

28th September 2016

To,

The Environmental Engineer,

Andhra Pradesh Pollution Control Board,

Regional Office, Kurnool,

Dear Sir,

Please find enclosed herewith "ENVIRONMENTAL STATEMENT" for the year 2015-2016.

Please acknowledge the receipt for the same.

Thanking you,
Yours sincerely,
For BERGER PAINTS INDIA LTD

Mr. Devashish Nath General Manager Works

Encl: Environmental Statement 2015 - 16 CC: APPCB, Parvayaran Bhavan 21 OCT 2018



28th September 2016

To,

The Environmental Engineer,

Andhra Pradesh Pollution Control Board,

Regional Office, Kurnool,

Dear Sir,

Please find enclosed herewith "ENVIRONMENTAL STATEMENT" for the year 2015-2016.

Please acknowledge the receipt for the same.

Thanking you,
Yours sincerely,
For **BERGER PAINTS INDIA LTD**

Mr. Devashish Nath General Manager Works

Encl: Environmental Statement 2015 - 16

CC: APPCB, Paryavaran Bhavah

PART - A

(i) Name and address of the Occupier of the industry

Shri Abhijit Roy Managing Director

M/s Berger Paints India Ltd

Operation or Process

Paint manufacturing

(ii) Industry Category

Primary SIC Code - 2800 Secondary SIC Code - 2850

(iii) Annual Production Capacity

272100 KL Water based Emulsion Paints Water based Distemper Paints 48000 MT

(iv) Year of Establishment

26.12.2013

(v) Date of the last Environmental Statement submitted

28.09.2015

PART B

Water and Raw Material Consumption



i. Water Consumption

Description	Qty As per CFO	Qty Actual Consumed
Process water	320 m3 / D	64.31 m3/D
Cooling tower make up	1 m3 / D	0.8 m3/D
Plant & Process wash, QC	2 m3 / D	1.47 m3/D
Fire fighting make up	1 m3 / D	0.75 m3/D
Domestic	7 m3 / D	5.04 m3/D
Gardening	7 m3 / D	5.19 m3/D



	Process water consumption (m ³ / KL of Production)	
Name of the product	FY 14 -15	FY 15 -16
Paints	0.50	0.814

Note:

ii. Raw Material consumption

Annexure I [Page 6]

PART C

Pollution Discharged to the Environment per unit of Output (Parameters as specified in the consent issued)

Pollutants

a. Water

b. Air

Annexure II [page 7]
Annexure III [page 8]

PART - D

Hazardous Wastes

(As specified under Hazardous Waste (Management and Handling) Rules, 1989 and list amendments there of)

Presented as Annexure IV [page 9]

PART - E

Solid Wastes

Presented as Annexure V [page 10]



PART F

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

Presented as Annexure VI [page 11]

PART-G

IMPACT OF POLLUTION ABATEMENT MEASURES TAKEN ON CONSERVATION OF NATURAL RESOURCES AND ON THE COST OF PRODUCTION

A. Impact of Pollution Abatement on Conservation.

a. Cleaner Effluent

Effluent is generated only during cleaning operations. Proper production planning, using jet pumps for cleaning the vessels will sufficiently reduce the consumption of fresh water. The effluents are treated and the treated effluents will be used for, toilet flushing, floor washing, ETP chemical preparation etc. Reuse of treated effluent reduces the consumption of fresh water.

b. Effective Dust Control:

The dust is only generated during charging powder raw material transferring. The same has been effectively controlled with pneumatic charging system & Dust collector devices are installed were ever it is needed this helps in maintaining good ambient air quality.

Charging to processing is a closed loop system through pneumatic conveying pipelines & equipments, More over bag filters are fitted with pulse jet bag filter 20000m3/hr, number of filter bags present

Fugitive emission generated during charging powder to equipment is captured by a section hood A 30 height stack is attached to it with ID fan

c. Natural resources conservation

Several initiatives are undertaken to reduce water, power and fuel consumption. Rain water harvesting pits for ground water recharging have also been implemented.

d. Reduction in noise pollution

Acoustic enclosure has been provided for Diesel Generators and for compressors which has resulted in reduction in noise pollution.

B. Impacts of Pollution Abatement on the cost of production

The expenses on the pollution abatement increased the cost of production Rs 54.43 per KL of production.



PART H

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

The focus on Environmental Management system directly from the "Manufacturing Excellence" of "Zero Waste". The company is determined to improve manufacturing discipline, installing quality system of international standards excellent housekeeping and preventive maintenance is implicit therein. Making the workplace environmental friendly and safe.

The company is producing environment - friendly water based paints only &Heavy metals free (lead free)

Given below are some of the implemented initiatives for environmental protection.

Procured one Jet Pump in production block's for cleaning of vessels which leads to reduction in Effluent generation. .

VOC Analyser for precaution & presentiveness at working Zones. Instrument procured and the same being used.



PART I

Any other particulars for improving the quality of the environment

- 1. 100 % Reuse of the Wash Water generated in the Process, thereby reducing the effluent generation.
- 2. Sludge drying bed of ETP.
- 3. Plantation in around the plant, 42% of plant area has been committed to it & new plants are added on continual basis
- 4. ETP is 50KLD as on process with biological treatment (Activated Sludge Process) & ETP can be extended to 100 KLD
- 5. Installed four fixed AAQM stations in the plant at strategic locations
- 6. Floor cleaning machines in Production floor.

Devashish Nath
General Manager Works
Berger Paints India Ltd
28.09.2016



Annexure I

Raw Material Consumption

S.No	Name of the Raw material	Name of product	Consumption of Raw material per unit o Output (MT/ MT of Production)		
3.140	Name of the National	4	14-15	15-16	
1	Pigment	Emulsion Paints	0.064	0.0568	
2	Extenders	Emulsion Paints	0.433	0.3886	
3	Additives	Emulsion Paints	0.042	0.037	
4	Solvents	Emulsion Paints	0.0003	0.0002	
5	Resins	Emulsion Paints	0.04	0.038	
6	Acids and Chemicals	Emulsion Paints	0.01	0.06	



Annexure II Water Pollutants

S.No	Parameter	Quantum of pollutants discharged (kg/per day)	Conc. of pollutants in discharges (mg/Lit)	Percentage of variation from prescribed standards	Reasons
1	pH	7.68	7.68	NA	
2	Suspended solids	0.435	30	-70	
3	BOD ₃ at 27°C	0.0189	1.3	-95.6	
4	Phenolic Compounds	0	0.001	-99.90	
5	Oil & Grease	0.1015	7	-30	
6	Bio Assay	NA	90%	NA	
7	Lead as Pb	0	0.005	-95.0	
8	Chromium (VI)	0	0.03	-98.5	
9	Chromium	0	0.03	-98.5	
10	Copper as Cu	0	0.01	-99.6	
11	Nickel as Ni	0	0.01	-99.6	
12	Zinc as Zn	. 0	0.043	-99.14	
13	Heavy metals	0	0.04	96.0	



Annexure III

Air Pollutants

SPM for DG sets and Dust Collector

Sr. No	Stack attached to	Quantity of Pollutants discharged (kg/day)	Concentration of Pollutants discharged (mg/Nm³)	Percentage of variation from prescribed Standards with reasons.	Reasons
1	D.G. 1- PM	0.00017	25	-75%	- ve sign indicates the
2	D.G. 2	0.0075	27	-73%	performance is much better
3	D.G. 3	0.034	35.2	-65%	than the
4	Dust collector	3.57	32	-68%	prescribed standards



Annexure IV

Hazardous Wastes

Category	S No	S.No Waste Source		Total Quantity	
Category	3.140		Category*	FY 14-15	FY 15-16
Α					
	From Pro	ocess			
	1	Empty polythene Bags(kgs)	34.3	2330	9510
	2	Used Containers(No's)	34.3	23481	2747
	3	Waste Oil(kgs)	5.1	0	0
В		A too			
	From po	llution control facility			
	1	ETP Sludge(kg)	34.3	0	41.74

^{*} Category as per Hazardous waste (M& H) Rules 2008



Annexure V Solid Wastes

	Waste Source	Total Quantity during the Financial Year		
	-	Unit	14-15	15-16
Α	From Process			
	1.Wooden Scrap	Kg	10870	55670
	2.Papers/Cartons	Kg	22350	106600
	3. Metal Scrap	Kg	72536	17990
	4. HDPE lids	Kg	4507	1610
	B F muc			
В	From pollution control facility		NIL	NIL
С	Quantity recycled or re-utilized within the unit		NIL	NIL



Annexure VI Hazardous waste Characterisation and Composition

S. No.	Waste	Characterisation/ Composition	Method of Disposal
1	Container & Container Liners of Hazardous Waste & Chemicals	HDPE/Polyethylene/cellulous and Organic/Inorganic chemicals	Sent to authorized re- processors/ Recyclers after complete detoxification.



Solid wastes Characterisation and Composition

S. No.	Waste	Characterisation/ Composition	Method of Disposal
1.	HDPE lids	Not Applicable	Sold to traders
2.	Wooden Scrap	Not Applicable	Sold to traders
3.	Papers/Cartons	Not Applicable	Sold to traders
4.	Metal Scrap	Not Applicable	Sold to traders

