

ECL/ BIHAR/ESR/MOEF/FORM-V/R-4

DATED- 26.06.2015

To,  
The Chairman,  
Bihar State Pollution Control Board,  
Beltron Bhavan, 2<sup>nd</sup> Floor, Lal Bahadur Shastri Nagar,  
Patna- 800023

**Sub.** : Environmental Statement Report ( FORM-V) of M/s. ECO CEMENTS LTD  
for the period of April 2014 to March, 2015.

**Ref** : Consent to operate letter No. PT2-1048/04 T. 15842 & P/T 2-26/12-T.  
15843, DATED -23/09/2013

**Dear Sir,**

We are submitting herewith the yearly Environmental Statement Report of **Eco Cements Limited**, Plot No. 1644, Bheriya More, Kulharia, Durgauti, Bhabua, Bihar, Pin code- 821105 for the period of April 2014 to March, 2015

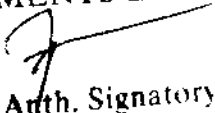
Kindly acknowledge the receipt and oblige.

Thanking you.

Yours Faithfully,

For Eco Cements Ltd.

**ECO CEMENTS LTD.**

  
Rajiv Saini **Auth. Signatory**  
(AUTHO. SIGN.)

**Copy to.**

1. The Chief Conservator of Forest(C),  
Regional office ( Central Region),  
Ministry of Environment and Forests,  
A-3, Chandrashekharapur, Bhubaneswar – 751 023, Orissa.  
Tel: 0674-2301248, 2301213; Fax: 0674-2302432
2. The Chairman, Central Pollution Control Board,  
Parivesh Bhawan, CBD-cum-Office Complex,  
East Arjun Nagar, Delhi - 110 032

## **ECO CEMENTS LIMITED**

Corp. Office : 72, Jawaharnagar Extn, Bhelupur, Varanasi-221010. Telefax – 0542-2277074

Zonal Office : HIG-193, Saileshree Vihar, Chandrashekharapur, Bhubaneswar, Orissa, Email - enquiry@ecocem.in  
: 1644, Beriya Road, Kulharia, Durguati, Bhabua ( Kamur), Bihar- 821105.

**ENVIRONMENTAL STATEMENTS**

**FORM-V**

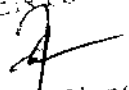
(See Rule-14)

The Ministry of Environment & Forest its vide its notification dated 13<sup>th</sup> March,1992 directed all industries which need to have consent under Water (Prevention & Control of Pollution) Act,1974 and Air (Prevention & Control of Pollution) Act,1981 to file the environmental statement under Environmental Protection Act.1986 every year. This is to be filed for the period ending of March by September every year The format for the same is as follows:-

**PART—A**

1	Name and address of the Owner / Occupier of the Industry operation or process	<b>Eco Cements Limited, Plot No. 1644, Bheriya More, Kulharia, Durgauti, Bhabua, Bihar, Pin code- 821105</b>
2	Industry Category Primary (S.T.C. Code) Secondary (S.T.C. Code)	<b>Red Category</b>
3	<b><u>Production Capacity</u></b> Cement : D. G. Set	<b>1.0 MTPA 125 KVA &amp; 500 KVA</b>
4	Year of Establishment	<b>2012</b>
5	Date of the last Environmental Statement submitted.	<b>N.A.</b>

ECO CEMENTS LTD.

  
Auth. Signatory

**PART — B**

**WATER AND RAW MATERIAL CONSUMPTION**

**(I) WATER CONSUMPTION:**

Process	N.A. (As plant is based on dry process technology)
Cooling and Dust Suppression	131.79KL
Domestic	675.25KL

Name of Product	Process water consumption per unit of product Output	
	During Previous Financial Year( 2013-14)	During Current Financial Year( 2014-15)
PPC Cement	.00137 KL/ MT OF CEMENT PRODUCTION	.00121 KL/ MT OF CEMENT PRODUCTION

**(II) RAW MATERIAL CONSUMPTION: (CEMENT PLANT)**

Name of Raw Material	Name or Product	Consumption of Raw Material per unit of Output ( Cement)	
		During Previous Financial year( 13-14)	During Current Financial year (14-15)
Clinker	PPC Cement	0.694	0.6475
Gypsum		0.048	0.0464
Fly Ash		0.258	0.3062

**RAW MATERIAL CONSUMPTION: (D.G. SET)**

Name of Raw Material	Name of Product	Consumption of Raw Material per unit of Output( Cement)	
		During Previous Financial Year 13-14	During Current Financial Year 14-15
Fuel/ Diesel	Power	0.18	0.21

**(III) POWER CONSUMPTION (KWH/T OF CEMENT):**

During Previous Financial Year	During Current Financial Year
50.21 KWH/T	44.46 KWH/T

**(IV) TOTAL CEMENT PRODUCTION (MT):**

During Previous Financial Year (2013-2014)	During Current Financial Year (2014-2015)
162262.87 MT	108915.91 MT

**ECO CEMENTS LTD.**

  
Auth. Signatory

**PART-C**

**DISCHARGED TO ENVIRONMENTAL / UNIT OF OUTPUT**

Pollutants	Quantity of Pollutants Discharged ( Mass/Day)	Concentration of Pollutants in Discharges ( Mass/day)	Percentage of variation from prescribed standards with reasons
(a)	Water	As the plant is being operated on dry process technology, no liquid effluent is generated from the plant, Waste water generated from office toilet and mess is disposed-off in a soak pit via septic tank	
(b)	Air	Please refer <b>Annexures - I, II &amp; III</b>	


**PART—D**

**HAZARDOUS WASTE**

(As specified under Hazardous Waste (Management, Handling and Transboundary Movement) Rules, 2008)

Hazardous Waste	Total Quantity ( Ltrs)	
	During Previous Financial Year (April 2013- March 2014)	During Current Financial Year (April 2014-March 2015)
	We are having common authorization for Hazardous Waste Management & Handling for Clinker Grinding Unit (Cement 1.0 MTPA & 125 KVA & 500 KVA D. G. Set)	
a) From Process, Cement manufacturing (Grinding) is based on "Dry Process" No Hazardous waste is generated from the process except used oil which is drained from Machinery / Equipments	Total Quantity Generated in 2013-14 : 600 Ltrs Old Stock : 280 Ltrs Sale out : 480 Ltrs Balance : 400 Ltrs	Total Quantity Generated in 2014-15 : 220 Ltrs Old Stock : 400 Ltrs Sale out : NIL Ltrs Balance : 620 Ltrs
(b) From Pollution Control Facilities	N.A	N.A

**ECO CEMENTS LTD.**

  
Auth. Signatory

**PART — E**  
**SOLID WASTE**

		Total Quantity	
		During Previous Financial Year	During Current Financial Year
(a)	From Process	Nil	Nil
(b)	From Pollution Control Facility	Dust collected in the Bag Houses and Bag Filters is recycled / reused in process.	
(c)	1) Quantity rejected or re-utilized	100%	100%
	2) Sold	Nil	Nil
	3) Disposed	Nil	Nil

**PART — F**

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

**Hazardous Wastes**

Cement manufacturing is based on "Dry Process". No Hazardous waste is generated from the process except used oil which is drained from machineries / equipments. Used oil is sold to the authorized recyclers/ self-used for lubrication.


Solid Wastes: - N.A.

**PART — G**

**IMPACT OF THE POLLUTION CONTROL MEASURES ON CONSERVATION OF NATURAL RESOURCES AND CONSEQUENTLY ON THE COST OF PRODUCTION**

Clinker grinding unit is being operated on dry process technology, which is cost effective and environmentally clean technology. The stack emissions from the plant are controlled by equipment like bag houses and bag filters installed at various material transfer points to clean the process and arrest the fugitive emissions. The particulate matter collected in the pollution control equipment is recycled / reused in process and neutralizing the cost of operation of pollution control equipments and hence no cost impact on the production cost.

**ECO CEMENTS LTD.**

  
Anth. Signatory

**PART—H**

**ADDITIONAL MEASURES / INVESTMENTS PROPOSAL FOR ENVIRONMENT  
PROTECTION INCLUDING ABATEMENT OF POLLUTION**

Green belt development and tree plantation is our ongoing process. Every year we are doing new tree plantation to increase the bio-diversity of the area. Up to March, 2015, we have covered 3.08 hectare, around 5600 trees with the survival rate of 92.66% , this is around 33.12 % green area of the total plant area (9.3 hect.). Additional to this we have planted 1000 tree saplings at Nearby schools, outside plant area, both side of Bheria road to enhance the greenery and prosperity of the area.

**PART—I**


**ANY OTHER PARTICULARS FOR IMPROVING THE QUALITY OF  
ENVIRONMENT.**

1. We have full-fledged Environment Department with three separate cells, one for monitoring, one for maintenance of pollution control equipment and one for green belt development.
2. Monitoring of stack emission, ambient air quality & ambient noise and water quality is being monitored regularly.
3. Maintenance department is doing regular checking and scheduled maintenance of all the pollution control devices.
4. Civil and Personal & Administration departments taking care for of House- keeping.
5. Horticulture section is taking care of tree plantation and green belt development. Every year we are growing new tree plantation.

**On support of above, we are enclosing herewith following Annexure:-**

- Annexure-I** : Ambient Air Quality Monitoring Report for the year 2014-15  
**Annexure-II** : Stack Emission Level Monitoring Report for the year 2014-15  
**Annexure-III** : Ambient Noise level Monitoring Report for the year 2014-15

**ECO CEMENTS LTD.**

  
**Auth. Signatory**

## Ambient Air Quality Monitoring Report for the year 2014-15

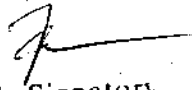
Ambient Air Quality Monitoring Report (All Values in ug/m3)													
Year: 2014 - 2015( APRIL 2014 TO MARCH 2015.)													
S. No.	Location ---->	Near Main Gate			Near CCR			Near Canteen			Near Gypsum & Clinker Storage		
	Month	PM <sub>10</sub>	SO <sub>2</sub>	NO <sub>2</sub>	PM <sub>10</sub>	SO <sub>2</sub>	NO <sub>2</sub>	PM <sub>10</sub>	SO <sub>2</sub>	NO <sub>2</sub>	PM <sub>10</sub>	SO <sub>2</sub>	NO <sub>2</sub>
1	Apr-14	70.4	8.8	11.7	70.8	10.56	12	67.4	12.4	11.9	66.8	11.2	9.2
2	May-14	69.3	11.4	10.4	71.2	11.8	12.3	68.3	11.9	10.9	69.4	10.8	9.8
3	Jun-14	69.5	11.3	10.9	71	11.7	12	68.6	11.8	11.4	69.8	10	9.7
4	Jul-14	70.3	11	10.6	72	11.2	11.9	69.4	11.4	11.3	69.3	9.8	9.9
5	Aug-14	73.3	9.9	11.8	71.2	12.6	11.7	68.4	12.6	12.4	71.4	11.9	9.4
6	Sep-14	72.3	9.8	11.9	71.9	12.9	11.4	68.7	11.9	12.2	71.9	12.9	9.6
7	Oct-14	69.3	11.4	10.4	71.2	11.8	12.3	68.3	11.9	10.9	69.4	10.8	9.8
8	Nov-14	70.4	8.8	11.7	70.8	10.56	12	67.4	12.4	11.9	66.8	11.2	9.9
9	Dec-14	69.5	8.8	11.9	71	10.56	11.4	68.6	12.4	12.2	69.8	11.2	9.6
10	Jan-15	70.4	8.8	11.9	70.8	11.2	11.9	67.4	11.4	11.3	66.8	11.2	9.6
11	Feb-15	73.3	9.9	11.9	71.2	12.6	11.4	68.7	11.9	10.9	71.9	10.8	9.8
12	Mar-15	72.3	9.8	10.6	70.8	10.56	11.9	67.4	12.4	11.3	66.8	11.2	9.9
Average		70.86	9.98	11.31	71.16	11.50	11.85	68.22	12.03	11.55	69.18	11.08	9.68

ECO CEMENTS LTD.  
  
 Auth. Signatory

## Annexure-II

Stack Emission Level Monitoring Report for the period APRIL 2014 TO MARCH 2015									
All Values in mg/m <sup>3</sup>									
Sr. No.	Month & Year	Particulate Matter Emission ( mg/Nm <sup>3</sup> )						Standard Limit of Particulate Matter Emission	
		Stack Attached with Bag House of Cement Mill	Stack Attached with Bag House of flyash unloader	Stack Attached with Bag House of Clinker & gypsum unloader	Stack Attached with Bag House of gypsum & clinker feeding	Stack Attached with DG 500 KVA	Stack Attached with DG 125 KVA		
1	Apr-14	27.8	27.9	27.6	28.9	27.9	31.9	50 mg/Nm <sup>3</sup>	
2	May-14	26.6	26.9	27.2	27.8	28.4	32		
3	Jun-14	27.9	27.8	27.9	28.6	28.7	31.8		
4	Jul-14	31.4	42.9	41.4	41.4	41.6	42.4		
5	Aug-14	35.6	43.7	42.3	42.3	42.3	40.4		
6	Sep-14	41.4	44.2	43.7	43.7	44.6	38.7		
1	Oct-14	41.7	42.1	41.7	42.1	38.3	35.9		
2	Nov-14	41.9	44.7	43.2	42.9	41.5	39.4		
3	Dec-14	42.3	43.8	45.6	41.8	36.2	39.6		
4	Jan-15	42.2	41.5	41.1	42.9	39.6	38.9		
5	Feb-15	42.7	44.7	42.9	43.1	35.8	40.2		
6	Mar-15	43.3	45.2	42.2	40.7	32.7	38.7		
Average Values		37.07	39.62	38.90	38.85	36.47	37.49		

ECO CEMENTS LTD.

  
 Auth. Signatory

## Ambient Noise level Monitoring Report for the year 2014-15 (dB(A))

## TIME WEIGHTED AVERAGE ( TWA) OF NOISE LEVEL IN dB(A)

S. No.	Location ---->	Plant boundary near Main gate	Plant boundary near CCR	Plant boundary near Canteen	Plant boundary near Gypsum storage	Plant boundary near clinker storage	Prescribed Standard Limit ( dB(A))
1	Apr-14	62	61.9	60.3	61.4	60.9	75dB(A) in day & 70 dB(A) in night
2	May-14	61.8	61.8	60.7	61.9	61.4	
3	Jun-14	61.4	61.1	60.3	61.8	61	
4	Jul-14	62.3	61	60.9	61.4	62	
5	Aug-14	62.9	61.6	61.8	61.9	63	
6	Sep-14	61.8	62.4	61.9	61.6	63.9	
7	Oct-14	62	61.9	61.4	61.1	61.8	
8	Nov-14	62.6	63	62.2	61.6	61	
9	Dec-14	61.8	62.4	61.9	61.6	63.9	
10	Jan-15	61	61.8	62	60.7	61.9	
11	Feb-15	61.8	61.8	60.7	61.1	61.9	
12	Mar-15	62.3	61	61.9	63	63.9	
Average Values		61.97	61.80	61.33	61.59	62.21	

\* Day time reckoned from 06 00AM to 10:00 PM

\*\* Night time reckoned from 10: PM to 06:00 AM

ECO CEMENTS LTD.  
  
 Auth. Signatory