

TSL/FAMD/FAPG/FY26/2569

Bhubaneswar-751023

Dt.29/05/2025

To,
Deputy Director General of Forests (Central)
Ministry of Environment, Forest & Climate Change,
Regional Office, A/3, Chandrasekharpur,

Sub: Submission of Half Yearly EC & CRZ Compliance for the period Oct'24 to Mar'25.

Ref: Letter No. J-11011/55/2011-1A-II(I) Dated 14.08.12 & 11-63/2012 Dated 18/3/13

Respected Sir,

We are enclosing the herewith half yearly Compliance return on Environment Clearance & CRZ Clearance for 55000 TPA High Carbon Ferro-Chrome plant for the period of Oct'24 to Mar'25.

This is for your kind information.

Thanking You, Yours Truly,

For Tata Steel Limited

Factory Manager (Atla Rambabu) ne Plant, Gopalpur

Plant Head & Factory Manager

Ferro Chrome Plant, Gopalpur

Copy to:

1. The Member Secretary, State Pollution Control Board, A/118, Nilakantha Nagar, Bhubaneswar, Odisha-751012)

2. Regional Officer, State Pollution Control Board, Berhampur

TATA STEEL LIMITED

Your (Half Yearly Compliance Report) has been Submitted with following details			
Proposal No	IA/OR/IND/5586/2011		
Compliance ID	128539960		
Compliance Number(For Tracking)	EC/M/COMPLIANCE/128539960/2025		
Reporting Year	2025		
Reporting Period	01 Jun(01 Oct - 31 Mar)		
Submission Date	31-05-2025		
RO/SRO Name	Shri Senthil Kumar Sampath		
RO/SRO Email	agmu156@ifs.nic.in		
State	ODISHA		
RO/SRO Office Address	Integrated Regional Offices, Bhubaneswar		
Note:- SMS and E-Mail has been sent to Shri Senthil Kur	mar Sampath, ODISHA with Notification to Project Proponent.		

Half Yearly Compliance Report 2025 01 Jun(01 Oct - 31 Mar)

Acknowledgement

Proposal Name	Proposed 55000 TPA High Carbon Ferro-Chrome Plant, 400000 TPA Rebar Mill and Desalination Plant at Gopalpur, Villages Chamkhandi, Sindhigaon Jagannathpur, Tehsil Chatrapur, District Ganjam, Odisha by M/s Tata Steel Limited
Name of Entity / Corporate Office	Tata Steel Ltd
Village(s)	N/A
District	GANJAM

Proposal No.	IA/OR/IND/5586/2011
Plot / Survey / Khasra No.	N/A
State	ODISHA
MoEF File No.	J-11011/55/2011-IA.II(I)

Category	Industrial Projects - 1
Sub-District	N/A
Entity's PAN	*****2803M
Entity name as per PAN	UTSAV KASHYAP

Compliance Reporting Details

Reporting Year 2025

Remarks (if any)

Reporting Period 01 Jun(01 Oct - 31 Mar)

Details of Production and Project Area

Name of Entity / Corporate Office

Tata Steel Ltd

	Project Area as per EC Granted	Actual Project Area in Possession
Private	140.426	140.426
Revenue Land	0	0
Forest	0	0
Others	0	0
Total	140.426	140.426

Production Capacity

Sr. no	Product Name	units	Valid Upto	Capacity	Production last year	Capacity as per CTO
1	High Carbon Ferro Chrome	Tons per Annum (TPA)	31/03/2026	55000	38504	55000

Conditions

Sr.No.	Condition Type	Condition Details			
1	Statutory compliance	The proponent shall obtain necessary CRZ clearance provision of CRZ Notification, 2010	under the		
PPs Submission: Complied We have been granted CRZ Clearance under the provision of CRZ Notification, 2011 on 18.03.2013 vide letter no. F No. 11-63/2012-IA.III from MoEFCC (IA Division).					
2	WASTE MANAGEMENT	No Charcoal shall be used as fuel. Pet Coal should be instead of charcoal from unknown sources.	e used as fuel		
PPs Submission: Complied No Charcoal is used as fuel for plant operations.					
3	AIR QUALITY MONITORING AND PRESERVATION	Continuous monitoring facilities for all the stacks an pollution control equipment viz. fume extraction systematic filters, ID fan and stack of adequate height to submerg shall be provided to control emission below 50 mg/Nm	m with bag ed arc furnac		
Continue Monthly been ins	report is being submitted to SPCB. F	ck is in place in SAF-1, SAF-2 and BQT Plant and Tume Extraction System with bag filters and ID fan has tack height is maintained in submerged arc furnace. to check dust emissions.	Date: 31/05/2025		
4	AIR QUALITY MONITORING AND PRESERVATION	The National Ambient Air Quality Standards issued vide G.S.R. No. 826(E) dated 16thNovember 2009 sha			
PPs Submission: Complied NAAQ-2009 Standards have been referred for air quality monitoring and is being complied.					
5	AIR QUALITY MONITORING AND PRESERVATION	Secondary fugitive emissions from all the sources sh controlled within the latest permissible limits issued by and regularly monitored. Guidelines / Code of Practice CPCB shall be followed.	y the Ministry		
A mobil	ubmission: Complied e Water sprinkler is being used on roa on to this Permanent Road sprinkler i	nds on a regular basis to control the fugitive emissions. s also installed to suppress the Dust.	Date: 31/05/2025		
6	WATER QUALITY MONITORING AND PRESERVATION	The total water requirement shall not exceed 5.5 ML effluent discharge shall be strictly followed, and no was should be discharged outside the premises.			
The max The ETI		00 TPA of Ferro Chrome Plant is 500 KLD approx. running condition and no wastewater is discharged	Date: 31/05/2025		
	WATER QUALITY MONITORING AND	Efforts shall be made to make use of rainwater harve capacity of the reservoir should be enhanced to meet the			

The ex	Submission: Complied isting water reservoir of 6.5 lakhs KL consoon. Rainwater post treatment is used	supremy is also used to store the runiwater during	Date: 9/05/2025
8	WATER QUALITY MONITORING AND PRESERVATION	Regular monitoring of influent and effluent surface, ground water shall be ensured and treated wastewater norms prescribed by the State Pollution Control Board under the Environment (Protection) Act whichever are stringent. Leachate study for the effluent generated and should also be regularly carried out and report submitt Ministry' Regional Office at Bhubaneswar, SPCB and	shall meet the or described more d analysis ed to the
Month	Submission: Complied ly Monitoring of Upstream and Downst the project site by third party registered	tream Surface water quality is carried out regularly d and NABL accredited labs.	Date: 31/05/2025
9	Statutory compliance	All the Ferro chrome slag shall be used for land filling plant or used as building material only after passing the Chemical Leachability Potential (TCLP) Test. Otherw substances shall be recovered from the slag and output disposed in secured landfill as per CPCB guidelines.	rough Toxic ise, hazardous
Ferro (l Leachability Potential (TCLP) has been done from The same can be used for landfilling in low lying	Date: 31/05/2025
10	Risk Mitigation and Disaster Management	Risk and Disaster Management Plan along with the measures should be prepared and a copy submitted to Regional Office at Bhubaneswar, SPCB and CPCB wi of issue of environment clearance letter.	the Ministry's
Risk a MoEF Office,	vide letter no. OP-Env/C-04/52/2012 d	th the mitigation measures have been submitted to the ated 12.11.2012 along with a copy to Eastern Regional trol Board, Bhubaneswar. Additionally, an onsite actories and Boilers is also in place.	Date: 29/05/2025
11	Corporate Environmental Responsibility	All the commitments made to the public during the Public Consultation meeting held on 20th September 2 satisfactorily implemented and a separate budget for in the same should be allocated and information submitted Ministry's Regional Office at Bhubaneswar.	2011 should be inplementing
Comm	Submission: Complied itments made to the public during public or Tata Steel Foundation (TSF) with the control of the control o	ic hearing are being regularly implemented and thin the allocated budget.	Date: 29/05/2025
12	GREENBELT	As proposed green belt should be developed in at least the project area. Selection of plant species shall be as puddelines in consultation with the DFO.	
Green	Submission: Complied belt development has been taken up in planted with an average survival rate gre	phase wise manner. Till date, over 54718 saplings have later than 95 percentage.	Date: 31/05/2025
13	Corporate Environmental Responsibility	At least 5 percent of the total cost of the project should earmarked towards the Enterprise Social Commitment Public Hearing issues and item-wise details along with action plan should be prepared and submitted to the M	based on time bound

		at Bhubaneswar. Implementation of such program shall accordingly in a time bound manner.	l be ensured
Separate development done by	nent activities such as Health, drin	e CSR activities, community as well as peripheral king water, Education, Environment etc. and is being upees 629.01 lacs were spent towards the above-arch 2024.	Date: 31/05/2025
14	MISCELLANEOUS	The Company shall provide housing for construction the site with all necessary infrastructure and facilities s cooking, mobile toilets, safe drinking water, medical h creche etc. The housing may be in the form of tempora be removed after the completion of the project.	such as fuel fo ealth care,
Necessar	abmission: Complied by infrastructure and facilities for the tition phase.	he construction labors were provided during the	Date: 31/05/2025
15	Corporate Environmental Responsibility	The Company shall submit within three months their Corporate Environment Responsibility which should in address (i) Standard operating process / procedure to be any infringement/deviation/violation of environmental norms/conditions, (ii) Hierarchical system or administration the Company to deal with environmental issues and encompliance to environmental clearance conditions and reporting of noncompliance/violation environmental negorard of Directors of the company and/or stakeholders shareholders.	nter-alia eing into foci or forest rative order o suring (iii) System orms to the
The Corp		ace and has been submitted to the MoEFCC vide letter no. with a copy to Regional Office, OSPCB.	Date: 31/05/2023
neral C	onditions		
Sr.No.	Condition Type	Condition Details	
1	Statutory compliance	The project authorities must strictly adhere to the stip by the Orissa State Pollution Control Board and the Sta Government.	
PPs Su	ibmission: Complied		Date: 31/05/2025

Sr.No.	Condition Type	Condition Details	
1	Statutory compliance	The project authorities must strictly adhere to the stipulations in by the Orissa State Pollution Control Board and the State Government.	
	ubmission: Complied ons made by the State and Centr	ral Govt. from time to time are being adhered to.	Date: 31/05/2025
2	Statutory compliance	No further expansion or modifications in the plant slout without prior approval of the Ministry of Environi Forests.	
Amendn	abmission: Complied nent to Environmental Clearance on 08.08.2014.	e was granted by MoEFCC vide File no. J-11011/55/2011-	Date: 29/05/2025
3	AIR QUALITY MONITORING AND PRESERVATION	The gaseous emissions from various process units sl the load/mass-based standards notified by the Ministry 1993 and standards prescribed from time to time. The may specify more stringent standards for the relevant	y on 19th May State Board

	Submission: Complied trocess units have the gaseous emission		Date: 9/05/2025
4	AIR QUALITY MONITORING AND PRESERVATION	At least four ambient air quality monitoring stations established in the downward direction as well as where ground level concentration of PM10, SO2 and NOX ar consultation with the SPCB. Data on ambient air quali emission shall be regularly submitted to this Ministry i Regional Office at Bhubaneswar and the SPCB/CPCB months.	e maximum re anticipated in ty and stack including its
Four a		sion monitoring stations installed. The ground level are as per the anticipation of SPCB. The Air Quality, alt is attached herewith.	Date: 31/05/2025
5	WATER QUALITY MONITORING AND PRESERVATION	Industrial wastewater shall be properly collected, treat conform to the standards prescribed under GSR 422(E May 1993 and 31st December 1993 or as amended from The treated wastewater shall be utilized for plantation) dated 19th m time to time
Indust standa		ated in Effluent Treatment Plant conforming to the and re-used for green belt development, water tc.	Date: 29/05/2025
6	Statutory compliance	Occupational health surveillance of the workers shall regular basis and records maintained as per the Factori	
Health check	Submission: Complied h Records of the workers are being mature prior to the issue of their gate pass e workers is being done.	intained as per Factories Act. Pre-Employment Medical to work inside the site and Periodic Medical Check-up	Date: 29/05/2025
Health check- for the	h Records of the workers are being ma -up prior to the issue of their gate pass	intained as per Factories Act. Pre-Employment Medical to work inside the site and Periodic Medical Check-up The company shall develop surface water harvesting harvest the rainwater for utilization in the lean season recharging the ground water table.	29/05/2025 structures to
Health checks for the 7 PPs A wat	h Records of the workers are being ma -up prior to the issue of their gate pass e workers is being done. WATER QUALITY MONITORING AND PRESERVATION Submission: Complied	The company shall develop surface water harvesting harvest the rainwater for utilization in the lean season recharging the ground water table.	29/05/2025 structures to besides Date:
Health checks for the 7 PPs A wat	h Records of the workers are being ma -up prior to the issue of their gate pass e workers is being done. WATER QUALITY MONITORING AND PRESERVATION Submission: Complied ter reservoir of 6.5 lakhs Liter capacity	The company shall develop surface water harvesting harvest the rainwater for utilization in the lean season recharging the ground water table.	29/05/2025 structures to besides Date: 29/05/2025 environmenta he EIA/EMP promic community
PPs A wat will be PPs Environ	h Records of the workers are being mature prior to the issue of their gate passe workers is being done. WATER QUALITY MONITORING AND PRESERVATION Submission: Complied the reservoir of 6.5 lakhs Liter capacity e used for plant operation post requisit Corporate Environmental Responsibility Submission: Complied commental Responsibility	The company shall develop surface water harvesting harvest the rainwater for utilization in the lean season recharging the ground water table. The project proponent shall also comply with all the protection measures and safeguards recommended in the report. Further, the company must undertake socio-ecc development activities in the surrounding villages like development programs, educational programs, drinking and health care etc. ated in the EIA and EMP report have been implemented. Health, Education, Sports, agriculture, and infrastructure	structures to besides Date: 29/05/2025 environmenta he EIA/EMP promic community

	Submission: Complied te budget has been earmarked towa	ards capital and operating environment expenditure.	Date: 29/05/2025
10	Statutory compliance	A copy of clearance letter shall be sent by the propor Panchayat, Zila Parishad/Municipal Corporation, Urba and the local NGO, if any, from whom suggestions/repany, were received while processing the proposal. The letter shall also be put on the web site of the company proponent.	n Local Body presentations, i clearance
Enviro		omitted to the concerned Govt. /Private Bodies in Aug een uploaded on the Tata Steel website, www.tatasteel.com	Date: 30/05/2025
11	Statutory compliance	The project proponent shall upload the status of com stipulated environmental clearance conditions, including monitored data on their website and shall update the sat periodically. It shall simultaneously be sent the Region the MoEF at Bhubaneswar. The respective Zonal Office the SPCB. The criteria pollutant levels namely; PM10, (ambient levels as well as stack emissions) or critical sparameters, indicated for the projects shall be monitored displayed at a convenient location near the main gate of in the public domain.	ng results of time all Office of CPCB and SO2, NOX ectoral ed and
Last six vww.ta evels i gate of	atasteel.com. Electronic multi-line namely, PM10, SO2, NOX or critic	been uploaded to the company's website display board installed to display the criteria pollutant all sectoral parameters, indicated for the projects at main a. The compliance reports are being sent to the Regional office of CPCB and SPCB.	Date: 30/05/2025
2	Statutory compliance	The project proponent shall also submit six monthly status of the compliance of the stipulated environment including results of monitored data (both in hard copie e-mail) to the Regional Office of MoEF, the respective of CPCB and the SPCB. The Regional Office of this M Bhubaneswar/ CPCB/ SPCB shall monitor the stipulat	al conditions s as well as by e Zonal Office Inistry at
Six mo ncludi Climat	ng results of monitored data will be	liance of the stipulated environmental clearance conditions e submitted to the Ministry of Environment, Forests and Bhubaneswar, the respective Zonal Office of Central lution Control Board in soft copy.	Date: 31/05/2025
3	Statutory compliance	The environmental statement for each financial year March in Form-V as is mandated to be submitted by the proponent to the concerned Pollution Control Board as under the Environment (Protection) Rules, 1986, as an subsequently, shall also be put on the website of the cowith the status of compliance of environmental conditionals also be sent to the respective Regional Office of the M Bhubaneswar by e-mail.	ne project prescribed nended ompany along ons and shall
	Submission: Complied vironment Statement in Form-V is	submitted before 30th Sept of every year .Copy of	Date: 31/05/2025

		The Project Proponent shall inform the public that the been accorded environmental clearance by the Ministre the clearance letter are available with the SPCB and m	y and copies o			
14	PUBLIC HEARING	the clearance letter are available with the SPCB and may also be see at Website of the Ministry of Environment and Forests at http://envfor.nic.in. This shall be advertised within seven days from the date of issue of the clearance letter, at least in two local newspapers that are widely circulated in the region of which one shabe in the vernacular language of the locality concerned and a copy of the same should be forwarded to the Regional Office at Bhubaneswar.				
Compl The Ne		follows a. Odia: SAMBAD, Page No. 9 b. English: ement details have been submitted to the MoEF 9.08.12.	Date: 31/05/2025			
15	Statutory compliance	Project authorities shall inform the Regional Office a Ministry, the date of financial closure and final approx project by the concerned authorities and the date of co land development work.	al of the			
PPs S	Submission: Complied					
Project interna intimat	al accruals. Ground levelling activities wated to the board vide letter no PG-Env/C	el Board in August 2010 and is being funded through were started on 04.05.2013 and the same was being C-01/03/2013 and PG-Env/C-01/04/2013, dated 10th ocal people have deferred the plant operation.	Date: 30/05/2025			
Project interna intimat	al accruals. Ground levelling activities wated to the board vide letter no PG-Env/C	vere started on 04.05.2013 and the same was being C-01/03/2013 and PG-Env/C-01/04/2013, dated 10th	shall be kept control res etc. on all should conform			
Project internation intimate May 20 116	al accruals. Ground levelling activities we ted to the board vide letter no PG-Env/C013. However, frequent strikes by the letter Monitoring & Prevention Submission: Complied	vere started on 04.05.2013 and the same was being C-01/03/2013 and PG-Env/C-01/04/2013, dated 10th ocal people have deferred the plant operation. The overall noise levels in and around the plant area well within the standards (85dBA) by providing noise measures including acoustic hoods, silencers, enclosur sources of noise generation. The ambient noise levels to the standards prescribed under EPA Rules, 1989 viz	shall be kept control res etc. on all should conform			
Project internation intimate May 20 116	al accruals. Ground levelling activities we ted to the board vide letter no PG-Env/C013. However, frequent strikes by the letter Monitoring & Prevention Submission: Complied	vere started on 04.05.2013 and the same was being C-01/03/2013 and PG-Env/C-01/04/2013, dated 10th ocal people have deferred the plant operation. The overall noise levels in and around the plant area well within the standards (85dBA) by providing noise measures including acoustic hoods, silencers, enclosur sources of noise generation. The ambient noise levels to the standards prescribed under EPA Rules, 1989 viz (daytime) and 70 dBA (nighttime).	shall be kept control res etc. on all should conform. 75 dBA			
Project internation intimate May 20 16 PPs 5 Ambie	al accruals. Ground levelling activities we ted to the board vide letter no PG-Env/C013. However, frequent strikes by the letter Monitoring & Prevention Submission: Complied	vere started on 04.05.2013 and the same was being C-01/03/2013 and PG-Env/C-01/04/2013, dated 10th ocal people have deferred the plant operation. The overall noise levels in and around the plant area well within the standards (85dBA) by providing noise measures including acoustic hoods, silencers, enclosur sources of noise generation. The ambient noise levels to the standards prescribed under EPA Rules, 1989 viz (daytime) and 70 dBA (nighttime).	shall be kept control res etc. on all should conform. 75 dBA			
Project interna intimat May 20 16 PPs S Ambie	al accruals. Ground levelling activities we ted to the board vide letter no PG-Env/C013. However, frequent strikes by the letter no PG-Env/C01	vere started on 04.05.2013 and the same was being C-01/03/2013 and PG-Env/C-01/04/2013, dated 10th ocal people have deferred the plant operation. The overall noise levels in and around the plant area well within the standards (85dBA) by providing noise measures including acoustic hoods, silencers, enclosur sources of noise generation. The ambient noise levels to the standards prescribed under EPA Rules, 1989 viz (daytime) and 70 dBA (nighttime). Visit Remarks	shall be kept control res etc. on all should conform. 75 dBA			

Sl. No.	Specific Conditions	Compliance/Status
1	The proponent shall obtain necessary CRZ clearance under the provision of CRZ Notification, 2010	We have been granted CRZ Clearance under the provision of CRZ Notification, 2011 on 18.03.2013 vide letter no. F No. 11-63/2012-IA.III from MoEF & CC (IA Division).
2	No Charcoal shall be used as fuel. Pet Coal should be used as fuel instead of charcoal from unknown sources.	No Charcoal is used as fuel for plant operations.
3	Continuous monitoring facilities for all the stacks and sufficient air pollution control equipment viz. fume extraction system with bag filters, ID fan and stack of adequate height to submerged arc furnace shall be provided to control emission below 50 mg/Nm ³	 Continuous monitoring of PM for process stack is in place in SAF-1 & SAF-2, BQT. Plant and Monthly report is being submitted to SPCB. Fume Extraction System with bag filters and ID fan has been installed to control emission. Adequate stack height is maintained in submerged arc furnace. Dust extraction &DFDS system is installed to check dust emissions.
4	The National Ambient Air Quality Standards issued by the Ministry vide G.S.R. No. 826(E) dated 16 th November 2009 shall be followed.	NAAQ-2009 Standards have been referred for air quality monitoring and is being complied.
5	Secondary fugitive emissions from all the sources shall be controlled within the latest permissible limits issued by the Ministry and regularly monitored. Guidelines / Code of Practice issued by the CPCB shall be followed.	A mobile Water sprinkler is being used on roads on a regular basis to control the fugitive emissions. In addition to this Permanent Road sprinkler is also installed to suppress the Dust.
6	The total water requirement shall not exceed 5.5 MLD. 'Zero" effluent discharge shall be strictly followed, and no wastewater should be discharged outside the premises.	The maximum water requirement for the 55,000 TPA of Ferro Chrome Plant is 500 KLD approx. The ETP and STP has been installed and is in running condition and no wastewater is discharged outside the premises.
7	Efforts shall be made to make use of rainwater harvested. If needed, capacity of the reservoir should be enhanced to meet the maximum water requirement. Only balance water requirement should be met from other sources.	The water reservoir of 6.5 lakhs KL capacity is also used to store the rainwater during the monsoon. Rainwater post treatment is used to meet the water requirement.
8	Regular monitoring of influent and effluent surface, sub-surface and ground water shall be ensured and treated wastewater shall meet the norms prescribed by the State Pollution Control Board or described under the Environment (Protection) Act whichever are more stringent. Leachate study for the effluent generated and analysis should also be regularly carried out and report submitted to the Ministry' Regional Office at Bhubaneswar, SPCB and CPCB.	Monthly Monitoring of Upstream & Downstream Surface water quality is carried out regularly around the project site by third party registered and NABL accredited labs.

9	All the Ferro chrome slag shall be used for land filling inside the plant or used as building material only after passing through Toxic Chemical Leachability Potential (TCLP) Test. Otherwise, hazardous substances shall be recovered from the slag and output waste and be disposed in secured landfill as per CPCB guidelines.	Ferro Chrome Slag testing for Toxic Chemical Leachability Potential (TCLP) has been done from IMMT. No hazardous substances were found. The same can be used for landfilling in low lying areas.
10	Risk and Disaster Management Plan along with the mitigation measures should be prepared and a copy submitted to the Ministry's Regional Office at Bhubaneswar, SPCB and CPCB within 3 months of issue of environment clearance letter.	Risk and Disaster Management Plan along with the mitigation measures have been submitted to the MoEF vide letter no. OP-Env/C-04/52/2012 dated 12.11.2012 along with a copy to Eastern Regional Office, MoEF and Odisha State Pollution Control Board, Bhubaneswar. Additionally, an onsite emergency plan approved by Directorate of Factories & Boilers is also in place.
11	All the commitments made to the public during the Public Hearing / Public Consultation meeting held on 20th September 2011 should be satisfactorily implemented and a separate budget for implementing the same should be allocated and information submitted to the Ministry's Regional Office at Bhubaneswar.	Commitments made to the public during public hearing is being regularly implemented and monitored by Tata Steel Foundation (TSF) within the allocated budget.
12	As proposed green belt should be developed in at least 33% of the project area. Selection of plant species shall be as per the CPCB guidelines in consultation with the DFO.	Green belt development has been taken up in phase wise manner. Till date, over 54718 saplings have been planted with an average survival rate greater than 95%.
13	At least 5% of the total cost of the project should be earmarked towards the Enterprise Social Commitment based on Public Hearing issues and item-wise details along with time bound action plan should be prepared and submitted to the Ministry's Office at Bhubaneswar. Implementation of such program shall be ensured accordingly in a time bound manner.	Separate budget has been earmarked for the CSR activities, community as well as peripheral development activities such as Health, drinking water, Education, Environment etc. and is being done by our Tata Steel Foundation wing. Rupees 629.01 lacs were spent towards the abovementioned activities in October 2023 to March 2024.
14	The Company shall provide housing for construction labor within the site with all necessary infrastructure and facilities such as fuel for cooking, mobile toilets, 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.	Necessary infrastructure & facilities for the construction labors were provided during the construction phase.

The Company shall submit within three months their policy towards Corporate Environment Responsibility which should inter-alia address (i) Standard operating process / procedure to being into focus any infringement/deviation/violation environmental or forest norms/conditions, (ii) Hierarchical system or administrative order of the Company to deal with environmental issues compliance and ensuring to environmental clearance conditions and (iii) reporting System of of noncompliance/violation environmental norms to the Board of Directors of the company and/or stakeholders or shareholders.

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The Corporate Environment Policy is in place and has been submitted to the MoEF & CC vide letter no. OP-Env /C-04/52/2012 dated 12.11.2012 with a copy to Regional Office, OSPCB.

Sl. No.	General Conditions	Compliance/Status
1	The project authorities must strictly adhere to the stipulations made by the Orissa State Pollution Control Board and the State Government.	Stipulations made by the State & Central Govt. from time to time are being adhered to.
2	No further expansion or modifications in the plant shall be carried out without prior approval of the Ministry of Environment and Forests.	Amendment to Environmental Clearance was granted by MoEF & CC vide File no. J-11011/55/2011-IA II(I) on 08.08.2014.
3	The gaseous emissions from various process units shall confirm to the load/mass-based standards notified by the Ministry on 19th May 1993 and standards prescribed from time to time. The State Board may specify more stringent standards for the relevant parameters keeping in view the nature of the industry and its size and location.	The Process units have the gaseous emissions under control and below the prescribed limits.
4	At least four ambient air quality monitoring stations should be established in the downward direction as well as where maximum ground level concentration of PM ₁₀ , SO ₂ and NOX are anticipated in consultation with the SPCB. Data on ambient air quality and stack emission shall be regularly submitted to this Ministry including its Regional Office at Bhubaneswar and the SPCB/CPCB once in six months.	Four ambient Air Quality & fugitive Emission monitoring stations installed. The ground level concentration of PM_{10} , SO_2 and NOX etc. are as per the anticipation of SPCB. The Air Quality, Fugitive emission and Stack monitoring result is attached herewith.
5	Industrial wastewater shall be properly collected, treated so as to conform to the standards prescribed under GSR 422(E) dated 19 th May 1993 and 31 st December 1993 or as amended from time to time. The treated wastewater shall be utilized for plantation purpose.	Industrial wastewater generated has been treated in Effluent Treatment Plant conforming to the standards and treated wastewater is recycled and re-used for green belt development, water sprinkling on roads, metal cooling activity etc.
6	Occupational health surveillance of the workers shall be done on a regular basis and records maintained as per the Factories Act.	Health Records of the workers are being maintained as per Factories Act. Pre-Employment Medical check-up prior to the issue of their gate pass to work inside the site and Periodic Medical Check-up for the workers is being done.
7	The company shall develop surface water harvesting structures to harvest the rainwater for utilization in the lean season besides recharging the ground water table.	A water reservoir of 6.5 lakhs liter capacity is in place to store the rainwater post monsoon which will be used for plant operation post requisite treatment.

8	The project proponent shall also comply with all the environmental protection measures and safeguards recommended in the EIA/EMP report. Further, the company must undertake socio-economic development activities in the surrounding villages like community development programs, educational programs, drinking water supply and health care etc.	 Environmental Protection measures as indicated in the EIA and EMP report has been implemented. Socio-economic developmental activities in Health, Education, Sports, agriculture, and infrastructure development are being carried out in the surrounding and periphery villages.
09	Requisite amount shall be earmarked towards capital cost and recurring cost/annum for environment pollution control measures to implement the conditions stipulated by the Ministry of Environment and Forests as well as the State Government. An implementation schedule for implementing all the conditions stipulated herein shall be submitted to the Regional Office of the Ministry at Bhubaneswar. The funds so provided shall not be diverted for any other purpose.	Separate budget has been earmarked towards capital and operating environment expenditure. The funds so provided are not diverted for any other purpose.
10	A copy of clearance letter shall be sent by the proponent to concern Panchayat, Zila Parishad/Municipal Corporation, Urban Local Body and the local NGO, if any, from whom suggestions/representations, if any, were received while processing the proposal. The clearance letter shall also be put on the web site of the company by the proponent.	 Environment Clearance copy has been submitted to the concerned Govt. /Private Bodies in Aug 2012. Environment Clearance letter has been uploaded on the Tata Steel website, www.tatasteel.com
11	The project proponent shall upload the status of compliance of the stipulated environmental clearance conditions, including results of monitored data on their website and shall update the same periodically. It shall simultaneously be sent the Regional Office of the MoEF at Bhubaneswar. The respective Zonal Office of CPCB and the SPCB. The criteria pollutant levels namely; PM ₁₀ , SO ₂ , NO _X (ambient levels as well as stack emissions) or critical sectoral parameters, indicated for the projects shall be monitored and displayed at a convenient location near the main gate of the company in the public domain.	 Last six-monthly compliance reports have been uploaded to the company's website www.tatasteel.com. Electronic multi-line display board installed at main gate of the company to display the criteria pollutant levels namely, PM₁₀, SO₂, NO_X or critical sectoral parameters, indicated for the projects. The compliance reports are being sent to the Regional Office, MoEF and the respective zonal office of CPCB and SPCB.

12	The project proponent shall also submit six monthly reports on the status of the compliance of the stipulated environmental conditions including results of monitored data (both in hard copies as well as by e-mail) to the Regional Office of MoEF, the respective Zonal Office of CPCB and the SPCB. The Regional Office of this Ministry at Bhubaneswar/ CPCB/ SPCB shall monitor the stipulated conditions.	Six monthly reports on the status of compliance of the stipulated environmental clearance conditions including results of monitored data will be submitted to the Ministry of Environment, Forests & Climate Change and it's Regional Office Bhubaneswar, the respective Zonal Office of Central Pollution Control Board and the State Pollution Control Board in soft copy.
13	The environmental statement for each financial year ending 31st March in Form-V as is mandated to be submitted by the project proponent to the concerned 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 conditions and shall also be sent to the respective Regional Office of the MoEF at Bhubaneswar by email.	The Environment Statement in Form-V is submitted before 30th Sept of every year .Copy of Environmental Statement is being sent to the State Pollution Control Board and to the Regional Office of MoEF&CC by email. Environmental statement is being updated/uploaded on the website (www.tatasteel.com).
14	The Project Proponent shall inform the public that the project has been accorded environmental clearance by the Ministry and copies of the clearance letter are available with the SPCB and may also be seen at Website of the Ministry of Environment and Forests at http:/envfor.nic.in. This shall be advertised within seven days from the date of issue of the clearance letter, at least in two local newspapers that are widely circulated in the region of which one shall be in the vernacular language of the locality concerned and a copy of the same should be forwarded to the Regional Office at Bhubaneswar.	Complied. Paper advertisement details are as follows; a. Odia: SAMBAD, Page No. 9 b. English: The New Indian Express, Page no. 5 Advertisement details have been submitted to the MoEF Eastern Regional Office at Bhubaneswar on 19.08.12.
15	Project authorities 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 and the date of commencing the land development work.	Project received final approval from Tata Steel Board in August 2010 and is being funded through internal accruals. Ground leveling activities started on 04.05.2013 and the same was being intimated to the board vide letter no PG-Env/C-01/03/2013 & PG-Env/C-01/04/2013, dated 10 th May 2013. However, frequent strikes by the local people have deferred the plant operation.
16	The overall noise levels in and around the plant area shall be kept well within the standards (85dBA) by providing noise control measures including acoustic hoods, silencers, enclosures etc. on all sources of noise generation. The ambient noise levels should conform to the standards prescribed under EPA Rules, 1989 viz. 75 dBA (daytime) and 70 dBA (nighttime).	Ambient Noise monitoring is continuously monitored. Plant area is maintained within the standards.



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Ref: CEMC32032214St1 Date: 30.5.2025

SIX MONTHLY COMPLIANCE REPORT FROM OCTOBER-2024 TO MARCH -2025

STATIONARY EMISSION MONITORING REPORT

M/s. Tata Steel Limited, Ferro Alloys Plant, Gopalpur Name of Industry

VAYUBODHAN STACK SAMPLER VSS-2 Monitoring Insruments

Stack Attached to CGP-1

Parameters	Prescribed standard as per CTO	OCT-2024	NOV-2024	DEC-2024	JAN-2025	FEB-2025	MAR-2025	Average
Flue Gas Temp. in K		360	349	358	356			355.7
Average flue gas Velocity in m/sec		14.0	12.4	12.6	12.0			12.75
Particulate Matter (PM) in mg/Nm ³	50	36.4	35.8	37.4	36.9			36.63
Sulphur Dioxide (SO ₂) in mg/Nm ³		32.1	32.4	31.2	30.6			31.58
Nitrogen Oxide (NOx) in mg/Nm ³		26.5	28.6	26.6	27.2			27.23

Notes:

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Ref: CEMC32032214St2 Date: 30.5.2025

SIX MONTHLY COMPLIANCE REPORT FROM OCTOBER-2024 TO MARCH -2025

STATIONARY EMISSION MONITORING REPORT

Name of Industry : M/s. Tata Steel Limited, Ferro Alloys Plant, Gopalpur

Monitoring Insruments : VAYUBODHAN STACK SAMPLER VSS-2

Stack Attached to : CGP-2

Parameters	Prescribed standard as per CTO	OCT-2024	NOV-2024	DEC-2024	JAN-2025	FEB-2025	MAR-2025	Average
Flue Gas Temp. in K		367	376	373	370	363	370	369.8
Average flue gas Velocity in m/sec		11.3	11.1	11.4	11.8	13.4	11.2	11.7
Particulate Matter (PM) in mg/Nm ³	50	37.5	39.2	38.8	37.5	35.8	37.0	37.63
Sulphur Dioxide (SO ₂) in mg/Nm ³		41.5	43.4	35.6	34.7	32.6	42.8	38.43
Nitrogen Oxide (NOx) in mg/Nm ³		34.5	33.3	31.4	30.3	26.4	32.4	31.38

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Ref: CEMC32032214A1 Date: 30.05.2025

AAO MONITORING REPORT FOR THE MONTH OF OCT-2024 TO MARCH-2025

1.Name of the industry	M/s. Tata Steel Limited, Ferro Alloys Plant, Gopalpur
2.Sampling Location	MRSS Building roof
3.Monitoring Instruments	RDS (APM 460 BL)APM 550 (Envirotech), CO Monitoring, VOC sampler
4.Sample Collected by	CEMCPL Representative

						PARAM	ETERS					
Date	PM ₁₀ (μg/m ³)	PM _{2.5} (μg/m ³)	SO ₂ (μg/m ³)	NO _x (μg/m ³)	CO (mg/m³)	O3 (mg/m ³)	NH_3 ($\mu g/m^3$)	C_6H_6 $(\mu g/m^3)$	BaP (ng/m³)	Ni (ng/m³)	Pb (μg/m³)	As (ng/m³)
Oct-2024	70.10	36.5	13.20	16.70	0.55	<10	<20	<0.1	<0.6	<0.44	<5	<1
Nov-2024	76.58	41.3	14.35	18.45	0.66	<10	<20	<0.1	<0.6	<0.44	<5	<1
Dec-2024	73.74	38.38	13.48	17.10	0.58	<10	<20	<0.1	<0.6	<0.44	<5	<1
Jan-2025	77.68	42.29	14.22	17.85	0.49	<10	<20	<0.1	<0.6	<0.44	<5	<1
Feb-2025	72.46	36.76	12.89	17.11	0.57	<10	<20	<0.1	<0.6	<0.44	<5	<1
Mar-2025	74.76	38.57	13.91	17.87	0.50	<10	<20	<0.1	<0.6	<0.44	<5	<1
NAAQ Standard	100	60	180	80	4	180	400	5	1	20	1	6
Six monthly Average	74.22	38.97	13.67	17.51	0.56	<10	<20	<0.1	<0.6	<0.44	<5	<1
Testing method	Gravimet ric	Gravimet ric	Improved West and Gaeke method	Modified Jacob & Hochheiser (Na- Arsenite)	Chemical Method	NDIR Spectro scopy	Indo phenol blue method	Absorption & Desorption followed by GC analysis	Solvent extraction followed by Gas Chromat ography analysis	AAS method after sampling	AAS metho d after sampli ng	AAS method after sampling

 $\textbf{BDL Values}: \text{PM}_{10} < 20 \ \mu\text{g/m}^3, \text{PM}_{2.5} < 10 \ \mu\text{g/m}^3 \ \text{SO}_2 < 4 \ \mu\text{g/m}^3, \text{NO}_X < 6 \ \mu\text{g/m}^3, \text{O}_3 < 4 \ \mu\text{g/m}^3, \text{NH}_3 < 20 \ \mu\text{g/m}^3, \text{Ni} < 2.5 \ \text{ng/m}^3, \text{As} < 1 \ \text{ng/m}^3, \text{C}_6 + 4 \ \mu\text{g/m}^3, \text{BaP} < 0.5 \ \text{ng/m}^3, \text{Pb} < 0.02 \ \mu\text{g/m}^3, \text{CO}_2 < 0.1 \ \text{mg/m}^3, \text{CO}_3 < 0.2 \ \mu\text{g/m}^3, \text{CO}_3 < 0.2 \ \text{mg/m}^3, \text{CO}_3 < 0.2 \ \text$

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Ref: CEMC32032214A2 Date: 30.05.2025

AAQ MONITORING REPORT FOR THE MONTH OF OCT-2024 TO MARCH-2025

1.Name of the industry	M/s. Tata Steel Limited, Ferro Alloys Plant, Gopalpur
2.Sampling Location	LBSS Building roof
3.Monitoring Instruments	RDS (APM 460 BL)APM 550 (Envirotech), CO Monitoring, VOC sampler
4.Sample Collected by	CEMCPL Representative

	PARAMETERS											
Date	PM ₁₀ (μg/m ³)	PM _{2.5} (μg/m ³)	SO ₂ (μg/m ³)	NO _x (μg/m ³)	CO (mg/m³)	O3 (mg/m ³)	NH ₃ (μg/m ³)	C_6H_6 $(\mu g/m^3)$	BaP (ng/m³)	Ni (ng/m³)	Pb (μg/m³)	As (ng/m³)
Oct-2024	65.40	32.70	11.20	15.5	0.53	<10	<20	<0.1	<0.6	<0.44	<5	<1
Nov-2024	64.73	36.39	12.55	16.75	0.63	<10	<20	<0.1	<0.6	<0.44	<5	<1
Dec-2024	65.50	35.79	12.73	16.20	0.54	<10	<20	<0.1	<0.6	<0.44	<5	<1
Jan-2025	68.28	38.43	11.09	16.34	0.42	<10	<20	<0.1	<0.6	<0.44	<5	<1
Feb-2025	64.71	32.43	10.80	15.52	0.51	<10	<20	<0.1	<0.6	<0.44	<5	<1
Mar-2025	67.01	34.23	11.82	16.28	0.44	<10	<20	<0.1	<0.6	<0.44	<5	<1
NAAQ Standard	100	60	180	80	4	180	400	5	1	20	1	6
Six monthly Average	65.94	34.99	11.7	16.10	0.51	<10	<20	<0.1	<0.6	<0.44	<5	<1
Testing method	Gravimet ric	Gravimet ric	Improved West and Gaeke method	Modified Jacob & Hochheiser (Na- Arsenite)	Chemical Method	NDIR Spectro scopy	Indo phenol blue method	Absorption & Desorption followed by GC analysis	Solvent extraction followed by Gas Chromat ography analysis	AAS method after sampling	AAS metho d after sampli ng	AAS method after sampling

 $\textbf{BDL Values}: PM_{10} < 20~\mu\text{g/m}^3, PM_{2.5} < 10~\mu\text{g/m}^3 \text{ SO}_2 < 4~\mu\text{g/m}^3, NO_X < 6~\mu\text{g/m}^3, O_3 < 4~\mu\text{g/m}^3, NH_3 < 20~\mu\text{g/m}^3, Ni < 2.5~n\text{g/m}^3, As < 1~n\text{g/m}^3, C_6H_6 < 4~\mu\text{g/m}^3, BaP < 0.5~n\text{g/m}^3, Pb < 0.02~\mu\text{g/m}^3, CO < 0.1~m\text{g/m}^3$

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Ref: CEMC32032214A3 Date: 30.05.2025

AAQ MONITORING REPORT FOR THE MONTH OF OCT-2024 TO MARCH-2025

1.Name of the industry	M/s. Tata Steel Limited, Ferro Alloys Plant, Gopalpur
2.Sampling Location	Canteen Building roof
3.Monitoring Instruments	RDS (APM 460 BL)APM 550 (Envirotech), CO Monitoring, VOC sampler
4.Sample Collected by	CEMCPL Representative

		PARAMETERS										
Date	PM ₁₀ (μg/m ³)	PM _{2.5} (μg/m ³)	SO ₂ (μg/m ³)	NO _x (μg/m ³)	CO (mg/m³)	O3 (mg/m³)	NH_3 ($\mu g/m^3$)	C_6H_6 $(\mu g/m^3)$	BaP (ng/m³)	Ni (ng/m³)	Pb (μg/m³)	As (ng/m³)
Oct-2024	65.70	33.65	11.51	14.91	0.50	<10	<20	<0.1	<0.6	<0.44	<5	<1
Nov-2024	65.63	35.70	14.66	17.05	0.54	<10	<20	<0.1	<0.6	<0.44	<5	<1
Dec-2024	63.80	33.75	10.39	12.95	0.50	<10	<20	<0.1	<0.6	<0.44	<5	<1
Jan-2025	67.70	37,65	11.13	13.70	0.44	<10	<20	<0.1	<0.6	<0.44	<5	<1
Feb-2025	66.53	33.94	10.99	14.95	0.44	<10	<20	<0.1	<0.6	<0.44	<5	<1
Mar-2025	68.83	35.74	12.01	15.71	0.37	<10	<20	<0.1	<0.6	<0.44	<5	<1
NAAQ Standard	100	60	180	80	4	180	400	5	1	20	1	6
Six monthly Average	66.36	34.55	11.78	14.88	0.46	<10	<20	<0.1	<0.6	<0.44	<5	<1
Testing method	Gravimet ric	Gravimet ric	Improved West and Gaeke method	Modified Jacob & Hochheiser (Na- Arsenite)	Chemical Method	NDIR Spectro scopy	Indo phenol blue method	Absorption & Desorption followed by GC analysis	Solvent extraction followed by Gas Chromat ography analysis	AAS method after sampling	AAS metho d after sampli ng	AAS method after sampling

 $\textbf{\textit{BDL Values}}: PM_{10} < 20~\mu\text{g/m}^3, PM_{2.5} < 10~\mu\text{g/m}^3 ~SO_2 < 4~\mu\text{g/m}^3, NO_X < 6~\mu\text{g/m}^3, O_3 < 4~\mu\text{g/m}^3, NH_3 < 20~\mu\text{g/m}^3, Ni < 2.5~n\text{g/m}^3, As < 1~n\text{g/m}^3, C_0 H_6 < 4~\mu\text{g/m}^3, BaP < 0.5~n\text{g/m}^3, Pb < 0.02~\mu\text{g/m}^3, CO < 0.1~m\text{g/m}^3$

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Ref: CEMC32032214A4 Date: 30.05.2025

1.Name of the industry	M/s. Tata Steel Limited, Ferro Alloys Plant, Gopalpur
2.Sampling Location	ETP Building roof
3.Monitoring Instruments	RDS (APM 460 BL)APM 550 (Envirotech), CO Monitoring, VOC sampler
4.Sample Collected by	CEMCPL Representative

		PARAMETERS										
Date	PM ₁₀ (μg/m ³)	PM _{2.5} (μg/m ³)	SO ₂ (μg/m ³)	NO _x (μg/m ³)	CO (mg/m³)	O3 (mg/m ³)	NH ₃ (μg/m ³)	C_6H_6 $(\mu g/m^3)$	BaP (ng/m³)	Ni (ng/m³)	Pb (μg/m³)	As (ng/m³)
Oct-2024	65.72	34.0	10.95	15.75	0.51	<10	<20	<0.1	<0.6	<0.44	<5	<1
Nov-2024	67.36	35.75	12.20	15.36	0.55	<10	<20	<0.1	<0.6	<0.44	<5	<1
Dec-2024	64.53	34.13	11.03	14.98	0.47	<10	<20	<0.1	<0.6	<0.44	<5	<1
Jan-2025	64.43	38.03	11.77	15.72	0.45	<10	<20	<0.1	<0.6	<0.44	<5	<1
Feb-2025	65.58	33.38	10.43	14.65	0.51	<10	<20	<0.1	<0.6	<0.44	<5	<1
Mar-2025	67.88	35.18	11.45	15.41	0.44	<10	<20	<0.1	<0.6	<0.44	<5	<1
NAAQ Standard	100	60	180	80	4	180	400	5	1	20	1	6
Six monthly Average	65.91	35.08	11.3	15.31	0.49	<10	<20	<0.1	<0.6	<0.44	<5	<1
Testing method	Gravimet ric	Gravimet ric	Improved West and Gaeke method	Modified Jacob & Hochheiser (Na- Arsenite)	Chemical Method	NDIR Spectro scopy	Indo phenol blue method	Absorption & Desorption followed by GC analysis	Solvent extraction followed by Gas Chromat ography analysis	AAS method after sampling	AAS metho d after sampli ng	AAS method after sampling

 $\textbf{BDL Values}: \text{PM}_{10} < 20 \ \mu\text{g/m}^3, \text{PM}_{2.5} < 10 \ \mu\text{g/m}^3 \ \text{SO}_2 < 4 \ \mu\text{g/m}^3, \text{NO}_X < 6 \ \mu\text{g/m}^3, \text{O}_3 < 4 \ \mu\text{g/m}^3, \text{NH}_3 < 20 \ \mu\text{g/m}^3, \text{Ni} < 2.5 \ \text{ng/m}^3, \text{As} < 1 \ \text{ng/m}^3, \text{C}_6 + 4 \ \mu\text{g/m}^3, \text{BaP} < 0.5 \ \text{ng/m}^3, \text{Pb} < 0.02 \ \mu\text{g/m}^3, \text{CO} < 0.1 \ \text{mg/m}^3, \text{CO} < 0.1 \ \text{mg/m}^3, \text{CO} < 0.02 \ \mu\text{g/m}^3, \text{CO$

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Ref: CEMC3203221E1 Date: 30.05.2025

EFFLUENT WATER QUALITY REPORT FOR THE MONTH OF

OCT-2024 TO MARCH-2025

1.Name of the industry	M/s. Tata Steel Limited, Ferro Alloys Plant, Gopalpur
2.Sampling Location	Stage-I (Collection Tank)
3.Sample Quantity	2 Lts
4.Sample Collected by	CEMCPL Representative

Sl.no	Parameters	Oct-24	Nov-24	Dec-24	Jan-25	Feb-25	Mar-25	Average
1	Colour, Max.	<5	<5	<5	<5	<5	<5	<5
2	Odour	Odourless						
3	Total suspended solid	35.6	36.4	68.2	42.6	28.8	29.8	40.2
4	Temperature in C	26	28	35.3	31.2	28	28	29.2
5	pH Value @ 25°C	8.32	8.41	7.94	8.21	8.11	8.0	8.16
6	Total residual chlorine	0.2	0.2	0.2	0.1	0.6	0.4	0.28
7	Copper as Cu, Max.	<0.03	<0.03	<0.03	<0.03	<0.03	<0.03	<0.03
8	Total Chromium,max	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
09	Fluoride as F, Max	0.41	0.45	0.54	0.54	0.52	0.48	0.49
10	Mercury as Hg,	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001
11	Cadmium as Cd, Max	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
12	Selenium as Se, Max.	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
13	Arsenic as As, Max.	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
14	Cyanide as CN, Max	ND						
15	Lead as Pb, Max.	<0.007	<0.007	<0.007	<0.007	<0.007	<0.007	<0.007
16	Zinc as Zn, Max.	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
17	Hexavalent Chromium as Cr ⁺⁶ , Max.	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
18	Dissolved Oxygen, Min.	5.1	5.2	5.0	5.3	5.2	5.0	5.13

Environmental Studies (EIA & EMP), Monitoring, Forest Diversion Planning, DPR, Wildlife Management Plan, Hazardous & Safety Studies, RS& GIS, Baseline Survey, Hydrological & Geological Studies, Socio-economic Studies, DGPS & ETS Survey.

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E-mail- cemc_consultancy@yahoo.co.in, cemc122@gmail.com, website: www.cemc.in.

Laboratory At: Plot No. 800/1274, Johal, Pahal, Bhubaneswar-752101, Odisha, India, ,Mobile: 7752014842 E-mail: cemclab@yahoo.in



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19	Oil & Grease, Max.	<1	<1	<1	<1	<1	<1	<1
20	BOD for 3 days@ 27°C, Max.	6.8	5.2	20.2	18.0	7.4	6.6	10.1
21	Chemical Oxygen Demand	30.8	20.4	40.0	30.0	50	40	35.2
22	Total Kjeldhal Nitrogen as N	5.0	5.4	6.3	3.28	7.0	6.2	5.36
23	Free ammonia	ND						
24	Amonical Nitrogen	ND						
25	Dissolved phosphates as PO4	0.21	0.28	0.32	0.12	0.38	0.32	0.27
26	Nickel as Ni	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
27	Particle size SS	<850	<850	<850	<850	<850	<850	<850
28	Bio assay Test	93%	93%	92%	93%	92%	92%	92%
29	Vanadium as V	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
30	Nitrate as NO ₃ , Max.	5.4	6.1	5.3	4.6	6.6	6.9	5.81
31	. Sulphide as S	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
32	Manganese as mn	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
33	Iron as Fe	0.32	0.28	0.38	0.36	0.36	0.30	0.30
34	Phenolic compound as C6H50H	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001

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Ref: CEMC32032214E2 Date: 30.05.2025

<u>EFFLUENT WATER QUALITY TEST REPORT FOR THE MONTH OF</u> <u>OCT-2024 TO MARCH-2025</u>

1.Name of the industry	M/s. Tata Steel Limited, Ferro Alloys Plant, Gopalpur
2.Sampling Location	Stage-II (Clarifier Flocculator)
3.Sample Quantity	2 Lts
4.Sample Collected by	CEMCPL Representative

Sl.no	Parameters	Oct-24	Nov-24	Dec-24	Jan-25	Feb-25	Mar-25	Average
1	Colour, Max.	<5	<5	<5	<5	<5	<5	<5
2	Odour	Odourless						
3	Total suspended solid	20.6	18.4	50.2	34.8	24.8	14.3	27.2
4	Temperature in °C	26.5	27	34.6	29.7	33.3	34.1	30.9
5	pH Value @ 25°C	8.41	8.37	7.81	8.32	8.42	8.55	8.31
6	Total residual chlorine	0.32	0.30	0.51	0.31	0.4	0.44	0.38
7	Copper as Cu, Max.	<0.03	<0.03	<0.03	<0.03	<0.03	<0.03	<0.03
8	Total Chromium,max	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
09	Fluoride as F, Max	0.28	0.25	0.42	0.36	0.32	0.26	0.31
10	Mercury as Hg, max	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001
11	Cadmium as Cd, Max	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
12	Selenium as Se, Max.	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
13	Arsenic as As, Max.	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
14	Cyanide as CN, Max	ND						
15	Lead as Pb, Max.	<0.007	<0.007	<0.007	<0.007	<0.007	<0.007	<0.007
16	Zinc as Zn, Max.	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
17	Hexavalent Chromium as Cr ⁺⁶ , Max.	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05

Environmental Studies (EIA & EMP), Monitoring, Forest Diversion Planning, DPR, Wildlife Management Plan, Hazardous & Safety Studies, RS& GIS, Baseline Survey, Hydrological & Geological Studies, Socio-economic Studies, DGPS & ETS Survey.

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18	Dissolved Oxygen, Min.	5.2	5.7	5.3	5.5	5.6	5.8	5.51
19	Oil & Grease, Max.	<1	<1	<1	<1	<1	<1	<1
20	BOD for 3 days@ 27°C, Max.	6.8	7.2	10.0	8.0	6.0	5.2	7.2
21	Chemical Oxygen Demand	34.8	40.8	32.0	20.0	22.0	20.0	28.3
22	Total Kjeldhal Nitrogen as N	4.8	5.2	4.6	3.2	5.2	4.8	4.8
23	Free ammonia	ND						
24	Amonical Nitrogen	ND						
25	Dissolved phosphates as PO4	0.26	0.31	0.29	0.08	0.28	0.24	0.24
26	Nickel as Ni	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
27	Particle size SS	<850	<850	<850	<850	<850	<850	<850
28	Bio assay Test	93%	92%	93%	94%	94%	94%	93%
29	Vanadium as V	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
30	Nitrate as NO ₃ , Max.	5.7	7.6	5.9	5.2	6.2	6.0	6.1
31	. Sulphide as S	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
32	Manganese as mn	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
33	Iron as Fe	0.30	0.36	0.28	0.22	0.26	0.22	0.27
34	Phenolic compound as C6H50H	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001

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Ref: CEMC32032214E3 Date: 30.05.2025

EFFLUENT WATER QUALITY TEST REPORT FOR THE MONTH OF OCT-2024 TO MARCH-2025

1.Name of the industry	M/s. Tata Steel Limited, Ferro Alloys Plant, Gopalpur
2.Sampling Location	Stage-III(Treated water)
3.Sample Quantity	2 Lts
4.Sample Collected by	CEMCPL Representative

Sl.no	Parameters	Oct-24	Nov-24	Dec-24	Jan-25	Feb-25	Mar-25	Average
1	Colour, Max.	<5	<5	<5	<5	<5	<5	<5
2	Odour	Odourless						
3	Total suspended solid	27.8	28.2	38.2	<5	12.0	10.8	23.4
4	Temperature	26.4	27.7	26.8	25.6	32.1	34.4	28.8
5	pH Value @ 25°C	8.26	8.33	7.11	8.13	7.93	8.44	8.03
6	Total residual chlorine	0.31	0.3	0.32	ND	ND	ND	0.3
7	Copper as Cu, Max.	<0.03	<0.03	<0.03	<0.03	<0.03	<0.03	<0.03
8	Total Chromium,max	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
09	Fluoride as F, Max	0.25	0.24	0.36	<0.05	<0.05	<0.05	0.28
10	Mercury as Hg, max	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001
11	Cadmium as Cd, Max	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
12	Selenium as Se, Max.	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
13	Arsenic as As, Max.	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
14	Cyanide as CN, Max	ND						
15	Lead as Pb, Max.	<0.007	<0.007	<0.007	<0.007	<0.007	<0.007	<0.007
16	Zinc as Zn, Max.	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
17	Hexavalent Chromium as Cr ⁺⁶ , Max.	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05

Environmental Studies (EIA & EMP),Monitoring, Forest Diversion Planning, DPR, Wildlife Management Plan, Hazardous & Safety Studies, RS&GIS, Baseline Survey, Hydrological & Geological Studies, Socio-economic Studies, DGPS & ETS Survey.

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18	Dissolved Oxygen, Min.	5.1	5.3	5.2	5.8	5.2	5.4	5.33
19	Oil & Grease, Max.	<1	<1	<1	<1	<1	<1	<1
20	BOD for 3 days@ 27°C, Max.	6.2	10.0	7.2	14.0	10.0	3.4	8.47
21	Chemical Oxygen Demand	28.8	40.8	30.0	70.0	30.0	10.0	34.9
22	Total Kjeldhal Nitrogen as N	4.6	3.8	2.6	5.28	3.8	3.6	3.95
23	Free ammonia	ND						
24	Amonical Nitrogen	ND						
25	Dissolved phosphates as PO4	0.20	0.24	0.16	<0.05	<0.05	<0.05	0.2
26	Nickel as Ni	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
27	Particle size SS	<850	<850	<850	<850	<850	<850	<850
28	Bio assay Test	93%	94%	95%	95%	95%	95%	94.5%
29	Vanadium as V	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01
30	Nitrate as NO ₃ , Max.	4.4	5.2	1.1	3.1	4.1	4.8	3.78
31	. Sulphide as S	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
32	Manganese as mn	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
33	Iron as Fe	0.20	0.16	0.19	0.28	0.18	0.12	0.19
34	Phenolic compound as C6H50H	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001

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Ref: CEMC32032214S1 Date: 30.05.2025

SURFACE WATER QUALITY TEST REPORT FOR THE MONTH OF OCT-2024 TO MARCH-2025

1.Nan	ne of the industry			M/s. Tata Steel Limited, Ferro Alloys Plant, Gopalpur							
2.Sam	pling Location			SW-(Khara Nallah Up Stream)							
	ple Quantity			2 Lts							
4.Sam	ple Collected by			CEMCPL Representative							
Sl.no	Parameters	Oct-24	Nov-24	Dec-24	Jan-25	Feb-25	Mar-25	Average			
1	Colour, Max.	<5	<5	10	5	<5	<5	5			
2	pH Value @ 25°C	8.03	8.09	7.68	8.01	7.41	8.4	7.93			
3	Iron as Fe, Max	0.18	0.06	0.19	0.21	0.16	0.28	0.18			
4	Chloride as Cl , max	29.9	31.2	41.9	42.9	30.9	23.9	33.1			
5	Dissolved solid, max	203.8	211.2	352	364	218	250	266.5			
6	Dissolved Oxygen, Min	5.4	5.8	5.9	6.1	5.1	6.0	5.71			
7	BOD for 3 days@ 27°C, Max.	2.6	2.4	2.8	2.6	2.8	<2	2.64			
8	Oil & Grease, Max.	ND	ND	ND	ND	ND	ND	ND			
9	Copper as Cu, Max.	005	<005	<005	<005	<005	<005	<005			
10	Sulphate as SO4, Max	7.9	8.2	12.4	12.9	9.2	6.6	9.53			
11	Nitrate as NO ₃ , Max	5.3	5.4	5.6	5.1	6.0	5.4	5.47			
12	Fluoride as F, Max	0.42	0.38	0.46	0.42	0.44	0.16	0.38			
13	Anionic Detergent	ND	ND	ND	ND	ND	ND	ND			
14	Cadmium as Cd, Max	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005			
15	Selenium as Se, Max.	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001			
16	Arsenic as As, Max.	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001			
17	Cyanide as CN, Max	ND	ND	ND	ND	ND	ND	ND			
18	Phenolic compound as C6H50H	ND	ND	ND	ND	ND	ND	ND			

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20	Lead as Pb, Max.	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005
21	Zinc as Zn, Max.	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005
22	Hexavalent Chromium as Cr ⁺⁶ , Max.	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
23	Total Coliform, Max.	130	154	156	140	120	31	122
24	Fecal Coliform, Max	9	21	13	9	11	2	11

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Ref: CEMC32032214S2 Date: 30.05.2025

SURFACE WATER QUALITY TEST REPORT FOR THE MONTH OF OCT-2024 TO MARCH-2025

1.Nan	ne of the industry			M/s. Tata S	teel Limited, l	Ferro Alloys	Plant, Gopal	pur		
	pling Location			SW-1I(Khara Nallah Down Stream)						
	ple Quantity			2 Lts	L Represent					
4.Sam	ple Collected by									
Sl.no	Parameters	Oct-24	Nov-24	Dec-24	Jan-25	Feb-25	Mar-25	Average		
1	Colour, Max.	5	10	15	10	5	<5	9		
2	pH Value @ 25°C	8.03	8.15	7.43	8.10	8.16	8.29	8.03		
3	Iron as Fe, Max	0.18	0.20	0.26	0.24	0.18	0.22	0.21		
4	Chloride as Cl, max	36.2	34.7	49.9	47.9	41.9	39.9	41.75		
5	Dissolved solid, max	238	230.8	412	394	208	221	283.97		
6	Dissolved Oxygen, Min	5.1	5.2	5.9	6.1	5.0	4.9	5.37		
7	BOD for 3 days@ 27°C, Max.	<2	<2	<2	<2	<2	<2	<2		
8	Oil & Grease, Max.	ND	ND	ND	ND	ND	ND	ND		
9	Copper as Cu, Max.	<005	<005	<005	<005	<005	<005	<005		
10	Sulphate as SO4, Max	10.8	11.2	11.6	11.2	11.2	10.4	11.07		
11	Nitrate as NO ₃ , Max	6.6	8.1	4.9	4.1	8.0	7.4	6.52		
12	Fluoride as F, Max	0.35	0.38	0.36	0.34	0.41	0.34	0.36		
13	Anionic Detergent	ND	ND	ND	ND	ND	ND	ND		
14	Cadmium as Cd, Max	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005		
15	Selenium as Se, Max.	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001		
16	Arsenic as As, Max.	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001		
17	Cyanide as CN, Max	ND	ND	ND	ND	ND	ND	ND		
18	Phenolic compound as C6H50H	ND	ND	ND	ND	ND	ND	ND		

Environmental Studies (EIA & EMP),Monitoring, Forest Diversion Planning, DPR, Wildlife Management Plan, Hazardous & Safety Studies, RS&GIS, Baseline Survey, Hydrological & Geological Studies, Socio-economic Studies, DGPS & ETS Survey.

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20	Lead as Pb, Max.	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005
21	Zinc as Zn, Max.	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005
22	Hexavalent Chromium as Cr ⁺⁶ , Max.	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
23	Total Coliform, Max.	198	219	233	220	177	210	209
24	Fecal Coliform, Max	17	38	34	26	14	21	25

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Ref: CEMC32032214S3 Date: 30.05.2025

SURFACE WATER QUALITY TEST REPORT FOR THE MONTH OF OCT-2024 TO MARCH-2025

	ne of the industry			M/s. Tata S	Steel Limited,	Ferro Alloys	Plant, Gopal	pur			
	pling Location			SW-1II(Reservoir)							
	ple Quantity			2 Lts							
4.Sam	ple Collected by			CEMCPL Representative							
Sl.no	Parameters	Oct-24	Nov-24	Dec-24	Jan-25	Feb-25	Mar-25	Average			
1	Colour, Max.	<5	<5	<5	<5	<5	<5	<5			
2	pH Value @ 25°C	8.10	8.20	7.85	8.04	8.23	8.10	8.09			
3	Iron as Fe, Max	0.22	0.26	0.22	0.24	0.31	0.28	0.25			
4	Chloride as Cl, max	11.8	10.4	21.9	22.9	26.9	23.9	19.63			
5	Dissolved solid, max	162.3	158.6	241	248	224	250	213.98			
6	Dissolved Oxygen, Min	5.8	6.2	6.2	6.3	5.6	6.0	6.02			
7	BOD for 3 days@ 27°C, Max.	<2	<2	<2	<2	<2	<2	<2			
8	Oil & Grease, Max.	ND	ND	ND	ND	ND	ND	ND			
9	Copper as Cu, Max.	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005			
10	Sulphate as SO4, Max	5.2	4.1	6.3	6.6	6.8	6.0	5.83			
11	Nitrate as NO ₃ , Max	3.4	3.8	3.6	4.1	5.4	5.4	4.28			
12	Fluoride as F, Max	0.12	0.14	0.14	0.15	0.14	0.16	0.14			
13	Anionic Detergent	ND	ND	ND	ND	ND	ND	ND			
14	Cadmium as Cd, Max	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005			
15	Selenium as Se, Max.	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001			
16	Arsenic as As, Max.	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001			
17	Cyanide as CN, Max	ND	ND	ND	ND	ND	ND	ND			
18	Phenolic compound as C6H50H	ND	ND	ND	ND	ND	ND	ND			

Environmental Studies (EIA & EMP), Monitoring, Forest Diversion Planning, DPR, Wildlife Management Plan, Hazardous & Safety Studies, RS& GIS, Baseline Survey, Hydrological & Geological Studies, Socio-economic Studies, DGPS & ETS Survey.

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20	Lead as Pb, Max.	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005
21	Zinc as Zn, Max.	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005
22	Hexavalent Chromium as Cr ⁺⁶ , Max.	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
23	Total Coliform, Max.	23	17	44	55	25	31	32
24	Fecal Coliform, Max	4	2	6	8	2	2	4

Notes:

- The results relate only to the sample tested.
- This Test Report shall not be reproduced wholly or in part without prior written consent of the laboratory.
- The samples received shall be destroyed after two weeks from the date of issue of the Test Report unless specified otherwise.
- This Test Report shall not be used in any advertising media or as evidence in the court of Law without prior written consent of the laboratory.

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Ref: CEMC32032214N1 Date: 30.05.2025

NOISE LEVEL MONITORING TEST REPORT FOR THE MONTH OF OCT-2024 TO MARCH-2025

1.Name of the industry	M/s. Tata Steel Limited, Ferro Alloys Plant, Gopalpur
2.Sampling Location	N1-N4:MRSS,LBSS,CANTEEN, ETP
3.Instrument used	Noise Meter
4.Sample Collected by	CEMCPL Representative

Sl.no		Oct-24 Noise level in dB(A)		Nov-24 Dec-24 Noise level in dB(A) in dB(A)		Jan-2	25	Feb-25 Noise level in dB(A)		Mar-25 Noise level in dB(A)		Average Noise level in dB(A)			
						- 10-20 - 0 1								Noise level in dB(A)	
		Day	Night	Day	Night	Day	Night	Day	Night	Day	Night	Day	Night	Day	Night
N1	MRSS	65.2	53.1	64.1	52.6	63.9	52.5	63.2	52.5	64.6	52.9	63.9	53.1	54.5	52.8
N2	LBSS	70.3	65.8	70.2	66.2	69.6	63.4	68.6	62.0	69.2	65.3	70.3	65.8	69.8	64.7
N2	Canteen	69.5	65.4	70.5	65.2	68.6	62.1	67.5	60.8	70.7	64.9	69.5	65.4	69.4	64.0
N4	ЕТР	68.4	66.2	69.5	66.1	68.7	65.8	67.8	65.0	69.1	66.0	68.4	66.2	68.4	65.9
Ambie	 nt air quality	 standar	ds in resp	ect of N	 oise for in	dustrial	l area							75	70
No dev prescri	iation from A bed	mbient	air qualit	y standa	ırds in res	pect of l	Noise is ol	served	and the v	alues ar	e within t	he stand	lards		

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