



# Maharashtra Pollution Control Board

महाराष्ट्र प्रदूषण नियंत्रण मंडळ

## FORM V

(See Rule 14)

Environmental Audit Report for the financial Year ending the 31st March 2022

### Unique Application Number

MPCB-ENVIRONMENT\_STATEMENT-0000050162

### Submitted Date

30-09-2022

## PART A

### Company Information

#### Company Name

Hindustan Petroleum Corporation Limited

#### Application UAN number

MPCB-CONSENT-0000079578

#### Address

HPCL Mumbai Refinery, B.D. Patil Marg, Mahul

#### Plot no

234/482

#### Taluka

Kurla

#### Village

Chembur

#### Capital Investment (In lakhs)

749256

#### Scale

L.S.I

#### City

Mumbai Suburban

#### Pincode

400074

#### Person Name

Rajanikant Dhamelia

#### Designation

DGM - Technical

#### Telephone Number

9930261492

#### Fax Number

25542017

#### Email

dhameliarr@hpcl.in

#### Region

SRO-Mumbai III

#### Industry Category

Red

#### Industry Type

R56 Oil Refinery (mineral Oil or Petro Refineries)

#### Last Environmental statement submitted online

yes

#### Consent Number

MPCB-CONSENT-0000079578

#### Consent Issue Date

2021-09-20

#### Consent Valid Upto

2025-08-31

#### Establishment Year

1974

#### Date of last environment statement submitted

Jan 1 1900 12:00:00:000AM

#### Industry Category Primary (STC Code) & Secondary (STC Code)

### Product Information

#### Product Name

Light Distillate

#### Consent Quantity

2515800

#### Actual Quantity

1641960

#### UOM

MT/A

Middle Distillate

4142000

1909888

MT/A

Lube Oil Base Stock

450000

368368

MT/A

### By-product Information

#### By Product Name

Other Heavy Products including Refinery Fuel and Loss

#### Consent Quantity

2355000

#### Actual Quantity

1608709

#### UOM

MT/A

Sulfur

61000

13100

MT/A

## Part-B (Water & Raw Material Consumption)

### 1) Water Consumption in m3/day

Water Consumption for Process	Consent Quantity in m3/day	Actual Quantity in m3/day
Cooling	12348.00	7000.00
Domestic	90242.00	31888.00
All others	870.00	415.00
Total	1500.00	1451.00
	104960.00	40754.00

### 2) Effluent Generation in CMD / MLD

Particulars	Consent Quantity	Actual Quantity	UOM
Trade effluent	7200	1887	CMD
Sea Cooling water blowdown	80354	24381	CMD
Domestic effluent	600	192	CMD

### 2) Product Wise Process Water Consumption (cubic meter of process water per unit of product)

Name of Products (Production)	During the Previous financial Year	During the current Financial year	UOM
Oil Refinery (Mineral Oil or Petro Refineries)	0.4	0.6	Ton/Ton
Oil Refinery (Mineral Oil or Petro Refineries)	0.4	0.6	Ton/Ton
Oil Refinery (Mineral Oil or Petro Refineries)	0.4	0.6	Ton/Ton

### 3) Raw Material Consumption (Consumption of raw material per unit of product)

Name of Raw Materials	During the Previous financial Year	During the current Financial year	UOM
Crude Oil	1.08	1.09	Ton/Ton

### 4) Fuel Consumption

Fuel Name	Consent quantity	Actual Quantity	UOM
LSHS	765606.5	103872	MT/A
Naptha	278419.1	41313	MT/A
Fuel Gas	1716754	203632	MT/A

## Part-C

### Pollution discharged to environment/unit of output (Parameter as specified in the consent issued)

#### [A] Water

Pollutants Detail	Quantity of Pollutants discharged (kL/day)	Concentration of Pollutants discharged(Mg/Lit) Except PH,Temp,Colour	Percentage of variation from prescribed standards with reasons %variation	Standard	Reason
pH	0	7.3	0	6 to 9	In Compliance
Oil & Grease	0.67	2	0	5 mg/L	In Compliance
BOD (3 days 27 C)	3.6	11	0	15 mg/L	In Compliance

Total Suspended Solids	5.02	15	0	20 mg/L	In Compliance
COD	25.8	77	0	125 mg/L	In Compliance
Phenol	0.03	0.11	0	0.35 mg/L	In Compliance
Sulphides	0	0	0	0.5 mg/L	In Compliance
CN	0	0	0	0.2 mg/L	In Compliance
Ammonia as N	0	0	0	15 mg/L	In Compliance
TKN	0.7	2	0	40 mg/L	In Compliance
Phosphate	0.23	0.7	0	3 mg/L	In Compliance
Cr (Hexavalent)	0	0	0	0.1 mg/L	In Compliance
Cr (Total)	0	0	0	2 mg/L	In Compliance
Pb	0	0	0	0.1 mg/L	In Compliance
Hg	0	0	0	0.01 mg/L	In Compliance
Zn	0.03	0.1	0	5 mg/L	In Compliance
Ni	0.06	0.2	0	1 mg/L	In Compliance
Cu	0.03	0.1	0	1 mg/L	In Compliance
V	0	0	0	0.2 mg/L	In Compliance
Benzene	0	0	0	0.1 mg/L	In Compliance
Benzo(a)-pyrene	0	0	0	0.2 mg/L	In Compliance

#### **[B] Air (Stack)**

<b>Pollutants Detail</b>	<b>Quantity of Pollutants discharged (kL/day)</b>	<b>Concentration of Pollutants discharged(Mg/NM3)</b>	<b>Percentage of variation from prescribed standards with reasons</b>	<b>Standard</b>	<b>Reason</b>
	<b>Quantity</b>	<b>Concentration</b>	<b>%variation</b>		
SPM	176.7	6.4	0	150 mg/Nm3	In Compliance
SOx	2456.6	104	0	12.6 TPD	In Compliance
NOx	4131	16.9	0	6.5 TPD	In Compliance
CO	5.34	49.4	0	50 mg/Nm3	In Compliance

#### **Part-D**

##### **HAZARDOUS WASTES**

###### **1) From Process**

<b>Hazardous Waste Type</b>	<b>Total During Previous Financial year</b>	<b>Total During Current Financial year</b>	<b>UOM</b>
4.2 Spent catalyst	1829.4	1323.68	MT/A
4.1 Oil sludge or emulsion	0	58.25	MT/A

###### **2) From Pollution Control Facilities**

<b>Hazardous Waste Type</b>	<b>Total During Previous Financial year</b>	<b>Total During Current Financial year</b>	<b>UOM</b>
0	0	0	MT/A

#### **Part-E**

##### **SOLID WASTES**

###### **1) From Process**

<b>Non Hazardous Waste Type</b>	<b>Total During Previous Financial year</b>	<b>Total During Current Financial year</b>	<b>UOM</b>
---------------------------------	---	--	------------

Metal Scrap	2128	4566	MT/A
Plastic waste	3.140	50.68	MT/A

### 2) From Pollution Control Facilities

Non Hazardous Waste Type	Total During Previous Financial year	Total During Current Financial year	UOM
N.A.	0	0	MT/A

### 3) Quantity Recycled or Re-utilized within the unit

Waste Type	Total During Previous Financial year	Total During Current Financial year	UOM
0	0	0	MT/A

## Part-F

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

### 1) Hazardous Waste

Type of Hazardous Waste Generated	Qty of Hazardous Waste	UOM	Concentration of Hazardous Waste
4.2 Spent catalyst	826.17	MT/A	Disposal to Mumbai Waste Management Limited, Taloja
4.1 Oil Sludge or emulsion	58.25	MT/A	Disposal to Mumbai Waste Management Limited, Taloja
4.2 Spent catalyst	87.98	MT/A	Recycle to M/s. Rubamin Private Limited, Vadodara, Gujarat
4.2 Spent catalyst	249.31	MT/A	Recycle to M/s. Arth Metallurgicals Pvt Ltd, Raipur, Chhattisgarh
4.2 Spent catalyst	102.51	MT/A	Recycle to M/s. Ravindra Heraeus Pvt. Ltd., Udaipur, Rajasthan
4.2 Spent catalyst	57.70	MT/A	Recycle to M/s. Hindustan Platinum Pvt. Ltd., Pawane, Navi Mumbai

### 2) Solid Waste

Type of Solid Waste Generated	Qty of Solid Waste	UOM	Concentration of Solid Waste
Metal scrap	4566	MT/A	Sold to recycler
Plastic waste	50.68	MT/A	Sold to recycler

## Part-G

Impact of the pollution Control measures taken on conservation of natural resources and consequently on the cost of production.

Description	Reduction in Water Consumption (M3/day)	Reduction in Fuel & Solvent Consumption (KL/day)	Reduction in Raw Material (Kg)	Reduction in Power Consumption (KWH)	Capital Investment(in Lacs)	Reduction in Maintenance(in Lacs)
Water recycling after treatment	1586.4	0	0	0	0	0
Rain water harvesting	285.9	0	0	0	0	0

## Part-H

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

### [A] Investment made during the period of Environmental Statement

Detail of measures for Environmental Protection	Environmental Protection Measures	Capital Investment (Lacks)
---	-----------------------------------	----------------------------

Mumbai Refinery expansion project for Euro-VI production

Significant reduction in Sulphur content.

274200

---

**[B] Investment Proposed for next Year**

***Detail of measures for Environmental Protection***

***Environmental Protection Measures***

***Capital Investment (Lacks)***

Recovery of steam condensate from LR tanks

Efficiency Improvement

141

Installation of Air trap in compressor inter cooler to reduce compressed air loss

Efficiency Improvement

50

**Part-I**

---

**Any other particulars for improving the quality of the environment.**

**Particulars**

Tree plantation

**Name & Designation**

Rajanikant Dhamelia, Deputy General Manager

**UAN No:**

MPCB-ENVIRONMENT\_STATEMENT-0000050162

**Submitted On:**

30-09-2022