vehicle movement. • The speed of dumpers plying on the haul road limited to avoid emission of dust. • Regular Maintenance of haul roads, internal roads, despatch roads etc. are being carried out to avoid formation of potholes etc. • Water spray in the form of Mist by DFDS System is being done at Feed Hopper, feed and discharge conveyors, transfer points etc. of Crushing and Screening Plant. • Fixed type water sprinklers system have been provided in Crushing & screening plant. • Dry Fog Dust Suppression System installed in the Crushing & Screening Plant and the same will be installed in the proposed BMQ Beneficiation Plant. • Mineral Ore is being transported in Tarpaulin covered trucks. Regular monitoring of air quality within the lease area and surround area is being carried out.
vi	Measures should be taken for control of noise levels below 85 dBA in the work environment. Workers engaged in operations of HEMM, etc should be provided with earplugs/muffs.	Control measures such as maintenance of all machines including checking of silencers are being done regularly; installed immovable machinery on foundations and closed rooms is being provided. The workers engaged at noisy areas are being provided with ear plugs/ muffs.
vii	Industrial waste water (workshop and waste water from the mine) should be properly collected, treated so as to conform to the standards prescribed under GSR 422 (E) dated 19th May, 1993 and 31st December, 1993 or as amended from time to time. Oil and grease trap should be installed before discharge of workshop	Oil & grease trap is not required as all mining machinery is being deployed on hired basis and repair and maintenance of the same are carried out by the concerned vendors/service providers at outside workshop only.

<table>
<tr><td></td><td>effluents.</td><td></td></tr>
<tr><td>viii</td><td>Personnel working in dusty areas should wear protective respiratory devices and they should also be provided with adequate training and information on safety and health aspects. Occupational health surveillance program of the workers should be undertaken periodically to observe any contractions due to exposure to dust and take corrective measures, if needed.</td><td>Being Complied with Personnel working in dusty areas have been provided protective respiratory devices and they are also provided adequate training and information on safety and health aspects. Occupational health surveillance programme of the workers is being undertaken periodically to observe any contractions due to exposure to dust and to take corrective measures.</td></tr>
<tr><td>ix</td><td>A separate environmental management cell with suitable qualified personnel should be set-up under the control of a Senior Executive, who will report directly to the Head of the Organization.</td><td>We are having an Environmental management Cell with qualified technical persons to carry out various Environment functions under the supervision of Senior Executive.
We are having laboratory facility with our group companies.</td></tr>
<tr><td>x</td><td>The funds earmarked for environmental protection measures should be kept in separate account and should not be diverted for other purpose. Year wise expenditure should be reported to the Ministry of Environment and Forests and its Regional Office located at Bhopal.</td><td><u>EMP Cost: -</u>

<table>
<tr><th rowspan="2">Sl. No.</th><th rowspan="2">Environmental Protection Measures</th><th>Capital Cost</th><th>Recurring Cost</th></tr>
<tr><th>(Rs. In lakhs)</th><th>(Rs. In lakhs/yr)</th></tr>
<tr><td>1</td><td>Air Pollution Control Measures

Dry fog Dust Suppression Systems at BMQ Beneficiation Plant, Dolerite C&S Plant and 250 tph Screening Plant</td><td>20</td><td>1</td></tr>
<tr><td rowspan="4">2</td><td>Water Pollution Control Measures</td><td></td><td rowspan="4">6.41</td></tr>
<tr><td>Construction of Garland drain</td><td>1.709</td></tr>
<tr><td>Construction of Retaining Wall</td><td>136.952</td></tr>
<tr><td>Construction of Settling Pond</td><td>24.551</td></tr>
</table></td></tr>
</table>

		3	Noise Pollution Control Measures	5.66	
		4	Greenbelt Development	45.381	10.3
		5	Rain Water Harvesting	15	1
		6	Fire Fighting and Safety measures	20	10
			Total	**269.253**	**28.71**

Capital Cost Details with Break up:

- Installation of Continuous Ambient Air Quality Monitoring Stations : Rs. 122 Lakh
- Installation of Water Sprinklers and piping network for duct suppression : Rs. 15 .50 Lakh
- Construction of Retaining Wall : Rs. 17.50 Lakh
- Construction of Garland Drains : Rs. 4.95 Lakh
- Construction of Settling Ponds :Rs. 2.64 Lakh
- Noise Pollution, Ground Vibration Monitoring Equipment : Rs. 6.00 Lakh
- Green Belt Development : Rs. 11.54 Lakh
- Construction of Rainwater Harvesting structures and Check dams : Rs. 8.066 Lakh

xi	The project authorities should inform to the Regional Office located at Bhopal regarding date of financial closures and final approval of the project by the concerned authorities and the date of start of land development work.	We would like to clarify that company has made all the investment (e.g. payment of mining lease, registration of lease, and payment of forest compensation and development of mines) from their own sources.
xii	The Regional Office of this Ministry located at Bhopal shall monitor compliance of the stipulated conditions. The project authorities	Agreed undertaking submitted and being complied with.

	should extend full cooperation to the officer (s) of the Regional Office by furnishing the requisite data/ information / monitoring reports.	
xiii	The project proponent shall submit six monthly reports on the status of compliance of the stipulated environmental clearance conditions including results of monitored data (both in hard copies as well as by e-mail) to the ministry of Environment and Forests, its Regional Office Bhopal ,the respective Zonal Office of Central Pollution Control Board, the State Pollution Control Board. The proponent shall upload the status of compliance of the environmental clearance conditions including results of monitored data on their website and shall update the same periodically. It shall simultaneously be sent to the Regional Office of the Ministry of Environment and Forests, Bhopal, the respective Zonal Office of Central Pollution Control Board and the State Pollution Control Board.	Being complied with.
xiv	A copy of the clearance letter shall be sent by the proponent to concerned Panchayat, Zila Parisad / Municipal Corporation, Urban Local Body and the Local NGO, if any, from whom suggestions/ representations, if any , where received while processing the proposal. The clearance letter shall also be put on the website of the Company by the proponent.	Complied.
xv	The State Pollution Control Board should display a copy of the clearance letter at the Regional office, District Industry Centre and the Collector's office / Tehsildar's Office for 30 days.	Complied.
xvi	The environmental statement for each Financial year ending 31st March in Form-Vas is mandated to be submitted by the project proponent to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently , shall also be put on the website of the company along with the status of compliance of environmental clearance conditions and shall also be sent to the Regional Office of the Ministry of Environment and Forests, Bhopal by e-mail.	Being Complied. The latest Environment Statement for the financial year 2021-22 has been submitted vide letter no. GPIL/EMS/2022-23/87 dated 21.09.22 **(Annexure -15)**.

xvii	The project authorities should advertise at least in two local newspapers of the District or State in which the project is located and widely circulated, one of which shall be in the vernacular language of the locality concerned, within 7 days of the issue of the clearance letter informing that the project has been accorded environmental clearance and a copy of the clearance letter is available with the state Pollution Control board and also at website of the Ministry of Environment and Forests at http:// envfor.nic.in and a copy of the same should be forwarded to the Regional Office of this Ministry located at Bhopal.	This has already been complied. Copy of Environment clearance letter has already been published in two local news paper of the District/ state and at website of MoEF. It was also made available to CECB and Regional Office of MoEF.
10	The Ministry or any other Competent Authority may alter/ modify the above conditions or stipulate any further condition in the interest of environment protection.	Agreed, undertaking submitted.
11	Concealing factual data or submission of false/ fabricated data and failure to comply with any of the conditions mentioned above may result in withdrawal of this clearance and attract action under the provisions of Environment (protection) Act, 1986.	Agreed, undertaking submitted.
12	The above conditions will be enforced inter-alia, under the provisions of the water (Prevention & Control of Pollution) Act, 1974, the Air (Prevention & Control of Pollution) Act 1981, the Environment (Protection) Act, 1986 and the Public Liability Insurance Act, 1991 along with their amendments and rules made there under and also any other orders passed by the Hon'ble Supreme Court of India / High Court of Chhattisgarh and any other Court of Law relating to the subject matter.	Agreed, undertaking submitted.
13	Any appeal against this environmental clearance shall lie with the National Green Tribunal, if preferred within a period of 30 days as prescribed under section 16 of the National Green Tribunal Act, 2010.	Agreed, undertaking submitted.

COMPLIANCE STATUS OF CONDITIONS AS STIPULATED IN ENVIRONMENTAL CLEARANCE VIDE LETTER NO. J-11015/384/2012-IA. II(M) DATED 26/05/2016 GODAWARI POWER AND ISPAT LIMITED

(PERIOD FROM 1st Oct, 2022 to 31st Mar, 2023)

Condition no. 5	ADDITIONAL CONDITION	COMPLIANCE STATUS AS ON 31.03.2023
(a)	There will be no generation of solid waste since the ore is crushed to required size. The fines so generated is being separately stored and transported to our steel plant at siltara for use in pelletization process.	Fine ore is stacked separately with preventive measures. The fines so generated is being transported to own plant at Siltara for use in pelletization process.
(b)	Continuous water sprinkling at loading and unloading points, haul roads etc will be done.	Control of fugitive dust emission is being carried out by continuous water spraying on haul roads, loading and unloading points and dust generating areas.
(c)	Adoption of technology like recovery of dust/ fines for reuse as raw material in pellet plant will fulfill the twin objectives of material conservation and pollution control.	being complied.
(d)	Four air monitoring stations are established in core zone area.	Four ambient air quality monitoring stations are established in the core zone as well as in the buffer zone for measurement of PM_{10}, $PM_{2.5}$, SO_2, NOx. The Monitoring report from Oct, 2020 to Mar, 2021 is enclosed as **Annexure – 5.**
(e)	Entire crushing & screening will be done in a closed circuit to eliminate fugitive emission.	The entire crushing & screening process is being done in a closed circuit to eliminate fugitive emission.
(f)	To control the level of pollution, bag filters will also be installed. The vibrating screens will be fitted with bag filters for pollution control. Plantation shall be developed all around the crusher plant.	Bag filters have been installed. Besides, Dry Fog Dust Suppression System (DFDS) has also been installed for controlling dust emission at crushing & screening plant. 100135 nos. saplings planted covering an area on 37.02 Hec. inside of the mining lease areas Plantation in the 7.5 m safety zone has been carried out. In addition to the above, plantation of 20100 saplings covering an area of 6.70 ha during the FY 2021-22 & 13000 saplings in 3.5 ha land during FY 2022-23 have also been carried out within the premises. (Certified copy of green belt development is enclosed as**Annexure – 12**).
(g)	No effluent generation from the process.	There is no water requirement in the process of mining and crushing. Hence, there is no effluent

		generation from these processes. At present, water is being utilized for dust suppression inside & outside the mine lease area, sprinkling in the conveyor to control the fugitive emission, domestic purpose and plantation/Green belt development. Domestic effluent of about 1 KLD is being treated in soak pits via septic tank.
(h)	Adequate green belt as already been done in and around the existing mining lease area of 106.60 ha.	100135 nos. saplings planted covering an area on 37.02 Hec. inside of the mining lease areas Plantation in the 7.5 m safety zone has been carried out. In addition to the above, plantation of 20100 saplings covering an area of 6.70 ha during the FY 2021-22 & 13000 saplings in 3.5 ha land during FY 2022-23 have also been carried out within the premises. (Certified copy of green belt development is enclosed as **Annexure – 12**).
(i)	The green area development will be as per the proposed programme as given for the mining activities in the amalgamated mine lease area of 138.96 ha.	100135 nos. saplings planted covering an area on 37.02 Hec. inside of the mining lease areas Plantation in the 7.5 m safety zone has been carried out. In addition to the above, plantation of 20100 saplings covering an area of 6.70 ha during the FY 2021-22 & 13000 saplings in 3.5 ha land during FY 2022-23 have also been carried out within the premises. (Certified copy of green belt development is enclosed as **Annexure – 12**).

Saya

Compliance status of conditions stipulated in Environmental Clearance issued by Ministry of Environment, Forest and Climate Change Impact Assessment Division vide no. J-11015/384/2012-IA.II (M) dated 23.06.2021

<table>
<tr><th>SN</th><th>CONDITIONS</th><th>COMPLIANCE AS ON DATE 31.03.2023</th></tr>
<tr><td colspan="3">A. SPECIFIC CONDITIONS</td></tr>
<tr><td>i.</td><td>The Project Proponent shall undertake the plantation in peripheral zone and ensure that the plantation in peripheral zone and plantation along haul roads should be completed within 3 years from the date of commencement of mining operations with at least 90% survival rate. Causalities of the previous year should be replaced other than the saplings proposed to be planted every year. PP shall provide tree guard to maintain the early stages of plant growth.</td><td>Plantation in peripheral zone and plantation along haul roads, has been undertaken to maintain average 90% survival rate. Year-wise Plantation Details is Given Below.
<table>
<tr><th>Financial Year</th><th>Area Covered (Ha)</th><th>No. of species and No. plants planted</th><th>Survival Rate</th><th>Expenditure Incurred, Rs.</th></tr>
<tr><td>2018-19</td><td>2.03</td><td>5000</td><td>90%</td><td>575000</td></tr>
<tr><td>2019-20</td><td>2.18</td><td>5400</td><td>89.80 %</td><td>597200</td></tr>
<tr><td>2020-21</td><td>4.0</td><td>10900</td><td>92%</td><td>718000</td></tr>
<tr><td>2021-22</td><td>4.28</td><td>20100</td><td>90%</td><td>1154000</td></tr>
<tr><td>2022-23</td><td>3.5</td><td>13000</td><td>90%</td><td>994500</td></tr>
</table>
Tree guards are not required as entire mining lease area has been fenced with barbed wire fencing.</td></tr>
<tr><td>ii.</td><td>PP shall take necessary steps to avoid the fugitive dust emission due to mining activities and vehicle movement. The roads shall be regularly cleaned and maintained in proper conditions by the project authorities.</td><td>To avoid the fugitive dust emission due to mining activities and vehicle movement the following measures have been undertaken:
Wet drilling is being carried out.
Sprinkling of water at regular interval on haul roads is being done to avoid dust emission during vehicle movement.
The speed of dumpers plying on the haul road limited to avoid emission of dust.
Regular Maintenance of haul roads, internal roads, despatch roads etc. are being carried out to avoid formation of potholes etc.
Mineral Ore is transported in Tarpaulin covered trucks.
Regular monitoring of air quality within the lease area and surrounding area is being done.</td></tr>
<tr><td>iii.</td><td>The budgetary plan of Rs. 610.06 Lakh</td><td>Agreed, undertaking is enclosed.</td></tr>
</table>

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
	proposed to address the public concerns should be strictly followed and completed within 3 years and the development should be submitted during submission of EC compliance. PP shall also organize employment based apprenticeship/ internship training program with stipend for the youth and other programs to enhance the skill of the local people.	Compliance status to address the public concerns raised during public hearing is enclosed as **Annexure - 1.** Employment drive of local qualified and skilled persons have been taken by GPIL to deploy manpower for proposed plants. GPIL has also undertaken several employment based apprenticeship/ internship training program with stipend for the youth and other programs to enhance the skill of the local people.
iv.	PP shall explore more possibilities to augment ground water resources in the area.	GPIL has carried out survey on Rain water harvesting potential in the area through expert consultant M/s HydroGeo Consultants Raipur. Based on the survey report and recommendations, rainwater harvesting structures along-with check dams, roof top rain water harvesting systems have been adopted by project proponent for reduction of ground water drawl. 1. Two nos. of ponds and a mine sump has already been constructed by project proponent which is capable of recharging 144607.5 cu.m water annually. 2. 13 nos. of recharge structure of 1 m dia. & 2.0 m depth has been constructed at Aridongri Mines which is capable of recharging of 1560 cu.m water per year. 3. 6 Nos. of recharge structure of 1.5 m dia. & 2.0 m depth with check dams have been constructed at Aridongri Mines which is capable of recharging of 30000 cu.m water per year. Total ground recharge potential is 176167.5 cu.m/year with a net development of 178%.
v.	PP shall ensure the adequate safety measures to avoid dust inhalation by workers and pollution control measures adopted during drilling and blasting.	To avoid the dust inhalation by workers and pollution control measures being adopted during drilling and blasting are as under: • Wet drilling is being carried out. • Control Blasting using NONEL is being

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
		carried out. • Sprinkling of water at regular interval on haul roads is being done to avoid dust emission during vehicle movement. • The speed of dumpers plying on the haul road limited to avoid emission of dust. • Regular Maintenance of haul roads, internal roads, despatch roads etc. are being carried out to avoid formation of potholes etc. • Water spray in the form of Mist is being done at Feed Hopper, feed and discharge conveyors, transfer points etc. of Crushing and Screening Plant. • Fixed type water sprinklers system have been provided in Crushing & screening plant. • Dry Fog Dust Suppression System installed in the Crushing & Screening Plant and the same will be installed in the proposed BMQ Beneficiation Plant. • Mineral Ore is being transported in Tarpaulin covered trucks. • Regular monitoring of air quality within the lease area and surround area is being carried out.
vi.	The Project Proponent shall obtain the NOC from CGWA for withdrawal of water before undertaking mining operations.	NOC obtained from CGWA for withdrawal of 300 KL/day water vide CGWA/NOC/MIN/REN/2/2022/7371, valid from 16/05/2022 to 15/05/2024.
B. STANDARD CONDITIONS		
I.	**Statutory compliance**	
1)	This Environmental Clearance (EC) is subject to orders/judgement of Hon'ble Supreme Court of India, Hon'ble High Court, Hon'ble NGT and any other Court of Law, Common Cause Condition as may be applicable.	Agree
2)	The Project Proponent complies with all the statutory requirements and judgment of Hon'ble Supreme Court dated 2nd August,	Agree

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
	2017 in Writ Petition (Civil) No.114 of 2014 in matter of Common Cause versus Union of India &Ors before commencing the mining operations.	
3)	The State Government concerned shall ensure that mining operation shall not be commenced till the entire compensation levied, if any, for illegal mining paid by the Project Proponent through their respective Department of Mining & Geology in strict compliance of Judgement of Hon'ble Supreme Court dated 2nd August, 2017 in Writ Petition (Civil) No. 114 of 2014 in matter of Common Cause versus Union of India &Ors.	Noted.
4)	The Project Proponent shall follow the mitigation measures provided in MoEFCC's Office Memorandum No. Z-11013/57/2014-IA.II (M), dated 29th October, 2014, titled "Impact of mining activities on Habitations-issues related to the mining Projects wherein Habitations and villages are the part of mine lease areas or Habitations and villages are surrounded by the mine lease area".	Agreed. Following measures have already been implemented by Project Proponent at Mines. 1. No village is located within the leasehold area and transportation of ore is not being carried out through village. 2. The Project Proponent has obtained all statutory clearances. 3. Three nos. of Continuous Online Ambient Air Quality Monitoring Stations (One in upwind direction and Two nos. in Downwind direction) for monitoring PM_{10}, $PM_{2.5}$, SO_2, NO_2 etc. have been installed in the lease area. 4. Regular monitoring of Ground water level and quality is being carried out by the project proponent. 5. No natural water body flows through the lease area. 6. Illumination and noise level are regularly being monitored by the project proponent and are within the statutorily permitted level. 7. Regular ground vibration monitoring is being carried out and mining operations are confined at more than approx. 1 km from the populated

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
		area. 8. Regular water sprinkling in haul roads and approach roads are being carried out through dedicated water tankers.
5)	A copy of EC letter will be marked to concerned Panchayat/ local NGO etc. if any, from whom suggestion/ representation has been received while processing the proposal.	Agreed and complied. Copy of Receiving Letter of EC by Gram PanchayatKachche, Parrekodo, Salhe and Bhaisakanhar is enclosed as **Annexure - 2.**
6)	State Pollution Control Board/ Committee shall be responsible for display of this EC letter at its Regional office, District Industries Centre and Collector's office/ Tehsildar's Office for 30 days.	Noted.
7)	The Project Authorities should widely advertise about the grant of this EC letter by printing the same in at least two local newspapers, one of which shall be in vernacular language of the concerned area. The advertisement shall be done within 7 days of the issue of the clearance letter mentioning that the instant project has been accorded EC and copy of the EC letter is available with the State Pollution Control Board/ Committee and web site of the Ministry of Environment, Forest and Climate Change (www.parivesh.nic.in). A copy of the advertisement may be forwarded to the concerned MoEFCC Regional Office for compliance and record.	We have advertised about the grant of this letter in two newspapers (One in Hindi and other in English News Paper). The copy of the same is enclosed as **Annexure- 3.**
8)	The Project Proponent shall inform the MoEF&CC for any change in ownership of the mining lease. In case there is any change in ownership or mining lease is transferred, PP need to apply for transfer of EC as per provisions of the para 11 of EIA Notification, 2006 as amended from time to time.	Agreed. At present there is no change in ownership or transfer of Lease. In future, if any change in ownership or transfer of lease takes place same will be informed to MoEF&CC
II.	**Air quality monitoring and preservation**	
9)	The Project Proponent shall install a minimum of 3 (three) online Ambient Air Quality Monitoring Stations with 1 (one) in upwind and 2 (two) in downwind direction	Three nos. of Continuous Online Ambient Air Quality Monitoring Stations (One in upwind direction and Two nos. in Downwind direction) for monitoring PM_{10}, $PM_{2.5}$, SO_2,

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
	based on long term climatological data about wind direction such that an angle of 120° is made between the monitoring locations to monitor critical parameters, relevantfor mining operations, of air pollution viz. PM10, PM2.5, NO2, CO and SO2 etc. as per the methodology mentioned in NAAQMS Notification No. B-29016/20/90/PCI/I, dated 18.11.2009 covering the aspects of transportation and use of heavy machinery in the impact zone. The ambient air quality shall also be monitored at prominent places like office building, canteen etc. as per the site condition to ascertain the exposure characteristics at specific places. The above data shall be digitally displayed within 03 months in front of the main Gate of the mine site.	NO_2 etc. have been installed in the lease area. Photograph showing the online ambient air quality monitoring stations is given at **Annexure – 4.** Ambient air quality monitoring is being carried out periodically at four locations in the core zone as well as buffer zone for measurement of PM10, PM2.5, SO2, NOx. Monitoring report is enclosed as **Annexure– 5.** Ambient air quality monitoring data are being digitally displayed in the front of main gate of the mines site.
10)	Effective safeguard measures for prevention of dust generation and subsequent suppression (like regular water sprinkling, metalled road construction etc.) shall be carried out in areas prone to air pollution wherein high levels of PM10 and PM2.5 are evident such as haul road, loading and unloading point and transfer points. The Fugitive dust emissions from all sources shall be regularly controlled by installation of required equipments/ machineries and preventive maintenance. Use of suitable water-soluble chemical dust suppressing agents may be explored for better effectiveness of dust control system. It shall be ensured that air pollution level conform to the standards prescribed by the MoEFCC/ Central Pollution Control Board.	To avoid the fugitive dust emission due to mining activities and vehicle movement the following measures have been undertaken: • Wet drilling is being carried out. • Sprinkling of water at regular interval on haul roads is being done to avoid dust emission during vehicle movement. • The speed of dumpers plying on the haul road limited to avoid emission of dust. • Regular Maintenance of haul roads, internal roads, despatch roads etc. are being carried out to avoid formation of potholes etc. • Mineral Ore is transported in Tarpaulin covered trucks. • Regular monitoring of air quality within the lease area and surrounding area is being done. Ambient air quality monitoring is being done and reports are being submitted to Regional Office of CECB at Jagdalpur (C.G.) regularly.

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
		The Ambient Air Quality Monitoring Report from Oct, 2022 to Mar, 2023 is enclosed as **Annexure - 5.**
III.	**Water quality monitoring and preservation**	
11)	In case, immediate mining scheme envisages intersection of ground water table, then Environmental Clearance shall become operational only after receiving formal clearance from CGWA. In case, mining operation involves intersection of ground water table at a later stage, then PP shall ensure that prior approval from CGWA and MoEFCC is in place before such mining operations. The permission for intersection of ground water table shall essentially be based on detailed hydro-geological study of the area.	Open cast mining activity is going on much above the ground level and ground water table will not be intersected during ensuing plan period
12)	Project Proponent shall regularly monitor and maintain records w.r.t. ground water level and quality in and around the mine lease by establishing a network of existing wells as well as new piezo-meter installations during the mining operation in consultation with Central Ground Water Authority/ State Ground Water Department. The Report on changes in Ground water level and quality shall be submitted on six-monthly basis to the Regional Office of the Ministry, CGWA and State Groundwater Department/ State Pollution Control Board.	Monitoring of ground water level & quality is being carried out in all four seasons by establishing a network of wells in Buffer Zone & Core Zone and records of the same is also being maintained by the project proponent. The Water quality analysis report and the ground water level monitoring reports for the period of Oct, 22 to Mar, 23 are enclosed as **Annexure– 5.** One no. of piezometer along with five nos. of flow meters have already been installed at the mines. The ground water level and quality report is being submitted to Regional office of the Ministry, CGWA and State Groundwater Department/ CECB Raipur (C.G.) regularly.
13)	The Project Proponent shall undertake regular monitoring of natural water course/ water resources/ springs and perennial nallahs existing/ flowing in and around the mine lease including upstream and downstream.Sufficient number of gullies shall be provided at appropriate places within the lease for management of water.The parameters to be monitored shall include their water quality vis-à-vis	Regular Monitoring is being done as per guidelines. Record of Monitoring Data is being maintained and submitted to MoEF&CC Regional Office, CGWB, CECB and CPCB. Sufficient numbers of garland drains have been provided at haul roads, at the toe of the waste dump and along the leasehold area within the lease for management of water. Besides, a series of Garland drains inter-

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
	suitability for usage as per CPCB criteria and flow rate.It shall be ensured that no obstruction and/ or alteration be made to water bodies during mining operations without justification and prior approval of MoEFCC.The monitoring of water courses/ bodies existing in lease area shall be carried out four times in a year viz. pre-monsoon (April May), monsoon (August), post-monsoon (November) and winter (January) and the record of monitored data may be sent regularly to Ministry of Environment, Forest and Climate Change and its Regional Office, Central Ground Water Authority and Regional Director, Central Ground Water Board, State Pollution Control Board and Central Pollution Control Board. Clearly showing the trend analysis on six-monthly basis.	connecting the settling ponds have been also provided at mines. Assessment of adequacy of these garland drains and design of retaining walls at Kachche Aridongri iron Ore Mines have been carried out by NIT, Raipur. No waterbody is passing through the mining lease, therefore, no obstruction/alteration of waterbody is required for Kachche Aridongri iron Ore Mines.
14)	Quality of polluted water generated from mining operations which include Chemical Oxygen Demand (COD) in mines run-off; acid mine drainage and metal contamination in runoff shall be monitored along with Total Suspended Solids (TDS), Dissolved Oxygen (DO), pH and Total Suspended Solids (TSS). The monitored data shall be uploaded on the website of the company as well as displayed at the project site in public domain, on a display board, at a suitable location near the main gate of the Company. The circular No. J-20012/1/2006-IA.II (M) dated 27.05.2009 issued by Ministry of Environment, Forest and Climate Change may also be referred in this regard.	There will be no effluent generation from the mine as the existing mine has adopted to maintain Zero Liquid Discharge (ZLD) at all times. Domestic waste water is being treated in septic tank followed by soak pit. Discharge if any from the soak pit is being used for plantation. The waste water from beneficiation plant will be recycled to thickener. Fresh water will be used as make up water in thickener. Besides, a series of settling ponds interconnected with network of garland drains have been constructed at mines to arrest the wash-off. 6 Nos. of boulder check dams having 4m width and 2m height followed by ground water recharge structure have been constructed to arrest the silt and to recharge the ground water by overflow water of these check dams.
15)	Project Proponent shall plan, develop and implement rainwater harvesting measures on long term basis to augment ground water resources in the area in consultation with Central Ground Water Board/ State Groundwater Department. A report on	Ground water recharge is being carried out through recharge ponds, collecting rain water in mine sump, ground water recharge structures with boulder check dams and roof top rain water harvesting structures. Following Rain water harvesting measures

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
	amount of water recharged needs to be submitted to Regional Office MoEFCC annually.	have been adopted by GPIL in the Kachche Aridongri Iron Ore Mines. a)Two nos. of ponds has already been constructed by project proponent which is capable of recharging 33150 cu.m water annually. b)111457.50 cu.m/year rain water is being recharged through mine sump constructed at the bottommost bench of the quarry. c) 13 nos. of recharge structure of 1 m dia. & 2.0 m depth has been constructed at Aridongri Mines which is capable of recharging of 1560 cu.m water per year. d)6 Nos. of recharge structure of 1.5 m dia. & 2.0 m depth with check dams have been constructed at Aridongri Mines which is capable of recharging of 30000 cu.m water per year. Copy of rain water harvesting study report of Kachche Aridongri Iron Ore Mines is enclosed **as Annexure- 6.**
16)	Industrial waste water (workshop and waste water from the mine) should be properly collected and treated so as to conform to the notified standards prescribed from time to time. The standards shall be prescribed through Consent to Operate (CTO) issued by concerned State Pollution Control Board (SPCB). The workshop effluent shall be treated after its initial passage through oil and grease trap.	Since mining equipment is deployed by the Mine Developer cum Operator (MDO), Major repairing and overhauling etc. is done by them outside the lease through their equipment supplier/vendor, therefore, workshop has not been constructed within the lease. Only minor repairs are done within the lease. Therefore, no workshop effluent will be generated from the mines. There will be no effluent generation from the mine as the existing mine has adopted to maintain Zero Liquid Discharge (ZLD) at all times. Domestic waste water is being treated in septic tank followed by soak pit. Discharge if any from the soak pit is being used for plantation. The waste water from beneficiation plant will be recycled to thickener/ used for plantation. Fresh water will be used as make up water in thickener. Besides, a series of settling ponds interconnected with network of garland drains have been constructed at mines to

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
		arrest the wash-off. 6 Nos. of boulder check dams having 4m width and 2m height followed by ground water recharge structure have been constructed to arrest the silt and to recharge the ground water by overflow water of these check dams.
17)	The water balance/ water auditing shall be carried out and measure for reducing the consumption of water shall be taken up and reported to the Regional Office of the MoEF&CC and State Pollution Control Board/ Committee.	Agree, water audit has been carried out by TUV India Pvt. Ltd. The copy of the same is enclosed as **Annexure – 7.**
IV.	**Noise and vibration monitoring and prevention**	
18)	The peak particle velocity at 500m distance or within the nearest habitation, whichever is closer shall be monitored periodically as per applicable DGMS guidelines.	The peak particle velocity monitoring using "Micromate Seismograph" of Instantel Canada make is already being carried out regularly within the stipulated distance near mines office (Approx. 400 m) to determine the ground vibration induced due to blasting as per applicable DGMS guidelines.
19)	The illumination and sound at night at project sites disturb the villages in respect of both human and animal population. Consequent sleeping disorders and stress may affect the health in the villages located close to mining operations. Habitations have a right for darkness and minimal noise levels at night. PPs must ensure that the biological clock of the villages is not disturbed; by orienting the flood lights/ masks away from the villagers and keeping the noise levels well within the prescribed limits for day / night hours.	Illumination and sound level are regularly being monitored by the project proponent and are within the statutorily permitted level.
20)	The Project Proponent shall take measures for control of noise levels below 85 dBA in the work environment. The workers engaged in operations of HEMM, etc. should be provided with ear plugs/ muffs. All personnel including laborers working in dusty areas shall be provided with protective respiratory devices along with adequate training, awareness and information on safety and health aspects.	The following mitigation measures is/ will adopt to control noise levels below 85 dBA: • Selection of low noise generating machinery/Equipment. • Provision of rubber padding/noise isolators/silencers to modulate the noise generated by machinery/ equipment, whenever possible. • Provision of protective devices like earmuff/ plugs for the workers.

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
	The PP shall be held responsible in case it has been found that workers/ personals/ laborers are working without personal protective equipment.	• Preventive maintenance of machinery/equipment and vehicles. • The high noise zones at site will be properly mark, information on noise, the risk of exposure to noise and the appropriate measures shall be displayed at site work place. • Appropriate training and education are being given to the workers. • Regular monitoring of ambient noise level as per the monitoring plan is being carried out.
V.	**Mining plan**	
21)	The Project Proponent shall adhere to approved mining plan, inter alia, including, total excavation (quantum of mineral, waste, over burden, inter burden and top soil etc.); mining technology; lease area; scope of working (method of mining, overburden & dump management, O.B. & dump mining, mineral transportation mode, ultimate depth of mining, concurrent reclamation and reclamation at mine closure; land-use of the mine lease area at various stages of mining scheme as well as at the end-of-life; etc.).	Agree and being complied.
22)	The land-use of the mine lease area at various stages of mining scheme as well as at the end-of-life shall be governed as per the approved Mining Plan. The excavation vis-à-vis backfilling in the mine lease area and corresponding afforestation to be raised in the reclaimed area shall be governed as per approved mining plan. PP shall ensure the monitoring and management of rehabilitated areas until the vegetation becomes self-sustaining. The compliance status shall be submitted half-yearly to the MoEFCC and its concerned Regional Office.	Agreed and Approved Mining plan is being/ will be followed. Plantation in the inactive terraces of waste dumps are being carried out.
VI.	**Land reclamation**	
23)	The Overburden (O.B.), waste and topsoil generated during the mining operations	At present top soil generation is nil. However, topsoil generated in future will be stacked

<table>
<tr><th>SN</th><th>CONDITIONS</th><th>COMPLIANCE AS ON DATE 31.03.2023</th></tr>
<tr><td></td><td>shall be stacked at earmarked OB dump site(s) only and it should not be kept active for a long period of time. The physical parameters of the OB/ waste dumps/ topsoil dump like height, width and angle of slope shall be governed as per the approved Mining Plan and the guidelines/ circulars issued by D.G.M.S. The topsoil shall be used for land reclamation and plantation.</td><td>separately and will be utilised for plantation purpose. OB generated during mining is being stacked at earmarked places with proper terracing as per the approved Review of Mining Plan.</td></tr>
<tr><td>24)</td><td>The slope of dumps shall be vegetated in scientific manner with suitable native species to maintain the slope stability, prevent erosion and surface run off. The selection of local species regulates local climatic parameters and help in adaptation of plant species to the microclimate. The gullies formed on slopes should be adequately taken care of as it impacts the overall stability of dumps. The dump mass should be consolidated with the help of dozer/compactors thereby ensuring proper filling/ levelling of dump mass. In critical areas, use of geo textiles/ geo-membranes/ clay liners/ Bentonite etc. Shall be undertaken for stabilization of the dump.</td><td>Waste dump has been formed by proper terracing (Benching) with average height of individual terrace as 10 m. Average dump slope is 26.07° which is within range and below 28° as permitted. Waste Dump stability analysis has been carried out by Department of Mining Engineering, NIT Raipur

Photographs showing the existing waste dump with proper terracing are enclosed as Annexure - 8.

Plantation in the inactive terraces of waste dumps are being carried out.

To stabilize the inactive terraces of dumps seeding of StyloHamata Grass was also done during the monsoon period.

Photographs showing the plantation carried out in waste dumps are enclosed as Annexure – 9.</td></tr>
<tr><td>25)</td><td>Catch drains, settling tanks and siltation ponds of appropriate size shall be constructed around the mine working, mineral yards and Top Soil/OB/Waste dumps to prevent run off of water and flow of sediments directly into the water bodies (Nallah/ River/ Pond etc.). The collected water should be utilized for watering the mine area, roads, green belt development, plantation etc. The drains/ sedimentation sumps etc. shall be de-silted regularly, particularly after monsoon season, and</td><td>Five Nos. of siltation ponds having following size having adequate silt storage capacity have been provided at mines:

<table>
<tr><th>Sl. No.</th><th>Settling Pit Location</th><th>Area</th><th>Unit</th></tr>
<tr><td>1</td><td>Settling Pit near WB No. 6 at the toe of waste dump</td><td>4591.935</td><td>Sq.m</td></tr>
<tr><td>2</td><td>Settlin Pit near</td><td>3188.977</td><td>Sq.m</td></tr>
</table>
</td></tr>
</table>

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
	maintained properly.	<table><tr><td></td><td>WB No. 6 at the toe of waste dump 2</td><td></td><td></td></tr><tr><td>3</td><td>Settling Pit on Western side of Weighbridge 5</td><td>13190.24</td><td>Sq.m</td></tr><tr><td>4</td><td>Settling Pit in North Western part of lease</td><td>4621.362</td><td>Sq.m</td></tr><tr><td>5</td><td>Settling Pit in Northern part of lease at the toe of waste dump WD1</td><td>400</td><td>Sq.m</td></tr></table> These settling ponds have been interconnected with a series of garland drains. Boulder check dams followed by recharge well have also been constructed after each check dams in these garland drains to arrest silts. These settling pits and garland drains are regularly de-silted after the monsoon. Photograph showing siltation pond within the mining lease is enclosed as **Annexure – 10.**
26)	Check dams of appropriate size, gradient and length shall be constructed around mine pit and OB dumps to prevent storm run-off and sediment flow into adjoining water bodies. A safety margin of 50% shall be kept for designing of sump structures over and above peak rainfall (based on 50 years data) and maximum discharge in the mine and its adjoining area which shall also help in providing adequate retention time period thereby allowing proper settling of sediments/ silt material. The sedimentation pits/ sumps shall be constructed at the corners of the garland drains.	Depending upon the drainage pattern of the area, retaining walls and Garland drains around OB dumps and mineral dumps have already been constructed with siltation ponds to arrest surface run off. Silts and sediments are cleaned and maintained regularly. Check dams followed by ground water recharge structures have been constructed in the garland drains connecting settling pits to arrest the silts and recharge the clean water. Garland drains of approx. 6247 m length having 1.5 to 2 m depth and 1.0 – 2 m width have been constructed inside the mining lease and at the periphery of the mining lease. Out of which 2230 m length of drains

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
		have been constructed connecting the series of settling pits, 2877 m long drains have been constructed along the haul roads and 1140 m long drain have been constructed at the periphery of the mining lease to arrest silt and surface run off. Adequacy assessment of these Garland drains and settling pits have already been carried out by NIT Raipur in 2021. Photographs showing the garland drains are enclosed as **Annexure – 11.**
VII.	**Transportation**	
27)	No transportation of the minerals shall be allowed in case of roads passing through villages/ habitations. In such cases, PP shall construct a 'bypass' road for the purpose of transportation of the minerals leaving an adequate gap (say at least 200 meters) so that the adverse impact of sound and dust along with chances of accidents could be mitigated. All costs resulting from widening and strengthening of existing public road network shall be borne by the PP in consultation with nodal State Govt. Department. Transportation of minerals through road movement in case of existing village/ rural roads shall be allowed in consultation with nodal State Govt. Department only after required strengthening such that the carrying capacity of roads is increased to handle the traffic load. The pollution due to transportation load on the environment will be effectively controlled and water sprinkling will also be done regularly. Vehicular emissions shall be kept under control and regularly monitored. Project should obtain Pollution Under Control (PUC) certificate for all the vehicles from authorized pollution testing centres. [If applicable in case of road transport].	Project proponent has obtained Pollution Under Control (PUC) certificate for all the vehicles from authorized pollution testing centres and loading is carried out in vehicles having PUC Certificates and registered in Khanij Online Web Portal of Govt. of Chhattisgarh. Transportation of the iron ore is being carried out through separate bypass dispatch road which is not passing through the village. Cost incurred for strengthening and widening of the road has been borne by the project proponent. Regular water sprinkling in the road is being carried out by the project proponent to control fugitive dust emission
28)	The Main haulage road within the mine	Sprinkling of water by water tankers at

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
	lease should be provided with a permanent water sprinkling arrangement for dust suppression. Other roads within the mine lease should be wetted regularly with tanker-mounted water sprinkling system. The other areas of dust generation like crushing zone, material transfer points, material yards etc. should invariably be provided with dust suppression arrangements. The air pollution control equipments like bag filters, vacuum suction hoods, dry fogging system etc. shall be installed at Crushers, belt-conveyors and other areas prone to air pollution. The belt conveyor should be fully covered to avoid generation of dust while transportation. PP shall take necessary measures to avoid generation of fugitive dust emissions.	regular interval on haul roads is being done to avoid dust emission during vehicle movement. Water spray in the form of Mist is being done at Feed Hopper, feed and discharge conveyors, transfer points etc. of Crushing and Screening Plant. Fixed type water sprinklers system have been provided in Crushing & screening plant. Dry Fog Dust Suppression System installed in the Crushing & Screening Plant and the same will be installed in the proposed BMQ Beneficiation Plant. Regular monitoring of air quality within the lease area and surround area is being carried out.
VIII.	**Green Belt**	
29)	The Project Proponent shall develop greenbelt in 7.5m wide safety zone all along the mine lease boundary as per the guidelines of CPCB in order to arrest pollution emanating from mining operations within the lease. The whole Green belt shall be developed within first 5 years starting from windward side of the active mining area. The development of greenbelt shall be governed as per the EC granted by the Ministry irrespective of the stipulation made in approved mine plan.	Three tier plantation in 7.5m wide safety zone all along the mine lease boundary has been carried out covering 9100 sapling in 3.768 ha area. Total 100135 nos. saplings planted covering an area on 37.02 Ha. inside of the mining lease areas In addition to the above, plantation of 20100 saplings covering an area of 6.70 ha during the FY 2021-22 & 13000 saplings in 3.5 ha land during FY 2022-23 have also been carried out within the premises. (Certified copy of green belt development is enclosed as (**Annexure – 12**).
30)	The Project Proponent shall carryout plantation/ afforestation in backfilled and reclaimed area of mining lease, around water body, along the roadsides, in community areas etc. by planting the native species in consultation with the State Forest Department/ Agriculture Department/	At present no area has been matured for backfilling. Plantation in the inactive terraces of the waste dump has been carried out in mines. A total of 100135 nos. saplings planted covering an area on 37.02 Hec. inside of the mining lease areas Plantation in the 7.5 m safety zone has also

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
	Rural development department/ Tribal Welfare Department/ Gram Panchayat such that only those species be selected which are of use to the local people. The CPCB guidelines in this respect shall also be adhered. The density of the trees should be around 2500 saplings per Hectare. Adequate budgetary provision shall be made for protection and care of trees.	been carried out. In addition to the above, plantation of 20100 saplings covering an area of 6.70 ha during the FY 2021-22 & 13000 saplings in 3.5 ha land during FY 2022-23 have also been carried out within the premises. (Certified copy of green belt development is enclosed as (**Annexure – 12**).
31)	The Project Proponent shall make alternative arrangements for livestock feed by developing grazing land with a view to compensate those areas which are coming within the mine lease. The development of such grazing land shall be done in consultation with the State Government. In this regard, Project Proponent should essentially implement the directions of the Hon'ble Supreme Court with regard to acquisition of grazing land. The sparse trees on such grazing ground, which provide mid-day shelter from the scorching sun, should be scrupulously guarded/ protected against felling and plantation of such trees should be promoted.	No grazing land falls within the Mining Lease Area. Further Expansion is proposed within the existing Mining lease area.
IX.	**Public hearing and human health issues**	
32)	Project Proponent shall make provision for the housing for workers/ labours or shall construct labour camps within/ outside (company owned land) with necessary basic infrastructure/ facilities like fuel for cooking, mobile toilets, mobile STP, safe drinking water, medical health care, crèche for kids etc. The housing may be provided in the form of temporary structures which can be removed after the completion of the project related infrastructure. The domestic waste water should be treated with STP in order to avoid contamination of underground water.	There is no residential colony for worker & staff in mines area. Labourers/Workers of the mine have been engaged from the local peoples of the neighbouring villages. Further, Guest house with necessary basic infrastructures i.e. fooding, drinking water, sanitation etc. for accommodating GPIL Staff has been constructed at DalliRajahara.
X.	**Corporate Environment Responsibility (CER)**	
33)	The Project Proponent shall submit the time-bound action plan to the concerned	Agreed and the time-bound action plan for undertaking the activities committed during

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
	regional office of the Ministry within 6 months from the date of issuance of environmental clearance for undertaking the activities committed during public consultation by the project proponent and as discussed by the EAC, in term of the provisions of the MoEF&CC Office Memorandum No. 22-65/2017-IA.III dated 30 September, 2020. The action plan shall be implemented within three years of commencement of the project.	public consultation for Environment Clearance of expansion of Kachche Aridongri Iron Ore Mines of Godawari Power &Ispat Limited has been submitted to Regional Officer, CECB Jagadalpur vide letter no. GRIL/ARI/EC/2021-22/01.
XI.	**Miscellaneous**	
34)	The Project Proponent shall prepare digital map (land use & land cover) of the entire lease area once in five years purpose of monitoring land use pattern and submit a report to concerned Regional Office of the MoEF&CC.	Agreed and will be complied. Digital map (land use & land cover) of the entire lease area is enclosed as **Annexure – 13.**
35)	The Project Authorities should inform to the Regional Office regarding date of financial closures and final approval of the project by the concerned authorities and the date of start of land development work.	Presently mine is operational since FY 2009. Upon approval of the Final Mine Closure Plan by Indian Bureau of Mines, the approved Final Mine Closure Plan along-with details of corpus fund will be submitted to the Ministry of Environment & Forests in due course of time.
36)	The Project Proponent shall submit six monthly compliance reports on the status of the implementation of the stipulated environmental safeguards to the MoEFCC& its concerned Regional Office, Central Pollution Control Board and State Pollution Control Board.	Six Monthly EC compliance statusreport is being submitted regularlyto the MoEFCC& Its concerned RO,CPCB and SPCB.
37)	A separate 'Environmental Management Cell' with suitable qualified manpower should be set-up under the control of a Senior Executive. The Senior Executive shall directly report to Head of the Organization. Adequate number of qualified Environmental Scientists and Mining Engineers shall be appointed and submit a report to RO, MoEFCC.	A separate environment management cell with qualified manpower has been set up under the control of senior executive who is reporting directly to mines head.
38)	The concerned Regional Office of the MoEFCC shall randomly monitor compliance	Agreed and will be complied.

SN	CONDITIONS	COMPLIANCE AS ON DATE 31.03.2023
	of the stipulated conditions. The project authorities should extend full cooperation to the MoEFCC officer(s) by furnishing the requisite data/ information/ monitoring reports.	
39)	In pursuant to Ministry's O.M. No. 22-34/2018-IA.III dated 16.01.2020 to comply with the direction made by Hon'ble Supreme Court on 8.01.2020 in W.P.(Civil) No 114/2014 in the matter Common Cause vs Union of India, the mining lease holder shall after ceasing mining operations, undertake regressing the mining area and any other area which may have been disturbed due to other mining activities and restore the land to a condition which is fit for growth of fodder, flora, fauna etc.	Agreed and will be complied.
40)	The Ministry or any other competent authority may alter/ modify the above conditions or stipulate any further condition in the interest of environment protection.	Agreed
41)	Concealing factual data failure to comply with any or submission of false/ fabricated data and of the conditions mentioned above may result in withdrawal of this clearance and attract action under the provisions of Environment (Protection) Act, 1986.	Agreed.

Saya.

SUPPORTING DOCUMENTS

INCLUDE AS

ANNEXURES

ANNEX-I

Expenditure on the Activities Committed During Public Consultation during Environment Clearance for Expansion of Kachche Aridongri Iron Ore Mines of Godawari Power &Ispat Limited

Budgetary plan proposed to address the public concerns : Rs. 610.06 Lakh

Actual Expenditure Details

Sl. No.	Sector	Proposed Activities under CER	Activities Completed	Actual Expenditure, Rs. Lakh		
				FY 2021-22	FY 2022-23	Total
1.	Health Facility	· Providing infrastructure facilities such as beds, medical instruments in medical centres	Renovation of Diagnostic Centre at Bhanupratappur has been completed	32.33	53.51	85.84
		· Organising Heath Camps, Medical Examination,	Health Camps were organized on 11.03.2022 for local villagers.	0.5	0	0.5
		· Ambulance 24x7 to be made available to Parrekodo, Salhe and Markatola villages	24x7 Ambulance facilities have been provided for local neighbouring villagers	43.04	55.30	98.34
2.	Educational Facilities	· Installation of water coolers in Government schools in village Parrekodo, Kachche, Salhe, Bhaisakanhar	Water coolers have been distributed in the schools of village Parrekodo, Kachche, Bhaisakanhar	0.56	0	0.56
		Construction of Toilets in the schools in village Parrekodo, Kachche, Salhe, Bhaisakanhar	Toilets in the schools of Village Kachche is under progress	1.5	0	1.5
		Distribution of computers in government schools in village Parrekodo&Kachche	Computers have been distributed in the schools of village Parrekodo, Kachche, Bhaisakanhar	1.08	0	1.08
		Distribution of Classroom Desks, Fan in Govt. Schools Parrekodo,	Fans distributed in schools of Kachche&Parrekodo	0.09	0	0.09

Sl. No.	Sector	Proposed Activities under CER	Activities Completed	Actual Expenditure, Rs. Lakh		
				FY 2021-22	FY 2022-23	Total
		Kachche, Salhe				
		Lab Equipments in Government High school at villages Parrekodo, Kachche, Salhe	Under Process, Equipment Ordered	0	0	0
		Distribution of Sports Kits to the school students for promoting sports in villages, Financial Assistance Educational Trip	Provided to the schools of Kachche and Parrekodo	0.75	0	0.75
		Engagement of Community Teachers	15 Community Teachers have been engaged in the Govt. Schools of Nearby Villages of Kachhe Aridongri Iron Ore Mines	10.14	10.85	20.99
3.	Infrastructure Development	Construction of Pucca roads, Waiting Shed,	Construction of CC Road from Kachche to Kola Chowk (Rail Over bridge) completed &constrction of 2 km long RCC road from Salhe to Kachche Village Completed. Its further widening is under progress	146.63	0.17	146.8
		Construction of Overhead tanks, piping, drainages & internal roads	RCC road from First Aid Centre to Dafaipara Completed & Repairing of water pipelines	26.88	0	26.88
		Provision of Street Light & operation cost of street light installed at Kachche	Street Light Pole Erection, Complete Fitting & Marking from KachcheChowk to Kola Chowk completed, operation cost of street light installed at Kachche	8.64	2.96	11.60
		Renovation of Sheetla Temple	Construction of Community Kitchen Room & Community Store Room at Premises of Sheetala Temple, Parrekodo	1.98	-	1.98
		Construction of Chabutara in Salhe,	Construction of Rangmanch at Dafaipara	7.73	15.43	23.16

Sl. No.	Sector	Proposed Activities under CER	Activities Completed	Actual Expenditure, Rs. Lakh		
				FY 2021-22	FY 2022-23	Total
		Parrekodo. Construction of Weekly Market Platform & Shed at Kachche	Completed			
		Traffic Signal at KachcheCowk, Distribution of Visitors Chairs at Village	30 nos. of of Visitors Chairs distributed at Village Kachche	1.46	-	1.46
		Construction of Community Hall, Drains etc in villages	Welcome Gate constructed at Kachche Village. Earthwork for Community hall construction is under progress. Gate Construction of Govt. High School, Parrekodo& Gram PanchayatParrekodo completed. Construction of Boundary Wall & Gate at Thakurdehi Cultural Congregation Point, Parrekodo completed	11.4	-	11.4
		Payment to Gram PanchayatKachche for Infrastructure Development	Payment to Gram PanchayatKachche for Infrastructure Development	-	18.66	18.66
4.	Employment Generation	Skill Development Training for operators, fitters, electricians	In house Training of Employees were conducted	0.10	-	0.1
		Training centres for Ladies (stitching, Embroidery, tailoring etc.)	Free Stitching & Tailoring Center is being operated at Kachhe&Parrekodo village	1.74	0.78	2.52
5	Sanitation and Hygiene	Drains cleaning & Distribution of heigene Pads etc.	Regular Drain Cleaning is being done prior to monsoon. Sanitary napkins were distributed to girl students of schools of Kachche, Parrekodo, Salhe etc.	0.35	-	0.35
		Providing sanitation infrastructure and other facilities under Swachh	Distribution of Toilet Block and construction of Cultural Platform at	2.08	-	2.08

Sl. No.	Sector	Proposed Activities under CER	Activities Completed	Actual Expenditure, Rs. Lakh		
				FY 2021-22	FY 2022-23	Total
		Bharat Abhiyan	Dafaipara completed			
6.	Community Development	Developing Rain Water Harvesting System in School &Panchayat of villages	Amount given in Village Infrastructure Development Fund	15.69	4.50	20.19
		Deepening of Pond, Ghats, wall for storing of rain water	Deepening of Pond in Kachche, Kanker, Garden Development, Landscaping, Electrification, Pre-Cast Chairs, & Fencing Work Near CollectorateKanker	27.73	-	27.73
		Supply of Drinking water by installation of Hand Pumps, Tap water system in villages with the issues of quality of water	Drilling of New Bore Well at Village Dafaipara (Parrekodo) for Drinking Water of Villagers. Water tankers have been engaged for drinking water supply, plantation and dust suppression in villages.	15.72	-	15.72
		Drinking Water	Providing water tankers for safe drinking water in nearby villages of mines	-	8.06	8.06
			Bore well work at village Dafaipara&Parrekodo for drinking water supply	-	3.88	3.88
		Dust Suppression	Water tankers have been engaged for Dust Suppression outside the lease	-	9.50	9.50
		Flag Distribution in the eve of AzadikaAmritMahotsav "HarGharTiranga Campaign" at Village KachcheSalhe&Tekdora	Flag Distribution in the eve of AzadikaAmritMahotsav "HarGharTirangaCampaign" at Village KachcheSalhe&Tekdora	-	0.33	0.33
7.	Afforestation Programs	Plantation of trees at road side of project site	Water tankers have been engaged for plantation.	5.18	4.34	9.52
Total				**363.30**	**188.27**	**551.57**

Status of the Activities Committed During Public Consultation during Environment Clearance for Expansion of Kachche Aridongri Iron Ore Mines of Godawari Power &Ispat Limited

S. No.	Proposed Activities under public hearing commitment scheme		Status of Activities under Public Hearing Commitment
1	Health Facility (Villages- Parrekodo, Salhe, Kachche, Bhaisakanhar)	Providing infrastructure facilities such as beds, medical instruments in medical centers	Completed
		Ambulance 24x7 to be made available to Parrekodo, Salhe and Bhaisakanhar villages	Completed
2	Educational Facilities (Villages- Kachche, Parrekodo, Salhe, Bhaisakanhar)	Installation of water coolers in Government schools in village Parrekodo, Kachche, Salhe, Bhaisakanhar	Completed
		Construction of Toilets in the schools in village Parrekodo, Kachche, Salhe, Bhaisakanhar	Completed in Kachche Village & will be completed in other villages in FY 2023-24 & 2024-25
		Distribution of computers in government schools in village Parrekodo&Kachche	Completed
		Lab Equipment in Government High school at villages Parrekodo, Kachche, Salhe	Completed
		Distribution of Sports Kits to the school students for promoting sports in villages	Completed
		Scholarship to Students for promoting education	Ongoing
		Construction of Playground in schools	Completed
3	Infrastructure Development (Villages- Kachche, Parrekodo, Salhe)	Construction of Pucca roads, Waiting Shed,	Completed
		Construction of Overhead tanks, piping, drainages & internal roads	Completed
		Provision of Street Light	Completed
		Renovation of Sheetla Temple	Completed
		Construction of Chabutara in Salhe, Parrekodo	Completed
		Traffic Signal at KachcheCowk	Completed
		Construction of Community Hall, Drains etc in villages	Land Identified
4	Employment Generation (Village- Salhe, Parrekodo, Bhaisakanhar,	Skill Development Training for operators, fitters, electricians	Completed & will be continued every year
		Training centers for Ladies (stitching, Embroidery, tailoring etc.)	Completed and will be continued every year

S. No.	Proposed Activities under public hearing commitment scheme		Status of Activities under Public Hearing Commitment
	Kachche)		
5	Sanitation and Hygiene	Construction of Nallas for proper drainage system in core area villages	Completed
		Drains cleaning & Distribution of heigene Pads etc.	Completed and will be continued every year
		Providing sanitation infrastructure and other facilities under Swachh Bharat Abhiyan	Completed and will be continued every year
6	Community Development (Villages-Kachche, Parrekodo, Salhe)	Deepening of Pond, Ghats, wall for storing of rain water	Completed
		Beautification of the pond	Completed at Kanker
		Supply of Drinking water by installation of Borewells/Hand Pumps, Tap water system in villages with the issues of quality of water	Completed. Borewells done at Parrekodo, salhe and Kachche Villages
		Providing sanitation & Rain water Harvesting facilities at Common area near Panchayat Bhava n/Schools	Rainwater harvesting facilities completed incillageKachche, Salhe, Parrekodo, Bhaisakanhar

ANNEX-2

J-11015/384/2012-IA.II (M)
Government of India
Ministry of Environment, Forest and Climate Change
Impact Assessment Division

Indira Paryavaran Bhavan,
Prithvi Block, 2nd Floor, Aliganj,
Jor Bagh Road, New Delhi-110 003

Dated: 23rd June, 2021

To

M/s Godawari Power and Ispat Limited
Plot No. 428/2, Phase-I
Industrial Area, Siltara,
Raipur - 493111 (Chhattisgarh)

Subject: Proposal for Environmental Clearance (EC) for Aridongri Iron Ore mine of M/s Godawari Power and Ispat Limited for enhancement of iron ore production from 1.405 MTPA to 2.35 MTPA (Iron Ore 1.8 MTPA & BMQ 0.55 MTPA), Dolerite OB 3.549 MTPA, Interburden (IB) 3.071 MTPA (Total Excavation 9.37 MTPA) along with setting up of Banded Magnetite Quartzite (BMQ) Beneficiation plant of 0.6 MTPA capacity, 250 TPH Iron Ore Screening Pant with magnetic separator for processing of low grade material and 2 MTPA Dolerite Crushing & Screening Plant in 2 modules of 1 MTPA, within the existing mining lease of 138.96 Ha at Village Kachcha, Tehsil Bhanuparatppur, District Uttar Bastar (Kanker), Chhattisgarh [Proposal no: IA/CG/MIN/203724/2021; File No. J-11015/384/2012-IA II(M)] - Environmental Clearance (EC) regarding.

Sir,

This has reference to online proposal no. IA/CG/MIN/203724/2021 dated 17.03.2021 for grant of Environmental Clearance for Aridongri Iron Ore mine for enhancement of iron ore production from 1.405 MTPA to 2.35 MTPA (Iron Ore 1.8 MTPA & BMQ 0.55 MTPA), Dolerite OB 3.549 MTPA, Interburden (IB) 3.071 MTPA (Total Excavation 9.37 MTPA) along with setting up of Banded Magnetite Quartzite (BMQ) Beneficiation plant of 0.6 MTPA capacity, 250 TPH Iron Ore Screening Pant with magnetic separator for processing of low grade material and 2 MTPA Dolerite Crushing & Screening Plant in 2 modules of 1 MTPA, within the existing mining lease of 138.96 Ha at Village Kachcha, Tehsil Bhanuparatppur, District Uttar Bastar (Kanker), Chhattisgarh. The mine lease area falls under the Survey of India Toposheet No 64 H/3 and bounded by Latitude 20°24'09.33942"N to 20°25'01.51454"N and longitude

Annex-3

TheHitavada

Main Paper Raipur | 2021-07-01 | Page- 5
ehitavada.com

NOTICE

This is to inform that M/s Godawari Power & Ispat Limited having its registered office at plot no.428/2, Phase-I, Siltara Industrial Area, District Raipur, C.G. has received an Environment Clearance from Ministry of Environment, Forests & Climate Change, Government of India, New Delhi vide letter no. F. No.J-11015/384/2012-IA.II(M) dated 23rd June, 2021 for Enhancement of Iron Ore Production capacity from 1.405 MTPA to 2.35 MTPA (Iron Ore 1.8 MTPA & BMQ 0.55 MTPA), Dolerite OB 3.949 MTPA, Interburden (IB) 3.071 MTPA (Total Excavation 9.37 MTPA) along with setting up of Banded Magnetite Quartzite (BMQ) Beneficiation plant of 0.60 MTPA capacity, 250 TPH Iron Ore Screening Plant with magnetic separator for processing of low grade material and 2 MTPA Dolerite Crushing & Screening Plant in 2 modules of each 1 MTPA, within the existing mining lease of 138.96 ha. in RF 608 New (139 Old) at Village : Kachehe (Aridongri), Tahsil: Bhanupratappur, Forest Division: East Bhanupratappur, District: North Bastar (Kanker) and the same is available with CECB and at Ministry's website at http://environmentclearance.nic.in

For Godawari Power & Ispat Limited

Y.C. Rao
Company Secretary

दैनिक भास्कर रायपुर 01-07-2021

सूचना

सर्वसाधारण को सूचित किया जाता है कि मेसर्स गोदावरी पावर एण्ड इस्पात लिमिटेड (रजिस्टर्ड ऑफिस प्लाट नंबर- 428/2, फेस-1, इण्डस्ट्रीयल एरिया, सिलतरा-493111, जिला रायपुर, छ.ग.) को पर्यावरण, वन एवं जलवायु परिवर्तन मंत्रालय, भारत सरकार, नई दिल्ली के पत्र क्रमांक F. No. J-11015/384/2012-IA.II(M) दिनांक 23 जून, 2021 द्वारा जिला उत्तर बस्तर (कांकेर) वन मंडल पूर्व भानुप्रतापपुर, वन कक्ष क्रमांक 608 नया (139 पुराना) ग्राम कच्चे (आरीडोंगरी) छ.ग. स्थित विद्यमान खनिपट्टा 138.96 हेक्टेयर क्षेत्र पर लौह अयस्क उत्पादन क्षमता वृद्धि 1.405 एमटीपीए से 2.35 एमटीपीए (लौह अयस्क 1.8 एमटीपीए और BMQ 0.55 एमटीपीए), Dolerite OB 3.949 एमटीपीए, Interburden (IB) 3.071 एमटीपीए (कुल उत्खनन 9.37 एमटीपीए) के साथ-साथ Banded Magnetite Quartzite (BMQ) बेनिफिकेशन प्लांट की क्षमता 0.60 एमटीपीए, निम्न ग्रेड मेटेरियल प्रोसेसिंग के लिए मैग्नेटिक सेपरेटर के साथ 250 टन प्रति घंटा लौह अयस्क स्क्रीनिंग प्लांट और 1 एमटीपीए के 2 मॉडयूल में 2 एमटीपीए डोलराइट क्रशिंग और स्क्रीनिंग प्लांट स्थापित किये जाने हेतु पर्यावरणीय स्वीकृति प्राप्त हुई है जिसकी जानकारी छत्तीसगढ़ पर्यावरण संरक्षण मंडल एवं मंत्रालय के वेबसाईट **http:/environmentclearance.nic.in** पर उपलब्ध है।

सामने गोदावरी पावर एण्ड इस्पात लिमिटेड

वाई. सी. राव
कंपनी सचिव

Three nos. of Continuous Online Ambient Air Quality Monitoring Stations (One in upwind direction and Two nos. in Downwind direction) for monitoring PM_{10}, $PM_{2.5}$, SO_2, NO_2 etc. have been installed in the lease area.

Photograph showing the online ambient air quality monitoring stations is given at **Annexure- 4.**

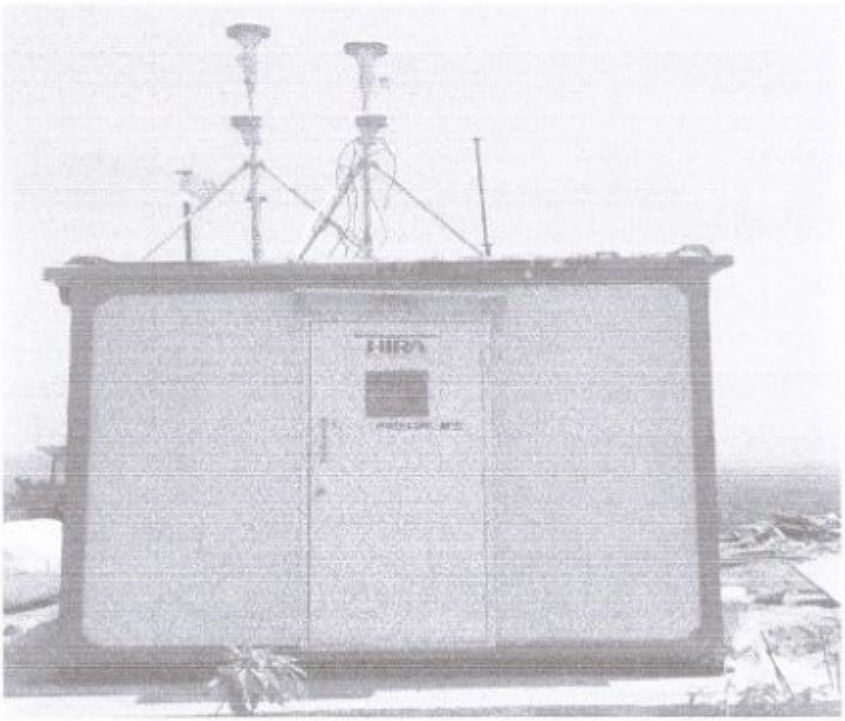
Ambient air quality monitoring is being carried out periodically at four locations in the core zone as well as buffer zone for measurement of PM10, PM2.5, SO2, NOx.

Ambient air quality monitoring data are being digitally displayed in the front of main gate of the mines site.

Annexure- 4

Continuous Ambient Air Quality Monitoring Station 1

Continuous Ambient Air Quality Monitoring Station 2



Continuous Ambient Air Quality Monitoring Station 3

Annexure 5

AMBIENT AIR QUALITY MONITORING REPORT

(OCT, 22 to MARCH, 23)

SN	Location	Parameter	Result (µg/m3)					
			Oct, 22	Nov,22	Dec,22	Jan,23	Feb,23	Mar,23
Core Zone								
1	Near Admin Building	PM10 (µg/m3)	74.6	80.3	83.5	80.2	74.8	71.5
		PM2.5 (µg/m3)	30.8	32.7	37.3	35.6	30.7	32.5
		SO_2 (µg/m3)	18.9	19.5	21.0	24.0	20.9	19.9
		NOx (µg/m3)	26.7	28.0	28.3	30.4	24.8	23.9
2	Near Work Face	PM10 (µg/m3)	82.9	88.2	87.2	90.5	81.6	78.4
		PM2.5 (µg/m3)	38.7	43.0	41.9	43.7	38.6	35.4
		SO_2 (µg/m3)	21.7	22.6	17.6	26.7	25.9	24.6
		NOx (µg/m3)	30.5	32.8	19.2	32.9	20.4	21.4
Buffer Zone								
3	Village-Kachche	PM10 (µg/m3)	52.5	60.5	61.8	65.3	61.5	63.5
		PM2.5 (µg/m3)	22.6	28.2	26.3	29.4	25.4	26.9
		SO_2 (µg/m3)	12.7	15.0	15.0	17.3	15.2	15.2
		NOx (µg/m3)	10.0	17.5	12.8	14.1	11.5	11.9
4	Village-Parrekodo	PM10 (µg/m3)	50.1	55.3	58.5	60.6	58.3	61.5
		PM2.5 (µg/m3)	18.5	23.4	25.4	31.4	22.7	23.7
		SO_2 (µg/m3)	11.6	12.4	13.5	15.7	12.5	12.1
		NOx (µg/m3)	9.3	10.7	10.6	12.8	10.2	11.4

GROUND WATER ANALYSIS REPORT

(OCT, 22 to MARCH, 23)

SN	Parameters	As per IS 10500 : 2012		Oct - 22		Nov -22		Dec -22		Jan -23		Feb -23		Mar -23		Analysis Methods
		Acceptable Limit	Permissible limit	Vill-Kachche	Vill-Salhe	Vill-Kachche	Vill-Salhe	Vill-Kachche	Vill-Salhe	Vill-Kachche	Vill Salhe	Vill-Kachche	Vill-Salhe	Vill-Kachche	Vill-Salhe	
PHYSICAL ANALYSIS																
1	Colour, Hazen unit	5	15	Colourless	Colourless	Colourless	Colourless	Colourless	Colourless	Colourless	Colourless	Colourless	Colourless	Colourless	Colourless	IS:3025 (4)
2	Odour	Agreeable	Agreeable	Unobjectionable	Unobjectionable	Unobjectionable	Unobjectionable	Unobjectionable	Unobjectionable	Unobjectionable	Unobjectionable	Unobjectionable	Unobjectionable	Unobjectionable	Unobjectionable	IS:3025 (5)
3	Taste	Agreeable	Agreeable	Agreeable	Agreeable	Agreeable	Agreeable	Agreeable	Agreeable	Agreeable	Agreeable	Agreeable	Agreeable	Agreeable	Agreeable	IS:3025 (7)
4	Turbidity, NTU,	1	5	0.7	0.5	0.6	0.7	0.9	0.8	0.7	0.6	0.8	0.7	0.5	0.6	IS:3025 (x)
5	Dissolved solids mg/l	500	2000	356	324	385	370	418	395	410	385	394	362	380	354	IS:3025 (16)

CHEMICAL ANALYSIS

6	PH Value	6.5 - 8.5	No relaxation	7.26	7.5	7.38	7.40	7.48	7.60	7.38	7.45	7.46	7.52	7.42	7.48	IS:3025 (11)
7	Hardness (T) $CaCO_3$)mg/l	200	600	138	124	142	136	156	142	152	160	168	154	150	158	IS:3025 (21)
8	Calcium (Ca)mg/l	75	200	30	20	40	32	46	39	42	45	46	40	40	36	IS:3025 (40)
9	Magnesium (Mg) mg/l	30	100	18	12	22	16	18	13	16	20	18	14	16	12	IS:3025 (46)
10	Iron (Fe) mg/l	0.3	No relaxation	0.16	0.18	0.2	0.19	0.17	0.14	0.15	0.18	0.16	0.13	0.14	0.15	IS:3025 (53)
11	Chloride (Cl) mg/l	250	1000	27	20	34	22	38	29	32	36	30	28	26	24	IS:3025 (32)
12	Free Residual Chlorine, mg/l	0.2	1	Nil	Nil	Nil	Nil	Nil	Nil	Nil	Nil	Nil	Nil	Nil	Nil	IS:3025 (35)
13	Lead (as Pb) mg/l	0.01	No relaxation	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	IS:3025 (47)
14	Manganese (as Mn) mg/l	0.1	0.3	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	APHA-3111B

BIOLOGICAL ANALYSIS

15	E. Coli (Bacteria count)	0/100ml	0/100ml	Nil	Nil	Nil	Nil	Nil	Nil	Nil	Nil	Nil	Nil	Nil	Nil	IS:1622:1981

GROUND WATER LEVEL MONITORING REPORT

(Oct, 22 to MARCH, 23)

SN	Location of Well	Ground Water Level (mbgl)	
		Oct,22	March, 22
1	Near Vill. - Parrekodo	3.9	5.3
2	Near Vill. – Bhainsa Kanhar	4.3	6..1
3	Near Vill. - Salhe	5.0	7.5
4	Near Vill. - Kachche	4.2	5.8

Annex- 6

2021

HIRA
GODAWARI POWER & ISPAT

REPORT ON "IMPLEMENTATION OF ARTIFICIAL RECHARGE STRUCTURES AND ITS RECHARGE QUANTUM CALCULATION OF ARIDONGRI IRON ORE MINES GODAWARI POWER & ISPAT LIMITED LEASE AREA : 138.96 HA

VILLAGE : KACHCHE, TAHSIL : BHANUPRATAPPUR, DIST. : KANKER (C.G.)

वास्ते गोदावरी पावर & इस्पात लिमिटेड

अधिकृत हस्ताक्षरकर्ता
गंगा राम वर्मा
उपाध्यक्ष (खान) एवं प्रभारी
आरीडोंगरी लौह अयस्क खदान

GODAWARI POWER & ISPAT LTD. HIRA

HYDRO

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REPORT ON "RAIN WATER HARVESTING AT
KACHCHE ARIDONGRI IRON ORE MINES M/S GODAWARI POWER & ISPAT LIMITED
VILLAGE: KACHCHE, TAHSIL: BHANUPRATAPPUR, DIST.: KANKER (C.G.)

INTRODUCTION:

Kachche Aridongri Iron Ore Mines is a captive open cast Iron ore mines supplying iron ore to the end use plant i.e. steel plant sponge iron plant pellet plant of Godawari Power & Ispat Limited located in Siltara, tehsil : Dharsiwa, Dist. : Raipur (C.G.). The mine is being operated since 16.01.2009 by GPIL.

Approved ROM production capacity of the mines is 1.405 MTPA as per approved Environmental Clearance. Total Lease area of the mine is 138.96 Ha. Out of which 127.40 Ha is forest land and remaining 11.56 Ha is Govt. Revenue patta land. Forest Clearance for entire forest land within the lease has been obtained from Ministry of Environment, Forest & Climate Change.

LOCATION:

The Kachche Aridongri Iron Ore Mines is located in village: Kachche (Aridongri) tehsil: Bhanupratappur, district: Uttar Bastar (Kanker) of Chhattisgarh between latitudes 20°24'09.33642"N to 20°25'01.51454"N and longitudes 81°03'33.73692"E to 81°04'15.28954"E & is covered under the survey of India toposheet no. 64H/3.

The lease is approachable by road & rail. The deposit is located at a distance of 25 km South-West of Dalli-Rajhara, 61 km on North-Western side of Kanker & is about 157 km South-West from Raipur. It is well connected from Raipur, Bhilai & Kanker by all-weather metal road. State Highway SH-07 passes at a distance of 1 km in the East of lease area. Nearest railway station is Dalli- Rajahara Located at a distance of around 25 km, which is on Dalli Rajahara-Jagdalpur branch of South Eastern Railways. Nearest airport is Mana airport, Raipur located at a distance of around 180 km from lease. Location map of Aridongri Iron Ore Mines is given in figure 1.

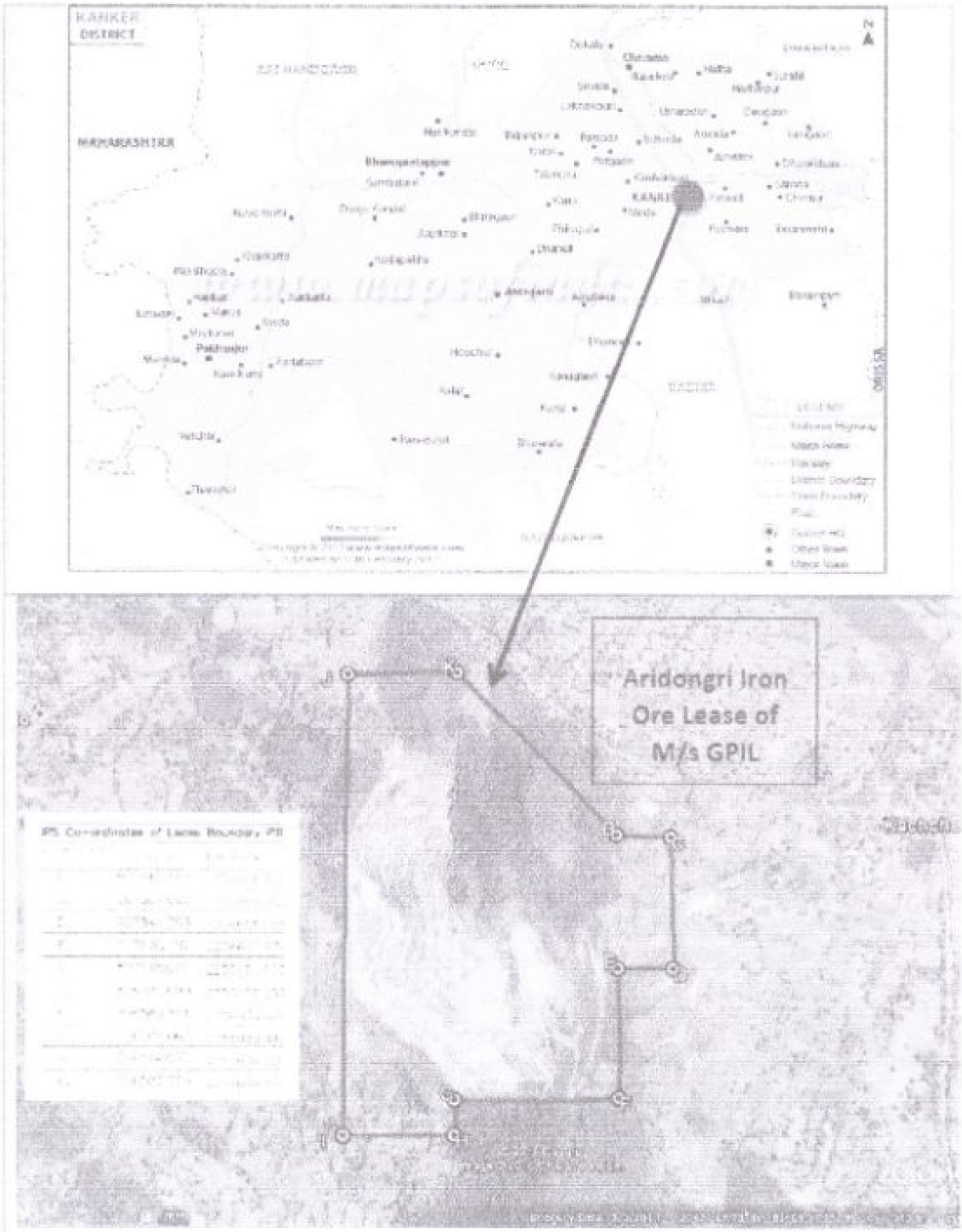


Figure 1 : Location Map of Aridongri Iron Ore Mines

CLIMATE AND RAINFALL:

Aridongri Iron ore mine under Kanker district experiences sub-tropical climate, characterized by extreme summer and extreme winter. The cold season is delightful which it is unpleasantly hot in the summer season. The summer extends from March to May. April and May are the hottest month and the dust storms and heat waves are common during this period. The rainy season extends from June to September with well-distributed rainfall during southwest monsoon. Monsoon generally breaks in the second week of June and rainfall is highest in July and August months. Winter season in the area is marked by dry and cold weather with intermittent showers during the month of December to February.

The normal annual rainfall of the area is 1090 mm. The temperature of the area varies from 39°C to 42°C with a maximum of 48°C in peak summer and 6°C to 13°C in winter. The relative humidity varies from 87% in rainy season to 32% during winter.

GEOMORPHOLOGY AND TOPOGRAPHY:

The study area covering 10 km radius around the proposed industry occupies a highly diversified topography ranging from gently sloping nearly plain low lying grounds to high rising, steep hillocks. The Mining Lease area also occupies a steep hill slope with 1in 2.5 m gradient. It has average elevation of approx. 454 m AMSL (meter, above mean sea level). The topmost point in the mining lease attains elevation of 508 meter above mean sea level (m, AMSL) while the bottom is at 405 to 400 m, AMSL. Digital Elevation map of 10 km buffer zone is given in figure 5.

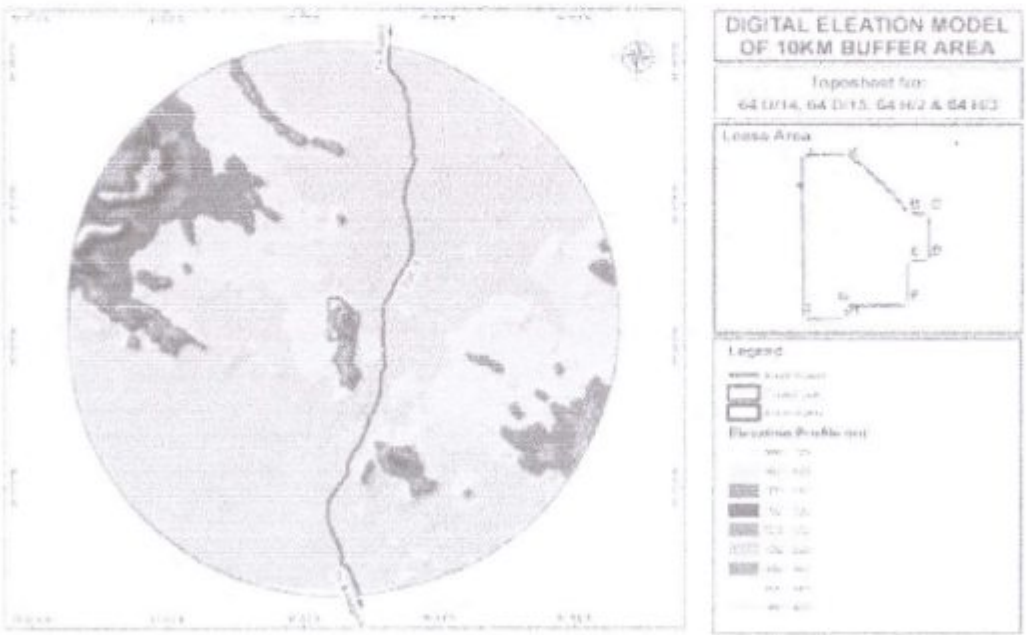


Figure 2 : Elevation Map of 10 Km Buffer Zone of Aridongri Iron Ore Mines

DRAINAGE:

The mining lease area is sloping eastward and forms a part of catchment of Tandula River which in itself is a part of gigantic Mahanadi river basin and no major stream nalla are found in or in close vicinity of mining lease area. All the nearest drainages are not perennial and short-lived i.e. they carry water during rains and go dry immediately after that. The nearest perennial stream being Khandri River, which flows 8.5 km away towards south from mining lease area. The drainage map of the 10 Km radius is given in figure 6. The study area is devoid of canal network from being located at higher elevations. Overall drainage pattern in the study area is sub dendritic, wherein the smaller stream meets with larger at acute angle.

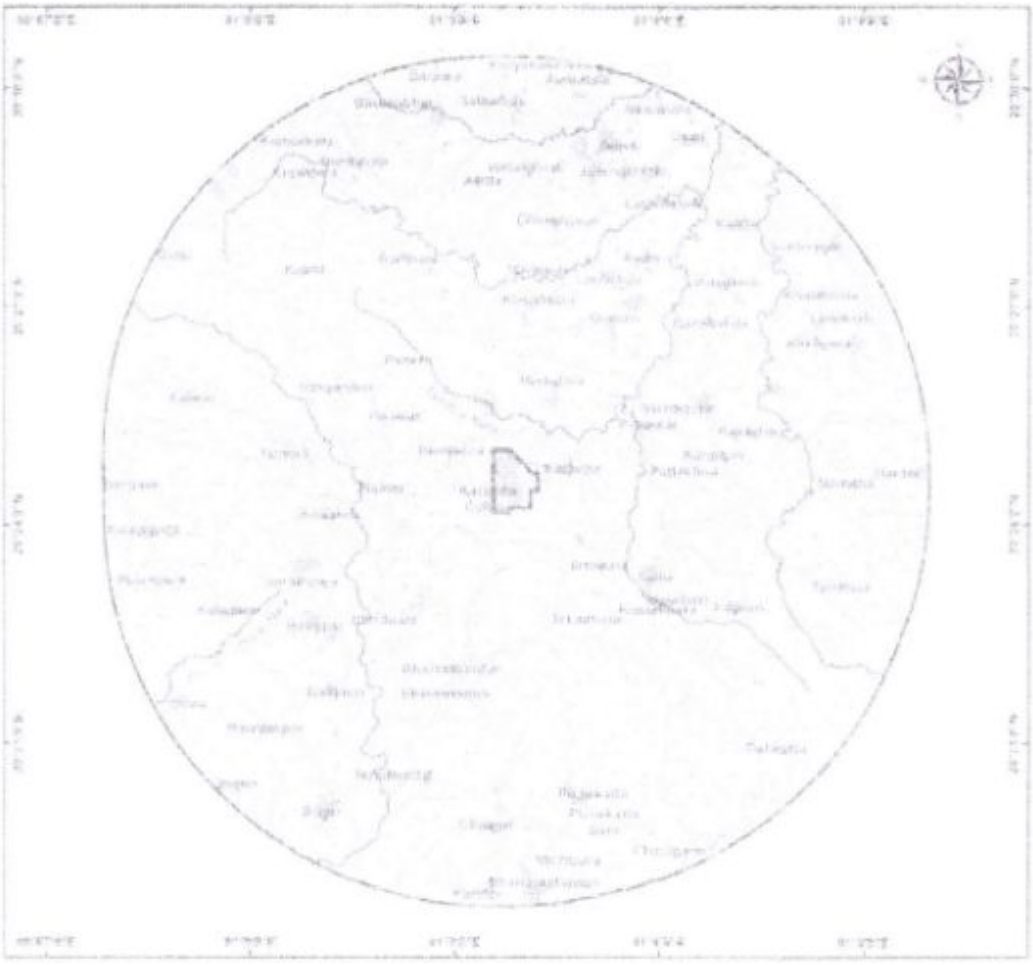


Figure 3: Drainage Map of Core and Buffer Zone of Aridongri Iron Ore Mines.

BRIEF GEOLOGY OF THE AREA:

Geologically the district is covered by met sediments and crystalline of Precambrian constituting Bengpal, Bailadila, Nandgaon, and Abujhamar group of rocks. The formations include Gneisses, Granites, Banded-Heamatite-Quartzite, Rhyolite, and Basalt, acid and basic intrusive. The ground water mainly occurs in phreatic (water table) conditions and at places under semi-confined conditions. Weathered formation thickness varies from 10 to 30 m. In granites, the weathered formation and the fractures in hard rock constitute the aquifers. Invariable the fractures are limited to a depth of 80m. On the regional scale, the study area occupies part of vast Chhattisgarh basin. The intra-cratonic Chhattisgarh basin located within the Central Indian Shield comprises of variety of rock types. The Archean rocks forming the basement are in juxtaposition with the Chhattisgarh sediments.

However, the proposed mining lease area forms a part of the Bailadila iron ore series belonging to the Chhattisgarh Super Group of rock formation. Phyllites, cherty quartzite which grade laterally as well as vertically to Banded Hematite Quartzite (BHQ) and Meta basic schist are exposed in the Kachche Ari-Dongri hill. Geologically the area forms a western continuity of the iron ore formations exposed on the well-known Dalli-Rajhara iron ore deposits located aerially about 20km from the area. In the area three litho logical members of the iron ore namely Banded Hematite Quartzite (BHQ), Ferruginous shale and iron ore are seen. Out of these three units BHQ is much prominently and extensively exposed in the area forming spectacular bluffs and cliffs near the hill top. The cliffs are followed by steep slopes and are mostly covered with BHQ and float ore. The general stratigraphic succession in this area is given in Table 2.

Table 1: Stratigraphic Succession of Study area

Age	Lithology
Quaternary	Recent : Soil, laterite and float ore
Upper Proterozoic	Intrusive : Quartz vein, basic lavas and dykes
Lower Proterozoic	Bailladila Group : Banded Hematite Quartzite, Banded Hematite Jaspar with associated iron ore
Archaeans	Intrusive Bengpal Group: Basic dykes Granite gneiss, migmatite and granite with quartz, mica schist, mica schist, talc-schist, quartz chlorite schist, magnetite quartzite, hornblende schist, pyroxene quartzite.

Source: Approved Review of Mining Plan

HYDROGEOLOGY OF THE AREA

The study area, spreading over 10 km radial distance from the site of mining lease, occupies highly undulating, land occupied by fractured and or weathered Meta-sedimentary rocks belonging to the Bailadila Iron Ore Series of Chhattisgarh Super-group of rocks. It mainly consists of are naceous –argillaceous calcareous rocks and are dominated by limestone dolomite and calcareous shale. The ground water in these formations occurs under water table, semi-confined and confined conditions. The weathered, cavernous and fractured part of the formation constitutes the aquifers in the area. These formations are the most potential in regards to ground water yield and development of the district. The weathered zone is restricted to upper 30 m depth and in exceptional cases it is observed up to 58 m. Most of the cavernous zones occur between 10 and 70 m depth and fractures are productive down to 150 to 200m. In this province, cavernous zones sometimes start just after soil horizon, particularly in the stratified calcareous rocks along the bedding. These caverns provide good channel for ground water movement when free from residual clays.

Most of the solution channels are filled with residual clay and cause hindrance to ground water movement. The gypsum karsts occurring in the Maniyari formation of this province are more productive. Though gypsum is more soluble than calcite, their alternative assemblage with thinly laminated shale provides special condition where dissolution of gypsum laminate causes roof collapses to create larger openings. Artesian conditions are also reported from this province especially in gypsum karstic terrain.

AQUIFER DESCRIPTION [TYPE, DEPTH, STORABILITY, PERMEABILITY AND POROSITY

In the study area Bailadila Group of Paleo Proterozoic age exposed in the southern and western parts of District comprises of chlorite schist, phyllite, talk-tremoliteschist, ortho-quartzite, banded haematite jasper, ferruginous shale with iron ore, ultramafic, Metavolcanic, Meta ruff and Mera conglomerate. Theses formations are occur under the unconfined and semi-confined condition in the study area. The weathered, cavernous and fractured part of the formation constitutes the aquifers in the area. These formations are the most potential in regards to ground water yield and development of the district. The contacts between different formations in this province are generally found productive. The ground water development in this province is through dug wells and bore wells. The dug wells are generally restricted up to 20m whereas bore wells are 30 to 200 m deep.

Laterite of cainozoic age forms an extensive capping over the Nandgaon and Abujmar Group of rocks. The laterite capping is also marked over Tirathgarh sandstone, bailadila and Bengpal group of rocks. Iron ore bearing laterite developed over the banded haematite jasper, ferruginous shale and conglomerate of Bailadila Group is reported in the part of district. The average weathered thickness in the study is 19 m. Most of the potential aquifer is below 50m where an average of 02 sets of fracture may encounter. Although 01 set of fracture may encounter between 50 to 80 m. Average transmissivity is 101 m² per day with an average drawdown of 12 m. The discharge in

this formation ranges from negligible to 8 lps having an average discharge of 2 lps. Cumulative thickness of fracture in this formation is up to 1m. The development in this formation is by the way of tube wells and bore wells.

RECHARGE POTENTIAL AND AREA DETAIL OF THE MINING:

The total water requirement of mines for different mining activities is 300 cum day in 330 mine working days as per the CGWA NOC. The total 300 cum day (and 99000 cum year) water requirement will be met through five existing borewells. Mine site is located at Block-Bhanupratappur, District-Kanker which is coming under Safe zone as per CGWB categorization. However, in order to augment groundwater resources of surrounding area and for betterment of groundwater regime, mine shall implement groundwater recharge measures within the lease area and in the nearby areas. Moreover, as the mining will be done below groundwater table (intersecting water table) in the upcoming plan periods recharge measures need to be adopted to neglect any adverse impacts due to mining activities.

The total Area in the project site, covering 475030.00 sq. m. square meters with an annual average rainfall of 1090 m. The water harvesting potential is the total amount of water that is received in the form of rainfall over an area, out of this, the amount that can be effectively harvested i.e.

Water Harvesting potential = Average Annual Rainfall (m.) * Collection Efficiency

Collection Efficiency = Area of the Catchment (m sq.) * Run Off coefficient

Area and runoff Co-efficient,

Table 02: Land Use of Mining Premises

S.No.	Details	Values
1	Roof top Area (m2)	9880.00
2	Paved Area (Roads+Floor+Parking) (m2)	98000.00
3	Green Belt Area (m2)	76070.00
4	Open Land Area	291080.00
5	Total Area Premises (m2)	475030.00
6	Average Annual rainfall (mm) (Source: Indian Metrological Dept.)	1090
7	Runoff coefficient for roof top	0.85
8	Runoff coefficient for yard & paved area	0.62
9	Runoff coefficient for green belt	0.15
10	Runoff coefficient for open area	0.20

Table 03: Rain Water Harvesting (Rwh) Potential

Estimation of Quantum of runoff available through Rain water harvesting (within premises)					
S No	Particulars	Area (Sqm) (To be filled)	Rain fall (m) (To be filled)	Runoff Coefficient*	Quantum of Run off available (Cum/Year)
	1	2	3	4	5 (2*3*4)
1	Roof Top of building Shed	9880	1.09	0.85	9155.82
2	Road Paved area	98000	1.09	0.65	69433
3	Open Land	291080	1.09	0.20	63455.44
4	Green Belt	76070	1.09	0.15	12437.445
5	Total (sqm)	475030		Total Quantum of available runoff (cum/y)	154479.705

From the above it is observed that a total potential of **154479.70 m^3** of rainfall run-off can be harvested annually from the mining premises.

IMPLEMENTED RAIN WATER HARVESTING AND ADDITIONAL GROUND WATER RECHARGE STRUCTURES:

At present ground water recharge at Aridongri Iron Ore Mines is being carried out through followings.

1. Two Nos. of Ground Water Recharge Ponds
2. 13 nos. of Recharge Well 1 mtr dia * 2 mtr depth.
3. 6 nos of Recharge Well 1.5 mtr dia * 2 mtr depth with Boulder Check dams

Therefore, Mines has constructed two medium recharge ponds with desilting chambers. It is logical that any recharge activity implemented in the area will surely benefit abstraction structures i.e. dug wells and bore wells in the surrounding as well as downstream area. There will be 3 seasons of fillings. Slope of storm water drains shall be maintained in such a way to facilitate natural flow to RWH pond. The harvested water (Evaporation and other handling losses account to 50% reduction) may be utilized for greenbelt development, domestic, sanitation and some other activities increasing the ground water recharge.

Table 04: Details of 2 Nos of Recharge Ponds

S. No	Particulars	Recharge Pond A	Recharge Pond B
1	Area (Sq.m)	3000	2000
2	Depth (m)	4.5	4.3
3	Storage Capacity (cum)	13500	8600
4	No of fillings	3	3
5	Total Capacity (cum)	40500	25800
6	Net recharge (50%)	20250	12900
	Grand Total Recharge	33150 cu. m	

Apart from above ponds rain water is accumulated in the sump (bottommost bench of the quarry for further recharge of ground water. Rain water accumulation calculation in the pit is given below

Table 05: Recharge Quantum of Mine Pit

Serial No	Rainfall in meter	Area of pit (Sq. m)	Rainwater accumulation (Cum)	(50%) Recharge + Evaporation loss (50%)
1	1.1	202650	222915	111457.50

The net water accumulated in the mine pit is 222915cum year. Out of which 111457.50 cum year will be utilized as recharge the ground water to restore ground water. Apart from this, the mines will augment groundwater resources of surrounding area and for betterment of groundwater regime.

GROUND WATER RECHARGE FROM ARTIFICIAL RECHARGE WELL

We have also implemented total 19 nos of recharge structures in which 06 nos of recharge well is of 1.5 m dia x 02 m depth with boulder check dams, & 13 nos of recharge well is of 1 m dia x 2 m depth & 2 check dams.

The complete Rain Water Harvesting structural details and recharge capacity is given in table below

Table 06: Location of Recharge Structures

S.No	Type of Structure	Latitude	Longitude	Location
1.	Recharge Well 1.5 m dia x 02 m depth with Boulder Check Dams	20.416617	81.060233	J point 1
2.	Recharge Well 1.5 m dia x 02 m depth with Boulder Check Dams	20.41001	81.059754	Behind weigh bridge
3.	Recharge Well 1.5 m dia x 02 m depth with Boulder Check Dams	20.414553	81.059483	Mines back side well pitching 2
4.	Recharge Well 1.5 m dia x 02 m depth with Boulder Check Dams	20.415458	81.059503	Mines back side well pitching 1
5.	Recharge Well 1.5 m dia x 02 m depth with Boulder Check Dams	20.416034	81.059728	Mines back side 2
6.	Recharge Well 1.5 m dia x 02 m depth with Boulder Check Dams	20.416602	81.060269	Mines opposite
7.	Check dam	20.412952	81.068311	Near pond
8.	Check dam	20.405514	81.060358	G point 1

Table 07: Recharge Quantum of Artificial Recharge Wells

Sr No	Name of Structure	Size Of Structure	QTY	Recharge Capacity m³ /year	Total rainfall harvested m³ /year

1	Recharge Well	1 m dia x 2 m depth	13	120	1560 m^3
2	Recharge Well with Boulder Check Dams	1.5 m dia x 02 m depth	06	5000	30000 m^3
Total Rain Water Harvested					31560 m^3/year

Table 08: Total Water Harvesting from the Mine

S. No	Particulars	Details
1.	Total Water Requirement as per the CGWA NOC	300 m^3/day or 99000 m^3/annum
2.	Recharge through of Recharge Ponds	**33150 m^3/annum**
3.	Recharge through Mine Pit	**111,457.50 m^3/annum**
4.	Recharge through Artificial Recharge Structures	**31560 m^3/annum**
	Total Net Ground Water through Recharge structures	176167.5
5.	Net Development	178 %
Therefore, net recharge is 178%, which is more than the required rainwater potential for the study area as per the safe zone norms of CGWA.		

PHOTOGRAPHS OF RECHARGE STRUCTURES WITHIN MINING LEASE PREMISES

Rainwater Harvesting Ponds within the Lease Area

PHOTOGRAPHS OF MINE PIT AND GREEN BELT AREA

Existing Mine Working

Green Belt within Mines

Existing Settling Pit

Safety Zone Plantation

PHOTOGRAPHS OF RECHARGE WELL 1.5 MTR DIA. 2 MTR DEPTH WITH BOULDER CHECK DAMS

Structure 01: Recharge Well With Boulder Check Dams
Latitude- 20.416617, Longitude- 81.060233

Structure 02: Recharge Well With Boulder Check Dams
Latitude- 20.41001, Longitude-81.059754

Structure 03: Recharge Well With Boulder Check Dams
Latitude- 20.414553, Longitude- 81.059485

Structure 04: Recharge Well With Boulder Check Dams
Latitude- 20.415458, Longitude- 81.059503

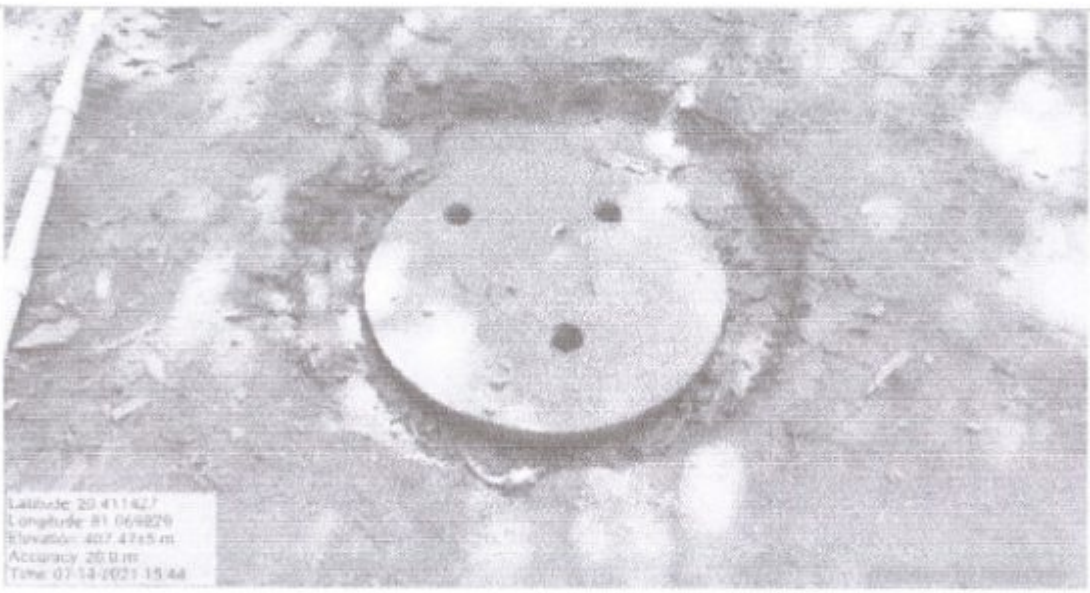
Structure 05: Recharge Well With Boulder Check Dams
Latitude- 20.416034, Longitude- 81.059728

Structure 06: Recharge Well With Boulder Check Dams
Latitude- 20.416602, Longitude- 81.060269

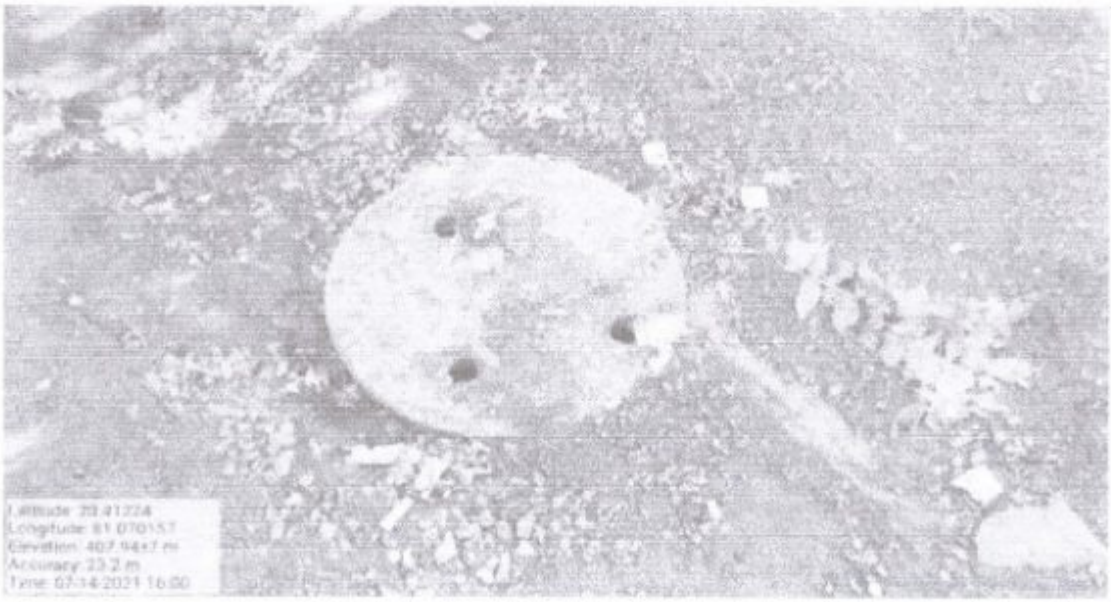
Structure 07: Boulder Check Dams
Latitude- 20.412952, Longitude- 81.068311

Structure 08: Boulder Check Dams
Latitude- 20.405514, Longitude- 81.060358

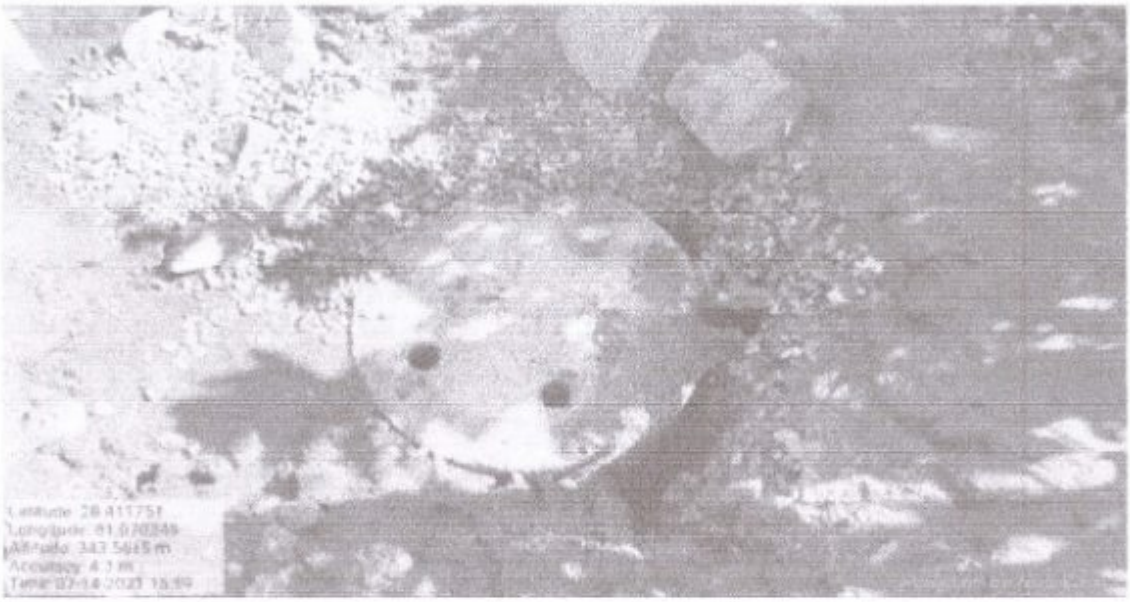
PHOTOGRAPHS OF RECHARGE WELL 1 MTR DIA. 2 MTR DEPTH WITH BOULDER CHECK DAMS



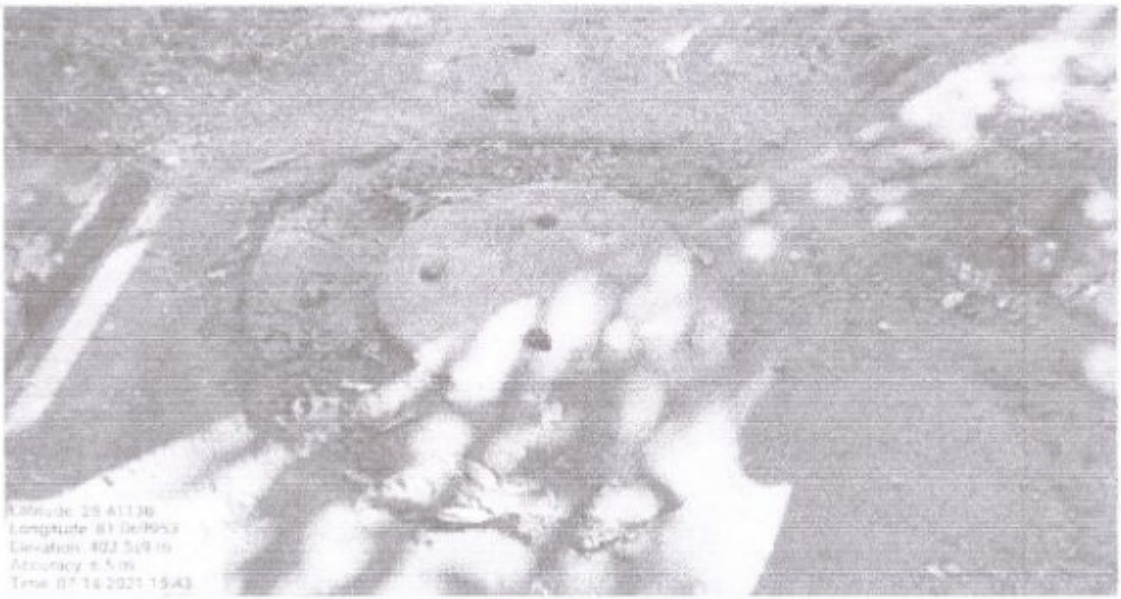
Structure 01 Recharge well 1 m dia 2 m depth



Structure 02 Recharge well 1 m dia 2 m depth



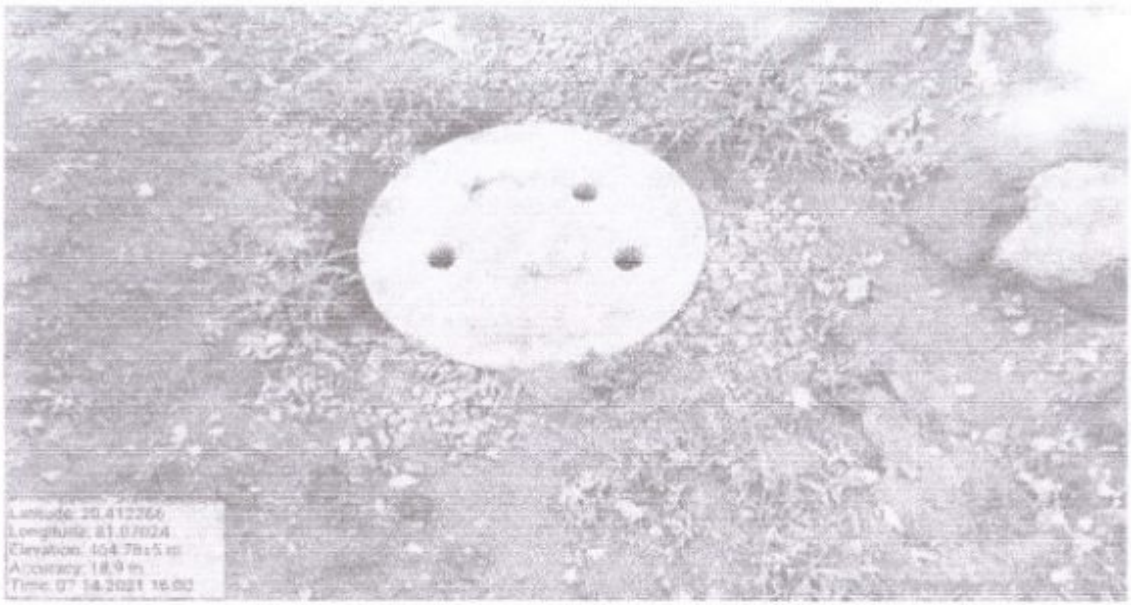
Structure 03 Recharge well 1 m dia 2 m depth



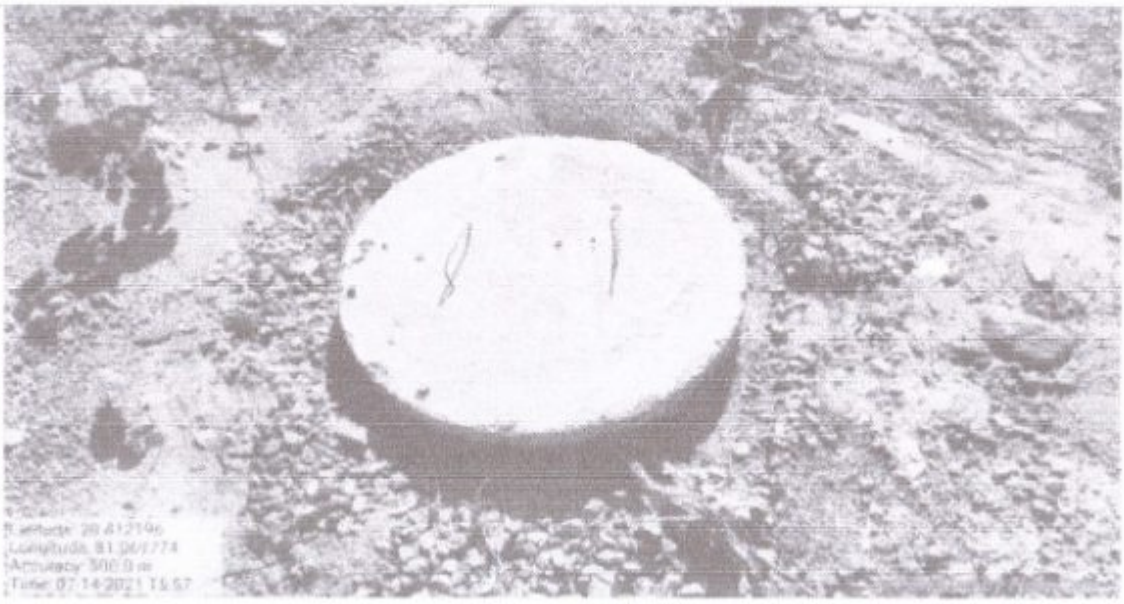
Structure 04 Recharge well 1 m dia 2 m depth

Structure 05 Recharge well 1 m dia 2 m depth

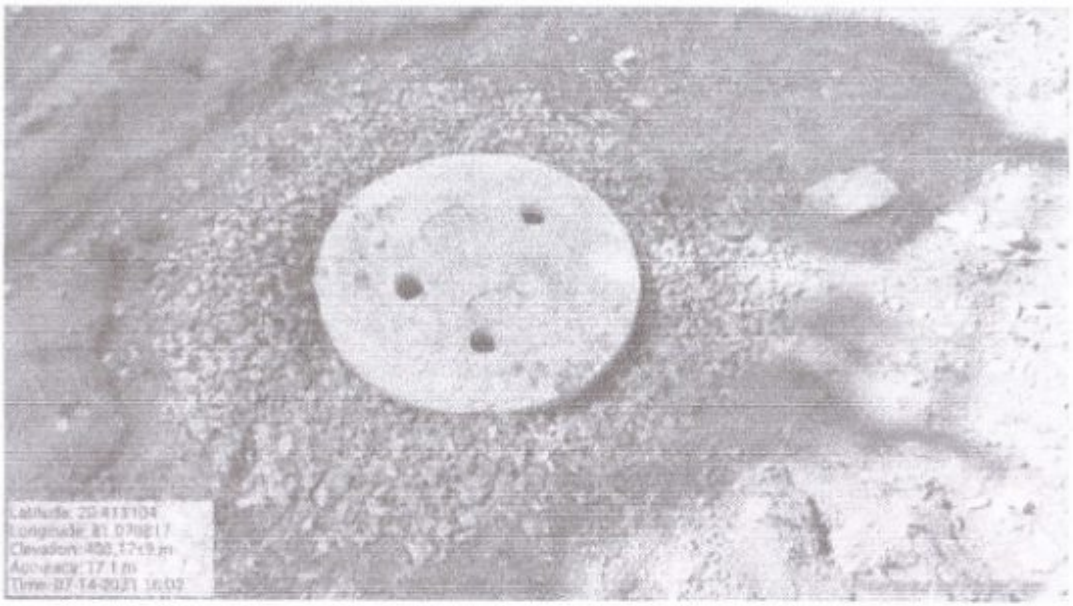
Structure 06 Recharge well 1 m dia 2 m depth



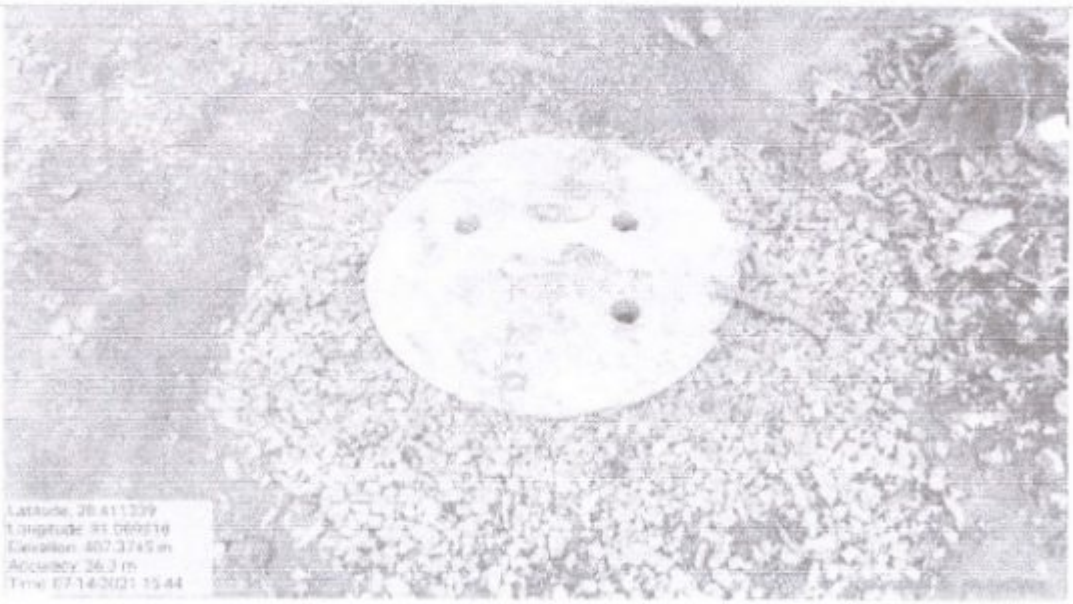
Structure 07 Recharge well 1 m dia 2 m depth



Structure 08 Recharge well 1 m dia 2 m depth



Structure 09 Recharge well 1 m dia 2 m depth



Structure 10 Recharge well 1 m dia 2 m depth

Structure 11 Recharge well 1 m dia 2 m depth

Structure 12 Recharge well 1 m dia 2 m depth

Structure 13 Recharge well 1 m dia 2 m depth

END OF REPORT

Annex-7

Confidential

HIRA

GODAWARI POWER & ISPAT

WATER AUDIT REPORT
OF
ARIDONGRI IRON ORE MINES
GODAWARI POWER & ISPAT LIMITED
VILLAGE: KACHCHE, TAHSIL: BHANUPRATAPPUR, DIST.: KANKER (C.G.)

SUBMITTED BY:

TUV India Pvt. Ltd.
TÜV NORD GROUP
2nd floor, Dhun Building, 827,
Anna Salai, Mount Road,
Chennai, Tamil Nadu 600002.
Email: prabhukiran@tuv-nord.com

29rd March 2021

CERTIFICATE

We certify the following

- The report is based on the data collected during Audit and information provided by the Godawari Power & Ispat Limited.
- The data collection has been carried out diligently and truthfully.
- All data measuring devices used by the team are in good working condition, have been calibrated and have valid certificate from the authorized approved agencies and tampering of such devices has not occurred.
- All reasonable professional skill, care and diligence have been taken in preparing the water audit report and the contents thereof are a true representation of the facts and figures.

Mr. Manjeet Singh

Manjeet Singh

TUV India Pvt Ltd

TÜV NORD GROUP

Table of Contents

List of Figures

Waste dump stability:

Waste dump has been formed by proper terracing (Benching) with average height of individual terrace as 10 m. Average dump slope is 26.07° which is within range and below 28° as permitted. Waste Dump stability analysis has been carried out by Department of Mining Engineering, NIT Raipur

Photographs showing the existing waste dump with proper terracing are enclosed as **Annexure -8.**

Plantation in the inactive terraces of waste dumps are being carried out.

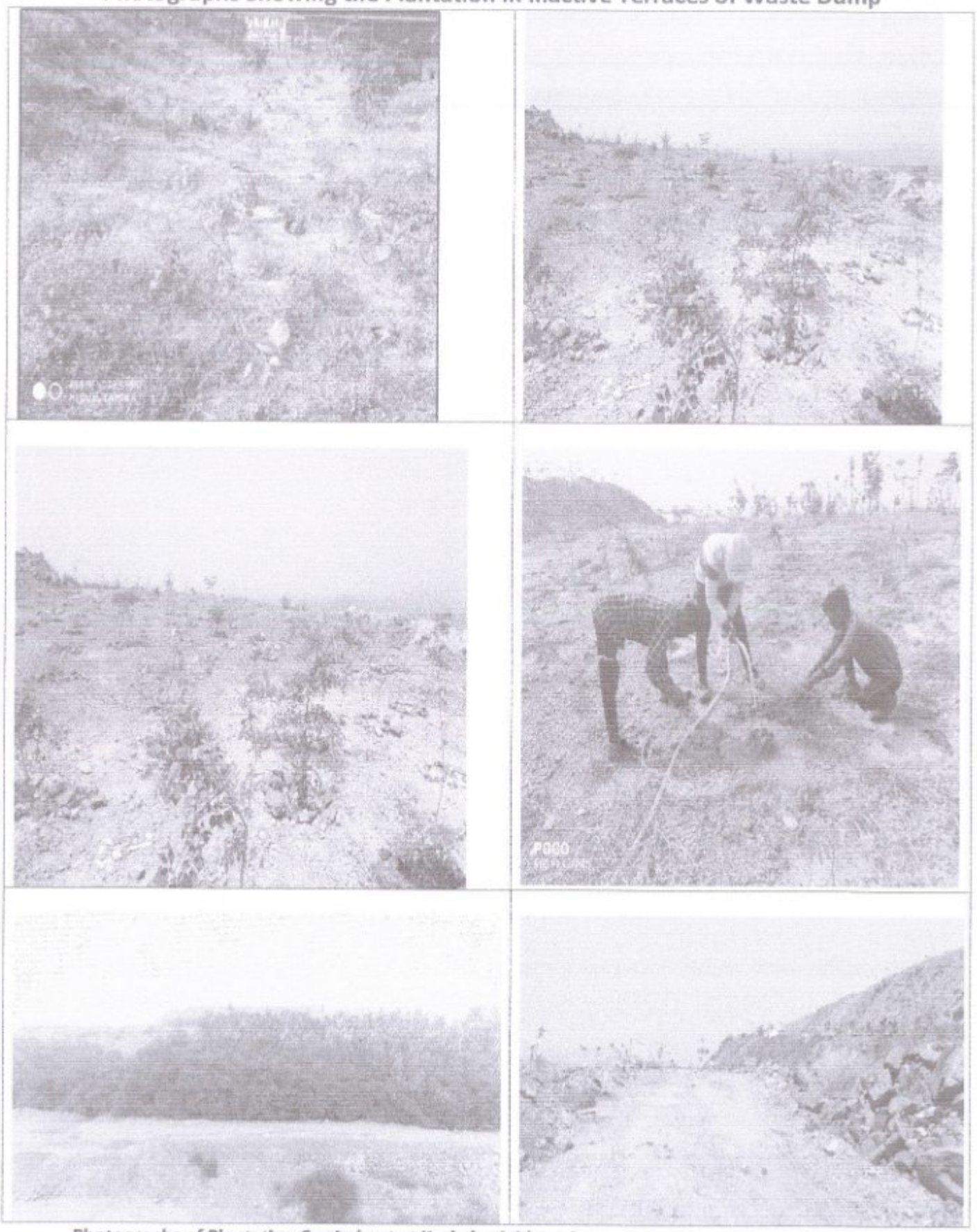
To stabilize the inactive terraces of dumps seeding of StyloHamata Grass was also done during the monsoon period.

Photographs showing the plantation carried out in waste dumps are enclosed as **Annexure- 9.**

Photographs Showing the Existing Waste Dump with Proper Terracing

Annexure 9

Photographs Showing the Plantation in Inactive Terraces of Waste Dump



Photographs of Plantation Carried out at Kachche Aridongri Iron Ore Mines

Annex- 10

Siltation Pond details

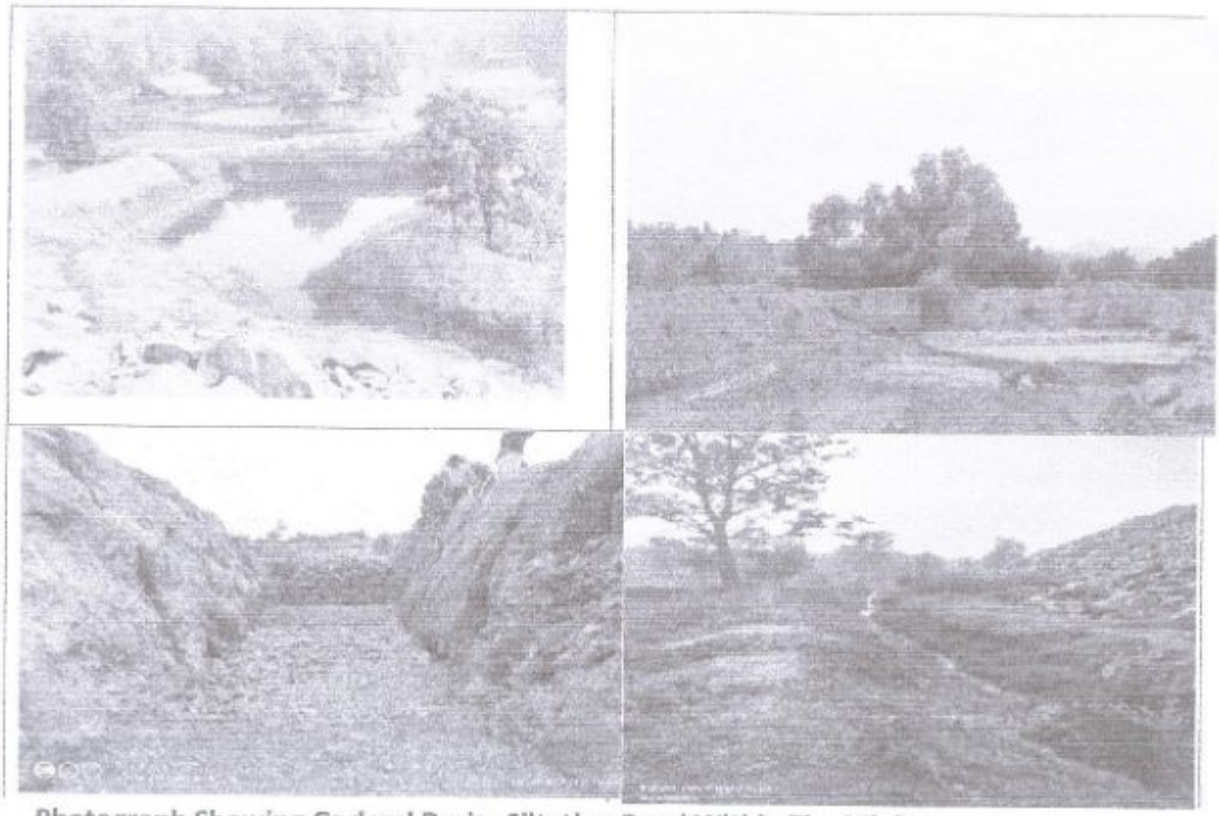
Five Nos. of siltation ponds having following size having adequate silt storage capacity have been provided at mines:

Sl. No.	Settling Pit Location	Area	Unit
1	Settling Pit near WB No. 6 at the toe of waste dump	4591.935	Sq.m
2	Settling Pit near WB No. 6 at the toe of waste dump 2	3188.977	Sq.m
3	Settling Pit on Western side of Weighbridge 5	13190.24	Sq.m
4	Settling Pit in North Western part of lease	4621.362	Sq.m
5	Settling Pit in Northern part of lease at the toe of waste dump WD1	400	Sq.m

These settling ponds have been interconnected with a series of garland drains. Boulder check dams followed by recharge well have also been constructed after each check dams in these garland drains to arrest silts.

These settling pits and garland drains are regularly de-silted after the monsoon.

Photograph showing garland drain, siltation pond within the mining lease is given below.



Photograph Showing Garland Drain, Siltation Pond Within The Mining Lease

Annex-11

Siltation Pond details

Five Nos. of siltation ponds having following size having adequate silt storage capacity have been provided at mines:

Sl. No.	Settling Pit Location	Area	Unit
1	Settling Pit near WB No. 6 at the toe of waste dump	4591.935	Sq.m
2	Settling Pit near WB No. 6 at the toe of waste dump 2	3188.977	Sq.m
3	Settling Pit on Western side of Weighbridge 5	13190.24	Sq.m
4	Settling Pit in North Western part of lease	4621.362	Sq.m
5	Settling Pit in Northern part of lease at the toe of waste dump WD1	400	Sq.m

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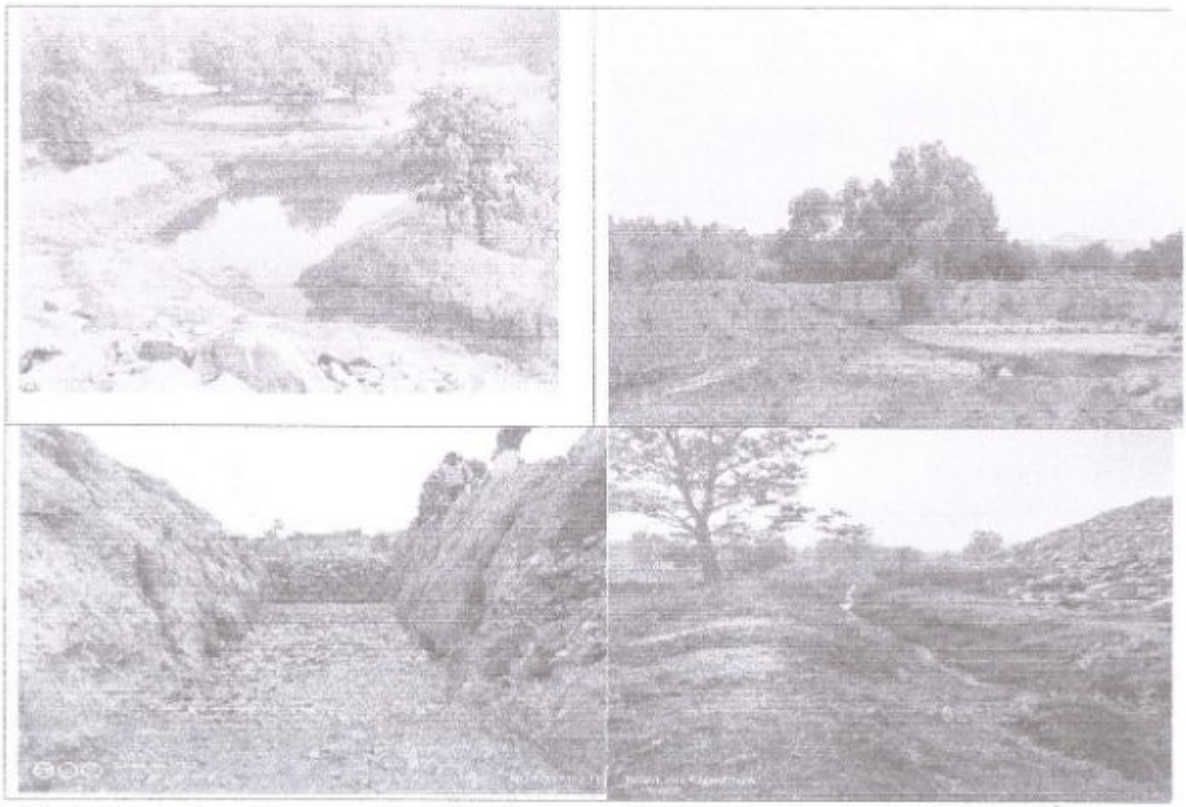


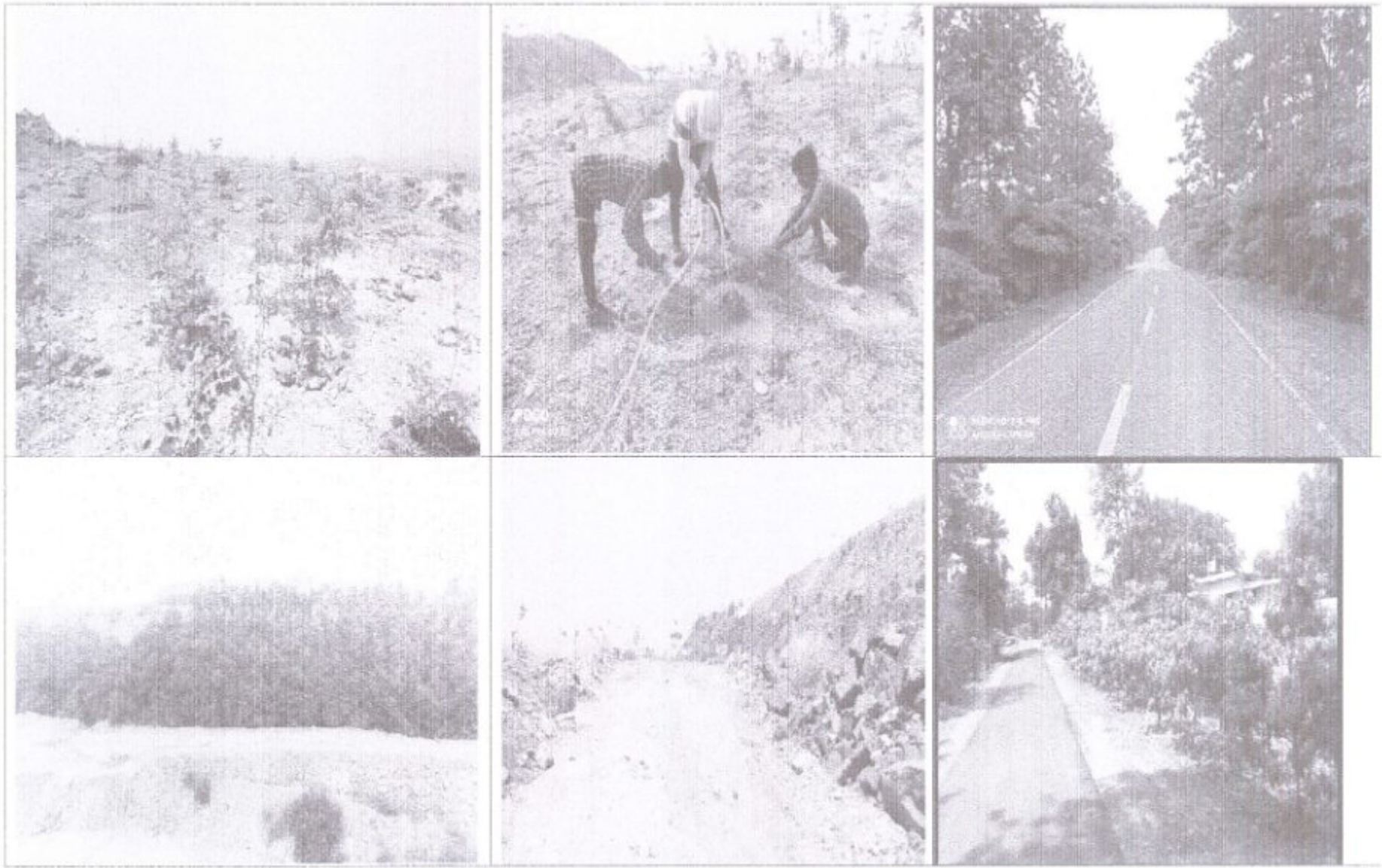
Photograph Showing Garland Drain, Siltation Pond Within The Mining Lease

Annex-12

AT AARI DONGARI IRON ORE MINES, VILLAGE – KACHCHE

Plantation in Safety Zone

Plantation along Road outside the Mining Lease



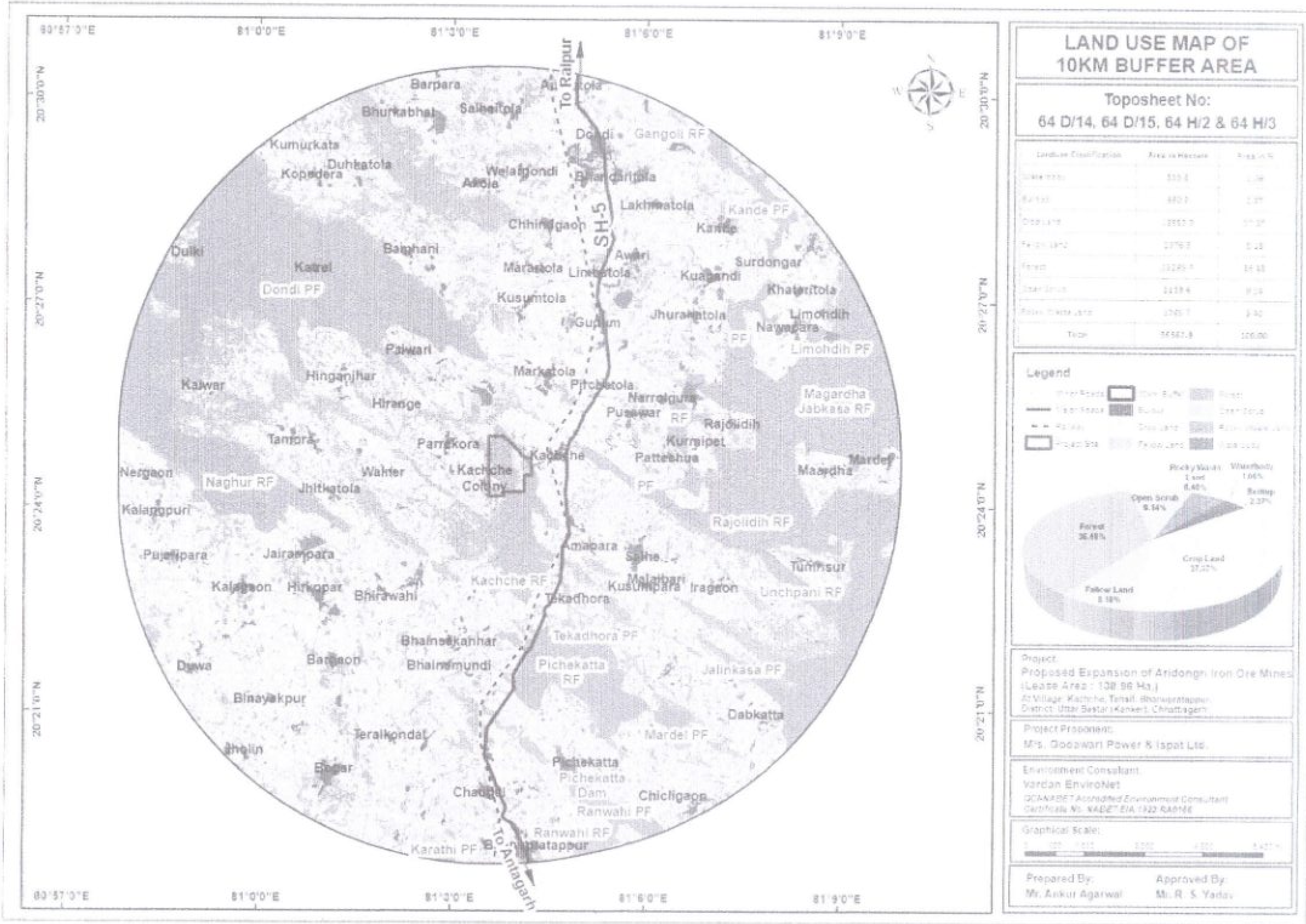
Photographs of Plantation Carried out at Kachche Aridongri Iron Ore Mines

Annex- 13

Existing & Proposed Land Use Pattern of Kachche Aridongri Iron Ore Mines

(Area in Ha)

Sl. No.	Particulars	Existing Land-use as on 01.09.2022	Land use at the end of FY 2024-25	Conceptual Land use
1	Excavated Area	37.294	40.277	50.142
2	Subgrade dump	0.000	-	0.000
3	Waste dump	61.422	69.246	60.193
4	Mineral Storage	3.503	3.180	2.499
	Top Soil Storage Area	-	0.555	0.000
5	Infrastructure (Workshop, administrative Building etc)	2.377	0.738	0.738
6	Roads & Railways	6.249	5.686	5.053
7	Mineral Processing	7.484	3.093	5.782
8	Township area	-	0.000	0.000
	Total Area	**118.328**	**122.766**	**124.407**
9	Magazine(with safety zone)	0.000	0.000	0.000
10	Statutory barrier	3.768	3.768	3.768
11	Tenaments	0.000	0.000	0.000
12	Others (Unutilised)	3.218	12.426	10.785
	Grand Total	**138.960**	**138.960**	**138.960**


LAND USE MAP OF
10KM BUFFER AREA
Toposheet No:
64 D/14, 64 D/15, 64 H/2 & 64 H/3
Legend
Forest 36.48%
Open Scrub 9.14%
Rocky Waste Land 0.40%
Waterbody 1.06%
Builtup 2.37%
Crop Land 37.37%
Fallow Land 5.18%
Project:
Proposed Expansion of Aridongri Iron Ore Mines
(Lease Area : 138.96 Ha.)
Project Proponent:
M/s. Godawari Power & Ispat Ltd.
Environment Consultant:
Vardan EnviroNet
Graphical Scale:
Prepared By:
Mr. Ankur Agarwal
Approved By:
Mr. R. S. Yadav
To Raipur
To Antagarh
SH-5
Dondi PF
Naghur RF
Gangoli RF
Kande PF
Limohdih PF
Magardha Jabkasa RF
Rajolidih RF
Unchpani RF
Kachche RF
Tekadhora PF
Pichekatta RF
Jalinkasa PF
Mardel PF
Ranwahi PF
Ranwahi RF
Karathi PF
Kachche Colony
Dondi
Barpara
Bhurkabhal
Kumurkata
Duhkatola
Kopedera
Welagondi
Lakhmatola
Chhindgaon
Baimhani
Katrel
Dulki
Marastola
Kusumtola
Surdongar
Khaitaritola
Limohdih
Paiwari
Hinganjhar
Kaiwar
Hirange
Markatola
Pitchetola
Pusawar
Rajolidih
Kurrsipet
Patteehua
Tamora
Parrekora
Wahler
Nergaon
Jhitketola
Kalangpuri
Pujelipara
Jairampara
Amapara
Tunnisur
Iragaon
Kusumpara
Tekadhora
Bhirawahi
Bhainsakanhar
Bhainsmundi
Duwa
Binayakpur
Teraikondal
Dabkatta
Pichekatta
Pichekatta Dam
Chiciigaon
81°0'0"E
81°3'0"E
81°6'0"E
81°9'0"E
20°30'0"N
20°27'0"N
20°24'0"N
20°21'0"N

Annex-IV

भारत सरकार
जल शक्ति मंत्रालय
जल संसाधन, नदी विकास
और गंगा संरक्षण विभाग
केन्द्रीय भूमि जल प्राधिकरण
Government of India
Ministry of Jal Shakti
Department of Water Resources,
River Development & Ganga Rejuvenation
Central Ground Water Authority

(भूजल निकासी हेतु अनापत्ति प्रमाण पत्र)
NO OBJECTION CERTIFICATE (NOC) FOR GROUND WATER ABSTRACTION

Project Name:	Ari Dongri Iron Ore Mine(m/s Godawari Power And Ispat Ltd)		
Project Address:	Kachche		
Village:	Kachche	Block:	Bhanupratappur
District:	Kanker	State:	Chhattisgarh
Pin Code:			
Communication Address:	Kachche, Bhanupratappur, Kanker, Chhattisgarh - 493111		
Address of CGWB Regional Office :	Central Ground Water Board North Central Chhattisgarh, 2nd Floor, Lk Corporate And Logistic Park, Dhamtari Road, Nh-30, Dumartarai, Raipur, Chhattisgarh - 492015		

1. **NOC No.:** CGWA/NOC/MIN/REN/2/2022/7371
2. Application No.: 21-4/700/CT/MIN/2017
3. Category: (GWRE 2020) Safe
4. Project Status: Existing Ground Water
5. NOC Type: Renewal
6. **Valid from:** 16/05/2022
7. **Valid up to:** 15/05/2024
8. Ground Water Abstraction Permitted:

Fresh Water		Saline Water		Dewatering		Total	
m³/day	m³/year	m³/day	m³/year	m³/day	m³/year	m³/day	m³/year
300.00	99000.00						

9. Details of ground water abstraction /Dewatering structures

	Total Existing No.:5						Total Proposed No.:0					
	DW	DCB	BW	TW	MP	MPu	DW	DCB	BW	TW	MP	MPu
Abstraction Structure*	0	0	5	0	0	0	0	0	0	0	0	0

*DW- Dug Well; DCB-Dug-cum-Bore Well; BW-Bore Well; TW-Tube Well; MP-Mine Pit;MPu-Mine Pumps

10. Ground Water Abstraction/Restoration Charges paid (Rs.): 198000.00
11. Number of Piezometers(Observation wells) to be constructed/ monitored & Monitoring mechanism.

	No. of Piezometers	Monitoring Mechanism		
		Manual	DWLR**	DWLR With Telemetry
**DWLR - Digital Water Level Recorder	1	0	1	0

(Compliance Conditions given overleaf)

This is an auto generated document & need not to be signed.

Validity of this NOC shall be subject to compliance of the following conditions:

Mandatory conditions:

1) Installation of tamper proof digital water flow meter with telemetry on all the abstraction structure(s) shall be mandatory for all users seeking No Objection Certificate and information regarding their installation shall be communicated to the CGWA within 30 days of grant of No Objection Certificate.

2) Proponents shall mandatorily get water flow meter calibrated from an authorized agency once in a year.

3) Construction of purpose built observation wells (piezometers) for ground water level monitoring shall be mandatory as per Section 14 of Guidelines. Water level data shall be made available to CGWA through web portal. Detailed guidelines for construction of piezometers are given in Annexure-II of the guidelines.

4) Proponents shall monitor quality of ground water from the abstraction structure(s) once in a year. Water samples from bore wells/ tube wells / dug wells shall be collected during April/May every year and analysed in NABL accredited laboratories for basic parameters (calcium and anions), heavy metals, pesticides/ organic compounds etc. Water quality data shall be made available to CGWA through the web portal.

5) In case of mining projects, additional key wells shall be established in consultation with the Regional Director, CGWB for ground water level monitoring four (4) times a year (January, May, August and November) in core as well as buffer zones of the mine.

6) In case of mining project the firm shall submit water quality report of mine discharge/ seepage from Govt. approved/ NABL accredited lab.

7) The firm shall report compliance of the NOC conditions online in the website (www.cgwa-noc.gov.in) within one year from the date of issue of this NOC.

8) Industries abstracting ground water in excess of 100 m 3 /d shall undertake annual water audit through certified auditors and submit audit reports within three months of completion of the same to CGWA. All such industries shall be required to reduce their ground water use by at least 20% over the next three years through appropriate means.

9) Application for renewal can be submitted online from 90 days before the expiry of NOC. Ground water withdrawal, if any, after expiry of NOC shall be illegal & liable for legal action as per provisions of Environment (Protection) Act, 1986.

10) This NOC is subject to prevailing Central/State Government rules/laws/norms or Court orders related to construction of tube well/ground water abstraction structure / recharge or conservation structure/discharge of effluents or any such matter as applicable.

General conditions:

11) No additional ground water abstraction and/or de-watering structures shall be constructed for the purpose without prior approval of the Central Ground Water Authority (CGWA).

12) The proponent shall seek prior permission from CGWA for any increase in quantum of groundwater abstraction (more than that permitted in NOC for specific period).

13) Proponents shall install roof top rain water harvesting in the premise as per the existing building bye laws in the premise.

14) The project proponent shall take all necessary measures to prevent contamination of ground water in the premises failing which the firm shall be responsible for any consequences arising thereupon.

15) In case of industries that are likely to contaminate the ground water, no recharge measures shall be taken up by the firm inside the plant premises. The runoff generated from the rooftop shall be stored and put to beneficial use by the firm.

16) Wherever feasible, requirement of water for greenbelt (horticulture) shall be met from recycled / treated waste water.

17) Wherever the NOC is for abstraction of saline water and the existing wells (s) is /are yielding fresh water, the same shall be sealed and new tubewell(s) tapping saline water zone shall be constructed within 3 months of the issuance of NOC. The firm shall also ensure safe disposal of saline residue, if any.

18) Unexpected variations in inflow of ground water into the mine pit, if any, shall be reported to the concerned Regional Director, Central Ground Water Board.

19) In case of violation of any NOC conditions, the applicant shall be liable to pay the penalties as per Section 16 of Guidelines.

20) This NOC does not absolve the proponents of their obligation / requirement to obtain other statutory and administrative clearances from appropriate authorities.

21) The issue of this NOC does not imply that other statutory / administrative clearances shall be granted to the project by the concerned authorities. Such authorities would consider the project on merits and take decisions independently of this NOC.

22) In case of change of ownership, new owner of the industry will have to apply for incorporation of necessary changes in the No Objection Certificate with documentary proof within 60 days of taking over possession of the premises.

23) This NOC is being issued without any prejudice to the directions of the Hon'ble NGT/court orders in cases related to ground water or any other related matters.

24) Proponents, who have installed/constructed artificial recharge structures in compliance of the NOC granted to them previously and have availed rebate of upto 50% (fifty percent) in the ground water abstraction charges/ground water restoration charges, shall continue to regularly maintain artificial recharge structures.

25) Industries which are likely to cause ground water pollution e.g. Tanning, Slaughter Houses, Dye, Chemical/ Petrochemical, Coal washeries, pharmaceutical, other hazardous units etc. (as per CPCB list) need to undertake necessary well head protection measures to ensure prevention of ground water pollution as per Annexure III of the guidelines.

26) In case of new infrastructure projects having ground water abstraction of more than 20 m3/day, the firm/entity shall ensure implementation of dual water supply system in the projects.

27) In case of infrastructure projects, paved/parking area must be covered with interlocking/perforated tiles or other suitable measures to ensure groundwater infiltration/harvesting.

28) In case of coal and other base metal mining projects, the project proponent shall use the advance dewatering technology (by construction of series of dewatering abstraction structures) to avoid contamination of surface water.

29) The NOC issued is conditional subject to the conditions mentioned in the Public notice dated 27.01.2021 failing which penalty/RC/cancellation of NOC shall be imposed as the case may be.
30) This NOC is issued subject to the clearance of Expert Appraisal Committee (EAC) (if applicable).

(Non-compliance of the conditions mentioned above is likely to result in the cancellation of NOC and legal action against the proponent.)

Annex - 15

HIRA

GODAWARI POWER & ISPAT

Great Place To Work. Certified DEC 2021-DEC 2022 INDIA

GPIL/EMS/2022-23/87 Date: 21/09/2022

To,
The Member Secretary,
Chhattisgarh Environment Conservation Board,
Paryavas Bhavan, North Block Sector-19,
Atal Nagar, Raipur (C.G.) – 490099.

Subject: Submission of **Environmental Statement** for the Financial Year 2021-22.

Dear Sir,

We are submitting herewith the Environmental Statement for the Financial Year 2021-22 with respect to our **Iron Ore Mines at Village - Kachhe, Tehsil - Bhanupratappur, Distt - Uttar Baster (C.G.),** as per the provisions of Environment (Protection) Rules, 1986 and as amended.,

This is for your kind information and record please.

Thanking you.

Yours faithfully,
For, **GODAWARI POWER & ISPAT LTD.**

Sanjay Srivastava
(AVP – Environment)

CC to - Regional Officer, CECB, Jagdalpur (C.G.)

Godawari Power & Ispat Limited
An ISO 9001:2015, ISO 14001:2015 & ISO 45001:2018 certified company
CIN L27106CT1999PLC013756
Registered Office and Works: Plot No. 428/2, Phase 1, Industrial Area, Siltara, Raipur - 493111, Chhattisgarh, India
P: +91 771 4082333, F: +91 771 4082234
Corporate Address: Hira Arcade, Near New Bus Stand, Pandri, Raipur - 492001, Chhattisgarh, India
P: +91 771 4082000, F: +91 771 4057601
www.godawaripowerispat.com, www.hiragroup.com

HIRA

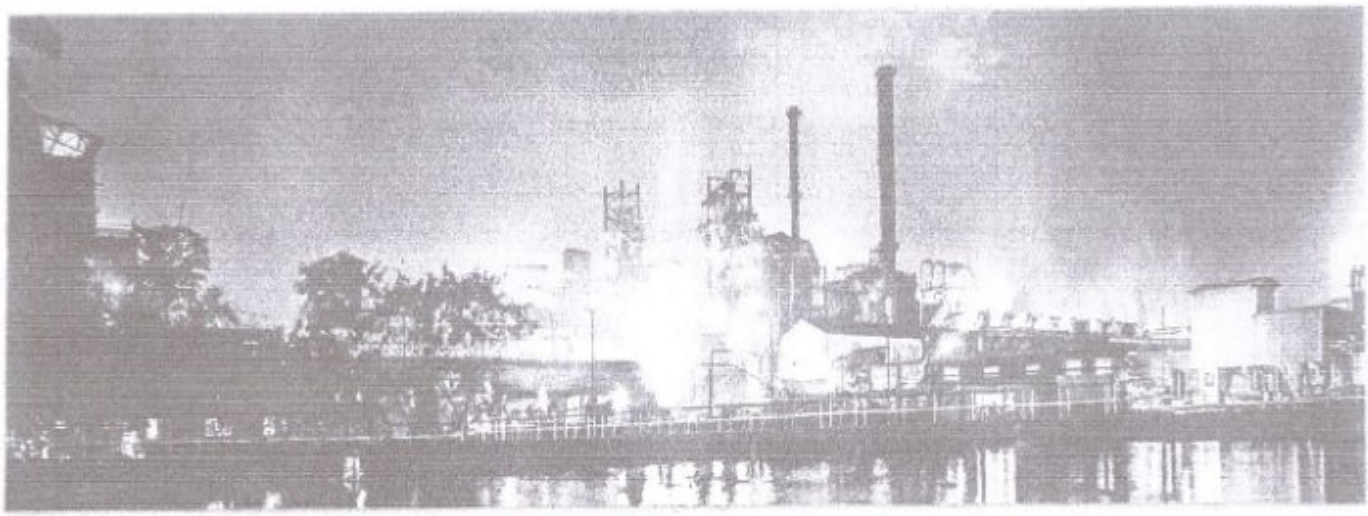
GODAWARI POWER & ISPAT

ENVIRONMENT STATEMENT

For the

Financial Year

2021-2022



KachcheAridongri Iron Ore Mines

[Unit of GODAWARI POWER & ISPAT LTD.]

HIRA
GODAWARI POWER & ISPAT

GodawariPower&IspatLimited

Plot No. 428/2 Industrial Area PH-I, Siltara, Raipur (Chhattisgarh) 492001, (T) 0771- 4082186, (F) 0771-4082333

INTRODUCTION

Godawari Power & Ispat Ltd. (GPIL) a public Ltd. Co., formally IspatGodawari Ltd (IGL), a pioneer constituent belonging to HIRA Group of Industries, Raipur, C.G. was incorporated in 1999 to set up an integrated steel plant with captive power generation under the guidance of visionary leadership of Mr. B. L. Agrawal, Managing Director, a techno commercial visionary having proven wide experience in commissioning & running of Cement Plant, Sponge Iron Plant etc., backed by a dedicated team of professionally qualified personnel under the stewardship of Board of Directors having expertise in Engineering, finance administration GPIL is listed with the National Stock Exchange and Bombay Stock Exchange.

GPIL is a Flagship Company of Raipur-based Hira Group of Industries having dominant presence in the long product segment of the Steel industry, mainly into mild steel wire. Today, GPIL is an end-to-end manufacturer of mild steel wires. In the process, the company manufactures sponge iron, billets, Ferro alloys, captive power, wires rods (through subsidiary company), steel wires, Oxygen gas, fly ash brick and last but not the least iron ore pellets. GPIL is also awarded rights for Iron Ore and Coal Mining for captive consumption, as a result of which, the company has managed to traverse the entire value chain (raw material to final product) in steel wires and hss now become a fully integrated steel manufacturer.

GPIL has come a long way since it started its operation in Raipur, Chhattisgarh as a sponge iron manufacturer in the year 2001. Over the last few years, the company has scaled up its capacity five fold and has become one of the largest players in the mild steel wires segment. GPIL has also become one of the pioneers in the field of Iron Ore Pelletization, having installed a Pellet Plant of 2.4 MTPA capacity and successfully operating it at 100% rated capacity. Not only has the company increased its scale during the aforesaid period, it has also moved up the value chain.

FORM-V

(See rule 14)

Environmental Statement for the financial year ending on 31st March on or before 30th of September every year.

PART -A

(i)	Name and address of the owner / Occupier of the industry operation or process	Mr.Vinod Pillai Godawari Power &Ispat Limited, Plot No. 428/2, Phase-I, Industrial Area, Siltara- Raipur (C.G)	
(ii)	Industry category Primary –(STC Code) Secondary-(STC Code)	Large	
(iii)	Production capacity - Units	1. Iron Ore Mine	2.35 Million Ton/Year
		2. Iron ore Crusher with screening facility	400 TPH
		3. Iron Ore ScreeningPlant with magnetic separator forprocessing of low grade material	250 TPH
		4. Dolorite crushing andscreening plant (Two Modules of 1.0MTPA)	2.0 Million Ton/Year
(iv)	Year of establishment	1. Iron Ore Mine	2009 (Amendment on 2015, 2021)
		2. Iron ore Crusher with screening facility	2016
		3. Iron Ore ScreeningPlant with magnetic separator forprocessing of low grade material	27.11.2021
		4. Dolorite crushing andscreening plant (Two Modules of 1.0MTPA)	09.03.2022
(v)	Date of the last environmental statement submitted	14.09.2021	

PART B

WATER & RAW MATERIAL CONSUMPTION

1. **Water consumption m^3/d**

(i)	Process	NA
(ii)	Cooling	NA
(iii)	Domestic	24 m^3/d (Annual Avg.)
	Other - Dust Suppression &Green Belt Development	112.08 m^3/d (Annual Avg.)

Name of Products	Process water consumption per unit of product output	
	During the previous **Financial Year (2020-21)**	During the Current **Financial Year (2021-22)**
Iron Ore	Not applicable as no water is used for mining	

2. **Raw material consumption**

*Name of raw materials	Name of Products	Consumption of raw material per unit	
		During the previous **Financial Year (2020-21)**	During the Current **Financial Year (2021-22)**
Iron Ore	Sized Iron Ore	2036.32	-
	Fines	1.00	1.00

** Industry may use codes if disclosing details of raw materials would violate contractual obligations, otherwise all industries have to name the raw materials used.*

PART- C

POLLUTION DISCHARGED TO ENVIRONMENT/UNIT OF OUTPUT

(Parameter as specified in the consent issued)

Pollution	Quantity of Pollutants discharged (mass/day)	Concentration of Pollutants Discharged (mass/volume)	Percentage of variation from prescribed standards with reasons.
a. WATER	Zero Discharge	There is no generation of industrial waste water. Water used only for dust suppression system. The waste water generated from the Domestic use is being disposed off in soak pit via septic tank and utilized in Green belt development	
AIR	1. Ambient Air Quality		

Location	Avg. Concentration of Various Parameters Discharged (in $\mu g/m^3$)			
	PM_{10}	$PM_{2.5}$	SO_2	NOx
CORE ZONE				
Near Admn. Building	68.49	29.95	14.67	17.03
Near Work Face	68.23	29.78	14.56	15.76
BUFFER ZONE				
Village-Kachhe	52.72	21.99	12.20	09.98
Village-Parrekodo	52.12	21.33	11.63	09.90

PART-D

HAZARDOUS WASTES

(As specified under Hazardous Wastes (Management & Handling Rules, 1989).

Hazardous Wastes	Total Quantity	
	During the previous Financial Year (2020-21)	During the Current Financial Year (2021-22)
(a) From process		
Cat. No. 5.1 Used/ Spent oil	0.430 KL	0.587 KL
Cat No. 33.1 Empty barrels/ containers/ liners contaminated with hazardous chemicals/ wastes	0.05 T	0.05 T
(b) From pollution control facilities	Nil	Nil

PART- E

SOLID WASTES

Solid Wastes	Total Quantity	
	During the previous Financial Year (2020-21)	During the Current Financial Year (2021-22)
(a) From process (Over Burden)	8272671.61 Tonnes	4924403 Tonnes
(b) From Pollution Control Facility	Nil	Nil
(c) (1) Quantity recycled/reused within the Unit	-	-
(2) Sold	-	-
(3) Disposed (stacked within mining lease area at designated place)	8272671.61 Tonnes	4924403 Tonnes

PART - F

Please specify the characterization (in terms of composition and quantum) of hazardous as well as solid wastes and indicate disposal practice adopted for both these categories of wastes.

- Overburden waste is disposed off at specified non-mineralized site within Mine Lease area with the help of excavator-dumper-loader-dozer.

PART- G

Impact of the pollution control measures taken on conservation of natural resources and on the cost of production.

1. Overburden waste is being disposed off scientifically with proper terracing.
2. To check erratic flow of precipitated water, silts & sediments, a network of drainagesystem has been provided with retaining wall around toe of the dumps.
3. Afforestation has been carried out over waste dumps, road sides & around infrastructural areas.
4. Approx.20100 sapling have been planted in FY2021-2022.

PART- H

Additional measures/investment proposal for environmental protection abatement of pollution, prevention of pollution.

- Garland drains around OB dumps and mineral dumps have already been constructed with siltation ponds at intervals to arrest silts and sediments.
- Garland drain around mine pit have been constructed for maximum discharge of rainfall in the adjoining areas.
- Two (02) recharge ponds and 13 nos. of recharge well and 6 nos. of recharge well with check dam have been constructed in mining lease.

PART - I

Any other particulars for improving the quality of the environment

- Transportation of ore is being carried in covered vehicle only.
- Water sprinkling is being doneby water tanker on regular basis to check fugitive dust.
- Ground water level recorder has been installed for ground water level monitoring.
- Digital water flow meters with telemetry systemhave been installed for measurement of water consumption.