M/S. D.R. PATNAIK

Mines Owner

(A UNIT OF D.R. PATNAIK & ALTRADE GROUP)

Ref No: MIOM/SPCB/ES/2020 – 118 **Date: 15.09.2020**

The Member Secretary,
State Pollution Control Board, Odisha,
Parivesh Bhawan, A/118,
Nilakantha Nagar, Unit-VIII,
Bhubaneswar-751012.

Sub: Environmental Statement of "Murgabeda Iron Ore Mines of Sri. D.R Patnaik" located in Thakurani RF near village Murgabeda,Tehsil-Barbil, Dist.: Keonjhar" for the year ending March- 2020.

Sir,

With reference to the above, we are herewith submitting the "Annual Environmental Environmental Statement" for the financial year ending **March-2020 (2019-20)**" in **Form-V** as per rule-14 under Environment (Protection) Rules, 1986.

This is for your kind information, please.

Thanking You,

Yours Sincerely,

Mines Manager
Murgabeda Iron Ore Mines
Sri. D.R Patnaik

Encl. : *As above.*

Copy to: *The Regional Officer, State Pollution Control Board, Regional Office, College Road, Dist.: Keonjhar, Odisha.*

The Member Secretary, SEIAA, Odisha (MoEF&CC),Bhubaneswar -751 022.
E Mail: seiaaorissa@gmail.com

Mines Manager
Murgabeda Iron Mines
M/s D R Patnaik

[FORM-V]

(See Rule 14)
Environment Statement for the financial year ending the 31st March 2020

PART-A

(1)Name and address of the owner / Occupier of the industry, Operation or process:	-	**Murgabeda Iron Ore Mines** **Sri. D.R Patnaik** **Works office: A-6, Commercial EstateCivil Township, Rourkela-769004, Odisha** **Phone: 91-661-2400014, Fax: 91-661-2401359**
(2) Industry category Primary	-	**(STC CODE) Secondary-(SIC Code)**
(3)Production capacity Units	-	**2.0 MTPA**
(4)Year of establishment	-	**1976**
(5)Date of the last Environmental Statement Submitted	-	**15.09.2019**

PART-B

Water and Raw material Consumption:

(1)Water Consumption m^3/day - **75 m^3/ Day**

Process (Dust suppression, Green Belt development & Workshop) - **60, 08 & 03 m^3/Day**
Domestic - **04 m^3/Day**

Name of Product	Process water consumption per unit of output
Sized Iron Ore	**Not Applicable**

	During the previous Financial year	during the current financial year
	(1)	(2)
(1)	NIL (2018-19)	0.02 KL/ Tonne
(2)		(451740.000 Tonne in 2019-20)

1. Substituted by rule 2 (b) of the Environment (Protection) Amendment rules, 1993 notified vide G.S.R vide G.S.R 3'6 (E) dated 22.04.1993.

(ii) Raw material consumption - **Not Applicable**

Name of raw Material	Name of Products	Consumption of raw material Per unit of out put	
	During the previous	during the current Financial Year	Financial year

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

PART-C

Pollution discharged to environment /unit of output - **Not Applicable**
(Parameter as specified in the consent issued)

(1)

Pollutants	Quantity of pollutants discharged in (mass/day)	Concentration of pollutants on discharges (mass/volume)	% of variation from prescribed standard with reason

(a)

1. Water- (Surface Run-Off Discharge during monsoon period): NIL

2. Site Specific Working Effluent cum ETP

Different Parameters	***Norms***	***Result***	***Quantity of pollutant discharged mass/volume***	***% of variation from prescribed standard***
Total suspended solids(TSS)	**100**	72	0.36	28 %
Total Iron (Fe)	**3**	0.88	0.0044	71 %
Manganese(Mn)	**2**	0.30	0.00150	85 %

3. Site Specific Working Sewage treatment plant (STP)

Different Parameters	***Norms***	***Result***	***Quantity of pollutant discharged mass/volume***	***% of variation from prescribed standard***
Total suspended solids(TSS)	**200**	84.17	3.37	58 %
Oil& grease	**10**	5.95	0.24	41 %
Total Iron (Fe)	**3**	1.02	0.04	66 %

Air: Not Applicable

Note: Present is no such trade effluent and source emissions, expect surface run - off discharge

PART – D

Hazardous Wastes

(As specified under Hazardous Waste/ Management and Handling Rules, 2016) and subsequent amendment there-of.

Hazardous waste [Waste Oil]		Total Quantity [liters]
	During the previous Financial year, 2018-19	During the Current financial year, 2019-20
1) From process	**NA**	**NA**
2) From Pollution Control Facility	**NA**	**NA**
3) Used Oil	**NIL**	**0.5 KL**
4) Oil contaminate waste	**NIL**	**20 Kg**

PATRT-E

Solid Waste

	Total Quantity	
Financial Year	During the previous Financial year, 2018-19	During the current Financial year, 2019-20
(a)From process: **(Overburden and Intercalated Waste)**	**: NIL**	**NIL**
(b) From pollution control facility	: **Not Applicable**	
(c) (1) Quantity recycled or re-utilized within the unit	: **Not Applicable**	
(2) Sold	: **Not Applicable**	
(3) Disposed	**: It is used up for road making & maintenance as per approved mining plan by Indian Bereau of Mines (IBM).**	

PART-F

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

- The mines were closed since April-2010 and resumed its operation on 27th Nov-2019.
- There is no such hazardous waste is being generated, other than used oil, oil contaminated waste, etc.
- Overburden waste is being used up for road maintenance purpose inside the mine.

- There is no top soil generation during the reporting period, 2019-20 as the work is confined to already broken up area only.
- Used Oil: Collection in leak proof barrels and stored in isolated yards under shed with impervious floor having secondary containment pit at the corner for the temporary storage.
- Oil contaminated cotton waste: Compacted into small packages and stored under isolated area in the yard.

PART-G

Impact of the pollution abatement measures taken on conservation of natural re-sources and on the cost of the production

- Rain water harvesting project completed in staff campus to recharge the ground water as a major step of natural conservation of water resources.
- Plantation is being carried out to retain the soil captivity as well as to increase the water holding.

PART- H

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

- Water sprinkling on haul roads carried out by engaging 18 KL &8 KL capacity of water tanker on daily basis.
- Dry fog system is provided in all screen plants for dust suppression.
- Plantation in safety zone and dump areas has been carried out.
- Check-dam, check weirs for surface run-off & silt management during monsoon season.

PART-I

Any other particulars for improving the quality of the environment

- Step towards Environmental Awareness Program, project has observed the “World Environment Day, 5th June 2019” with the plantation campaign in the area.

- Steps are also taken by the project to create awareness about water conservation, wildlife conservation etc. at nearby villages.

PHOTO

Mobile Water Tanker for dust suppression on mines haul road & Dry fog system at screen plant

Photo showing check dam, guard wall along the nalla& retaining wall

STP for treatment of Domestic Waste Water

Roof top Rain Water Harvesting structure