Ref: CPM/ENV/K-32/CF/03/07 Date: 17.05.2012

To
Dr. S C Katiyar
Scientist D
North Eastern Regional Office,
Ministry of Environment & Forests
Law U-Sib, Lumbatngen, Near M T C Workshop
Shillong – 793 021
Gram: Paryavaran, Shillong

Sub: Half Yearly Compliance Report on Environmental Stipulations.
(Period- October 2011 to March 2012)

Sir,

Half Yearly Compliance report on Environmental Stipulations from October 2011 to March 2012 is hereby submitted for your kind perusal.

Thanking you.

Yours faithfully
For & on behalf of HPC Ltd
Cachar Paper Mill

Enclo: as above (07 pages).

(D. Banerjee)
Sr. Manager (Env & Civil)

Cc:
i) The Director
Ministry of Environment & Forest
Paryavaran Bhavan, CGO Complex
Lodi Road, New Delhi – 110003
ii) The Additional Director
Central Pollution Control Board, N.E.Zonal Office
Near Fire Brigade, Lower Motinagar
Shillong - 793014
iii) The Sr. Environmental Engineer
Assam Pollution Control Board,
Itkhola, Ghaniwala Lane
Silchar – 788 002

HINDUSTAN PAPER CORPORATION LTD
CACHAR PAPER MILL, PANCHGRAM
ENVIRONMENT DEPARTMENT

Half yearly compliance report on environmental stipulations
Period- October 2011 to March 2012

Sl no	Environmental stipulations	Present status
01.	The project authority must strictly adhere to the stipulation made by the State Pollution Control Board and the State Government. A comprehensive EIA covering 4(Four) seasons data should be submitted to this Ministry latest by Dec'92	Comprehensive EIA Study 1996-1997 had been submitted to MOEF vide no. HPC/ENV/36-A/98/184 dtd. 09-03-1998.
02.	Expansion of the plant should not be taken up without prior approval of this Ministry.	No expansion has been taken up.
03.	The emission from various units should confirm to the standards prescribed by the Government or Central / State Pollution Control Board. At no time the emission levels should be beyond the stipulated standards. In the event of failure of any Pollution Control systems adopted by the units, the respective unit should be put out of operation immediately and not be restarted until the Control System are rectified to achieve the desired efficiency.	Emission monitoring of all the four boilers operating at Cachar Paper Mill are being done and reports are sent to APCB, CPCB & MoEF in every month. The reports are also available in the website of HPC. Monthly average report from October 2011 to March 2012 is enclosed as Table – I.
04.	The Project Authority should not change any design of stacks without the permission of the State Pollution Control Board. They will also provide close circuit grinding Unit in all the grinding sections of the Plant.	Design of stack has not been changed. Paper manufacturing process in the Mill does not include grinding process.
05.	A minimum of 4(Four) Air Quality Monitoring Stations should be set up in the downwind direction as well as where maximum ground level concentration is anticipated. Also stack emission should be monitored by setting up Automatic Stack Monitoring Unit. Air quality & Stack emissions should be monitored regularly. The data collected should be statistically analyzed, interpreted and report submitted to the State Pollution Control Board & this Ministry once in 6(Six) months.	Ambient Air Monitoring at 4 (four) monitoring stations has been continuing since September 2006 and reports are sent to APCB, CPCB & MoEF in every month. The reports are also available in the website of HPC. Monthly average report from October 2011 to March 2012 is enclosed as Table- II (A) & Table- II(B).

Sl no	Environmental stipulations	Present status
06.	At Nagaon fluidize bed boiler should be installed within 24(Twenty-four) months.	Not related to this mill. However, for our mill , installation of FBC Boiler is in progress. 81% erection job has already been completed.
07.	At Cachar, in case gas is available gas fired boiler should be installed within 24(Twenty-four) months instead of oil fired units.	Gas is not available for installation of gas fired boiler.
08.	Regular monitoring of Hydrogen Sulphide should be done and data should be statistically analyzed.	H_2S monitoring is regularly being done for Recovery stack and reports are sent to APCB, CPCB & MoEF in every month. The reports are also available in the website of HPC. Monthly average report from October 2011 to March 2012 is enclosed as Table-III.
09.	The liquid effluents generated should be treated so as to meet the prescribed standards of Central / State Pollution Control Board. The quality of liquid effluent should be monitored regularly and the data so collected should be statistically analyzed , interpreted and report submitted to this Ministry & State Pollution Control Board once in 6(Six) months .	The quality of liquid effluent is being monitored regularly and reports are sent to APCB, CPCB & MoEF in every month. The reports are also available in the website of HPC. Monthly average report from October 2011 to March 2012 is enclosed as Table- IV.
10.	Minimize, control foams in the aerated lagoons sprinkler system / fountain system should be installed within 24(Twenty-four) months.	Defoamer is used and foam is controlled.
11.	Action should be taken within 3(Three) years to remove the colour of the effluents before discharging.	This is also CREP requirement. IPMA was advised vide Sl no. 6 of CREP to take up project with CPPRI for developing viable technology. Viable Technology is yet to be available. However the color is under control with great effort.
12.	Polishing pond should be desludged regularly.	Desludging activity of South Aeration Lagoon has been completed and the same is in operation from 12.06.2011.
13.	The Mercury level in the liquid effluents should meet the standards stipulated by the State Pollution Control Board. A Mercury Removal System should be installed to care of unforeseen circumstances.	Installation of Ion Exchange Mercury Removal System, removal of mercury from Hydrogen Gas & Caustic Lye, Mercury distillation units are in operation. The Mercury level in the liquid effluents is well within limit.

Sl no	Environmental stipulations	Present status
14.	Plan for proper disposal of solid wastes by way of value added materials should be drawn within months and submitted to this Ministry.	Solid waste Disposal Plan had been submitted vide letter no. ENV/K-32/CF/09 Dtd. 21-12-2000. The area in the vicinity of the mill being flood prone, major solid waste like Coal Ash & lime grits are allowed to the locality for land filling preferably developing of road and demand is very high. To reduce the quantity of Solid Waste generation and disposal measures taken are a) To utilize bamboo dust as fuel a Bamboo Dust based Gasification Plant has been Installed & Commissioned in November 2006. b) A Lime Mud Re-burning Plant installation activities completed in March 2008. Commissioning will be done after the production of the mill is stabilized on sustainable basis. c) A Multifuel AFBC Boiler is being installed. 81% erection work has already been completed. Fly Ash generated in Coal fired boiler shall also be used as one of the fuels in AFBC Boiler.
15.	Ground water around the solid waste disposal pits should be regularly monitored for mercury contamination.	Ground water is being monitored weekly and the reports are sent to APCB, CPCB & MoEF in every month. The reports are also available in the website of HPC. Monthly average report from October 2011 to March 2012 is enclosed as Table –V.

TABLE - I
STACK EMISSION DATA
Limit: PM 150 mg/Nm3

Monthly average values from October 2011 to March 2012

Source	CF Boiler I	CF Boiler II	CF Boiler III	Recovery Boiler
Month	PM mg/Nm3	PM mg/Nm3	PM mg/Nm3	PM mg/Nm3
October 2011	126.4	139.2	144.7	109.3
November 2011	140.2	128.6	131.3	97.4
December 2011	126.2	134.2	123.8	84.6
January 2012	115.6	140.3	131.5	72.3
February 2012	129.3	133.8	124.7	86.5
March 2012	143.1	137.4	135.2	90.3

TABLE – II (A)
AMBIENT AIR QUALITY DATA
Monthly average values from October 2011 to March 2012

Source	Time Office (Industrial)							Township (Residential)						
Parameter	SPM	SO2	NOX	PM (below 10µm)	Pb	NH_3	CO	SPM	SO2	NOX	PM (below 10µm)	Pb	NH_3	CO
Limit	360 µg/m^3	80 µg/m^3	80 µg/m^3	100 µg/m^3	1.0 µg/m^3	400 µg/m^3	4.0 mg/m^3	120 µg/m^3	80 µg/m^3	80 µg/m^3	100 µg/m^3	1.0 µg/m^3	400 µg/m^3	4.0 mg/m^3
Month														
Oct`11	215.9	9.9	17.7	75.3	-	-	-	123.5	BDL	5.7	31.6	-	-	-
Nov`11	262.9	4.4	21.5	73.7	BDL	BDL	BDL	136.0	BDL	4.4	28.0	BDL	BDL	BDL
Dec`11	270.6	9.5	21.2	77.7	-	-	-	160.4	BDL	10.0	27.4	-	-	-
Jan`12	266.0	3.2	20.6	72.6	-	-	-	163.2	BDL	3.2	29.1	-	-	-
Feb`12	249.2	4.4	20.2	65.5	BDL	BDL	BDL	158.6	BDL	3.3	30.2	BDL	BDL	BDL
Mar`12	176.9	7.0	6.9	75.8	-	-	-	136.8	2.0	7.4	45.5	-	-	-

TABLE – II (B)
AMBIENT AIR QUALITY DATA
Monthly average values from October 2011 to March 2012

Source	Yard No.7 at Security Point (Industrial)							At corner of Lagoon (Industrial)						
Parameter	SPM	SO2	NOX	PM (below 10µm)	Pb	NH_3	CO	SPM	SO2	NOX	PM (below 10µm)	Pb	NH_3	CO
Limit	360 µg/m^3	80 µg/m^3	80 µg/m^3	100 µg/m	1.0 µg/m^3	400 µg/m^3	4.0 mg/m^3	360 µg/m^3	80 µg/m^3	80 µg/m^3	100 µg/m	1.0 µg/m^3	400 µg/m^3	4.0 mg/m^3
Month														
Oct`11	257.0	14.2	12.2	-	-	-	-	230.0	6.8	11.9	-	-	-	-
Nov`11	271.2	11.7	13.9	-	BDL	17.6	BDL	228.8	9.7	11.8	-	BDL	26.3	BDL
Dec`11	259.7	10.9	13.8	-	-	-	-	226.2	9.8	12.9	-	-	-	-
Jan`12	262.0	11.3	14.8	-	-	-	-	228.0	3.3	12.2	-	-	-	-
Feb`12	256.3	7.0	18.1	-	BDL	BDL	BDL	230.8	3.2	12.5	-	BDL	19.3	BDL
Mar`12	226.0	9.2	13.1	-	-	-	-	194.0	6.9	11.8	-	-	-	-

Cachar Paper Mill has no source of emission of Benzene, Nickel, Ozone, Arsenic & BaP.

TABLE - III

HYDROGEN SULPHIDE DATA
Limit: 10 mg/Nm3
Monthly average values from Oct 2011 to March 2012

Source	Month	Hydrogen Sulphide mg/Nm3
Soda Recovery Stack	October`11	9.1
--do --	November' 11	8.6
--do--	December `11	6.3
--do--	January`12	3.7
--do--	February`12	4.2
--do--	March`12	6.4

TABLE - IV
TREATED EFFLUENT QUALITY DATA
Limit: SS 100 mg/l, COD 350 mg/l, BOD 30 mg/l
Monthly average values from Oct 2011 to March 2012

Month	SS mg/l	COD mg/l	BOD mg/l
October`11	94	334	26
November' 11	94	334	26
December `11	91	332	27
January`12	92	334	28
February`12	94	332	28
March`12	94	334	29

TABLE-V
GROUND WATER QUALITY DATA
Monthly average values from Oct 2011 to March 2012

Parameter Months	LOCATION OF SAMPLING POINT			
	Well opposite to Adm. Building		Well near Railway station	
	P^H	Mercury	P^H	Mercury
October`11	7.8	BDL	7.1	-
November' 11	7.3	BDL	7.5	BDL
December `11	7.3	BDL	7.3	BDL
January`12	7.3	BDL	7.2	BDL
February`12	7.3	BDL	7.2	BDL
March`12	7.3	BDL	7.1	BDL