

ANDHRA PRADESH POLLUTION CONTROL BOARD

D. No. 33-26-14 D/2, Near Sunrise Hospital, Pushpa Hotel Centre,

Chalamalavari Street, Kasturibaipet, Vijayawada - 520 010

Website: www.pcb.ap.gov.in

CONSENT ORDER FOR ESTABLISHMENT

Order No.200/APPCB/CFE/RO-VZM/HO/2018 13/08/2022

- Sub: APPCB CFE M/s. Sarda Metals & Alloys Ltd., APIIC, Industrial Area, Kantakapalli (V), Kothavalasa (M), Vizianagaram District - CFE (Expansion) under Sec.25 of Water (P & C of P) Act, 1974 and Under Sec.21 of Air (P & C of P) Act, 1981 – Issued – Reg.
- *Ref:* 1. Environmental Clearance order dt.27.05.2022 issued by MoEF & CC, Gol.
 - 2. CFE (Exp) application received through APOCMMS on 14.06.2022.
 - 3. R.O's inspection report dt.30.06.2022.
 - 4. CFE Committee meeting held on 12.07.2022.
 - 5. Industry's lr.dt.13.07.2022.
- 1. M/s. Sarda Metals & Alloys Ltd., vide reference 2nd cited, submitted an application to the Board seeking Consent for Establishment (CFE) expansion, in addition to existing products with capacities as mentioned below, with an additional investment of Rs.1242 Crores:

S. No.	Name of the Product	CFE (exp) order dt.10.08.2021	CFO order dt.19.10.2021	EC dt.27.05.2022	CFE (Exp)
1	Ferro Alloys		1,00,000 MTPA (or) 278 MTPD (2x33 MVA)	5x36 MVA (2,50,000 TPA)	1,50,000 TPA
2	Steel Melting shop			3,00,000 TPA	3,00,000 TPA
3	Mineral fibre plant			1,50,000 TPA	1,50,000 TPA
4	Sinter plant			Dropped	
5	Ferro manganese				
6	Silico manganese				
7	Thermal power plant (captive)		1x80 MW	2x80 MW	1x80 MW
8	Coke oven with stamp charging			Dropped	
9	Sponge iron plant				
10	Blast furnace				
11	Rolling mill				
	Iron ore crushing plant				
13	Pellet plant				
14	Briquette plant	1,05, 000 MTPA	1,05, 000 MTPA	1,05,000 MTPA	1,05,000 MTPA

- 2. As per the application, the above activity is to be located at APIIC, Industrial Area, Kantakapalli (V), Kothavalasa (M), Vizianagaram District in an area of 56.83 acres (total area is 280.96 acres).
- 3. The above site was inspected by the Environmental Engineer and Asst. Environmental Engineer, Regional Office, Vizianagaram, A.P Pollution Control Board on 30.06.2022 and noted that the above activity is to be located within the existing premises and surroundings are as following:

North	: Hillock
South	: Dry lands with mango and cashew gardens
East	: Partly green belt and partly Hillock
West	: Kothavalasa – Vizianagaram road,

- 4. The Board, after careful scrutiny of the application and verification report of Regional Officer, hereby issues **CONSENT FOR ESTABLISHMENT FOR EXPANSION** to the activity under Section 25 of Water (Prevention & Control of Pollution) Act 1974 and Section 21 of Air (Prevention & Control of Pollution) Act, 1981 and the rules made there under. **This order is issued to manufacture the products as mentioned at para (1) only.**
- 5. This Consent Order now issued is subject to the conditions mentioned in Annexure.
- 6. This order is issued from pollution control point of view only. Zoning and other regulations are not considered.
- 7. This order is valid for a period of 7 years from the date of issue.

Encl: Annexure.

VIJAY KUMAR GSRKR IAS, MEMBER SECY(GSRKRVK), O/o MEMBER SECRETARY-APPCB

To M/s. Sarda Metals & Alloys Ltd., (exp) APIIC, Industrial Area, Kantakapalli (V), Kothavalasa (M), Vizianagaram District

Copy to: 1. The JCEE, Z.O: Visakhapatnam for information and necessary action.

2. The E.E., R.O: Vizianagaram for information and necessary action.

ANNEXURE

- 1. The proponent shall obtain Consents for Operation (CFO) from APPCB, as required Under Sec.25/26 of the Water (P&C of P) Act, 1974 and under sec. 21/22 of the Air (P&C of P) Act, 1981, before commencement of the activity.
- 2. Compensation is to be paid for any environmental damage caused by it, as fixed by the Collector and District Magistrate as civil liability.
- 3. The rules and regulations notified by Ministry of Law and Justice, GOI, regarding the Public Liability Insurance Act, 1991 shall be followed.

Water:

4. The source of water is Thatipudi reservoir and the maximum permitted water consumption after expansion is as following:

S. No	Purpose	Qty as per CFO order dt.19.10.2021	Qty for CFE (Exp)
1	Boiler make up water		
2	Cooling tower make up water	530 KLD	1243 KLD
3	RO Feed / DM feed (Boiler Feed)	110 KLD	110 KLD
4	Softener regeneration	34 KLD	34 KLD
5	Domestic	52.34 KLD	75 KLD
6	Slag granulation	225 KLD	
7	Process	27.7 KLD	28 KLD
8	Service water		230 KLD
	Total	979.54 KLD	1720 KLD

Separate meters with necessary pipe-line shall be provided for assessing the quantity of water used for each of the purposes mentioned below.

5. The maximum waste water generation shall not exceed the following for expansion:

S. No.	Source	Qty as per CFO order dt.19.10.2021	Qty for CFE (Exp)
	RO Reject and DM Plant Back Wash (Ferro Alloy & CPP)	30.0 KLD	
2	Boiler blow down	5.0 KLD	5.0 KLD
3	Cooling Blow Down	45.0 KLD	199 KLD
4	Domestic	39.3 KLD	60 KLD
5	Softener reject		27 KLD
6	Other service water		18 KLD
	Total	119.30 KLD	309 KLD

Treatment & Disposal :

Effluent Source	Treatment Facility	Mode of Disposal
	20 KLD below ground cement tank (2	
down, Cooling Bleed off &	chamber of 10 KL each) for Collection	and dust suppression.
Softener regeneration	tank and neutralization tank.	
Domestic wastewater	2 x 10 KLD Eco Sequential Batch	On land for plantation.
	Reactor (SBR) STP with Collection	
	tank and neutralization tank.	

- 6. Closed circuit cooling system shall be adopted for cooling system. No waste water shall be discharged outside the factory premises under any circumstances and zero effluent discharge shall be adopted.
- 7. The industry shall install flow meters with totalizer for the purpose of measuring the quantity of treated effluents recycled for various uses.
- 8. The industry shall install flow meters for quantify the treated effluents utilization for each purpose.

<u>Air:</u>

9. The Air pollution Control equipment shall be maintained properly to comply with the following for controlling air pollution after expansion:

S. No.	Details of stack	Stack – 4	Stack – 5	Stack – 6	Stack – 7	Stack – 8
a)	Attached to	Ferro alloys furnaces	Steel melting shop	Steel melting shop	Coal fired boiler	Mineral Fiber plant
b)	Capacity	3 x 36 MVA	2 x 22MT	2 x 22MT	1 x 309 TPH	
c)	Fuel	Electricity	Electricity	Electricity	Imported coal 1133 TPD	
d)	Stack height	65 m (common stack)	Common stack 30m	Common stack 30m	120 m	Not proposed
- /	Control equipment	Dedicated heat exchanger followed by bag house each	Bag filter	Bag filter	ESP	Bag filter

Expansion:

- 10. The Industry shall provide Continuous online stack monitoring facility to all the major stacks attached to furnaces and the data shall be upload to APPCB & CPCB websites.
- 11. The proponent shall provide 25% of additional bags as spare in the Bag house to meet the emergency requirements.
- 12. The industry shall always place the hood over the furnaces to collect the emissions, except during charging of raw materials into the furnace.

- 13. The proponent shall provide interlocking system between air pollution control equipments electricity supply, so that the electricity supply to the furnaces would be stopped automatically incase the air pollution control equipment fails / emission levels exceed the prescribed standards.
- 14. All the conveyors shall be covered with G.I sheets to prevent fugitive emissions.
- 15. All the raw material & solid waste shall be accommodated under roof cover with required safety ventilation as approved by the competent authorities. There shall not be any open piling.
- 16. Secondary fugitive emissions from all the sources shall be controlled within the latest permissible limits issued by the Board and regularly monitored. Guidelines / Code of Practice issued by the CPCB shall be followed.
- 17. The industry shall install dust extraction system and dry fogging system at coke handling areas, stock piles, transfer areas and other vulnerable dusty areas to control dust emissions.
- 18. The industry shall provide dust suppression system at all the discharge and feed points.
- **19**. All the internal roads shall be concerted / asphalted to control fugitive emissions.
- 20. The industry shall install separate energy meters to air pollution control equipment and maintain records pertaining to operation and maintenance of the control equipment.
- 21. The proponent shall ensure compliance of the National Ambient Air quality standards notified by MoE&F, GoI vide notification No. GSR 826(E), dated. 16.11.2009 during regular operational phase of the project.
- 22. A sampling port with removable dummy of not less than 15 cm diameter shall be provided in the stack at a distance of 8 times the diameter of the stack from the nearest constraint such as bends etc. A platform with suitable ladder shall be provided below 1 meter of sampling port to accommodate three persons with instruments. A 15 AMP 250 V plug point shall be provided on the platform.
- 23. The generators shall be installed in a closed area with a silencers and suitable noise absorption systems. The ambient noise level shall not exceed 75 dB(A) during day time and 70 dB(A) during night time.

Solid Waste:

24. The proponent shall comply with the following after expansion:

As per CFO order dt.19.10.2021:

S. No.	Description	Qty	Mode of Disposal
1	Ash From Power Plant (80MW) bottom and fly ash	30274 TPA	Shall be sold to fly ash brick manufacturing units and to nearby cement plant
2	Ferro Manganese Slag	55,000	To be reused for production of silico

	(2x33 MVA) (80 to 85% of Product)	ТРА	manganese
	Silico Manganese Slag(85 to 90 % of Product)	1,20,000 TPM	Shall be disposed in Land fill/ for making roads with in the premises after TCLP test.
4	Dust from De dusting Units like transverse points of coal conveyors and silos	200 TPA	The industry shall reuse the dust from dedusting units as fuel for captive consumption and the fly ash generated shall be sent to nearby brick makers.
5	Waste Oil	224 Ltrs/mont h	Shall be routed through APEMC, so as to send to authorized recyclers/reprocessors(as recyclable waste).
	Bag house Dust (Gas cleaning plant dust)	7500 TPA	The industry shall use the bag house dust for making briquettes for captive consumption.

Expansion:

S. No.	Description	As per CFO Order dt.19.10.2021	Mode of Disposal
	Ash From Power Plant (2 x 80MW)	90,000 TPA	Shall be sold to fly ash brick manufacturing units
	Slag from production of Silico manganese	3,00,000 TPA	SiMn slag will be provided to brick manufacturers / raw material for mineral fiber plant
3	GCP dust	4500 TPA	As a raw material for briquetting plant in making briquettes
6	Dust laden fumes from IF primary Fume Extraction System	3640 TPA	Reused as feed material for briquetting plant.
1 /	Dust laden fumes from IF secondary FES	1680 TPA	Reused as feed material for briquetting plant.
8	Mill scale from CCM & rolling mill	3000 TPA	Reused as feed material for ferro alloys plant.
9	Slag from induction furnace	31,880 TPA	Used as road ballast / road fill material

- 25. The following rules and regulations notified by the MoEF & CC, GoI shall be implemented.
- a) Regulation of Persistent Organic Pollutants Rules
- b) Hazardous waste and other wastes (Management and Transboundary Movement) Rules
- c) Plastic Waste Management Rules
- d) Manufacture
- e) Fly Ash Notification
- f) Batteries (Management & Handling) Rules
- g) E-Waste (Management) Rulesh) Construction and Demolition waste Management Rules
- i) Solid Waste Management Rules
- j) The Public Liability Insurance Act

Other Conditions:

- 26. The industry shall comply with following conditions before applying for CFO, as committed by the industry during the CFE Committee meeting held on 12.07.2022:
 - i. The industry shall maintain good housekeeping within the plant premises (at the raw material storage area and process area).
 - ii. The industry shall rectify the damaged coal shed at earliest and shall not store the coal and raw materials openly.
 - iii. The industry shall route the all-storm water drains outlets to rain water harvesting pit.
 - iv. The industry shall not park / halt the material transport vehicles in front of the main gate adjacent to the Vizianagaram-Kothavalasa main road.
 - v. The industry shall rectify the Online effluent monitoring system installed.
 - vi. The industry shall connect the online stack analyzer provided for CPP to the APPCB and CPCB website.
 - vii. The industry shall submit Safety report approved by the Factories Dept, to the Board, regularly.

The industry shall comply with the following un-complied EC conditions:

- viii. The industry shall install 3 no. of CAAQMs outside the plant.
- ix. The industry shall provide wind shelter fence and chemical spraying on raw material.
- x. The industry shall provide truck tyre washing facility.
- 27.

The industry shall comply with the conditions stipulated in the EC orders dt.26.11.2009, dt.02.07.2018 & dt.27.05.2022 issued by MoEF & CC, Gol.

- 28. The industry shall prepare a safety report and carry out an independent safety audit report of the respective industrial activities including chemical storages / isolated storages by an expert not associated with such industrial activity as required under Rule 10 of MSIHC Rules, 1989 and get it approved by the Factories Dept., and submit the compliance along with copy of the safety report, safety audit report and safety certificate at concerned Regional Office, APPCB.
- 29. The industry shall submit a copy of the NOC issued by the Andhra Pradesh State Disaster Response and Fire Service Dept., (APSDRFSD) at concerned Regional Office, APPCB.
- 30. The industry shall submit risk assessment report covering worst scenario clearly describing impact within the industry premises and outside the industry premises and emergency response system.
- 31. The proponent shall ensure that there shall not be any change in the process technology, source of raw material and scope of working without prior approval from the Board.
- 32. The proponent shall comply with all the directions issued by the Board from time to time.
- 33. Existing green belt shall not be disturbed due to the proposed activity. Thick green belt shall be maintained all along the boundary & vacant spaces with tall growing

trees with good canopy and it shall not be less than 33% of the total area.

- 34. The industry shall submit compliance to the conditions stipulated in the EC and CFE orders to the concerned Regional Officer of APPCB every six months and shall upload the same at APPCB website viz., https://pcb.ap.gov.in/UI/Submission_Compliance_of_EC_CFE_CFO_Direction.aspx.
- 35. Concealing the factual data or submission of false information / fabricated data and failure to comply with any of the conditions mentioned in this order attracts action under the provisions of relevant pollution control Acts.
- 36. Notwithstanding anything contained in this conditional letter or consent, the Board hereby reserves its right and power Under Sec. 27(2) of Water (Prevention and Control of Pollution) Act, 1974 and Under Sec.21(4) of Air (Prevention and Control of Pollution) Act, 1981 to revoke the order, to review any or all the conditions imposed herein and to make such modifications as deemed fit and stipulate any additional conditions.
- 37. Any person aggrieved by an order made by the State Board under Section 25, Section 26, Section 27 of Water Act, 1974 or Section 21 of Air Act, 1981 may within thirty days from the date on which the order is communicated to him, prefer an appeal as per Andhra Pradesh Water Rules, 1976 and Air Rules, 1982, to such authority (hereinafter referred to as the Appellate Authority) constituted under Section 28 of Water (Prevention and Control of Pollution)Act, 1974 and Section 31 of the Air (Prevention and Control of Pollution) Act, 1981.

VIJAY KUMAR GSRKR IAS, MEMBER SECY(GSRKRVK), O/o MEMBER SECRETARY-APPCB

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M/s. Sarda Metals & Alloys Ltd., (exp) APIIC, Industrial Area, Kantakapalli (V), Kothavalasa (M), Vizianagaram District