ADITYA BIRLA

UltraTech

Ref. No. UTCL/Tanda/Env/2023-24/22

September 05, 2023

To
The Member Secretary,
Uttar Pradesh Pollution Control Board,
TC-12th, Vibhuti Khand, Gomtinagar, Lucknow – 226010

Sub: **Submission of Environmental Statement Report (FY 2022-23) of UltraTech Cement Limited (Unit: Tanda Cement Works)**

Ref: 134305/UPPCB/Faizabad(UPPCBRO)/CTO/Air/AMBEDKARNAGAR/2021 dtd 11.10.2021
134298/UPPCB/Faizabad(UPPCBRO)/CTO/Water/AMBEDKAR NAGAR/2021 dtd 06.12.2021

Dear Sir,

This is with reference to aforesaid subject and referred Consent to Operate granted by the U.P. Pollution Control Board under Water (Prevention and Control of Pollution) Act, 1974 and Air (Prevention and Control of Pollution) Act, 1981.

Hereby, we are pleased to submit Environment Statement Report (Form-V) for the Financial Year 2022-23 for our UltraTech Cement Limited (Unit-Tanda Cement Works) at Village Kanhaura, Post: Husainpur Sudhan, Near NTPC Tanda, Distt. Ambedkarnagar, Uttar Pradesh.

This is for your information and record please.

Thanking you,

Yours faithfully,

For & behalf of
UltraTech Cement Limited (Unit: Tanda Cement Works)

Nagesh Upadhyay
Asst. Vice President & Unit Head

Encl: Environmental Statement Report (FY'2022-23)

Copy to:

- **The Regional Officer,** U.P. Pollution Control Board, 1/17/104, Ram Nagar Colony, Ayodhya (U.P.)
- **Regional Directorate (Lucknow),** Central Pollution Control Board, 3rd Floor, B-Block Picup Bhawan, Vibhuti Khand, Gomti Nagar, Lucknow, Uttar Pradesh 226010

UltraTech CEMENT The Engineer's Choice

UltraTech Cement Limited
(Unit : Tanda Cement Works)
Post : Husainpur Sudhan, Near NTPC, Tanda, Distt. Ambedkarnagar (UP) - 224190
T : +915273 284626,284429 I W: www.ultrarechcement.com
Registered Office: 'B' Wing, Ahura Centre, 2nd Floor, Mahkali Caves Road, Andheri (East), Mumbai - 400 093
T : +9122 6691 7800 I CIN : L26940MH2000PLC128420

ENVIRONMENT STATEMENT REPORT (FORM – V)

2022-2023

FOR

M/s. UltraTech Cement Limited

(Unit: Tanda Cement Works)

At
Post : Husainpur Sudhan,
Near NTPC Tanda,
District: Ambedkarnagar (UP)

SUBMITTED BY

APPLICANT

M/s. Ultratech Cement Limited
(Unit: Tanda Cement Works)
Post: Husainpur Sudhan,
Near NTPC Tanda,
Distt. Ambedkarnagar (UP) - 224190

CONSULTANT

J.M. EnviroNet Pvt. Ltd.
Registered EIA Consultant by NABET (QCI)
Emaar Digital Greens, Tower - B, Unit No. 1517,
Golf Course Ext. Road, Sector - 61,
Gurugram, Haryana -122 011

FORM – V

Environment statement for the financial year ending the 31st March 2023

PART – A

i)	Name and address of the owner / occupier of the industry, operation, or process	:	UltraTech Cement Limited (Unit: Tanda Cement Works) Post: Husainpur Sudhana, Near NTPC Tanda, Distt. Ambedkarnagar (UP) - 224190
ii)	Industry category Primary – (STC Code) Secondary – (SIC Code)	:	Red Category
iii)	Production capacity	:	1.0 MTPA
iv)	Year of Establishment	:	2004
v)	Date of the last environmental Statement submitted	:	September 28, 2022

PART – B

Water and Raw Material Consumption

1) Water consumption m^3/d

Process : Cement grinding is dry based process so no use of water in process.

Cooling : 81

Domestic : 70

Name of Products	Process water consumption per unit of product output (m^3/t)	
	During the previous financial year (2021-22)	During the current financial year (2022-23)
1) Cement	0.027 (m^3/t)	0.030 (m^3/t)

2) Raw material consumption

Name of Raw Materials		Name of Product	Consumption of raw material per unit of output	
			During the previous financial year	During the current financial year
Clinker	t/t	Cement	0.68	0.65
Gypsum	t/t		0.019	0.016
Fly Ash	t/t		0.30	0.34

3) Power consumption KWH/Per Ton of Cement.

During the previous financial year (2021-22)	During the current financial year (2022-23)
33.17	32.32

4) Total Cement Production

Total Cement Production	Production of Cement (MT)	
	During the previous financial year (2021-22)	During the current financial year (2022-23)
Cement	9.81 Lakh Metric Ton	9.75 Lakh Metric Ton

FORM – V

Environment statement for the financial year ending the 31st March 2023

PART – C

Pollution discharged to environment/unit of output.

(Parameter as specified in the consent issued)

1) Pollutants	Quantity of pollutants discharged (mass/day) i.e., Ton/day	Concentrations of pollutants in discharges (mass/day) i.e., Ton/day	Percentage of variation from prescribed standards with reasons
a) Water (Effluent)	Grinding unit is based on dry process and no any effluent water is generated from the process. Wastewater generating from domestic usage is being treated in the STP and reused in the dust suppression and horticulture activities.		
b) Air (PM)	0.034	0.000013	-40.064

Note: Percentage of variation is lower from prescribed standards due to uninterruptedly operation and maintenance of Baghouse equipped with cement mill stack.

PART – D

HAZARDOUS WASTES

(As specified under Hazardous Wastes (Management & Handling & Trans boundary Movement Rules)

Hazardous Wastes	Total Quantity (MT)	
	During the previous financial year (2021-22)	During the current financial year (2022-23)
1. Used/ Spent Oil (Cat-5.1)	0.00	2.86
2. Waste Oils (Cat. 5.2)	0.00	0.00

a) From Process: Not Applicable

b) From pollution control facilities: Not Applicable

PART – E

Solid Wastes

Solid Wastes	**Total Quantity (Metric Ton)**	
	During the previous financial year (2021-22)	During the current financial year (2022-23)
a) From process:	Nil	Nil
b) From pollution control facilities	Dust collected through Bag house & Bag filters is recycled in the process itself.	
(i) Qty. recycled or reused with in the unit. (ii) Sold (iii) Disposed	There is no solid waste generation from the plant process. The sludge generated from the STP is being utilized as compost in gardening activities.	

PART – F

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

Hazardous Waste: Used oil Cat. 5.1 and waste oil Cat. 5.2, generating from our plant machineries or gear box is temporarily stored in the dedicated storage shed and sold as per the Hazardous Waste Management Rules, 2016.

J.M. ENVIROLAB PVT. LTD.

Approved from MoEF&CC & Certified - ISO 9001:2015, ISO 14001:2015, ISO 45001:2018

TEST REPORT

Sample Number	JME/TCW/O/01	Report No.	JME/O/221124001
Name & Address of Unit	M/s. Ultratech Cement Limited Unit: Tanda Cement Works, at village Kanhoru, P.O. HussainpurSudhana, Near NTPC, Tehsil- Tanda, District- Ambedkar Nagar, Uttar Pradesh	Format No.	7.5 F-05
		Party Reference No.:	Nil
		Reporting Date:	30/11/2022
Sample Description	Used Oil	Receipt Date:	24/11/2022
Sampling Location	Plant Store	Sampling Date:	23/11/2022
Client Representative (Name & Designation)	Mr. Rajkumar Singh (Asst. Manager ENV.)	Sampling Type:	Grab
Sample collected by	JMELPL Team	Sample Quantity	1Ltr.
Sampling & Analysis Protocol	APHA & USEPA	Packing Status	Temp. Sealed

TEST RESULTS

S. No.	Parameter	Protocol	Result	Unit	Limits
1	Polychlorinated biphenyls (PCBs)	As Per CPCB Guidelines	BDL (DL 2.0)	ppm	<2.0
2.	Lead	As Per CPCB Guidelines	30.14	ppm	100
3.	Arsenic	As Per CPCB Guidelines	0.39	ppm	5
4	Cadmium + Nickel + Chromium	As Per CPCB Guidelines	28.62	ppm	500
5.	Poly Aromatic Hydrocarbon (PAH)	As Per CPCB Guidelines	0.78	%	6

BDL – Below Detection Limit, DL - Detection Limit

End of Report

Hazardous waste analysis report

Solid Waste: Dust collected through Bag house & Bag filters is recycled in the process itself. The scrap generated from maintenance activities viz. metal pieces, wooden planks etc. are collected and sold to outside parties for re-use. Total fly ash sourced from the Thermal Power plants during the year 2022-23 is 2,96,007 MT, which is used for manufacturing of PPC.

Biodegradable Waste: generating from our residential colony and guest house is being disposed-off in bio-gas plant and gas generating from biogas plant is being used for cooking in our guest house.

PART – G

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

UltraTech Cement Ltd. is a flagship company of the Aditya Birla Group is committed to sustainable development and play a constructive role in Building "A Green and Clean Environment" by adoption of state-of-the-art-technology.

- To control particulate emissions, air pollution control devices have been installed at different locations covering all transfer point in unit.
- Grinding cement is based on dry process and no effluent generated from the process. Rainwater Water Harvesting system is in practice to conserve the water resources. Sewage/wastewater generating from domestic usage is being treated in STP and 100% reused in horticulture & dust suppression activities.
- The plant is equipped with appropriate Pollution Control System and its schedule maintenance and upkeeps is being done regularly to meet the environmental norms and plant performance.
- On regular basis environment monitoring done by the NABL Accredited Laboratory and report is being submitted to the U.P. Pollution Control Board, Ayodhya & Lucknow.
- In the cement manufacturing process, we are using fly ash approx. 34% of total raw materials such initiatives contribute towards conservation of natural resource (i.e., limestone) and air pollution issues due to fly ash generated from power plants as well.

FORM – V
Environment statement for the financial year ending the 31st March 2023

PART – H

Additional measures/investment proposal for environmental protection including abatement of Pollution, Prevention of pollution.

The performance of pollution control equipment's i.e., Bag House and Bag Filters installed has kept the PM emission levels of stack at a significant lower level from the prescribed limit of 30 mg/Nm^3. The entire picture of the pollution control is well within the framework of the standard limits prescribed by the regulatory authorities and the consent condition laid by U.P. Pollution Control Board. The expenditure on pollution control equipments maintenance during FY2022-23 are as below.

Environment Expenditures FY'2022-23		
Sr. No.	**Particulars**	**Rs. in Lacs**
A. Recurring Expenditure		
1	Environmental monitoring	6.60
2	Ground water monitoring and consultancy	3.79
3	Environment monitoring equipment calibration	0.38
4	Environment personnel and helper wages	1.46
5	Green belt development	3.62
6	Sewage Treatment Plant Operation /Maintenance	4.39
7	APCEs operation and maintenance (excluding energy)	8.77
8	Online monitoring equipment operation and maintenance	3.55
9	Sweeping machine operation and maintenance	6.14
10	Water spraying in yard and roads by tankers	7.29
	Sum of Rs.	45.99
B. Capital Expenditure		
1	Bio-gas plant installation	12.15
2	Rainwater Harvesting System	8.25
3	Environment monitoring equipments	3.92
4	Water fogging system	5.96
	Sum of Rs.	30.28
	Grand total expenses of Rs. (In Lacs)	**76.27**

PART – I

Any other particulars for improving the quality of the environment.

In the Cement Manufacturing Process, we are utilizing considerable amount of Fly Ash that is approximately 34% of total raw materials such initiatives contribute towards conservation of natural resource (i.e., limestone) and prevents air pollution issues due to fly ash generated from power Plants.

Industrial and residential area spreaded over 8.59 ha and out of the total land area approx. 2.90 ha area covered under greenery it is around >33% of total area. Besides, in this year under mega plantation derives of U.P. Govt. we have planted 5000 nos. of saplings in and around our plant premises. In the previous FY 2021-22, we have planted 4350 nos. of saplings based on Miyawaki Method.

Community tree plantation in nearby villages (i.e., Makhdoomnagar and Bihra)

Plantation site visited the Divisional Forest Officer (DFO) Ambedkarnagar and Team

Bio-Gas Plant:

Biodegradable wastes generating from our residential colonies and guest house is being collected from door to door and it is processed in Bio-gas plant. Biogas generation from biogas plant is being used for cooking in guest house. Initiatives was appreciated by the DFO, Ambedkarnagar.

Bio-gas processing and used for cooking in guesthouse

DFO & Team

Environment awareness programs

Tree plantation

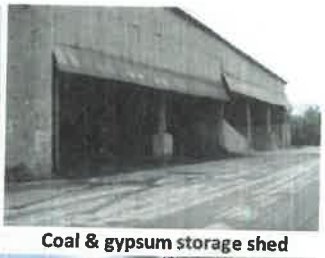
The plant is equipped with appropriate Pollution Control System (i.e., Bag House & Bag Filters) and its schedule maintenance and upkeeps are being done regularly to meet the environmental norms and plant performance. On regular basis environment monitoring done by the NABL Accredited Laboratory and report is being submitted to the U.P. Pollution Control Board, Faizabad & Lucknow.

Air pollution control measures being adopted are as below: -

- Raw material transfer is being carried out through belt conveyers and bag filters are provided at every transfer point to control the fugitive emission.
- Fly ash is being transported through closed bulker and pneumatically unloaded and stored in the fly ash storage silo.
- Material handling area is paved and regularly sprinkling of water by dedicated tractor mounted water tanker.
- Trees have been planted along the plant boundary which helps to arrest fugitive dust and prevent to spreads outside from plant boundary.


Covered belt conveyer and Bag Filter


Fly ash pneumatic unloading system


Coal & gypsum storage shed


Plant view


Water sprinkling


Dense tree plantation along boundary

Clinker loading and unloading is being done in the clinker storage shed and never stored in the open area.


Clinker storage yard


Clinker unloading at truck tippler


Water sprinkling inside plant

To control the fugitive emission apart from various measures water sprinkling is being done by dedicated tractor mounted water sprinkler in material handling areas and roads.

Clinker is being shifted from railway siding to the plant by trucks and unloaded thorough truck tippler directly into the mill hopper or covered storage yard.

Photo: Railway siding equipped with air pollution control arrangements

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Environment Monitoring Data

Stack Monitoring Data

Stack No.	S-1
Stack Name	Cement Mill
Parameter	PM
Std Limit (mg/Nm³)	30
Apr-22	19.0
May-22	16.1
Jun-22	15.3
Jul-22	14.2
Aug-22	20.2
Sep-22	14.7
Oct-22	20.1
Nov-22	14.6
Dec-22	18.0
Jan-23	21.3
Feb-23	19.1
Mar-23	23.1
Minimum	14.2
Maximum	23.1
Average	17.98

Ambient Air Quality

Location 1: Plant Gate Back Side

Parameters	PM 2.5			PM 10		
Std Limit	60 µg/m3			100 µg/m3		
Month	Min	Max	Avg	Min	Max	Avg
Apr-22	34.1	39.7	36.5	59.7	72.4	64.8
May-22	35.9	41.3	37.7	60.6	72.5	66.0
Jun-22	36.2	42.5	38.7	61.3	73.4	66.7
Jul-22	32.3	40.2	35.6	54.2	67.6	60.8
Aug-22	30.7	38.2	33.8	50.9	63.5	57.1
Sep-22	30.7	38.2	34.2	50.4	63.5	56.2
Oct-22	31.5	39.2	34.6	52.3	65.2	57.8
Nov-22	31.0	38.7	35.0	57.2	68.9	62.4
Dec-22	32.2	41.2	36.0	60.1	69.6	64.2
Jan-23	32.6	37.5	34.7	58.2	67.5	62.4
Feb-23	31.2	36.8	33.9	61.1	67.9	64.3
Mar-23	32.4	37.1	34.5	55.6	67.4	60.8

FORM – V

Environment statement for the financial year ending the 31st March 2023

Location 2 : Near Main Gate						
Parameters	PM 2.5			PM 10		
Std Limit	60 µg/m3			100 µg/m3		
Month	Min	Max	Avg	Min	Max	Avg
Apr-22	36.2	45.8	40.1	60.6	73.8	68.9
May-22	37.3	46.3	41.1	61.9	76.3	70.2
Jun-22	37.4	47.5	41.0	62.6	77.3	71.2
Jul-22	36.6	45.6	39.3	58.3	75.1	67.8
Aug-22	34.8	43.3	37.4	54.8	71.4	63.8
Sep-22	34.8	43.3	37.8	54.1	71.4	62.4
Oct-22	35.7	44.5	38.2	55.3	72.2	64.1
Nov-22	34.2	42.2	38.5	62.0	76.9	67.2
Dec-22	35.9	45.3	40.0	65.1	73.4	69.4
Jan-23	36.1	41.7	39.6	70.7	79.9	75.3
Feb-23	37.3	41.8	40.1	73.6	79.7	76.5
Mar-23	34.6	44.6	38.5	58.7	73.5	66.5

Location 3 : Near D G House						
Parameters	PM 2.5			PM 10		
STD Limit	60 µg/m3			100 µg/m3		
Month	Min	Max	Avg	Min	Max	Avg
Apr-22	34.1	41.9	37.0	59.0	73.2	64.4
May-22	35.1	42.8	38.0	59.6	75.6	66.3
Jun-22	31.6	40.4	37.0	60.3	76.3	67.0
Jul-22	33.2	40.7	35.7	52.6	73.2	59.7
Aug-22	31.5	38.6	33.8	51.5	68.8	56.5
Sep-22	29.7	38.6	33.8	48.7	68.8	55.2
Oct-22	32.3	39.6	34.6	52.8	70.6	58.1
Nov-22	28.8	36.9	33.2	56.6	70.3	61.7
Dec-22	30.6	39.1	34.7	60.0	74.5	64.8
Jan-23	34.5	40.1	37.1	63.1	68.3	65.1
Feb-23	34.0	40.7	37.1	63.0	69.7	66.1
Mar-23	32.1	37.0	34.1	55.7	69.9	60.3

Location 4 : UTCL Colony (Near Temple)						
Parameters	**PM 2.5**			**PM 10**		
Std Limit	**60 µg/m3**			**100 µg/m3**		
Month	**Min**	**Max**	**Avg**	**Min**	**Max**	**Avg**
Apr-22	30.4	35.5	32.1	57.9	63.8	60.7
May-22	32.4	37.5	34.7	58.2	66.4	63.2
Jun-22	31.5	38.6	35.1	55.3	67.8	62.2
Jul-22	30.2	36.2	32.4	50.6	67.8	61.8
Aug-22	28.7	34.4	30.8	49.6	63.8	58.6
Sep-22	28.2	34.4	30.2	45.7	63.8	56.2
Oct-22	29.4	35.3	31.6	50.9	65.4	59.6
Nov-22	29.4	34.3	31.8	56.2	67.1	60.9
Dec-22	31.2	36.4	33.6	59.6	71.1	63.9
Jan-23	29.1	35.6	32.6	57.2	70.8	61.1
Feb-23	29.4	34.6	32.2	56.8	62.5	59.3
Mar-23	28.8	34.0	31.0	56.2	62.2	59.1

Ambient Noise Level Monitoring												
	Apr-22		May-22		Jun-22		Jul-22		Aug-22		Sep-22	
	Day time	Night Time	Day time	Night Time	Day time	Night Time	Day time	Night Time	Day time	Night Time	Day time	Night Time
Prescribed Limits dB (A) Leq	75	70	75	70	75	70	75	70	75	70	75	70
Colony (Near Temple)	51.7	38.3	53.7	42.9	53.2	43.8	50.8	38.4	49.7	37.6	47.7	36.1
Near Main Gate	51.5	56.9	65.2	61.7	66.2	62.4	62.4	57.6	60.5	55.8	59.8	54.9
Near D G House	62.3	57.1	63.5	62.5	61.5	56.6	60.9	58.4	58.4	56	57.8	55.4
Plant Gate Back Side	64.8	54.3	63.5	57.6	68.4	64.7	62.4	54.9	60.5	53.2	59.9	52.7
Minimum	51.5	38.3	53.7	42.9	53.2	43.8	50.8	38.4	49.7	37.6	47.7	36.1
Maximum	64.8	57.1	65.2	62.5	68.4	64.7	62.4	58.4	60.5	56	59.9	55.4

Ambient Noise Level Monitoring												
	Oct-22		Nov-22		Dec-22		Jan-23		Feb-23		Mar-23	
	Day time	Night Time	Day time	Night Time	Day time	Night Time	Day time	Night Time	Day time	Night Time	Day time	Night Time
Prescribed Limits dB (A) Leq	75	70	75	70	75	70	75	70	75	70	75	70
Colony (Near Temple)	50.1	38.3	50.3	38.5	51.1	39.8	52.1	41.2	51.7	40.9	54.3	41.7
Near Main Gate	61.7	56.9	61.9	57.4	62.6.	57.7	68.4	59.2	51.5	47.2	71	59.2
Near D G House	59.6	57.1	59.9	57.4	53.3	42.9	52.8	48.5	62.3	58	54.1	48.1
Plant Gate Back Side	61.7	54.3	61.8	54.9	62.3	55.4	63.7	59.5	64.8	59.2	65.4	59.2
Minimum	50.1	38.3	50.3	38.5	51.1	39.8	52.1	41.2	51.5	40.9	54.1	41.7
Maximum	61.7	57.1	61.9	57.4	62.3	57.7	68.4	59.5	64.8	59.2	71	59.2

STP : Water Water Analysis Report																	
Parameter	**Limit**	**Unit**	**Apr-22**	**May-22**	**Jun-22**	**Jul-22**	**Aug-22**	**Sep-22**	**Oct-22**	**Nov-22**	**Dec-22**	**Jan-23**	**Feb-23**	**Mar-23**	**Minimum**	**Maximum**	**Average**
pH	5.5 to 9	-	7.28	7.56	7.64	7.59	7.5	7.34	7.76	7.52	7.69	7.64	7.54	7.73	7.28	7.76	7.6
Total Suspended Solids	100	mg/l	10.2	8	16.8	8	9	8	10	8.4	8.9	8.2	10.6	10.87	8	16.8	9.7
BOD (5 days at 20°C)	30	mg/l	17	14	15	13.3	13	14	16	13	16	14	13	13.33	13	17	14.3
COD	250	mg/l	51	60	61.2	58	56	52	57	54	57	52	55	56.38	51	61.2	55.8
Oil & Grease	10	mg/l	BDL	BDL	0.82	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL	BDL			

FORM – V

Environment statement for the financial year ending the 31st March 2023

WORK ZONE NOISE MONITORING				
	LOCATION NO.1	LOCATION NO.2	LOCATION NO.3	LOCATION NO.4
Location Name	Near Cement Mill	Near Coal Mill	Near Packer	Near Weight Bridge
STD Limit dB (A) Leq	90	90	90	90
Apr-22	78.5	71.0	69.5	57.9
May-22	83.3	75.6	76.5	62.2
Jun-22	78.4	71.6	66.1	59.2
Jul-22	80.4	69.4	70.6	59.7
Aug-22	76.4	66.6	66.2	57.9
Sep-22	69.7	71.4	71.5	54.9
Oct-22	77.3	67.9	67.5	59.1
Nov-22	77.5	68.2	67.6	59.4
Dec-22	78.1	71.4	66.5	59.9
Jan-23	77.2	72.2	74.2	61.1
Feb-23	77.4	72.9	75.4	62.5
Mar-23	71.5	74.9	77.4	64.2
Minimum	69.7	66.6	66.1	54.9
Maximum	83.3	75.6	77.4	64.2

FUGITIVE EMISSION MONITORING			
	LOCATION NO.1	LOCATION NO.2	LOCATION NO.3
	Near Packing Plant	Near Clinker Tippler	Rly Siding
Parameter	SPM ($\mu g/m^3$)		
STD Limit	2000		
Apr-22	1623	1146	1032
May-22	1181	958	945
Jun-22	1230	903	1011
Jul-22	1164	1088	998
Aug-22	1106	1023	958
Sep-22	1180	1098	1025
Oct-22	1182	1189	1035
Nov-22	1256	906	1124
Dec-22	1506	1042	1468
Jan-23	1418	955	1280
Feb-23	1389	986	1608
Mar-23	1457	1121	1324
Minimum	1106	903	945
Maximum	1623	1189	1608
Average	1292	1024	1135

*****End*****