



सत्यमेव जयते

File No: IA-J-11011/515/2022-IA-II(IND-I)
Government of India
Ministry of Environment, Forest and Climate Change
IA Division



Date 05/02/2024



To,
M/s. RUNGTA MINES LIMITED
8A, Express Tower, 42A-Shakespere Sarani, Kolkata, WEST BENGAL, 700017
Email: environment.dsp@rungtamines.co.in

Subject: **Expansion of Ferro Alloy Plant (0.055 MTPA to 0.293 MTPA Ferro Alloys) along with 150 MW CPP) by M/s. Rungta Mines Limited, located at Villages: Tulasidiha, Chararhagarhia & Kangelapal, District Dhenkanal, Odisha –Grant of Environmental Clearance under the provisions EIA Notification, 2006 -regarding.**

Sir/Madam,

This refers to your proposal no **IA/OR/IND1/447624/2023** dated **09.11.2023** along with copy of EIA report, Forms (Part A, B and C) seeking Environment Clearance (EC) under the provisions of the EIA Notification, 2006 for the project mentioned above. Further, the PP has uploaded the information on Parivesh Portal on **12.12.2023**.

2. The particulars of the proposal are as below :

(i) EC Identification No.	EC23A1005OR5396955N
(ii) File No.	IA-J-11011/515/2022-IA-II(IND-I)
(iii) Clearance Type	Fresh EC
(iv) Category	A
(v) Project/Activity Included Schedule No.	3(a) Metallurgical Industries (ferrous and non ferrous),1(d) Thermal Power Plants,2(b) Mineral beneficiation
(vi) Sector	Industrial Projects - 1
(vii) Name of Project	Expansion of Ferro Alloys Plant (0.055 MTPA to 0.293 MTPA Ferro Alloys along with 150 MW CPP)
(viii) Name of Company/Organization	RUNGTA MINES LIMITED
(ix) Location of Project (District, State)	DHENKANAL, ODISHA
(x) Issuing Authority	MoEF&CC
(xi) Applicability of General Conditions as per	No

EIA Notification, 2006

3. As per the provisions of the Environment Impact Assessment (EIA) Notification, 2006, the above-mentioned project/activity is covered schedule S. No. 3(a) Metallurgical Industries (ferrous & non-ferrous) 2(b) Mineral beneficiation and 1(d) Thermal Power Plants under Category “A” of the schedule of the EIA Notification, 2006 and appraised at Central Level.
4. The proposal is considered in the 49th meeting of the EAC for Industry-I sector held during 28th -29th November, 2023, wherein the Committee, after detailed deliberations, recommended the proposal. The minutes of the meeting and all the project documents are available on PARIVESH portal which can be accessed at <https://parivesh.nic.in>.
5. The details of the proposal are as per the EIA/EMP report submitted by the proponent. The salient features of the proposal as presented during the above-mentioned meetings of EAC (Industry 1 Sector) are given at **Annexure 1**, Unit configuration and capacity are given at **Annexure II** and PH action plan given at **Annexure III**.
6. The EAC, in its meeting held during on **28th to 29th November, 2023**, inter-alia, deliberated the following:
 1. The instant proposal is for expansion of Ferro Alloy Plant (0.055 MTPA to 0.293 MTPA Ferro Alloys) along with 150 MW CPP).
 2. The EAC, constituted under the provision of the EIA Notification, 2006 comprising Expert Members/domain experts in various fields, examined the proposal submitted by the Project Proponent in desired format along with EIA/EMP reports prepared and submitted by the Consultant accredited by the QCI/ NABET on behalf of the Project Proponent.
 3. The EAC noted that the Project Proponent has given an undertaking that the data and information given in the application and enclosures are true to the best of his knowledge and belief and no information has been suppressed in the EIA/EMP reports. If any part of data/information submitted is found to be false/ misleading at any stage, the project will be rejected and Environmental Clearance given, if any, will be revoked at the risk and cost of the project proponent.
 4. The Committee noted that the EIA reports are in compliance of the ToR issued for the project, reflecting the present environmental status and the projected scenario for all the environmental components. The Committee deliberated on the proposed mitigation measure towards Air, Water, Noise and Soil pollutions. The Committee suggested that the storage of toxic/explosive raw materials/products shall be undertaken with utmost precautions and following the safety norms and best practices.
 5. The EAC also took into consideration the drone survey of the project site and kml file on the Google Earth presented by the project proponent along with DSS of the project site on PARIVESH and made following deliberations accordingly.
 6. The existing project was accorded Consent to Establish (NOC) for Ferro Manganese and Silico Manganese from Odisha State Pollution Control Board, vide letter no. 33614/IND-II-NOC dated 22.11.2005 and its amendment vide letter no 19793/IND-II-CTE-6752 dated 27.10.2022 and for manganese ore sinter plant from Odisha State Pollution Control Board, vide letter no. 11852/IND-II-NOC dated 21.07.2014 and its amendment vide letter no 19942/IND-II-CTE-6761 dated 28.10.2022. Consent to Operate for the existing unit was first accorded by Odisha State Pollution Control Board vide Ir. No. 5719/SPCB/BBSR-I-IND(CON)-5718 dated 14.03.2007. The latest CTO was accorded vide letter no. 4716/IND-I-CON-5718 dated 25.03.2022 valid upto 31.03.2027 validity of CTO is up to Valid upto 31.03.2027.
 7. The EAC noted that the existing plant of Ferro Alloys Plant has obtained the Consent to Establish (NOC) on 22.11.2005 and since the NOC was granted before 14.09.2006 and as per the Ministry’s OM no. F. No. J-11013/41/20060IA.II dated 21.11.2006, clause (ii), projects which were issued NOC before 14.09.2006 will not be required to take environmental clearance under EIA Notification 2006. Further, the PP within the same premises established a metal recovery plant as well as sinter plant with prior Consents from Odisha State Pollution Control Board for effectively utilizing the solid waste [Fines & Slags etc.] from the Ferro alloy plant. Further the said facility has also obtained the Consent to Operate from the Odisha State Pollution Control Board. The EAC deliberated on the certified compliance report of CTO issued by RO, SPCB and found it satisfactory.

8. Total land available is 59.126 ha (Private Land 33.062 ha, Government Leasable 1.21 ha, Govt. Communal 0.947 ha, Gochar 2.651 ha). 21.257 ha land is purchased and in possession of the company. Additional land is 37.869 ha [33.06 ha private land and 4.81 ha government land] out of which 16.16 ha private land has been purchased and 16.9 ha private and 4.81 ha government land is to be purchased. PP has obtained consent from private land owners or recommendation by IPICOL, Govt. of Odisha as per the single window clearance process.
9. There is rich habitation along with other sensitive areas within the study area of the project site. The EAC is of the opinion that PP shall strictly implement the environmental safeguard measures to minimise the impact on the habitation of the locals.
10. A seasonal nala flows from west to east across the expansion area and joins Lingara Nadi, located adjoining to existing and proposed expansion project site. There is a pond as well as the Rengali Right Main Canal outside the southern boundary of the project area. Assistant Executive Engineer, Flood Subdivision, Kamkhyanagar, vide his letter no. 397 dated 04.05.2023 has stated that the HFL data of Lingra Nallah is not readily available. Hence, based on experience of the Company at site since 2005, it is reported that the Lingara nala has never flooded its banks since 2005. The mRL of the bank of Nigra/ Lingara Nala is below 86 m amsl in south east side of the project to 87 m amsl in south of the project based on the survey map of the project site prepared by the company. The EAC is of the opinion that the water bodies shall not be disturbed. Mitigation measures w.r.t. safeguarding the water bodies shall be implemented. The Committee deliberated and found in order.
11. The water requirement for the existing & proposed project is estimated as 5688 m³/day which is proposed to be met from surface water (Lingara Nala). The EAC deliberated on the water requirement and is of the opinion that necessary permissions shall be obtained from the Competent Authority. Ground water shall only be permitted for industrial use and PP shall explore the possibility for gradual phase out through alternate source to reduce dependency on ground water.
12. The Committee has deliberated on the baseline data and incremental GLC due to the proposed project and found it satisfactory.
13. It is reported that there are 11 mammals, 5 reptiles and 19 Aves in Schedule I in the buffer zone. Request letter for preparation of "Site Specific Conservation Plan" has been made vide letter no. RML/FAD/WLCP/22-23/181 dated 16.01.2023 as per memo no 3332/CWLW-FDWC-MISC-0028-2021 dated 16.04.2022 of PCCF (Wildlife) & Chief Wildlife Warden, Government of Odisha, to Divisional Forest Officer, Dhenkanal Forest Division. The approval of the Site Specific Wildlife Conservation plan is underway. Acknowledged copy of request letter is submitted.
14. The PP has submitted that existing greenbelt has been developed in 7.082 ha which is about 33% of the existing project area with total saplings of 17705 trees. Proposed greenbelt will be developed in 12.497 ha which is about 33% of the expansion area. Thus, total of 19.579 ha area (33% of total project area) will be developed as greenbelt. A total of 31250 saplings will be planted and nurtured in 12.497 hectares in 5 years. The EAC deliberated on the greenbelt layout plan along with action plan and the budget earmarked and found it satisfactory.
15. The committee deliberated details of carbon foot prints and carbon sequestration study w.r.t. proposed project and found them to be satisfactory.
16. The Committee also deliberated on the public hearing issues along with revised action plan submitted by the proponent to address the issues raised during the public hearing and found it satisfactory.
17. The EAC deliberated on the certified compliance report of RO, SPCB and found it satisfactory.
18. The EAC also deliberated on the written submission of the project proponent and found it satisfactory.
19. The EAC deliberated on the proposal with due diligence in the process as notified under the provisions of the EIA Notification, 2006, as amended from time to time and accordingly made the recommendations to the proposal. The Experts Members of the EAC found the proposal in order and recommended for grant of environmental clearance.
20. The environmental clearance recommended to the project/activity is strictly under the provisions of the EIA Notification 2006 and its subsequent amendments. It does not tantamount/construe to approvals/consent/permissions etc. required to be obtained or standards/conditions to be followed under any other Acts/ Rules/ Subordinate legislations, etc., as may be applicable to the project. The project proponent shall obtain necessary permission as mandated under the Water (Prevention and Control of Pollution) Act, 1974 and the Air (Prevention and Control of Pollution) Act, 1981, as applicable from time to time, from the State Pollution Control Board, prior to construction & operation of the project.
21. The EAC also reviewed the EC conditions (specific and general) pertaining to Industry-I projects and observed that some of the specific conditions stipulated so far in the previously recommended EC projects are common and applicable to most of the projects in general. In view of the same, the General Conditions (in case of EC projects) have

been revised through reallocation of these common conditions from specific to General Conditions (in case of EC projects). Accordingly, the instant project is also being stipulated with the modified General conditions.

7. The EAC, in its 48th meeting of Expert Appraisal Committee (Industry-1 Sector) held during 8th to 9th November, 2023, based on information & clarifications provided by the project proponent and after detailed deliberations **recommended** the instant proposal for grant of Environment Clearance under the provisions of EIA Notification, 2006 subject to the stipulation of following specific conditions and general conditions as per the Ministry's Office Memorandum No. 22-34/2018-III dated 9/8/2018 based on project specific requirements:

8. The MoEF&CC has examined the proposal in accordance with the Environment Impact Assessment (EIA) Notification, 2006 & further amendments thereto and after accepting the recommendations of the Expert Appraisal Committee (Industry-1 Sector) hereby decided to grant **Environment Clearance** for instant proposal of **M/s. Rungta Mines Limited** under the provisions of EIA Notification, 2006 subject to specific conditions and general conditions at **Annexure IV**.

9. The Ministry reserves the right to stipulate additional conditions, if found necessary at subsequent stages and the project proponent shall implement all the said conditions in a time bound manner. The Ministry may revoke or suspend the environmental clearance, if implementation of any of the above conditions is not found satisfactory.

10. 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 the Environment (Protection) Act, 1986.

11. 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.

12. The above conditions shall 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, Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016 and the Public Liability Insurance Act, 1991 along with their amendments and Rules and any other orders passed by the Hon'ble Supreme Court of India / High Courts and any other Court of Law relating to the subject matter.

13. This issues with approval of the competent authority.

Copy To

1. The Principal Secretary, Department of Forest and Environment, Government of Odisha, Bhubaneswar, Odisha
2. Director General of Forest, Ministry of Environment, Forest and Climate Change, New Delhi
3. Principal Chief Conservator of Forests & HoFF, Aranya Bhawan, Chandrasekharapur, Bhubaneswar - 751 023, Odisha
4. The Regional Officer, Ministry of Environment, Forest and Climate Change, Integrated Regional Office, A/3, Chandrasekharapur, Bhubaneswar - 751023 Odisha
5. The Member Secretary, Central Pollution Control Board, Parivesh Bhawan, CBD-cum-Office Complex, East Arjun Nagar, Delhi - 32
6. The Member Secretary, Central Ground Water Authority, Jamnagar House, 18/11, Man Singh Road Area, New Delhi, Delhi 110001
7. The Member Secretary, Odisha State Pollution Control Board, Paribesh Bhawan, A/118, Nilakantha Nagar, Unit - VIII, Bhubaneswar -12 Odisha.
8. Monitoring Cell, Ministry of Environment, Forest and Climate Change, Indira Paryavaran Bhawan, Jor Bagh Road, New Delhi.
9. District Collector, Dhenkanal, Odisha.

Additional EC Conditions

1. This EC is granted subject to final outcome of Hon'ble Supreme Court of India, Hon'ble High Court, Hon'ble NGT and any other Court of Law, if any, as may be applicable to this project.
2. This EC granted to the project/ activity is strictly under the provisions of the EIA Notification, 2006 and its amendments issued from time to time. It does not tantamount/ construe to approvals/ consent/ permissions etc., required to be obtained or standards/conditions to be followed under any other Acts/Rules/Subordinate legislations, etc., as may be applicable to the project.



Annexure I

The salient features of the proposal as presented during the meetings of EAC

S. No.	Particulars	Details																		
a.	Terms of Reference for undertaking EIA study	01.12.2022																		
b.	Period of baseline data collection	01.03.2022 to 31.05.2022																		
c.	Date of Public Consultation	31.08.2023																		
d.	Action plan to address the PH issues	An amount of Rs. 1501.2 Lakhs has been earmarked for implementation of the commitments made during Public Hearing and need based activities. Detail of activities proposed attached as Annexure III .																		
e.	Location of the project	Villages: Tulasidiha, Chararhagarhia & Kangelapal, District Dhenkanal, Odisha																		
f.	Latitude and Longitude of the project site	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;">Coordinate</th> <th style="text-align: left;">Latitude, N</th> <th style="text-align: left;">Longitude, E</th> </tr> </thead> <tbody> <tr> <td>North most</td> <td>20° 47' 52.48"</td> <td>85° 17' 24.94"</td> </tr> <tr> <td>East most</td> <td>20° 47' 35.60"</td> <td>85° 17' 51.21"</td> </tr> <tr> <td>South most</td> <td>20° 47' 14.93"</td> <td>85° 17' 26.27"</td> </tr> <tr> <td>West most</td> <td>20° 47' 30.10"</td> <td>85° 17' 14.82"</td> </tr> </tbody> </table>	Coordinate	Latitude, N	Longitude, E	North most	20° 47' 52.48"	85° 17' 24.94"	East most	20° 47' 35.60"	85° 17' 51.21"	South most	20° 47' 14.93"	85° 17' 26.27"	West most	20° 47' 30.10"	85° 17' 14.82"			
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g.	Total land	59.126 ha (Private Land 33.062 ha, Government Leasable 1.21 ha, Govt. Communal 0.947 ha, Gochar 2.651 ha)																		
h.	Land acquisition details as per MoEF&CC O.M. dated 7/10/2014	Existing: 100% i.e. 21.257 ha land is purchased and in possession of the company. Proposed additional: 37.869 ha which consists of 33.06 ha private land and 4.81 ha government land. Out of this, 16.16 ha private land has been purchased and 16.9 ha private and 4.81 ha Government land has also obtained consent/letter. Hence, 100% of the land is either owned by the company or has consent from private land owners or recommended by IPICOL, Govt. Of Odisha as per the single window clearance process.																		
i.	Existence of habitation & involvement of R&R, if any	<p>Project site : Land of Villages Tulasidiha, Chararhagarhia & Kangelapal.</p> <p>Study area: (nearest in various directions)</p> <table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;">Habitation</th> <th style="text-align: left;">Distance</th> <th style="text-align: left;">Direction</th> </tr> </thead> <tbody> <tr> <td>Meramanadali</td> <td>1</td> <td>NE</td> </tr> <tr> <td>Bhanupada</td> <td>0.7</td> <td>SE</td> </tr> <tr> <td>Chitapada</td> <td>0.5</td> <td>E</td> </tr> <tr> <td>Chararhagarhia</td> <td>0.2</td> <td>W</td> </tr> <tr> <td>Kochilanaarha</td> <td>0.8</td> <td>W</td> </tr> </tbody> </table>	Habitation	Distance	Direction	Meramanadali	1	NE	Bhanupada	0.7	SE	Chitapada	0.5	E	Chararhagarhia	0.2	W	Kochilanaarha	0.8	W
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j.	Elevation of the project site	The elevation of the project site varies from 86.5 m amsl (in south) to 101.5 m amsl (in North), as per the survey map																		

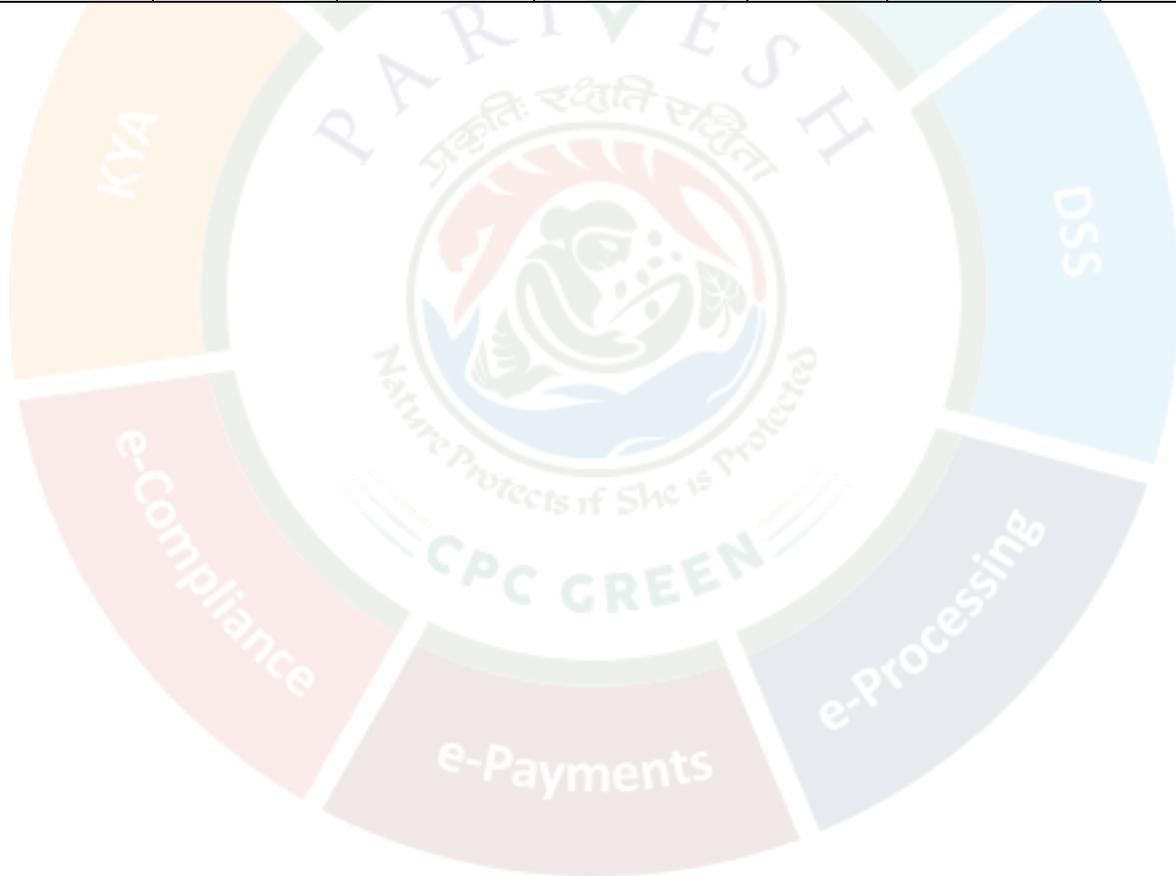
S. No.	Particulars	Details												
		available with the project proponent of the existing and expansion plant area.												
k.	Involvement of Forest land if any.	No Forest land is involved in the project site.												
l.	Water body exists within the project site as well as study area	<p>Core Zone: No perennial water body within the project area. A seasonal nala flows from west to east across the expansion area and joins Lingara Nadi, located adjoining to existing and proposed expansion project site.</p> <p>Buffer zone: There is a pond as well as the Rengali Right Main Canal outside the southern boundary of the project area. Main river is Brahmani at a distance of 3.8 km.</p>												
m.	Existence of ESZ / ESA / national park / wildlife Sanctuary / biosphere Reserve / tiger reserve / elephant reserve etc. if any within the study area	<p>No Sanctuary/ Bio-sphere Reserve/ Elephant corridor/ Tiger Reserve/ Eco sensitive area/ eco sensitive area is present within 10 km of radius. Three reserve forests within 10 km study area are</p> <table border="1"> <thead> <tr> <th>Name of forest</th> <th>Distance (km)</th> <th>Direction</th> </tr> </thead> <tbody> <tr> <td>Ganthigarhia Protected Forest</td> <td>3.4</td> <td>W</td> </tr> <tr> <td>Jharbandh Reserve Forest</td> <td>3.2</td> <td>SSE</td> </tr> <tr> <td>Nimidha Reserve Forest</td> <td>4.9</td> <td>SE</td> </tr> </tbody> </table>	Name of forest	Distance (km)	Direction	Ganthigarhia Protected Forest	3.4	W	Jharbandh Reserve Forest	3.2	SSE	Nimidha Reserve Forest	4.9	SE
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n.	Project cost	Proposed – INR Rs 950 Crores												
o.	EMP cost	<table border="1"> <thead> <tr> <th>Type</th> <th>Capital (Rs. in Crores)</th> <th>Recurring (Rs. in Crores)</th> </tr> </thead> <tbody> <tr> <td>Proposed</td> <td>38.42</td> <td>16.92</td> </tr> </tbody> </table>	Type	Capital (Rs. in Crores)	Recurring (Rs. in Crores)	Proposed	38.42	16.92						
Type	Capital (Rs. in Crores)	Recurring (Rs. in Crores)												
Proposed	38.42	16.92												
p.	Employment opportunity	1500 persons												
q.	Water and Power requirement	(Total)Water –5688 KLD, Power –150 MW												

Annexure II

The unit configuration and capacity of existing and proposed project is given as below:

Sl. No.	Plant Equipment/facility	Existing facilities as per CTE dated 22.11.2005, and 21.07.2014		Proposed Additional Units		Final (Existing + Proposed)	
		Total (A+B)					
		Configuration	Capacity TPA	Configuration	Capacity TPA	Configuration	Capacity TPA
1	Ferro Alloy Plant						
	Ferro Manganese OR	1X9 MVA 1X18 MVA	1X 9 MVA= 18,336 1X18 MVA=36,672	7 nos. X 9 MVA= 128,352 3 nos. X 18 MVA=110,016	238,368	8 nos. X 9 MVA= 146,688 4 nos. X 18 MVA=146,688	293,376
	Silico Manganese OR	1X9 MVA 1X18 MVA	9 MVA= 13,320 18 MVA=26,640	7nos. X 9 MVA =102080 3 nos. X 18 MVA =88,760	190,840	8 nos. X 9 MVA =115,400 4 nos. X 18 MVA =115,400	230,800
	Ferro Chrome OR	Nil	Nil	8 nos. X 9 MVA= 115,200 TPA 4 nos. X 18 MVA= 115,200 TPA	230,400	8 nos. X 9 MVA= 115,200 TPA 4 nos. X 18 MVA= 115,200 TPA	230,400
	Ferro Silicon	Nil	Nil	8 nos. X 9 MVA= 51200 TPA 4 nos. X 18 MVA= 51200 TPA	102,400	8 nos. X 9 MVA= 51200 TPA 4 nos. X 18 MVA= 51200 TPA	102,400
2	Pig Iron	Nil	Nil	8 nos. X 9 MVA= 184800 TPA 4 nos. X 18 MVA= 184800 TPA	369,600	8 nos. X 9 MVA= 184800 TPA 4 nos. X 18 MVA= 184800 TPA	369,600
3	Metal Recovery plant	1X 5TPH	19,980	2 nos. X 10 TPH +1X5 TPH	95,420	2 nos. X 10 TPH + 2 nos. X 5 TPH	115,400
4	Briquette Plant for Ferro chrome	Nil	Nil	4 nos. X 10 TPH 8 nos. X 5 TPH	461,127	4 nos. X 10 TPH 8 nos. X 5 TPH	461,127
5	Briquette Plant for	Nil	Nil	7 nos. X 10 TPH	476,738	4 nos. X 10 TPH	586,754

Sl. No.	Plant Equipment/ facility	Existing facilities as per CTE dated 22.11.2005, and 21.07.2014		Proposed Additional Units		Final (Existing + Proposed)	
		Total (A+B)		Configuration	Capacity TPA	Configuration	Capacity TPA
		Configu-ration	Capacity TPA				
	Ferro manganese			7 nos. X 5 TPH		8 nos. X 5 TPH	
6	Sinter plant	1 no. X 150 TPD	43,200	3 nos. X 600 TPD or 15 nos. X 120 TPD	518,400	1 X 150 TPD 3 X 600 TPD	561,600
7	Chrome ore Beneficiation	Nil	Nil	4 nos. X 500 TPD or 5 nos. X 400 TPD	660,000	4 nos. X 500 TPD or 5 nos. X 400 TPD	660,000
8	Power plant	Nil	Nil	2 nos. X 25 MW + 5 nos. X 20 MW	150 MW	2 nos. X 25 MW + 5 nos. X 20 MW	150 MW



Public Consultation Action plan as per MoEF&CC O.M. dated 30.09.2020

Sl. No.	Physical activity and action plan		Year of Implementation (Budget in Rs. lakhs)			Total
	Name of the Activity	Physical Target	Year 1	Year 2	Year 3	
1	Drinking Water					
	Provision of drinking water	36 borewells with tank & pipeline to community tap points will be installed for drinking water purpose in 9 villages Tulasidiha, Chararhagarhia, Kangelapal, Bhanupara, Jharbandh, Naraharipur, Motanga, Meramandali & Gandijhara	72	72	72	216
2	Electricity					
	Electricity facilities	Solar power supply to proposed borewells in 9 villages (as above)	12	12	12	36
		180 nos. (@20 nos./year/ village) of solar street light in each of the 3 adopted villages - Tulasidiha, Chararhagarhia and Kangelapal villages	24	24	24	72
3	Skill Development					
	For Women	Provision of sewing machines (45 nos.) to women for tailoring classes through Local Panchayat in each of the 3 adopted villages - Tulasidiha, Chararhagarhia and Kangelapal villages	1.5	1.5	1.5	4.5
	For Farmers	Provision of sprayer pump (60 nos. @20 nos./ year) for local farmers through Local Panchayat in each of the 3 adopted villages - Tulasidiha, Chararhagarhia and Kangelapal villages	5	5	5	15
4	Education					
	Monetary support to Schools & underprivileged students	Markers, stationary, books, etc. will be provided to under privileged students in the school nearby the Plant in 3 adopyted villages	6	6	6	18
	providing school teacher in 3 village	3 primary teacher in 3 village school in Tulasidiha,	5.4	5.4	5.4	16.2

Sl. No.	Physical activity and action plan		Year of Implementation (Budget in Rs. lakhs)			Total
	Name of the Activity	Physical Target	Year 1	Year 2	Year 3	
		Chararhagarhia and Kangelapal villages				
	Supporting meritorious students	Laptops to top three rankers of Odisha Board of Secondary Education toppers of Class 10 of Odisha High School each village	1.5	2.5	3.5	7.5
		Scholarship to students for school studies, ITI training and higher studies as per requisition received from 9 villages	9	9	9	27
	Infrastructure	Boundary wall & room construction in 3 schools in Tulasidiha, Chararhagarhia and Kangelapal villages	10	10	10	30
5	Tree Plantation	Road side from NH to FAD and villages Tulasidiha, Chararhagarhia, Kangelapal, Bhanupara, Jharbandh, Naraharipur, Motanga, Meramandali & Gandijhara	12	12	12	36
6	Sports activities	Supply of sports material (football, bat, balls, wickets, etc.) to anganwadi kendra in 9 village	6	6	6	18
7	Social infrastructure	Community center construction at 3 adopted villages Tulasidiha, Chararhagarhia and Kangelapal villages	20	20	20	60
8	Road development	Construction of road 1 km in villages Tulasidiha, Chararhagarhia and Kangelapal	100	100	100	300
9	Communication development	Bus facilities will be provided from Dhenkanal district to FAD Plant	0	0	35	35
10	Expenditure for Public Health	1 nos. Ambulance	10	0	0	10
		6 bedded hospital with equipment	200	200	200	600
	Total		494.4	485.4	521.4	1501.2

Specific conditions and general conditions

A. Specific Condition:

- i. This Environmental clearance is granted subject to final outcome of Hon'ble Supreme Court of India, Hon'ble High Court, Hon'ble NGT and any other Court of Law, if any, as may be applicable to this project.
- ii. The project proponent shall comply with all the environmental protection measures and safeguards proposed in the documents submitted to the Ministry. All the recommendations made in the EIA/EMP in respect of environmental management, and risk mitigation measures relating to the project shall be implemented.
- iii. The project proponent shall utilize modern technologies for capturing of carbon emitted and shall also develop carbon sink/carbon sequestration resources capable of capturing more than emitted. The implementation report shall be submitted to the IRO, MoEF&CC in this regard.
- iv. There is rich habitation along with other sensitive areas within the study area of the project site. Proponent shall take appropriate environmental safeguard measures to minimise the impact on the habitation of the locals. The PP needs to strengthen green belt all around the plant area to reduce the dust pollution. The PP shall also include some of these locations in its environmental monitoring programme.
- v. A seasonal nala flows from west to east across the expansion area and joins Lingara Nadi, located adjoining to existing and proposed expansion project site. There is a pond as well as the Rengali Right Main Canal outside the southern boundary of the project area. A robust and full proof Drainage Conservation scheme to protect the natural drainage and its flow parameters; along with Soil conservation scheme and multiple Erosion control measures shall be implemented.
- vi. The water requirement of 5688 m³/day shall be met from surface water (Lingara Nala) only after obtaining necessary permission from the Competent Authority. Ground water shall only be permitted for industrial use and PP shall explore the possibility for gradual phase out through alternate source to reduce dependency on ground water.
- vii. Three tier Green Belt shall be developed in at least 33% of the project area as per the committed plan all along the project site of adequate width and tree density shall not be less than 2500 per ha. Survival rate of green belt developed shall be monitored on periodic basis to ensure that damaged plants are replaced with new plants in the subsequent years. PP shall also develop greenbelt in the form of shelter belt comprising of total of 6 rows of 2x2 m plantation with tall trees & broad leaves with thick canopy along with windshield inside the plant premises to act as green barrier for air pollution & noise levels towards sensitive areas nearby project site. The PP shall also adopt vertical garden type of plantation. Compliance status in this regard, shall be submitted to concerned Regional Office of the MoEF&CC.
- viii. The action plan based on the social impact assessment study of the project as per the EMP in accordance to the Ministry's OM dated 30.09.2020 amounting to Rs. 15 Crores shall be strictly implemented and progress shall be submitted to the Regional Office of MoEF&CC.

- ix. The PP shall ensure that 100% waste recycling methods for all types of wastes be adopted and implemented.
- x. The recommendations of the approved Site-Specific Wildlife Management Plan shall be implemented in consultation with the State Forest Department. The implementation report shall be furnished along with the six-monthly compliance report to the concerned Regional Office of the MoEF&CC.

B. General Conditions

I. Statutory compliance:

- i. The Environment Clearance (EC) granted to the project/ activity is strictly under the provisions of the EIA Notification, 2006 and its amendments issued from time to time. It does not tantamount/ construe to approvals/ consent/ permissions etc., required to be obtained or standards/conditions to be followed under any other Acts/Rules/Subordinate legislations, etc., as may be applicable to the project.

II. Air quality monitoring and preservation

- i. The project proponent shall install 24x7 continuous emission monitoring system at process stacks to monitor stack emission as well as 04 Nos. Continuous Ambient Air Quality Station (CAAQMS) for monitoring AAQ parameters with respect to standards prescribed in Environment (Protection) Rules 1986 as amended from time to time. The CEMS and CAAQMS shall be connected to SPCB and CPCB online servers and calibrate these systems from time to time according to equipment supplier specification through labs recognized under Environment (Protection) Act, 1986 or NABL accredited laboratories.
- ii. The project proponent shall carryout Continuous Ambient Air Quality monitoring for common/criterion parameters relevant to the main pollutants released (e.g. PM₁₀ and PM_{2.5} in reference to PM emission, and SO₂ and NO_x in reference to SO₂ and NO_x emissions) within and outside the plant area covering upwind and downwind directions.
- iii. The project proponent shall monitor fugitive emissions in the plant premises at least once in every quarter through laboratories recognized under Environment (Protection) Act, 1986 or NABL accredited laboratories.
- iv. Sampling facility at process stacks shall be provided as per CPCB guidelines for manual monitoring of emissions.
- v. Appropriate Air Pollution Control (APC) system shall be provided for all the dust generating points including fugitive dust from all vulnerable sources, so as to comply prescribed stack emission and fugitive emission standards.
- vi. The project proponent shall provide leakage detection and mechanized bag cleaning facilities for better maintenance of bags.
- vii. Sufficient number of mobile or stationery vacuum cleaners shall be provided to clean plant roads, shop floors, roofs, regularly.
- viii. Ensure covered transportation and conveying of raw material to prevent spillage and dust generation. The project proponent use leak proof trucks/dumpers carrying coal and other raw materials and cover them with tarpaulin.

- ix. Recycle and reuse iron ore fines, coal and coke fines, lime fines and such other fines collected in the pollution control devices and vacuum cleaning devices in the process after briquetting/ agglomeration.
- x. The project proponent shall provide primary and secondary fume extraction system at all heat treatment furnaces.
- xi. Wind shelter fence and chemical spraying shall be provided on the raw material stock piles.
- xii. Design the ventilation system for adequate air changes as per prevailing norms for all tunnels, motor houses, Oil Cellars.
- xiii. Pollution control system in the plant shall be provided as per the CREP Guidelines of CPCB.
- xiv. The project proponent shall adopt the Clean Air practices like mechanical collectors, wet scrubbers, fabric filters (bag houses), electrostatic precipitators, combustion systems (thermal oxidizers), condensers, absorbers, adsorbers, and biological degradation. Controlling emissions related to transportation shall include emission controls on vehicles as well as use of cleaner fuels. Sufficient numbers of additional truck mounted Fog/Mist water cannons shall be procured and operated regularly inside the project premises and also in the surrounding villages to arrest suspended dust in the atmosphere.
- xv. Bag filters shall be cleaned regularly and efficiency of bag filter system shall be monitored at regular intervals.
- xvi. Water Sprinklers/Water mist system shall be installed near raw material yards, operational units and other strategic locations to control fugitive emissions from the plant.
- xvii. The particulate matter emissions from the process stacks shall be less than 30 mg/Nm^3 and measures shall be undertaken as per the submitted action plan. Efficient Air monitoring equipment shall be installed.
- xviii. Following additional arrangements to control fugitive dust shall be provided:
 - a. Fog / Mist Sprinklers at all on bulk raw material storage area (at the transfer points) like Iron Ore, Coal and for Fly Ash and similar solid waste storage areas.
 - b. Proper covered vehicle shall be used while transport of materials.
 - c. Wheel washing mechanism shall be provided in entry and exit gates with complete recirculation system.
- xix. Briquetting and Jigging plant shall be installed in Ferro Alloys Plant.
- xx. The PP shall minimize the evaporation losses in jigging operation to less than 10% using suitable advanced process.
- xxi. The 4th hole extraction system shall be provided in the Sub Merged Arc Furnaces and EAF.
- xxii. Industry is going to use silica quartz in large quantities and going to produce Silico Manganese and Ferro Silicon alloy steel. Therefore, it is necessary to control silica/quartz exposures at production Departments, not only emission norms as per Indian Factories Act. The permissible limit for silica/quartz should be within 10 mg/m^3 for total dust as per Indian Factories Act. Therefore, it is recommended to monitor personal and area exposures for silica quartz dust in the process plants.

- xxiii. During operational phase at Captive Power Plant, Action Plan to monitor coke/coal dust exposures in different process plants using personal and area air samplers and to compare with permissible limits as per Indian Factories Act, 1948 shall be implemented.
- xxiv. The coal dust should be monitored at coal unloading, crushing, furnace areas and should be within 2 mg/m³, respirable dust fraction containing less than 5% quartz as per Indian Factories Act, 1948.
- xxv. Online stack monitoring system for IF and RHF shall be installed and monitoring report shall be submitted to the concerned Regional Office of the MoEF&CC along with the six monthly compliance report.
- xxvi. Low NO_x Burners will be installed at Reheating Furnace for control of Gaseous emissions generated while using PNG.

III. Water quality monitoring and preservation

- i. The project proponent shall install 24x7 continuous effluent monitoring system with respect to standards prescribed in Environment (Protection) Rules 1986 as amended from time to time and connected to SPCB and CPCB online servers and calibrate these system from time to time according to equipment supplier specification through labs recognized under Environment (Protection) Act, 1986 or NABL accredited laboratories.
- ii. The project proponent shall monitor regularly ground water quality at least twice a year (pre- and post-monsoon) at sufficient numbers of piezometers/sampling wells in the plant and adjacent areas through labs recognized under Environment (Protection) Act, 1986 and NABL accredited laboratories.
- iii. Garland drains and collection pits shall be provided for each stock pile to arrest the run-off in the event of heavy rains and to check the water pollution due to surface run off.
- iv. Water meters shall be provided at the inlet to all unit processes in the plants.
- v. The project proponent shall make efforts to minimise water consumption in the plant complex by segregation of used water, practicing cascade use and by recycling treated water.
- vi. The proposed project shall be designed as "Zero Liquid Discharge" Plant. ETP shall be installed and there shall be no discharge of effluent from the plant. Domestic effluent shall be treated in Sewage Treatment Plant. Suitable measures shall be adopted for sewage water handling to ensure no contamination of any kind of water body.
- vii. All stockyards shall have impervious flooring and shall be equipped with water spray system for dust suppression. Stock yards shall also have garland drains and catch pits to trap the run off material and shall be implemented as per the action plan submitted in EIA/EMP report.
- viii. Rain water harvesting shall be implemented to recharge/harvest water as per the action plan submitted in the EIA/EMP report.
- ix. Air Cooled condensers shall be used in the captive power plant.
- x. Tailing management plan shall be implemented as included in EIA report.

- xi. Tailings from Iron Ore beneficiation plant shall be dewatered in filter press and no slime /tailing pond shall be permitted.

IV. Noise monitoring and prevention

- i. Noise pollution shall be monitored as per the prescribed Noise Pollution (Regulation and Control) Rules, 2000 and amendments thereof, and report in this regard shall be submitted to Regional Officer of the Ministry as a part of six-monthly compliance report.
- ii. The ambient noise levels should conform to the standards prescribed under E(P)A Rules, 1986 viz. 75 dB(A) during day time and 70 dB(A) during night time.
- iii. PP shall identify extreme hot areas through heat stress survey as well as noise monitoring within process plants to ensure that workers not exposed above 90 dBA levels as per Factories Act, 1948.

V. Energy Conservation measures

- i. Provide solar power generation on roof tops of buildings, for solar light system for all common areas, street lights, parking around project area and maintain the same regularly;
- ii. Provide LED lights in their offices and residential areas.
- iii. The project proponent shall provide waste heat recovery system (pre-heating of combustion air) at the flue gases of reheating furnaces.
- iv. Practice hot charging of slabs and billets/blooms as far as possible.
- v. Ensure installation of regenerative type burners on all reheating furnaces.

VI. Waste management

- i. Oil Collection pits shall be provided in oil cellars to collect and reuse/recycle spilled oil.
- ii. Kitchen waste shall be composted or converted to biogas for further use.
- iii. 100% utilization of fly ash shall be ensured. All the fly ash shall be provided to cement and brick manufacturers for further utilization and Memorandum of Understanding in this regard shall be submitted to the Ministry's Regional Office.
- iv. The Plastic Waste Management Rules 2016, inter-alia, mandated banning of identified Single Use Plastic (SUP) items with effect from 01/07/2022. In this regard, CPCB has issued a direction to all the State Pollution Control Boards (SPCBs)/Pollution Control Committees (PCCs) on 30/06/2022 to ensure the compliance of Notification published by Ministry on 12/08/2021. The technical guidelines issued by the CPCB in this regard is available at <https://cpcb.nic.in/technical-guidelines-3/>. All the project proponents are hereby requested to sensitize and create awareness among people working within the Project area as well as its surrounding area on the ban of SUP in order to ensure the compliance of Notification published by this Ministry on 12/08/2021. A report, along with photographs, on the measures taken shall also be included in the six monthly compliance report being submitted by the project proponents.
- v. A proper action plan must be implemented to dispose of the electronic waste generated in the industry.

- vi. SMS slag after metal recovery in waste recycling facility shall be conditioned and used for road making, railway track ballast and other applications. The project proponent shall install a waste recycling facility to recover metallic and flux for recycle to sinter plant. The project proponent shall establish linkage for 100% reuse of rejects from Waste Recycling Plant.
- vii. Carbon recovery plant to recover the elemental carbon present in GCP slurries for use in Sinter plant shall be installed.
- viii. Waste recycling Plant shall be installed to recover scrap, metallic and flux for recycling to sinter plant and SMS.

VII. Green Belt

- i. The project proponent shall prepare GHG emissions inventory for the plant and shall submit the programme for reduction of the same including carbon sequestration by trees.
- ii. Project proponent shall submit a study report on Decarbonisation program, which would essentially consist of company's carbon emissions, carbon budgeting/balancing, carbon sequestration activities and carbon capture, use and storage and offsetting strategies. Further, the report shall also contain time bound action plan to reduce its carbon intensity of its operations and supply chains, energy transition pathway from fossil fuels to Renewable energy etc. All these activities/ assessments should be measurable and monitor able with defined time frames.
- iii. Greening and Paving shall be implemented in the plant area to arrest soil erosion and dust pollution from exposed soil surface.

VIII. Public hearing and Human health issues

- i. Emergency preparedness plan based on the Hazard identification and Risk Assessment (HIRA) and Disaster Management Plan shall be implemented.
- ii. The project proponent shall carry out heat stress analysis for the workmen who work in high temperature work zone and provide Personal Protection Equipment (PPE) as per the norms.
- iii. 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, creche etc. The housing may be in the form of temporary structures to be removed after the completion of the project.
- iv. Occupational health surveillance of the workers shall be done on a regular basis and records maintained.

IX. Environment Management

- i. The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 30/09/2020. As part of Corporate Environment Responsibility (CER) activity, company shall adopt nearby villages based on the socio-economic survey and undertake community developmental activities in consultation with the village Panchayat and the District Administration as committed.

- ii. The company shall have a well laid down environmental policy duly approved by the Board of Directors. The environmental policy should prescribe for standard operating procedures to have proper checks and balances and to bring into focus any infringements/deviation/violation of the environmental / forest / wildlife norms / conditions. The company shall have defined system of reporting infringements / deviation / violation of the environmental / forest / wildlife norms / conditions and / or shareholders / stake holders. The copy of the board resolution in this regard shall be submitted to the MoEF&CC as a part of six-monthly report.
- iii. A separate Environmental Cell both at the project and company head quarter level, with qualified personnel shall be set up under the control of senior Executive, who will directly report to the head of the organization.
- iv. Performance test shall be conducted on all pollution control systems every year and report shall be submitted to Integrated Regional Office of the MoEF&CC.

X. Miscellaneous

- i. The project proponent shall make public the environmental clearance granted for their project along with the environmental conditions and safeguards at their cost by prominently advertising it at least in two local newspapers of the District or State, of which one shall be in the vernacular language within seven days and in addition this shall also be displayed in the project proponent's website permanently.
- ii. The copies of the environmental clearance shall be submitted by the project proponents to the Heads of local bodies, Panchayats and Municipal Bodies in addition to the relevant offices of the Government who in turn has to display the same for 30 days from the date of receipt.
- iii. The project proponent shall upload the status of compliance of the stipulated environmental clearance conditions, including results of monitored data on their website and update the same on half-yearly basis.
- iv. The project proponent shall monitor the criteria pollutants level namely; PM10, SO₂, NO_x (ambient levels as well as stack emissions) or critical sectoral parameters, indicated for the projects and display the same at a convenient location for disclosure to the public and put on the website of the company.
- v. Action plan for developing connecting and internal road in terms of MSA as per IRC guidelines shall be implemented
- vi. The project proponent shall submit six-monthly reports on the status of the compliance of the stipulated environmental conditions on the website of the ministry of Environment, Forest and Climate Change at environment clearance portal.
- vii. The project proponent shall submit the environmental statement for each financial year in Form-V to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently and put on the website of the company.
- viii. The project proponent shall inform the Regional Office as well as the Ministry, the date of financial closure and final approval of the project by the concerned authorities, commencing the land development work and start of production operation by the project.

- ix. The project proponent shall abide by all the commitments and recommendations made in the EIA/EMP report, commitment made during Public Hearing and also that during their presentation to the Expert Appraisal Committee.
- x. The recommendations of the approved Site-Specific Wildlife Management Plan (in case of involvement of Schedule-I species) shall be implemented in consultation with the State Forest Department. The implementation report shall be furnished along with the six-monthly compliance report to the concerned Regional Office of the MoEF&CC.
- xi. The PP shall put all the environment related expenditure, expenditure related to Action Plan on the PH issues, and other commitments made in the EIA/EMP Report etc. in the company web site for the information to public/public domain. The PP shall also put the information on the left over funds allocated to EMP and PH as committed in the earlier ECs and shall be carried out and spent in next three years, in the company web site for the information to public/public domain.
- xii. No further expansion or modifications in the plant shall be carried out without prior approval of the Ministry of Environment, Forests and Climate Change (MoEF&CC).
- xiii. Concealing factual data or submission of false/fabricated data may result in revocation of this environmental clearance and attract action under the provisions of Environment (Protection) Act, 1986.
- xiv. The Ministry may revoke or suspend the clearance, if implementation of any of the above conditions is not satisfactory.
- xv. The Ministry reserves the right to stipulate additional conditions if found necessary. The Company in a time bound manner shall implement these conditions.
- xvi. The Regional Office of this Ministry shall monitor compliance of the stipulated conditions. The project authorities should extend full cooperation to the officer (s) of the Regional Office by furnishing the requisite data / information/monitoring reports.
- xvii. Any appeal against this EC 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.
