

FRAME WORK OF MODEL ACTION PLAN FOR CRITICALLY POLLUTED INDUSTRIAL AREAS/CLUSTERS-SINGRAULI

1. INTRODUCTION:

- 1.1** Area details including brief history : Singrauli Area consists of the area pertaining to Uttar Pradesh and Madhya Pradesh. The part of Distt. Sonebhadra in Uttar Pradesh is covered under the Singrauli area. In District Sonebhadra the boundary of the area surrounded by Sakti Nagar, Rihand Nagar, Dudhichua, & Dala. and river sone makes the boundary of the area. Aerial extent of the area covers approximate 400 square kilometers. Singrauli area in U.P. Distt. is approximately 4328 square km.. Singrauli area is major power hub in the country. The availability of rich natural resources and raw material caters to the need of the Thermal Power Plants, Aluminium Industry, Chemical Industry, Mining Industries, Cement Plants & Stone Crushers established in Sonebhadra District in Singrauli Area. At present Approx. 12000 MW/day power is being generated by the Thermal Power Plants in Singrauli Area. Due to the industrialization of the area environmental problems have been reported since last two decades. CPCB after detail environmental status study identified it has critically polluted area in the year 1991 and Singrauli action plan was formulated in 1996 .Implementation of action plan is being revised from time to time.
- 1.2** Location : The area in the eastern part of Siddhi District in the state of MP and the adjoining southern part of Sonebhadra District in the state of Uttar Pradesh is collectively known as Singrauli. Singrauli is emerging as India's Energy Capital, the place earlier known as Shringavali, named after the sage Shringi, was once upon a time covered with dense and un-navigable forests and inhabited by wild animals. The place was considered so treacherous that it was used by the Kings of Rewa State, who ruled the area till 1947, as an open air prison for detaining errant civilians and officers. Just two generations ago, small holders were tending their parcels of land here, and the original inhabitants were gathering honey and herbs in the forest. In the late fifties, a large scale dam banked up the water of the River Rihand. The dam known as Govind Vallabh Pant Sagar, was inaugurated by Pt. Jawahar Lal Nehru in 1962. Later, rich coal deposits spread over an area of 2200 km² in the state of M.P. (eastern part of Siddhi District) and U.P. (southern part of Sonebhadra District) were discovered close to the artificial lake that could be used to generate electricity.
- 1.3** Digitized Map with Demarcation of Geographical boundaries and Impact Zones : The map is attached as **Annexure-I**

1.4	CEPI Score (Air, Water, Land and Total)	:	1. Water CEPI – 64.00 2. Air CEPI - 70.50 3. Land CEPI - 59.50 4. Total CEPI - 81.73
1.5	Total population and sensitive receptors (hospitals, educational institutions, courts etc residing in the area comprising of geographical area of the cluster and its impact zone (minimum 2 Km.)	:	As of 2001 India census, Singrauli area of U.P. had a population of 657200. Males constitute 54% of the population and females 46%. Estimated floating population is about 20% of the total population and population of engaged in industrial activities is about 50,000.
1.6	Eco-geological features Impact Zones [the area comprising of geographical area of the cluster and its impact zone (minimum 2 Km)]	:	
1.6.1	Major Water Bodies (Rivers, Lakes, ponds, etc.)	:	1. Rihand Reservoir, 2. Sone River 3. Renu River 4. Rihand River 5. Kanhar River 6. Badal River 7. Bagga Nala 8. Murdhawa Nala 9. Dongia Nala 10. Balia Nala 11. Nagua Dam 12. Gaghar Dam 13. Chilka Lake Shaktinagar 14. Rasganda Water Falls 15. Kaanchan Dam 16. Obra Dam
1.6.2	Ecological parks, Sanctuaries, flora and fauna or any eco sensitive zones	:	1. Sone Eco point 2. Fossil Park 3. Dear Park
1.6.3	Buildings or Monuments of Historical/	:	<ul style="list-style-type: none"> Jwalamukhi Devi Temple Shaktinagar,

archaeological/religious importance

- Hanuman Mandir Jhingurdah,
- Tippa Jhariya Jhingurdah,
- Lake Park Vindharnagar,
- Rose Garden Jayant,
- Mada Caves(Prehistoric Rock Paintings)
- Nandankanan Rihandnagar
- Shiva Temple Rihandnagar
- Aanand Vatika,Rihandnagar
- Vaishno Devi Temple, Dala
- Birla Temple, Renukoot
- Radha Krishna Temple, Renukoot
- Vijagarh Fort
- Shivdwar Temple

1.7 Industry classification and distribution (no. of industries per 10 Sq. Km. area of fraction)

- | | | | |
|--------------|---|---|------------------------------------|
| 1.7.1 | Highly Polluting industries (17 categories) | : | Annexed as annexure No. II |
| 1.7.2 | Red category industries (54 categories) | : | Annexed as annexure No. III |
| 1.7.3 | Orange and Green category industries | : | Annexed as annexure No. IV |
| 1.7.4 | Grossly Polluting industries | : | Annexed as annexure No. V |

2. WATER ENVIRONMENT:

2.1 Present status of water environment supported with minimum one year analytical data :

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|--------------|---|---|--|
| 2.1.1 | Water bodies/effluent receiving drains in the area important for water quality monitoring | : | 1. Analysis results of Sone
2. Analysis results of Rihand Reservoir
3. Analysis results of Dongia Nala
4. Analysis results of Murdhawa Nala-
5. Analysis results of Ballia Nala
Annexed as annexure No. VI |
|--------------|---|---|--|

2.1.2	Present levels of pollutants in water bodies/effluent receiving drains/ground water (routine parameters, special parameters and water toxics relevant to the area in three categories- known carcinogens, probable carcinogens and other toxics)	:	Analysis results already enclosed as per Point. No. 2.1.1
2.1.3	Predominant sources contributing to various pollutants	:	Industrial effluent, domestic effluent of Singrauli Area in UP & MP and agricultural run-off of U.P. & M.P.
2.2	Sources of water pollution	:	
2.2.1	Industrial	:	Details enclosed as Point No. 1.7
2.2.2	Domestic	:	Domestic effluent of Singrauli Area in U.P. appro. 4000KLD
2.2.3	Others (Agricultural runoff, leachate from MSW dump, illegal dump site etc.)	:	Agricultural run off, leachate of M.S.W. dump & illegal dump.
2.2.4	Impact on surrounding area (outside the CEPI Area) on the water courses/drainage system of the area under consideration	:	Impact on Wild Life, Forest, Agriculture and nearby population.
2.3	Details of Water Polluting Industries in the area/cluster	:	Details enclosed as per Point No. 1.7
2.4	Effluent Disposal Methods-Recipient water bodies etc.	:	Industrial effluent is disposed off after proper treatment into nearby drains.
2.5	Quantification of wastewater pollution load and relative contribution by different sources viz industrial/domestic	:	<ol style="list-style-type: none"> 1. Total Industrial effluent load, 2. Local bodies domestic effluent load.
2.6	Action Plan for compliance and control of pollution	:	
2.6.1	Existing infrastructure facilities- water quality monitoring network, ETPs, CETPs, Sewerage Treatment Plant of industry (STPs), surface drainage system, effluent conveyance channels/outfalls etc.	:	Available.

2.6.2	Pollution control measures installed by Industries	:	Details of ETP of each Industry enclosed as per Point No. 1.
2.6.3	Technological Intervention	:	
2.6.3.1	Inventorisation of prominent industries with technological gaps	:	Done & renovation and modernization is in progress in M/S Kanoria Chemicals & Industries Ltd. & HINDALCO Industries Ltd., Renukoot, Sonebhadra.
2.6.3.2	Identification of low cost and advanced cleaner technology for pollution control	:	As per CPCB & MoEF recommendation.
2.6.4	Infrastructure Renewal	:	
2.6.4.1	Details of existing infrastructural facilities	:	Roads, Electricity, Drinking Water, Hospitals, Educational Institutes, Police Security.
2.6.4.2	Need of up gradation of existing facilities	:	Roads – Roads are in very poor conditions and needs to be repaired/constructed by UP PWD outside the industrial premises. Electricity – Shortage of power Drinking water – Scarcity of water due to the drought situation since last 5 years, polluted surface and underground water needs to take steps for supply of drinking water by the State Govt. Health - Needs to strengthen the health facilities by the State Govt. Police Security – Strengthening of Police as the area is covered under Nexal Belt.
2.6.4.3	De-silting of water tanks, drains, rivulets, etc.	:	Needed
2.6.4.4	Construction of lined drains/connections	:	Needed
2.6.4.5	Treatment and management of contaminated surface water bodies	:	River Sone, River Renu, Rihand Reservoir & other drains and nalas.

2.6.4.6	Rejuvenation/Management Plan for important eco-geological features	:	Needed
2.6.4.7	Carrying of effluent from industrial units located in non-industrial locations to CETP facilities by lined drains/ pipelines only and prevention of their disposal into city sewerage/surface drains.	:	Not applicable.
2.6.4.8	Installation of Gen sets at CETPs	:	Not applicable.
2.6.5	Managerial and Financial aspects	:	
2.6.5.1	Cost and time estimates	:	To be done by concerned Authority/Agency.
2.6.5.2	Identified Private/Public sector potential investors & their contribution/obligation	:	N.A.
2.6.5.3	Government Budgetary support requirement	:	Yes
2.6.5.4	Hierarchical and structured managerial system for efficient implementation	:	Yes
2.6.6	Self monitoring system in industries (ETPs etc.)	:	Established.
2.6.7	Data linkages to SPCB/CPCB (OF MONITORING DEVICES)	:	Needs to be done.

3. **AIR ENVIRONMENT:**

3.1	Present status of Air environment supported with minimum one year analytical data	:	Status of Air environment in industries and ambient air Quality monitoring data of Anpara & Renusagar is being annexed as Annexure-VII & VIII respectively.
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3.1.1	Critical locations for air quality monitoring	:	Shaktinagar, Rihand Nagar, Anpara, Renusagar, Renukoot, Dalla & Obra.
3.1.2	Present levels of pollutants in air (routine parameters, special parameters and air toxics relevant to the area in three categories- known carcinogens, probable carcinogens and other toxic)	:	Annexed as at point no.3.1
3.1.3	Predominant sources contributing to various pollutants	:	Mining, Transport & Heavy Earth Movers & domestic fuel.
3.2	Sources of air Pollution viz industrial, domestic (Coal & Biomass burning), natural and Transport & Heavy Earth Movers	:	Industrial, domestic (Coal and Biomass burning), natural and Transport and Heavy Earth Movers.
3.3	Air Polluting Industries in the area/Cluster	:	Industrial status annexed on Point No. 3.1
3.4	Impact of activities of nearby area on the CEPI Area	:	Industries and local bodies of M.P.
3.5	Quantification of the air pollution load and relative contribution by different sources	:	Annexed as Annexure of Point No. 3.1
3.6	Action Plan for compliance and control of pollution	:	
3.6.1	Existing infrastructure facilities – Ambient air quality monitoring network	:	Available.
3.6.2	Pollution control measures installed by the individual sources of pollution	:	Pollution control measures installed by the industries is enclosed in the annexure at Point No. 3.1
3.6.3	Technological Intervention	:	As per CPCB & MoEF recommendations.
3.6.3.1	Inventorisation of prominent industries with technological gaps	:	Done & renovation and modernization is in progress in M/s Kanoria Chemicals & Industries Ltd. & HINDALCO Industries Ltd., Renukoot, Sonebhadra.

3.6.3.2	Identification of low cost and advanced cleaner technology for air pollution control	:	As per CPCB & MoEF recommendations.
3.6.3	Introduction and switch over to cleaner fuel	:	As per CPCB & MoEF recommendations.
3.6.4	Need of infrastructure Renovation	:	Needed for repairing/Construction of Roads, Drinking water, Power supply, Health facilities, LPG & Security.
3.6.4.1	Development of roads	:	Needed for repairing & construction of Roads.
3.6.5	Impact on CEPI score after installation/commissioning of full fledged air pollution control systems	:	CEPI score will decrease.
3.6.6	Managerial and Financial aspects- Cost and time estimates	:	
3.6.6.1	Cost and time estimates	:	To be done by concerned/Authorities/Agencies.
3.6.6.2	Identified Private/Public sector potential investors & their contribution/obligation	:	As per Govt. decision.
3.6.6.3	Government Budgetary support requirement	:	Needed.
3.6.6.4	Hierarchical and structured managerial system for efficient implementation	:	Needed.
3.6.7	Self monitoring system in industries (Stacks, APCDs)	:	Available in all Large scale Industries. Except Stone Crushing Units.

3.6.8 Data linkages to SPCB/CPCB (of monitoring devices) : In Progress.

4. **LAND ENVIRONMENT (Soil and Ground Water)** :

4.1 **Soil contamination:** :

4.1.1 Present status of land environment supported with minimum one year analytical data :

S.No.	Category of Land	Areas of Land (Ha.)
1.	Forest Area	237861
2.	Irrigated Area	2111
3.	Un-irrigated Area	58729
4.	Culturable Waste	57804
5.	Area not available for Agriculture	66658

4.1.2 Critical locations for land/soil pollution assessment and ground water monitoring : Govindpur, Myorepur, Kamaridar, Garbandha, Kusmha & Renukoot.

4.1.3 Present levels of pollutants in land/soil and ground water (routine parameters, special parameters and water toxics relevant to the area in three categories- known carcinogens, probable carcinogens and other toxics) : The analysis results of soil of different villages is annexed at **Annexure No. IX.**

4.1.4 Predominant sources contributing to or posing, danger of pollution of land and ground water such as hazardous/toxic wastes or chemical dumps/storage etc. : Municipal Solid Waste, Chemical Fertilizer and insecticides used by farmers.

4.1.5 Sources of Soil Contamination : Industrial Waste prior to enactment of Environmental Laws, Municipal Solid Waste, Chemical Fertilizer and insecticides used by farmers.

4.1.6	Types of existing pollution	:	Analysis results are enclosed at Annexure No. X.
4.1.7	Remedies for abatement, treatment and restoration of normal soil quality	:	Development of Municipal Solid Waste treatment and disposal facilities and to encourage the farmers for using Bio fertilizers.
4.2	<u>Ground Water contamination:</u>	:	
4.2.1	Present status/quality of ground water	:	Analysis results of ground water of different places are being annexed at Annexure No. XI.
4.2.2	Source Identification (Existing sources of Ground water Pollution)	:	Municipal Solid Waste, Chemical Fertilizer and insecticides used by farmers.
4.2.3	Ground water quality monitoring program	:	Quarterly samples of ground water of Govindpur, Myorepur, Kamaridar, Garbandha, Kusmha & Renukoot.
4.2.4	Action Plan for control of pollution including cost/time aspects	:	As per CPCB & MoEF recommendations.
4.2.5	Treatment and management of contaminated ground water bodies, etc.	:	As per CPCB & MoEF recommendations.
4.2.6	Impact on CEPI score after abatement of pollution	:	CEPI score will decrease.
4.3	<u>Solid waste Generation and management:</u>	:	
4.3.1	Waste classification and Quantification		
4.3.1.1	Hazardous waste	:	6514.447 TPA
4.3.1.2	Bio-medical waste	:	Approx. 1860 Kg/day.
4.3.1.3	Electronic Waste	:	None

4.3.1.4	Municipal solid Waste/Domestic Waste/ Sludges from ETPs/ CETPS/ STPs and other industrial sources	:	
4.3.1.5	Plastic waste	:	Approx. 300 Kg/day.
4.3.1.6	Quantification of wastes and relative contribution from different sources	:	Stated as in Point No. 4.3
4.3.2	Identification of waste minimization and waste exchange options	:	Plastic waste may be used in construction of Roads and in Cement manufacturing industry as fuel.
4.3.3	Reduction/Reuse/Recovery/Recycle options in the co-processing of wastes.	:	Stated as Point No. 4.3.2
4.3.4	Infrastructure facilities	:	Hazardous waste of industries is being disposed at TSDF,Kanpur. It is required to install Common Bio-Medical Waste Treatment Facility and Municipal Waste treatment & disposal facilities in local bodies.
4.3.4.1	Existing TSDF/Incineration facilities including capacities	:	Incineration facilities installed in NTPC of 100Kg/ hr. capacity.
4.3.4.2	Present status/performance and need of up gradation of existing facilities including enhancement of capacities	:	It is required to install Common Bio-Medical Waste Treatment Facility and Municipal Waste treatment & disposal facilities in local bodies.
4.3.4.3	Treatment and management of contaminated waste disposal sites, etc.	:	As per CPCB & MoEF recommendationS.
4.3.4.4	Impact on CEPI score after proper management of Solid Wastes.	:	CEPI score will decrease.

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| 5. | <u>PPP Model:</u> | : | |
| 5.1 | Identification of project proposals (for both the options i.e. technology intervention and infrastructure renewal) for implementation under the PPP mode under the Action Plan. | : | Required from concerned Authorities/Agencies. |
| 5.2 | Identification of stakeholders/agencies to be involved and to evolve financial and managerial mechanisms for implementation of PPP projects. | : | Required from concerned Authorities/Agencies. |
| 6. | <u>Other infrastructural Renewal measures:</u> | : | |
| 6.1 | Green Belts | : | Strengthening & development of green belt & forestry. |
| 6.2 | Development of Industrial Estate(s) | : | Yes, Bijpur, Dalla, Obra area. |
| 6.3 | Development/shifting of industries located in the non-industrial areas to the existing/new industrial estates. | : | Yes, |
| 7. | <u>Specific Schemes:</u> | : | |
| 7.1 | GIS-GPS system for pollution sources monitoring | : | Required. |
| 7.2 | Hydro-geological fracturing for water bodies rejuvenation | : | Required. |
| 7.3 | In-situ remediation of sewage | : | Required. |
| 7.4 | Utilization of MSW inert by gas based brick kilns | : | Required. |
| 7.5 | Co-processing of wastes in cement industries | : | Required. |
| 8. | Public awareness and training Programmes | : | Being done by different NGOs & related Departments. |
| 9. | Overall Impact of installation/commissioning of pollution control equipments/measure on the CEPI score | : | CEPI score will decrease. |

10. **Assessment of Techno-economical feasibility of pollution control systems in clusters of small/ medium scale industries.** : Required for Stone Crushing Units.
11. **Efforts shall be made to encourage use of Bio-compost and Bio-Fertilizer alongwith the chemical fertilizer in the state to minimize the unutilized chemical fertilizer run-off into the natural water resources from agriculture fields (through Govt. policy)** : Required.
12. **Summary of proposed action points:** :
- 12.1 Short Term Action Points (upto 1 year, including continuous Activities) : Annexed as **Annexure No. XII.**

S.No.	Action Points (including source & mitigation measures)	Responsible Stake Holders	Time limit	Cost	Remarks

- 12.2 Long Term Action points (more than 1 year) : Annexed as **Annexure No. XIII.**

S.No.	Action Points (including source & mitigation measures)	Responsible Stake Holders	Time limit	Cost	Remarks

PROPOSED AREA OF SINGARAULI ACTION PLAN Distt.-Sonebhadra (U.P.)



STATUS OF 17 CATEGORIES

Sl. No.	Name of Industries with complete Address	17 Category type	Sector whether CU/SU/PU/CP	Pollution Control System		Pollution Control Status			ISO 14001 Certification (Yes/No)
				ETP Unit	Emission Control System	ETP Status	ECU Status	Hazardous Waste Management provision	
1	2	3	4	5	6	7	8	9	10
1.	NTPC, Shaktinagar, Sonebhadra	Thermal Power 2000 MW, 2x500 MW 5X200 MW	CU	Ash Slurry discharges into dyke and finally after proper settling discharges into Rihand Dam. For coal handling plant effluent treatment plant is installed and also STP installed for domestic waste water treatment.	With each units ESP is installed and emissions are as per board norms.	OPRS	OPRS	ADQ	YES
2.	NTPC, Rihand Nagar, Sonebhadra	Power Generation- 2x500 MW 2x500 MW	CU	Ash Slurry after proper treatment through ashdyke, total effluent is being recycled into plant for different purposes. Industry has septic Tank/Oxidation Pond for domestic wastewater treatment. For coal handling plant effluent passes through settling pond. Only in case of flood effluent may be discharged into Rihand reservoir.	With each units ESP is installed and emission are being emit as per board norms.	OPRS	OPRS	ADQ	YES
3.	Anpara Thermal Power Station Unit-A, Anpara, Sonebhadra	Power Generation- 3x210 MW	SU	Ash slurry effluent discharge into ash dyke after proper settling finally goes into Rihand reservoir. Industry has installed sewage treatment plant for domestic wastewater.	With each units ESP is installed and due to less capacity emission are not being as per board norms.	OPRS	OPRNS	ADQ	NO

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1	2	3	4	5	6	7	8	9	10
4.	Anpara Thermal Power Station Unit-B , Anpara, Sonebhadra	Thermal Power 2x500 MW	SU	Ash slurry discharges into dykes after proper settling finally goes into Rihand reservoir. Effluents are not being treated as per board norms	With each units ESP is installed and due to less capacity emission are not being as per board norms.	OPRS	OPRNS	ADQ	NO
5.	Obra Thermal Power Station Unit-A , Obra, Sonebhadra	Thermal Power 5x50 MW 3x100 MW	SU	Ash slurry discharges into dykes. Domestic effluent are being treated in septic tank. Effluents are not being treated as per board norms.	In 3x100MW unit mechanical precipitator and ESP are being installed and wit 5x50 MW unit mechanical dust collectors are being installed. Emissions are much more as compare with board norms.	OPRNS	OPRNS	ADQ	NO
6.	Obra Thermal Power Station Unit-B , Obra, Sonebhadra	Thermal Power 5x200 MW	SU	Ash slurry discharges into dykes and rest quantity is being passed by Jhariya Nala Domestic effluent is being treated in septic tank. Effluents are not being treated as per board norms.	In all units less capacity ESP's are being installed which are failed to work as board norms.	OPRNS	OPRNS	ADQ	NO
7.	M/s. Dalla Cement Factory. (A Unit of Jai Prakash Associates) Dalla, Sonebhadra	Cement Clinker- 66000MT/M PPC- 30000MT/M	PU	Only domestic Septic Tanks Soak Pit – STP -Proposed.	ESP – Kiln ESP – Coller Bag Filters - Coal Mill & Transfer Point	OPRS	OPRS	ADQ	Not received

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1	2	3	4	5	6	7	8	9	10
8.	M/s. Churk Cement Factory, Churk, Sonebhadra.	Cement	PU	-----Not operational-----					
9.	Hindalco Industries Ltd. (Renusagar Power Division) Renusagar.	Thermal Power (Captive) 750MW.	PU	Ash slurry effluent discharged into ash dykes and finally after proper treatment total effluent is being reused in industrial process. Effluent generated from floor washing after neutralizing kept in pit and then finally by pip into ash dyke. Industry has STP for domestic wastewater treatment.	With each units ESP is installed and emission are being emit as per board norms.	OPRS	OPRS	ADQ	YES
10.	Hindalco Industries Ltd. Renukoot, Sonebhadra	Aluminium metal	PU	ETP & STP both has been upgraded and treated effluent is recycled back for process use and etc. Industrial effluent treated by collection pit, neutralization tank, HRSCC, Centrifuge and sludge drying bed. Domestic effluent is being treated by Fluidised Aerobic Bio-reactor.	Air pollution control unit consist ESP, DSS, FTP, Computerized Oil Firing system and emission are as per well below PCB norms.	OPRS	OPRS	ADQ	YES
11.	Kanoria Chemicals & Industries Ltd. Renukoot, Sonebhadra.	Chemical Industry	PU	Treatment unit for Industrial effluent. Mercury effluent is being totally recycled. Effluent is being treated as per PCB norms. Domestic effluent treated by septic tank/Soak pit.	Proper system for air pollution control unit. Chlorine neutralization plant, hypo plant and fume scrubber are there. MCDC & Bag Filter are installed in Boiler.	OPRS	OPRS	ADQ	YES

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1	2	3	4	5	6	7	8	9	10
12.	Kanoria Chemicals (Power Generation Unit) Renukoot, Sonebhadra.	Thermal Power (Captive) 2x25MW	PU	Dry as disposal for brick manufacturing.	ESP & Bag filter	OPRS	OPRS	ADQ	YES
13.	Hitech Carbon RenuKoot, Sonebhadra	Carbon Black 170 T/Y	PU	Industrial effluent treated by primary treatment pit oil skimmer, oil separator imhoff clarifier settling tank pH adjustment tank Sludge drying bed. Domestic effluent is being treated by septic tank/soak pit tank.	Plume consist Bag filter purge bag filter. Emission are being emit as per board norms.	OPRS	OPRS	ADQ	YES

Remarks:

- 1. CU - Central Unit.
- 2. SU - State Unit.
- 3. PU - Private Unit.
- 4. OPRS - Operational & achieving standards.
- 5. OPRNS - Operational but not achieving standards.
- 6. ADQ - Adequate.

Annexure- III**STATUS OF 45 CATEGORY OF POLLUTING INDUSTRIES:****REGIONAL OFFICE – SONEBHADRA****DISTRICT: SONBHADRA**

SL. NO.	NAME & ADDRESS	DISTRICT	PRODUCT	OPR/ CLOSED	IND. CAT.	45 CAT. NAME	ETP STATUS	APCS STATUS
1	2	3	4	5	6	7	8	9
1.	Anpara Thermal power Station U-I, Anpara.	Sonebhadra	Electricity	OPR	Large	Thermal Power	Installed	Installed OPRNS
2.	Anpara Thermal power Station U-II, Anpara.	Sonebhadra	Electricity	OPR	Large	Thermal Power	Installed	Installed OPRNS
3.	Hindalco Industries Ltd. Renukoot.	Sonebhadra	Ingots	OPR	Large	Aluminum	Installed	Installed
4.	Hindalco Industries Ltd. Power Divn. Renusagar.	Sonebhadra	Electricity	OPR	Large	Thermal Power	Installed	Installed
5.	Jai Beer Cement Markundi.	Sonebhadra	Cement bagging	----- Industry Closed -----				
6.	Kanoria Chemical & Ind. (Power Div). Renukoot.	Sonebhadra	Electricity	OPR	Large	Thermal Power	Installed	Installed
7.	Kanoria Chemical & Ind. Ltd. Renukoot.	Sonebhadra	Caustic Soda	OPR	Large	Caustic Soda	Installed	Installed
8.	Kanoria Chemical Ind. Ltd. (Alumn Ch.), Renukoot.	Sonebhadra	Aluminium Chloride	OPR	Large	Aluminium Chloride	Installed	Installed
9.	N.T.P.C. Rihand Nagar.	Sonebhadra	Electricity	OPR	Large	Thermal Power	Installed	Installed
10.	N.T.P.C. Shakti- Nagar.	Sonebhadra	Electricity	OPR	Large	Thermal Power	Installed	Installed
11.	Northern Coal Field Ltd. Dudhichuwa.	Sonebhadra	Open cost Min.	OPR	Large	Mines	Installed	Installed
12.	Northern Coal Field Ltd. Beena Unit.	Sonebhadra	Open cost Min.	OPR	Large	Mines	Installed	Installed

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1	2	3	4	5	6	7	8	9
13.	Northern Coal Field Ltd. Kakari Unit.	Sonebhadra	Open cost Min.	OPR	Large	Mines	Installed	Installed.
14.	Northern Coal Field Ltd. Khadia Unit.	Sonebhadra	Open cost Min.	OPR	Large	Mines	Installed	Installed
15.	Obra Thermal Power Station U-I, Obra.	Sonebhadra	Electricity	OPR	Large	Thermal Power	Not Installed	Partial Installed
16.	Obra Thermal Power Station U-II, Obra.	Sonebhadra	Electricity	OPR	Large	Thermal Power	Not Installed	Partial Installed
17.	Orient Micro Abresives Ltd. Renukoot.	Sonebhadra	CPW	OPR	Small	C P W	Installed	Installed
18.	Prajapati Chemical Industries Ltd. Renukoot.	Sonebhadra	CPW	OPR	Small	C P W	Installed	Installed
19.	M/s. Dalla Cement Factory, (A Unit of Jai Prakash Associates) Dalla, Sonebhadra.	Sonebhadra	Clinker	OPR	Large	Cement	Installed	Installed at present capacity.
20.	M/s. Dala Cement Factory (A Unit of Jai Prakash Associates) Kajarahat (Dala), Bhalua, Julgul & Padarach Mines.	Sonebhadra	Lime Stone Mining	OPR	Large	Lime Stone Mining	Installed	Installed
21.	Hi-Tech Carbon, Renukoot, Sonebhadra.	Sonebhadra	Carbon Black	OPR	Large	Chemical	Installed	Installed

Annexure No IV

क्षेत्रीय कार्यालय: उ०प्र० प्रदूषण नियंत्रण बोर्ड, सोनभद्र में स्थित स्टोन क्रशर्स में वायु प्रदूषण नियंत्रण का विवरण:

जनपद-सोनभद्र

क्र० सं०	स्टोन क्रशर का नाम एवं पता	जिला उद्योग केन्द्र/व्यापार कर/ख. ग. बोर्ड के पंजियन प्रमाण-पत्र के अनुसार उत्पादन प्रारम्भ करने का वर्ष	जिला उद्योग केन्द्र का पंजियन संख्या	वायु प्रदूषण नियंत्रण व्यवस्था	अनुपालन स्थिति		टिप्पणी
					अनुपालन	अनुपालन नहीं	
1	2	3	4	5	6	7	8
1.	मे० शशांक स्टोन वर्क्स, बिल्ली, ओबरा, सोनभद्र	1999	09070120992	स्थापित	Complying	--	
2.	मे० माँ दुर्गा इण्डस्ट्रीज, बिल्ली, लंगडा मोड़, मारकुण्डी, सोनभद्र	1999	0070409	स्थापित	Complying	--	
3.	मे० प्रवीन स्टोन वर्क्स, दारी-डाला, सोनभद्र	1994	203801774	स्थापित	Complying	--	
4.	मे० बलिया सीता स्टोन प्रोडक्ट, बिल्ली, ओबरा, सोनभद्र	1998	090701201051	स्थापित	Complying	--	
5.	मे० अंकिता इण्टरप्राइजेज, रासपहाड़ी रोड, बग्गा नाला बिल्ली	1999	09070120788	स्थापित	Complying	--	कारण बताओ नोटिस जारी
6.	मे० महामाया स्टोन क्रसिंग के डाला कोठा, सोनभद्र	1999	09070120924	स्थापित	Complying	--	
7.	मे० तेज स्टोन वर्क्स, यूनिट-2, बिल्ली-मारकुण्डी, सोनभद्र	1999	09070120990	स्थापित	Complying	--	
8.	मे० आराधना स्टोन क्रसिंग क०, वर्दिया, चोपन, सोनभद्र	1999	09070121033	स्थापित	Complying	--	
9.	मे० कमला स्टोन वर्क्स, वर्दिया, चोपन, सोनभद्र	1999	09070121034	स्थापित	Complying	--	
10.	मे० न्यू महावीर स्टोन क्रसिंग क०, बिल्ली-मारकुण्डी, सोनभद्र	1997	09070120932	स्थापित	Complying	--	
11.	मे० शंकर स्टोन प्रोडक्ट, डाला, सोनभद्र	1984	203801700	स्थापित	Complying	--	
12.	मे० कैंगूर स्टोन वर्क्स, बिल्ली-मारकुण्डी, सोनभद्र	1999	09615200857	स्थापित	Complying	--	
13.	मे० रासपहाड़ी क्रशर स्टोन, बिल्ली-ओबरा, सोनभद्र	1999	09215106239	स्थापित	Complying	--	

14.	मे० वैभव स्टोन प्रोडक्ट बिल्ली-ओबरा, सोनभद्र	1997	09070120993	स्थापित	Complying	--	
15.	मे० माँ शीतला इण्डस्ट्रीज, बिल्ली-मारकुण्डी, सोनभद्र	1999	09115106348	स्थापित	Complying	--	
16.	मे० जय माँ शीतला देवी इण्डस्ट्रीज, बिल्ली-मारकुण्डी, सोनभद्र	1999	09070121010	स्थापित	Complying	--	
17.	मे० माँ शेरवाली स्टोन, बिल्ली-मारकुण्डी, सोनभद्र	1999	--	स्थापित	Complying	--	
18.	मे० तुषार स्टोन प्रोडक्ट, लंगड़ा मोड़, डाला, सोनभद्र	1999	09070120995	स्थापित	Complying	--	
19.	मे० आर०सी०एम० स्टोन वर्क्स, बिल्ली-ओबरा, सोनभद्र	1999	09315706093	स्थापित	Complying	--	
20.	मे० शिवा कन्स्ट्रक्शन, बिल्ली-मारकुण्डी, सोनभद्र	1997	090701201001	स्थापित	Complying	--	कारण बताओ नोटिस जारी
21.	मे० बलिया इण्टरप्राइजेज, डाला, जनपद-सोनभद्र	1999	090701201050	स्थापित	Complying	--	
22.	मे० फौजदार सिंह स्टोन वर्क्स, बिल्ली-मारकुण्डी, सोनभद्र	1983	203801596	स्थापित	Complying	--	
23.	मे० साई स्टोन प्रोडक्ट, डाला, बिल्ली-सोनभद्र	1993	09115703581	स्थापित	Complying	--	
24.	मे० आदर्श स्टोन प्रोडक्ट, बिल्ली-मारकुण्डी, सोनभद्र	1999	09070120959	स्थापित	Complying	--	
25.	मे० वैष्णो एसोसिएट्स, बिल्ली-मारकुण्डी, सोनभद्र	1995	09070120980	स्थापित	Complying	--	
26.	मे० ओम स्टोन क्रसिंग कं०, पटेल नगर, डाला, सोनभद्र	1995	0049349	स्थापित	Complying	--	
27.	मे० रुद्राक्ष स्टोन प्रोडक्ट, बिल्ली-मारकुण्डी, सोनभद्र	1991	0039021	स्थापित	Complying	--	
28.	मे० वैभव स्टोन ट्रेडर्स, डाला, सोनभद्र	1997	09070120993	स्थापित	Complying	--	
29.	मे० भारत स्टोन क्रसिंग कं०, बिल्ली-ओबरा, सोनभद्र	1999	0077324	स्थापित	Complying	--	सहमति क्षेत्रका० इलाहाबाद द्वारा जारी
30.	मे० बी० अग्रवाल स्टोन प्रोडक्ट्स, यूनिट-4, बिल्ली-मारकुण्डी, सोनभद्र	1999	09070120977	स्थापित	Complying	--	
31.	मे० बी० अग्रवाल स्टोन प्रोडक्ट्स, यूनिट-1, बिल्ली-सोनभद्र	1999	09215100040	स्थापित	Complying	--	
32.	मे० बी० अग्रवाल स्टोन प्रोडक्ट्स, यूनिट-3, बिल्ली-मारकुण्डी, सोनभद्र	1992	--	स्थापित	Complying	--	1992 में एन.ओ.सी जारी
33.	मे० बी० अग्रवाल स्टोन प्रोडक्ट्स, यूनिट-2, बिल्ली-मारकुण्डी, सोनभद्र	1990	--	स्थापित	Complying	--	1990 में एन.ओ.सी जारी
34.	मे० जे०के० स्टोन वर्क्स, बिल्ली-मारकुण्डी, सोनभद्र	11.02.00	0065759	स्थापित	Complying	--	
35.	मे० सिंह स्टोन इण्डस्ट्रीज, वारी-डाला, सोनभद्र	1996	206701492	स्थापित	Complying	--	
36.	मे० माँ थावे देवी स्टोन प्रोडक्ट, बिल्ली-ओबरा, सोनभद्र	1999	09070120971	स्थापित	Complying	--	
37.	मे० ओम स्टोन क्रसिंग कं०, पटेल नगर, डाला, सोनभद्र	1999	090701201003	स्थापित	Complying	--	

38.	मे० शीला इण्टरप्राइजेज, बिल्ली-मारकुण्डी, ओबरा, सोनभद्र	1991	0040973	स्थापित	Complying	--	
39.	मे० जय माँ अम्बे इण्टरप्राइजेज, बिल्ली-ओबरा, सोनभद्र	1999	09070120933	स्थापित	Complying	--	
40.	मे० कामधेनु इण्टरप्राइजेज, बारी-डाला, सोनभद्र	1999	09070120889	स्थापित	Complying	--	
41.	मे० रमेश स्टोन प्रोडक्ट, बिल्ली-ओबरा, सोनभद्र	1990	20620308	स्थापित	Complying	--	
42.	मे० माँ स्टोन प्रोडक्ट, बिल्ली-ओबरा, सोनभद्र	1999	09070120973	स्थापित	Complying	--	
43.	मे० शुभम स्टोन कं०, बिल्ली-मारकुण्डी, सोनभद्र	1998	0941520099	स्थापित	Complying	--	
44.	मे० माँ सरस्वती स्टोन प्रोडक्ट, बिल्ली-मारकुण्डी, सोनभद्र	1982	203801559	स्थापित	Complying	--	
45.	मे० माँ मैहर देवी इण्डस्ट्रीज, यूनिट-2, बिल्ली-ओबरा, सोनभद्र	1995	0108673	स्थापित	Complying	--	
46.	मे० जय निर्मल बाबा इण्डस्ट्रीज, बिल्ली-ओबरा, सोनभद्र	1995	0284943	स्थापित	Complying	--	
47.	मे० गणपति एसोसिएट्स, बिल्ली-ओबरा, सोनभद्र	1996	09070120981	स्थापित	Complying	--	
48.	मे० वैष्णो स्टोन प्रोडक्ट, सुकृत, सोनभद्र	1999	09070110015	स्थापित	Complying	--	
49.	मे० आदर्श स्टोन वर्क्स, बिल्ली, सोनभद्र	1999	000001423	स्थापित	Complying	--	
50.	मे० माँ वैष्णो स्टोन वर्क्स, रासपहाड़ी, बिल्ली, सोनभद्र	1999	09115701049	स्थापित	Complying	--	
51.	मे० सत्यम स्टोन वर्क्स, बिल्ली, ओबरा, सोनभद्र	मई, 2000	09815103115	स्थापित	Complying	--	
52.	मे० महामाया स्टोन, बिल्ली-मारकुण्डी, सोनभद्र	1999	--	स्थापित	Complying	--	
53.	मे० श्री बालेश्वर जी स्टोन प्रोडक्ट, बिल्ली-मारकुण्डी, सोनभद्र	1999	--	स्थापित	Complying	--	
54.	मे० राज लक्ष्मी स्टोन प्रोडक्ट, बिल्ली, ओबरा, सोनभद्र	1996	09415702641	स्थापित	Complying	--	
55.	मे० ओम स्टोन क्रसिंग कं०, रासपहाड़ी, बिल्ली-मारकुण्डी, सोनभद्र	1999	09815706175	स्थापित	Complying	--	
56.	मे० शिवम स्टोन क्रसिंग कं०, बिल्ली, ओबरा, सोनभद्र	1997	0057662	स्थापित	Complying	--	
57.	मे० प्रकाश स्टोन क्रसिंग कं०, बारी, डाला, सोनभद्र	1987	0030138	स्थापित	Complying	--	
58.	मे० आरती स्टोन वर्क्स, बिल्ली, डाला, सोनभद्र	1982	203601336	स्थापित	Complying	--	
59.	मे० प्रताप स्टोन वर्क्स, बारी, डाला, सोनभद्र	1999	0088155	स्थापित	Complying	--	
60.	मे० पाण्डेय इण्टरप्राइजेज, सिन्दुरिया, चोपन, सोनभद्र	1992	206200669	स्थापित	Complying	--	
61.	मे० वर्दिया स्टोन प्रोडक्ट, वर्दिया, चोपन, सोनभद्र	1999	09070121031	स्थापित	Complying	--	
62.	मे० पंचतंत्र स्टोन प्रोडक्ट, बिल्ली-मारकुण्डी, सोनभद्र	1999	09615706115	स्थापित	Complying	--	
63.	मे० राजहंस इण्टरप्राइजेज, डाला, सोनभद्र	1997	09615700461	स्थापित	Complying	--	

64.	मे0 नारायण इण्टरप्राइजेज, बिल्ली-मारकुण्डी, सोनभद्र	1999	09070120987	स्थापित	Complying	--	
65.	मे0 राम नारायण सिंह, बारी-डाला, सोनभद्र	1995	206201441	स्थापित	Complying	--	
66.	मे0 अमरेंद्र बहादुर सिंह, वरदिया, चोपन, सोनभद्र	1999	09215200958	स्थापित	Complying	--	
67.	मे0 शारदा लक्ष्मी स्टोन प्रोडक्ट, बिल्ली-मारकुण्डी, सोनभद्र	1987	09070120918	स्थापित	Complying	--	
68.	मे0 पटेल स्टोन वर्क्स, डाला, सोनभद्र	1996	09215200360	स्थापित	Complying	--	
69.	मे0 विन्ध्यवासिनी स्टोन वर्क्स, बिल्ली, डाला, सोनभद्र	1983	203801880	स्थापित	Complying	--	
70.	मे0 विनोद स्टोन प्रोडक्ट्स, बारी-डाला, सोनभद्र	1982	000001528	स्थापित	Complying	--	
71.	मे0 अगोरी ग्रामोद्योग विकास संस्थान, बिल्ली-मारकुण्डी, सोनभद्र	2000	426	स्थापित नहीं है।	--	Not Complying	नोटिस जारी
72.	मे0 साक्षी ग्रामोद्योग विकास संस्थान, प्रीतिनगर, चोपन, सोनभद्र	1997	299	स्थापित नहीं है।	Complying	--	
73.	मे0 माँ सिद्धेश्वरी सेवा समिति, बिल्ली-ओबरा, सोनभद्र	1981	0019067	स्थापित	Complying	--	
74.	मे0 विन्ध्य स्टोन प्रोडक्ट, बिल्ली-ओबरा, सोनभद्र	1999	--	स्थापित	Complying	--	
75.	मे0 जय माँ वैष्णो स्टोन प्रोडक्ट, बिल्ली-ओबरा, सोनभद्र	1999	09070120972	स्थापित	Complying	--	
76.	मे0 माँ विन्ध्यवासिनी इण्टरप्राइजेज, बिल्ली-मारकुण्डी, सोनभद्र	1999	09070120931	स्थापित	Complying	--	
77.	मे0 माँ वैष्णो इण्टरप्राइजेज, बारी-डाला, सोनभद्र	1999	09115201303	स्थापित	Complying	--	
78.	मे0 कामाख्या इण्टरप्राइजेज, चोपन, सोनभद्र	1999	09415105894	स्थापित	Complying	--	
79.	मे0 आर0एस0 इण्टरप्राइजेज, पटेल नगर, डाला, सोनभद्र	1999	--	Partial	--	Not Complying	2008 तक सहमति जारी। नोटिस जारी
80.	मे0 बाबा सेवा समिति, सुकृत, सोनभद्र	2000	376	स्थापित नहीं है।	--	Not Complying	नोटिस जारी
81.	मे0 मिश्रा स्टोन क्रसिंग कं0, बिल्ली, सोनभद्र	1991	--	Partial	--	Not Complying	2007 तक सहमति जारी। नोटिस जारी
82.	मे0 अग्रवाल स्टोन, बिल्ली, ओबरा, सोनभद्र	1981	--	स्थापित	Complying	--	
83.	मे0 सुनील कुमार सिंह, बिल्ली-मारकुण्डी, सोनभद्र	1999	09115201666	स्थापित	Complying	--	
84.	मे0 राजा स्टोन प्रोडक्ट, बिल्ली-मारकुण्डी, सोनभद्र	1999	09115706334	स्थापित	Complying	--	
85.	मे0 सिद्धि विनायक स्टोन वर्क्स, बिल्ली-मारकुण्डी, सोनभद्र	1996	09415700496	स्थापित	Complying	--	
86.	मे0 माँ मैहर देवी इण्डस्ट्री, बिल्ली-ओबरा, सोनभद्र	1984	2342	स्थापित	Complying	--	

87.	मे0 विवेक स्टोन चिप्स कारपोरेशन, बिल्ली-मारकुण्डी, सोनभद्र	1978	1527	Partial	Complying	--	
88.	मे0 विन्ध्य स्टोन क्रसिंग कं0, बिल्ली-मारकुण्डी, सोनभद्र	1994	206200372	स्थापित	Complying	--	
89.	मे0 शिव स्टोन क्रसिंग कं0, बारी-डाला, सोनभद्र	1996	0054808	स्थापित	Complying	--	
90.	मे0 साम्भवी स्टोन वर्क्स, लंगडा मोड़, बिल्ली-बारी, डाला, सोनभद्र	1995	--	स्थापित	Complying	--	
91.	मे0 जय श्रीकृष्णा स्टोन, बिल्ली-ओबरा, सोनभद्र	10.05.00	090701201000	स्थापित	Complying	--	
92.	मे0 माँ जगदम्बा इण्डस्ट्रीज, बिल्ली-डाला, सोनभद्र	1999	09915705528	स्थापित	Complying	--	
93.	मे0 आर0कं0 इण्टरप्राइजेज, बिल्ली-मारकुण्डी, ओबरा, सोनभद्र	1995	09715200277	स्थापित	Complying	--	
94.	मे0 मुन्नी लाल एण्ड कं0, बिल्ली-मारकुण्डी, सोनभद्र	1990	09070120884	स्थापित	Complying	--	
95.	मे0 राधेश्याम इण्टरप्राइजेज, डाला कोठा, सोनभद्र	1998	09070110845	स्थापित	Complying	--	
96.	मे0 सुशील ग्रिट्स कारपोरेशन, बारी-डाला, सोनभद्र	1996	--	स्थापित	Complying	--	
97.	मे0 लक्ष्मी स्टोन वर्क्स, बिल्ली-मारकुण्डी, रासपहाडी, सोनभद्र	1994	203801709	स्थापित	Complying	--	
98.	मे0 जय माँ चित्तपूर्ण स्टोन वर्क्स, बिल्ली-ओबरा, सोनभद्र	1999	09115701049	स्थापित	Complying	--	
99.	मे0 आर0कं0 इण्डस्ट्रीज, बिल्ली-मारकुण्डी, सोनभद्र	1999	09070120929	स्थापित	Complying	--	
100	मे0 मनोज स्टोन क्रसिंग कं0, बारी-डाला, सोनभद्र	1995	--	स्थापित	Complying	--	
101	मे0 मौर्या स्टोन वर्क्स, बिल्ली-मारकुण्डी, सोनभद्र	1984	0034194	स्थापित	Complying	--	
102	मे0 रमेश सिंह स्टोन वर्क्स, डाला, सोनभद्र	1989	0035097	स्थापित नहीं है।	--	Not Complying	नोटिस जारी
103	मे0 माँ वैष्णो इण्डस्ट्रीज, बिल्ली-मारकुण्डी, सोनभद्र	19.02.2000	0070409	स्थापित	Complying	--	
104	मे0 जय सियाराम इण्टरप्राइजेज, डाला कोठा, सोनभद्र	1998	09070110846	स्थापित	Complying	--	
105	मे0 अवधेश कुमार सिंह, बारी-डाला, सोनभद्र	1993	09215200105	स्थापित	Complying	--	
106	मे0 मकखन स्टोन वर्क्स, बिल्ली-मारकुण्डी, ओबरा, सोनभद्र	1990	206200311	स्थापित	Complying	--	
107	मे0 अग्रहरी स्टोन प्रोडक्ट, यूनिट-1, बारी-डाला, सोनभद्र	1997	206203873	स्थापित	Complying	--	

108	मे० अग्रहरी स्टोन प्रोडक्ट, यूनिट-2, बारी-डाला, सोनभद्र	1997	--	स्थापित	Complying	--	
109	मे० विरेन्द्र बहादुर सिंह, पटेल नगर, डाला, सोनभद्र	28.01.00	--	Partial	--	Not Complying	नोटिस जारी
110	मे० बन्टी स्टोन क्रसिंग कं०, बारी-डाला, सोनभद्र	1998	206201915	स्थापित	Complying	--	
111	मे० शोभा इण्डस्ट्रीज, बारी, ओबरा, सोनभद्र	1992	--	स्थापित	Complying	--	
112	मे० रमेश स्टोन क्रसिंग कं०, बारी-डाला, सोनभद्र	1993	206200335	स्थापित	Complying	--	
113	मे० सत्यम स्टोन ग्रामोद्योग सेवा समिति, बारी-डाला, सोनभद्र	15.05.00	2062	स्थापित	Complying	--	
114	मे० गणेश सिंह स्टोन कं०, बारी-डाला, सोनभद्र	1999	112511	स्थापित	Complying	--	
115	मे० बंशीधर स्टोन वर्क्स, बिल्ली-मारकुण्डी, सोनभद्र	1988	09915105599	स्थापित	Complying	--	
116	मे० सुपर स्टोन क्रसिंग कं०, बारी-डाला, सोनभद्र	1992	0042067	स्थापित	Complying	--	
117	मे० प्रसाद इण्डस्ट्रीज, बिल्ली-ओबरा, सोनभद्र	1999	--	स्थापित	Complying	--	
118	मे० सोवरन इण्टरप्राइजेज, बिल्ली, सोनभद्र	1999	--	स्थापित	Complying	--	
119	मे० हिन्दुस्तान कन्स्ट्रक्शन कं० लि०, बिल्ली-मारकुण्डी, सोनभद्र	1999	--	स्थापित	Complying	--	
120	मे० रजा सेवा समिति, बारी-डाला, सोनभद्र	01.04.00	--	स्थापित	Complying	--	
121	मे० यूनिवर्सल स्टोन क्रसिंग कं०, बारी-डाला, सोनभद्र	1994	--	स्थापित	Complying	--	
122	मे० जय भवानी इण्टरप्राइजेज, बारी-डाला, सोनभद्र	1996	--	स्थापित	Complying	--	
123	मे० राजकुमार स्टोन प्रोडक्ट, बिल्ली-मारकुण्डी, सोनभद्र	1999	--	स्थापित	Complying	--	

24.	मे० पाण्डेय इण्टरप्राइजेज, सिन्दुरिया, चोपन, सोनभद्र	1992	--	स्थापित	Complying	--	
125	मे० स्टोन ग्रिड ग्रामोद्योग संस्था, बारी-डाला, सोनभद्र	1997	2062003	स्थापित	Complying	--	
126	मे० हरियाणा स्टोन क्रसिंग कं०, डाला, सोनभद्र	1990	--	स्थापित	Complying	--	
127	मे० बलिया स्टोन प्रोडक्ट, बिल्ली, ओबरा, सोनभद्र	1999	RG-0064895	स्थापित	Complying	--	
128	मे० शिवम स्टोन सेवा समिति, बारी-डाला, सोनभद्र	1999	25/62/ग्रामोद्योग/ 124/99-2000	स्थापित	Complying	--	
129	मे० विक्रम स्टोन वर्क्स, कोठा, डाला, सोनभद्र	1991	20620064	स्थापित	Complying	--	
130	मे० न्यू प्रकाश स्टोन प्रोडक्ट (पारस स्टोन वर्क्स), लगडा मोड़, डाला, सोनभद्र	1998	20000494	स्थापित	Complying	--	
131	मे० मेहर लक्ष्मी स्टोन प्रोडक्ट, चूड़ी गली, बिल्ली-ओबरा, सोनभद्र	1998	R-O-0063464	स्थापित	Complying	--	
132	मे० विन्ध्य स्टोन, रासपहाड़ी, डाला, सोनभद्र	1998	09415200627	स्थापित	Complying	--	
133	मे० कुमार स्टोन वर्क्स, पटेल नगर, डाला, सोनभद्र	1995	205801542	स्थापित	Complying	--	
134	मे० शनी विकास समिति, बारी-डाला, सोनभद्र	1999	887/उ०प्र०खा०ग्रामोद्योग	स्थापित	Complying	--	
135	मे० शनी स्टोन क्रसिंग कं०, बारी-डाला, सोनभद्र	1999	206200373	स्थापित	Complying	--	
136	मे० माँ भगवती देवी इण्डस्ट्रीज, बिल्ली-ओबरा, सोनभद्र	1999	09815106255	स्थापित	Complying	--	
137	मे० जय माँ पंचरुखा देवी, बिल्ली-मारकुण्डी, सोनभद्र	1999	RG-0061496	स्थापित	Complying	--	
138	मे० बाला जी स्टोन क्रसिंग कं०, बारी-डाला, सोनभद्र	1995	206201414	स्थापित	Complying	--	
139	मे० अवधेश स्टोन वर्क्स, बारी-डाला, सोनभद्र	1995	--	स्थापित	Complying	--	

140	मे0 नन्दलाल स्टोन क्रसिंग कं0, बारी-डाला, सोनभद्र	1993	206200282	स्थापित	Complying	--	
141	मे0 दुर्गा इण्डस्ट्रीज (पूर्व में बलिया स्टोन क्रसिंग कं0) बिल्ली-ओबरा, सोनभद्र	1997	--	स्थापित	Complying	--	
142	मे0 ओम स्टोन क्रसिंग कं0, बिल्ली-ओबरा, सोनभद्र	1993	203801885	स्थापित	Complying	--	
143	मे0 यूनाइटेड क्रशर्स, बारी-डाला, सोनभद्र	1996	20620492	स्थापित	Complying	--	
144	मे0 श्याम इण्टरप्राइजेज, बारी-डाला, सोनभद्र	1998	RG-0062195	स्थापित	Complying	--	
145	मे0 गणेश इण्डस्ट्रीज, बिल्ली-ओबरा, सोनभद्र	1993	RG-0019067	स्थापित	Complying	--	
146	मे0 यशवन्त स्टोन वर्क्स, बारी-डाला, सोनभद्र	1995	206200419	--	Complying	--	
147	मे0 काशी ग्रामोद्योग सेवा समिति, बिल्ली-मारकुण्डी, ओबरा, सोनभद्र	1999	RG-5016422	स्थापित	--	Not Complying	सहमति रिवोक कर कारण बताओ नोटिस जारी
148	मे0 ब्रजवासी स्टोन, बारी-डाला, सोनभद्र	1998	RG-0062830	स्थापित	Complying	--	
149	मे0 अवध स्टोन क्रसिंग समिति, बारी-डाला, सोनभद्र	1998	6500	स्थापित	Complying	--	
150	मे0 शक्ति स्टोन, बिल्ली-ओबरा, सोनभद्र	1997	--	स्थापित	Complying	--	
151	मे0 अवधेश सेवा समिति, बारी-डाला, सोनभद्र	1998	RG-0047559	स्थापित	Complying	--	
152	मे0 जगदम्बा इण्टरप्राइजेज, बारी-डाला, सोनभद्र	1995	206201422	स्थापित	Complying	--	
153	मे0 लक्ष्मी ट्रेडिंग, डाला, सोनभद्र	1999	RG-0066774	स्थापित	Complying	--	
154	मे0 ज्वाला स्टोन क्रशर्स, बारी-डाला, सोनभद्र	1996	--	--	Complying	--	
155	मे0 नन्दी स्टोन प्रोडक्ट्स, बारी-डाला, सोनभद्र	1999	RG-0065190	स्थापित	Complying	--	

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156.	मे0 कलसी स्टोन सप्लायर्स, बारी-डाला, सोनभद्र	1997	20600486	स्थापित	Complying	--	
157.	मे0 जय इण्टरप्राइजेज, बारी-डाला, सोनभद्र	1997	--	स्थापित	Complying	--	
158.	मे0 प्रवेश स्टोन क्रसिंग कं0, बारी-डाला, सोनभद्र	1991	--	स्थापित	Complying	--	
159.	मे0 रघुबशी स्टोन प्रोडक्ट, बिल्ली-ओबरा, सोनभद्र	1988	U P T T V N 0484625	स्थापित	Complying	--	
160.	मे0 चोपन स्टोन प्रोडक्ट, बारी-डाला, सोनभद्र	1994	206200355	स्थापित	Complying	--	
161.	मे0 अमित स्टोन प्रोडक्ट, बिल्ली-ओबरा, सोनभद्र	1998	RG-5018184	स्थापित	Complying	--	
162.	मे0 सोनांचल स्टोन क्रसिंग कं0, बारी-डाला, सोनभद्र	1999	20620493	स्थापित	Complying	--	
163.	मे0 एन0आर0वी0 कम्पनी, डाला क्वैरीज, सोनभद्र	1992	--	स्थापित	Complying	--	
164.	मे0 गुप्ता स्टोन वर्क्स, बिल्ली-ओबरा, सोनभद्र	1999	RG-0062552	स्थापित	Complying	--	
165.	मे0 बाबा स्टोन, बारी, डाला, सोनभद्र	1997	206201659	स्थापित	Complying	--	
166.	मे0 प्रशान्त स्टोन क्रशर कं0, डाला, सोनभद्र	1999	--	स्थापित	Complying	--	
167.	मे0 एकता विकास संस्थान, बारी-डाला, सोनभद्र	1997	RG-0051624	स्थापित	Complying	--	
168.	मे0 प्रिया विकास समिति, पटेल नगर, डाला, सोनभद्र	1999	RG-0066042	स्थापित	Complying	--	
169.	मे0 नर्मदा स्टोन क्रसिंग कं0, बारी-डाला, सोनभद्र	1994	206201433	स्थापित	Complying	--	
170.	मे0 प्रवीण स्टोन कं0, बारी-डाला, सोनभद्र	1999	20/62/ग्रा0ड0/136	स्थापित	Complying	--	
171.	मे0 संदीप स्टोन प्रोडक्ट, बारी-डाला, सोनभद्र	1999	206201493	स्थापित	Complying	--	
172.	मे0 पंकज स्टोन वर्क्स, बारी-डाला, सोनभद्र	1994	206200339	स्थापित	Complying	--	
173.	मे0 सरोज विकास समिति, बारी-डाला, सोनभद्र	2000	219/सो0/रजि0/ V-21747	स्थापित	Complying	--	
174.	मे0 कृष्णा स्टोन प्रोडक्ट्स, बिल्ली-ओबरा, सोनभद्र	2000	VL-0081324	स्थापित	Complying	--	
175.	मे0 श्याम स्टोन क्रसिंग कं0, बिल्ली-मारकुण्डी, सोनभद्र	1992	RG-0047333	स्थापित	Complying	--	
176.	मे0 अग्रवाल स्टोन ट्रेडर्स, बिल्ली-ओबरा, सोनभद्र	1992	206200278	स्थापित	Complying	--	
177.	मे0 शंकर स्टोन सेवा समिति, बारी-डाला, सोनभद्र	1998	RG-0062450	स्थापित	Complying	--	
178.	मे0 मार्डन स्टोन क्रसिंग कं0, बिल्ली, सोनभद्र	1987	RG-0015843	स्थापित	Complying	--	

179.	मे0 महावीर स्टोन क्रसिंग कं0, बिल्ली-बारी-डाला, सोनभद्र	1999	--	स्थापित	Complying	--	
180.	मे0 प्रकाश स्टोन वर्क्स, बिल्ली-मारकुण्डी, सोनभद्र	1992	206200165	स्थापित	Complying	--	
181.	मे0 शिव शक्ति स्टोन वर्क्स, बारी-डाला, सोनभद्र	1996	RG-0052068	स्थापित	Complying	--	
182.	मे0 यूनाइटेड स्टोन क्रशर्स, बारी-डाला, सोनभद्र	1999	--	स्थापित	Complying	--	
183.	मे0 के0पी0 स्टोन वर्क्स, बारी-डाला, सोनभद्र	1997	--	स्थापित	Complying	--	
184.	मे0 राधा स्वामी सेवा समिति, बारी-डाला, सोनभद्र	2000	RG-0083579	स्थापित	Complying	--	
185.	मे0 गनेश स्टोन प्रोडक्ट्स, बिल्ली-ओबरा, सोनभद्र	1997	BL-0066802	स्थापित	Complying	--	
186.	मे0 जय माता दी इण्टरप्राइजेज, बिल्ली-ओबरा, सोनभद्र	1999	RG-0069643	स्थापित	Complying	--	
187.	मे0 श्री योगी बाबा स्टोन प्रोडक्ट, बिल्ली-मारकुण्डी, सोनभद्र	1999	09215106258	स्थापित	Complying	--	
188.	मे0 कृष्णा स्टोन वर्क्स (पूर्व नाम-दारा ग्रामोद्योग सेवा समिति), बिल्ली-ओबरा, सोनभद्र	1999	--	स्थापित	Complying	--	
189.	मे0 आदिशक्ति स्टोन वर्क्स, डाला कोठा टोला, सोनभद्र	1997	RG-0028611	स्थापित	Complying	--	
190.	मे0 विन्ध्यवासिनी ग्रामोद्योग सेवा समिति, बिल्ली-मारकुण्डी, सोनभद्र	1999	20/62/खा0बो0/ 0107/99	स्थापित	Complying	--	
191.	मे0 एस0एस0 कन्स्ट्रक्शन वर्क्स, वर्दिया, चोपन, सोनभद्र	1997	09070120920	स्थापित	Complying	--	
192.	मे0 शुभम इण्डस्ट्रीज, बिल्ली-मारकुण्डी, सोनभद्र	1999	09715106307	स्थापित	Complying	--	
193.	मे0 ग्रिड्स को, बिल्ली-ओबरा, सोनभद्र	1985	RG-0027128	स्थापित	Complying	--	
194.	मे0 अवधेश स्टोन वर्क्स, बिल्ली-मारकुण्डी, सोनभद्र	1995	09115200247	स्थापित	Complying	--	
195.	मे0 जयश्री बाला जी स्टोन क्रसिंग कं0, बिल्ली-मारकुण्डी, सोनभद्र	2000	09315106248	स्थापित	Complying	--	कारण बताओ नोटिस जारी
196.	मे0 सरोज स्टोन क्रसिंग कं0, बारी-डाला, सोनभद्र	1999	09070120955	स्थापित	Complying	--	
197.	मे0 आर0के0 स्टोन, बिल्ली-मारकुण्डी, सोनभद्र	1998	0970110935	स्थापित	Complying	--	
198.	मे0 ओम साई स्टोन, बिल्ली-मारकुण्डी, सोनभद्र	1999	09070120958	स्थापित	Complying	--	
199.	मे0 जय माँ वैष्णो स्टोन क्रसिंग कं0, बिल्ली-मारकुण्डी, सोनभद्र	1999	09515106247	स्थापित	Complying	--	
200.	मे0 शारदा सेवा समिति, बिल्ली-मारकुण्डी, सोनभद्र	1998	RG-5031805	स्थापित	Complying	--	
201.	मे0 प्रकाश स्टोन वर्क्स, बिल्ली-मारकुण्डी, सोनभद्र	1991	RG-0028422	स्थापित	Complying	--	
202.	मे0 शारदा इण्डस्ट्रीज, बिल्ली-मारकुण्डी, सोनभद्र	1987	--	स्थापित	Complying	--	
203.	मे0 नीलकण्ठ स्टोन क्रसिंग कं0, बारी-डाला, सोनभद्र	1999	--	स्थापित	Complying	--	

204.	मे० स्वामी जी महाराज स्टोन प्रोडक्ट्स, बिल्ली-ओबरा, सोनभद्र	1998	090701201052	स्थापित	Complying	--	
205.	मे० वैभव इण्टरप्राइजेज, बिल्ली-मारकुण्डी, सोनभद्र	1997	09070120956	स्थापित	Complying	--	
206.	मे० विशाल सेवा समिति, सिन्दुरिया, चोपन, सोनभद्र	1999	2062 खा०ग्रा०बो०/ 09/99	स्थापित	Complying	--	
207.	मे० सूर्या क्रशर, बिल्ली-मारकुण्डी, ओबरा, सोनभद्र	1996	0051697	स्थापित	Complying	--	
208.	मे० विन्ध्य ग्रामोद्योग विकास संस्थान, बिल्ली-ओबरा, सोनभद्र	1997	1099	स्थापित	Complying	--	
209.	मे० वैभव ग्रुप, बिल्ली-मारकुण्डी, सोनभद्र	1998	09070120957	स्थापित	Complying	--	
210.	मे० मकखन स्टोन वर्क्स, बिल्ली-ओबरा, सोनभद्र	1999	09070120936	स्थापित	Complying	--	
211.	मे० ओम इण्डस्ट्री, बिल्ली-मारकुण्डी, सोनभद्र	1999	09615106256	स्थापित	Complying	--	

212.	मे० बाबा वर्फानी स्टोन प्रोडक्ट, बिल्ली-मारकुण्डी, सोनभद्र	1999	09070121009	स्थापित	Complying	--	
213.	मे० तिरुपति बालाजी स्टोन प्रोडक्ट, बिल्ली-मारकुण्डी, सोनभद्र	1999	090701201002	स्थापित	Complying	--	
214.	मे० विजय एक्सप्रेस वे इंजीनियरिंग लि०, डाला, सोनभद्र	--	--	स्थापित	Complying	--	एन०ओ०सी० मुख्यालय द्वारा जारी
215.	मे० प्रेम स्टोन वर्क्स, बिल्ली-मारकुण्डी, सोनभद्र	1999	09070120938	स्थापित	Complying	--	
216.	मे० लक्ष्मी स्टोन प्रोडक्ट वर्क्स, बारी-डाला, सोनभद्र	2000	--	स्थापित	Complying	--	
217.	मे० डायमण्ड स्टोन वर्क्स, बारी-डाला, सोनभद्र	1998	090701201048	स्थापित	Complying	--	
218.	मे० जय शक्ति स्टोन वर्क्स, बिल्ली-मारकुण्डी, सोनभद्र	1999	090701200966	स्थापित	Complying	--	
219.	मे० देवी स्टोन वर्क्स, रासपहाड़ी, चोपन, सोनभद्र	1999	090701201039	स्थापित	Complying	--	
220.	मे० श्री बजरंग स्टोन, वरदिया, चोपन, सोनभद्र	1993	09115100097	स्थापित	Complying	--	
221.	मे० जे०एम०वी० इण्टरप्राइजेज, बघमनवा, बिल्ली, सोनभद्र	1999	09070120970	स्थापित	Complying	--	कारण बताओ नोटिस जारी
222.	मे० पूजा स्टोन क्रसिंग कं०, पटेल नगर, सोनभद्र।				--	Not Complying	नोटिस जारी
223.	मे० हनुमन्त स्टोन क्रसिंग कं० (मुकुन्द सेठ), बिल्ली-ओबरा, सोनभद्र।				--	Not Complying	कारण बताओ नोटिस जारी
224.	मे० वैष्णवी इण्टरप्राइजेज, बारी-डाला, जनपद-सोनभद्र।				--	Not Complying	नोटिस जारी
225.	मे० सिहोरी स्टोन ग्रामोद्योग संस्थान, वारी-डाला, सोनभद्र।				--	Not Complying	नोटिस जारी
226.	मे० विनोद सिन्धी स्टोन वर्क्स, बिल्ली-मारकुण्डी, सोनभद्र।				--	Not Complying	नोटिस जारी

227.	मे0 विन्ध्य विकास सेवा समिति, वारी-डाला, सोनभद्र।				--	Not Complying	नोटिस जारी
228.	मे0 पशुपति सेवा संस्थान, डाला, सोनभद्र।				--	Not Complying	नोटिस जारी
229.	मे0 ग्रामीण आदिवासी सेवा संस्थान, वारी-डाला, सोनभद्र।				--	Not Complying	कारण बताओ नोटिस जारी
230.	मे0 भारद्वाज ग्रामोद्योग विकास सेवा समिति, वारी-डाला, सोनभद्र।				--	Not Complying	नोटिस जारी
231.	मे0 भारत स्टोन (बलिया स्टोन क्रसिंग कं0), बिल्ली-ओबरा, सोनभद्र।				--	Not Complying	नोटिस जारी
232.	मे0 अतुल स्टोन प्रोडक्ट, वारी-डाला, सोनभद्र।				--	Not Complying	नोटिस जारी
233.	मे0 पी0एन0एस0एस0 (सौरभ स्टोन), कोठा टोला, डाला, सोनभद्र।				--	Not Complying	नोटिस जारी
234.	मे0 माँ पिताम्बरा सेवा समिति, कोठा टोला, डाला, सोनभद्र।				--	Not Complying	नोटिस जारी
235.	मे0 लक्ष्मी देवी स्टोन क्रशर, वारी-डाला, सोनभद्र।				--	Not Complying	नोटिस जारी
236.	मे0 जय माँ गायत्री कंक्रीट उद्योग, वारी-डाला, सोनभद्र।				--	Not Complying	नोटिस जारी
237.	मे0 सर्वहित स्टोन वर्क्स, बिल्ली-ओबरा, सोनभद्र।				--	Not Complying	नोटिस जारी
238.	मे0 ए0के0 इण्टरप्राइजेज, बिल्ली-मारकुण्डी, सोनभद्र।				--	Not Complying	कारण बताओ नोटिस जारी
239.	मे0 सिंह स्टोन वर्क्स, वरदिया, चोपन, सोनभद्र।				--	Not Complying	नोटिस जारी
240.	मे0 आशीष इण्टरप्राइजेज, बिल्ली-मारकुण्डी, सोनभद्र।				--	Not Complying	बंदी आदेश जारी
241.	मे0 शंकर स्टोन क्रसिंग कं0, बारी-डाला, सोनभद्र।				--	Not Complying	विधि कार्यवाही के लिए न्यायालय प्रेषित
242.	मे0 नरायन स्टोन वर्क्स, वरदिया, चोपन, सोनभद्र।				--	Not Complying	विधि कार्यवाही के लिए न्यायालय प्रेषित
243.	मे0 निषाद स्टोन क्रसिंग कं0, वारी-डाला, सोनभद्र।				--	Not Complying	विधि कार्यवाही के लिए न्यायालय प्रेषित
244.	मे0 शुभम स्टोन प्रोडक्ट्स, सुकृत, सोनभद्र				--	--	बंदी आदेश जारी
245.	मे0 रमेश गर्ग निखिल गर्ग स्टोन क्रेशर्स, सुकृत, सोनभद्र				--	--	बंदी आदेश जारी
246.	मे0 बजाज स्टोन क्रशर सुकृत, सोनभद्र				--	--	बंदी आदेश जारी
247.	मे0 सज्जन गर्ग स्टोन क्रेशर्स, सुकृत, सोनभद्र				--	--	बंदी आदेश जारी

248.	मे0 अल्का ग्रामोद्योग समिति, बिल्ली-ओबरा, सोनभद्र				--	--	बंदी आदेश जारी
249.	मे0 अवध इंजीनियरिंग वर्क्स एसोसिएशन, काशी मोड़, सोनभद्र				--	--	बंदी आदेश जारी
250.	मे0 सर्वहित सेवा संस्थान, बिल्ली-मारकुण्डी, सोनभद्र				--	--	बंदी आदेश जारी
251.	मे0 सुबास स्टोन प्रोडक्ट, बारी-डाला, सोनभद्र				--	--	बंदी आदेश जारी
252.	मे0 केशरी स्टोन वर्क्स, मारकुण्डी, गुर्मा, सोनभद्र				--	--	बंदी आदेश जारी
253.	मे0 कीर्ति ग्रामोद्योग विकास संस्थान, डाला, सोनभद्र				--	--	बंदी आदेश जारी
254.	मे0 वन्दना स्टोन, बारी-डाला, सोनभद्र।				--	--	बंदी आदेश जारी
255.	मे0 शंकर स्टोन वर्क्स, पटेल नगर, डाला, सोनभद्र				--	Not Complying	कारण बताओ नोटिस जारी
256.	मे0 सुनील स्टोन इण्डस्ट्रीज, बारी-डाला, सोनभद्र				--	Not Complying	बंदी आदेश जारी
257.	मे0 सिहोरी ग्रामोद्योग संस्थान बारी डाला, सोनभद्र				--	Not Complying	कारण बताओ नोटिस जारी
258.	मे0 विजय कन्स्ट्रक्शन, बिल्ली-ओबरा, सोनभद्र				--	Not Complying	कारण बताओ नोटिस जारी
259.	मे0 वजरंग स्टोन, बारी-डाला, सोनभद्र				--	Not Complying	कारण बताओ नोटिस जारी
260.	मे0 कं0के0 इण्डस्ट्रीज, डाला, सोनभद्र				--	Not Complying	बंदी आदेश जारी
261.	मे0 गैमन इण्डिया लि0, डाला, सोनभद्र				Complying	--	सीमित अवधि हेतु मुख्यालय स्तर से MOEF की अनुमति से जारी।
262.	मे0 सिम्प्लेक्स इन्फ्रास्ट्रक्चर लि0, बिल्ली, ओबरा, सोनभद्र				Complying	--	-तदैव-
263.	मे0 नागार्जुन कन्स्ट्रक्शन कं0, सिन्दुरिया, चोपन, सोनभद्र				Complying	--	-तदैव-
264.	मे0 विजय एक्सप्रेस वे कन्स्ट्रक्शन कं0, सुकृत, सोनभद्र				Complying	--	-तदैव-

1. बोर्ड द्वारा बंदी आदेश जारी	—	14
2. कारण बताओ नोटिस जारी	—	12
3. क्षेत्रीय स्तर से नोटिस प्रेषित की गयी है	—	15
4. विधिक कार्यवाही हेतु बोर्ड मुख्यालय संस्तुत	—	05
5. मानकों की पूर्ति करने वाले स्टोन क्रशर्स	—	218
6. कुल योग	—	264

Green category small scale and tiny tots industry in singrauli area of UP-----1261

CURRENT STATUS OF GROSSLY POLLUTING INDUSTRIES COVERED UNDER SINGRAULI ACTION**PLAN IN DISTT. SONEBHADRA AS ON 31.07.2010**

Sl. No.	Name & Address of Industry	Industrial Sector	Name of Product	Status of Water Pollution Control Unit	Status of Air Pollution Control Unit	Performance		Recent Analysis Results/Monitoring Report	Remarks
						Water Pollution Control Unit	Air Pollution Control Unit		
1	2	3	4	5	6	7	8	9	10
1.	NTPC, Shaktinagar, Sonebhadra	CU	T.P.P. 2000 MW (2x500 MW 5X200 MW)	Ash Slurry discharges into dyke and finally after proper settling discharges into Rihand Dam. For coal handling plant effluent treatment plant is installed and also STP installed for domestic waste water treatment.	With each units ESP is installed and emissions are as per board norms.	Satisfactory	Satisfactory	Sample dtd. 29.04.10 pH - 7.94 BOD - 7.0 mg./L COD - 28.0 mg./L S.S. - 105.0 mg./L Fluoride- 2.19 Cr ⁺⁶ - Nil Sample Collected on 29.04.10	Sample collected on 26.07.10.
2.	NTPC, Rihand Nagar, Sonebhadra	CU	T.P.P. (2x500 MW 2x500 MW) = 2000 MW	Ash Slurry after proper treatment through ashdyke, total effluent is being recycled into plant for different purposes. Industry has septic Tank/Oxidation Pond for domestic wastewater treatment. For coal handling plant effluent passes through settling pond. Only in case of flood effluent may be discharged into Rihand reservoir.	With each units ESP is installed and emission are being emit as per board norms.	Satisfactory	Satisfactory	Sample Collected dtd. 15.12.09 pH - 7.62 BOD - 18.0 mg/L COD - 88.0 mg/L S.S. - 26.0 mg/L	Treated effluent re-cycled. Consent (Water/Air) granted upto 2009.

1	2	3	4	5	(2) 6	7	8	9	10
3.	Anpara Thermal Power Station Unit-A , Anpara, Sonebhadra	SU	T.P.P. (3x210 MW) 630 MW	Ash slurry effluent discharge into ash dyke after proper settling finally goes into Rihand reservoir. Industry has installed sewage treatment plant for domestic wastewater.	With each units ESP is installed and due to less capacity emission are not being as per board norms.	Satisfactory	Unsatisfactory	Sample dtd. 28.04.10 pH - 8.05 BOD - 6.0 mg./L COD - 20.0 mg./L S.S. - 38.0 mg./L Floride- 1.55 Arsenic - 0.005 Ni - 0.13 Cr ⁺⁶ Nil	Sample collected on 26.07.10.
4.	Anpara Thermal Power Station Unit-B , Anpara, Sonebhadra	SU	TPP (3x500 MW) 1500 MW	Ash slurry discharges into dykes after proper settling finally goes into Rihand reservoir. Effluents are not being treated as per board norms.	With each units ESP is installed and due to less capacity emission are not being as per board norms.	Satisfactory	Unsatisfactory	Sample dtd. 28.04.10 pH - 8.05 BOD - 6.0 mg./L COD - 20.0 mg./L S.S. - 38.0 mg./L Floride- 1.55 Arsenic - 0.005 Ni - 0.13 Cr ⁺⁶ Nil	Sample collected on 26.07.10..
5.	Obra Thermal Power Station Unit-A , Obra, Sonebhadra	SU	TPP (5x50 MW 3x100 MW) 550 MW	Ash slurry discharges into dykes. Domestic effluent are being treated in septic tank. Effluents are not being treated as per board norms.	In 3x100MW unit mechanical precipitator and ESP are being installed and wit 5x50 MW unit mechanical dust collectors are being installed. Emissions are much more as compare with board norms.	Unsatisfactory	Unsatisfactory	Sample dtd. 28.01.10 pH - 7.66 BOD - 4.0 mg./L COD - 12.0 mg./L S.S. - 25.0 mg./L	No EPP - APCS Partial.

(3)									
1	2	3	4	5	6	7	8	9	10
6.	Obra Thermal Power Station Unit-B, Obra, Sonebhadra	SU	TPP (5x200 MW) 1000 MW	Ash slurry discharges into dykes and rest quantity is being passed by Jhariya Nala. Domestic effluent is being treated in septic tank. Effluents are not being treated as per board norms.	In all units less capacity ESP's are being installed which are failed to work as board norms.	Unsatisfactory	Unsatisfactory	Sample dtd. 28.01.10 pH - 7.66 BOD - 4.0 mg./L COD - 12.0 mg./L S.S. - 25.0 mg./L	No ETP & APCS Partial.
	M/s. Dalla Cement Factory, (A Unit of Jai Prakash Associates) Dalla, Sonebhadra.	PU	Cement Clinker- 66000MT/M PPC- 30000MT/M	Only domestic Septic Tanks Soak Pit - STP under Construction.	ESP - Kiln ESP - Coller Bag Filters - Coal Mill & Transfer Point	Satisfactory	Satisfactory	--	-
8.	M/s. Churk Cement Factory, Churk, Sonebhadra.	PU	Cement	----- Industry Closed -----					
9.	Hindalco Industries Ltd. (Renusagar Power Division) Renusagar.	PU	T.P.P. 741.7MW	Ash slurry effluent discharged into ash dykes and finally after proper treatment total effluent is being reused in industrial process. Effluent generated from floor washing after neutralizing kept in pit and then finally by piped into ash dyke. Industry has STP for domestic wastewater treatment.	With each units ESP is installed and emission are being emit as per board norms.	Satisfactory	Satisfactory	Sample dtd. 28.04.10 pH - 7.96 BOD - 10.0 mg./L COD - 36.0 mg./L S.S. - 25.0 mg./L Fe- 0.18	Sample collected on 29.07.10..
10.	Hindalco Industries Ltd. Renukoot, Sonebhadra	PU	Aluminium metal	ETP & STP both has been upgraded and treated effluent is recycled back for process use and etc. Industrial effluent treated by collection pit, neutralization tank, HRSCC, Centrifuge and sludge drying bed. Domestic effluent is being treated by Fluidised Aerobic Bio-reactor.	Air pollution control unit consist ESP, DSS, FTP, Computerized Oil Firing system and emission are as per well below PCB	Satisfactory	Satisfactory	Sample Collected dtd. 22.04.2010 BOD - 2.6 mg/L COD - 24.0 mg/L pH - 3 S.S. - 23.0 Flouride - 4.2	Sample collected on 29.07.10..

(4)

1	2	3	4	5	6	7	8	9	10
11.	Kanoria Chemicals & Industries Ltd. Renukoot, Sonebhadra.	PU	Chemical Industry	Treatment unit for Industrial effluent. Mercury effluent is being totally recycled. Effluent is being treated as per PCB norms. Domestic effluent treated by septic tank/Soak pit.	Proper system for air pollution control unit. Chlorine neutralization plant, hypo plant and fume scrubber are there. MCDC & Bag Filter are installed in Boiler.	Satisfactory	Satisfactory	Sample Collected dtd. 22.04.2010 BOD - 4.5 mg/L COD - 32.0 mg/L pH - 7.64 S.S. - 32.0 Floride - .82	Sample collected on 29.07.10..
12.	Kanoria Chemicals (Power Generation Unit) Renukoot, Sonebhadra.	PU	T.P.P 2x25MW 50 MW	Dry as disposal for brick manufacturing.	ESP & Bag filter.	Satisfactory	Satisfactory	--	Sample collected on 29.07.10..
13.	M/s. Hitech Carbon Renukoot, Sonebhadra	PU	Carbon Black 170T/Y	Industrial effluent treated by primary treatment pit oil skimmer, oil separator imhoff clarifier settling tank pH adjustment tank Sludge drying bed. Domestic effluent is being treated by septic tank/soak pit tank.	Plume consist Bag filter purge bag filter. Emission are being emit as per board norms.	Satisfactory	Satisfactory	Sample Collected dtd. 28.01.2010 BOD - 24.00 mg/L COD - 168.0 mg/L pH - 7.73 S.S. - TSS - 82.0 TDS - 304.0 T.S. - 386.0	Sample collected on 29.07.10.
14.	M/s. NCL, Bina Project, Bina, Sonebhadra.	CU	Coal 4.5MT/Y	ETP is installed for industrial effluent and STP for domestic effluent treatment.	Hall road, CHP water spray, CHP dust suppression system for air pollution control and for effluent STP is there.	Satisfactory	Satisfactory	Sample Collected dtd. 30.04.10 BOD - 2.00 mg/L COD - 8.0 mg/L pH - 7.71 S.S. - 23.0 TDS - 305.0 TS - 328.0 Fe - .28	Sample collected on 26.07.10..

Contd....p/5.

(5)

1	2	3	4	5	6	7	8	9	10
15.	M/s. NCL, Kakri, Project Kakri, Sonebhadra.	CU	Coal 4.0MT/Y	ETP is installed for industrial effluent Treated effluent are being discharge by nala and Domestic effluent is being treated by septic tank/soak pit tank.	Hall road, CHP water spray, system for air pollution control and dust extraction installed at collection pit.	Satisfactory	Satisfactory	Sample Collected dtd. 30.04.2010 BOD - 2.00 mg/L COD - 12.0 mg/L pH - 7.71 S.S. - 22.0 TDS - 290.0 TS - 312.0 Fe - .13	Sample collected on 26.07.10.
16.	M/s. NCL, Khadia, Project Khadia, Sonebhadra.	CU	Coal 3.0MT/Y	ETP is installed for industrial effluent Treated effluent are being discharge by nala and Domestic effluent is being treated by STP but not working well.	Hall road, CHP water spray, system for air pollution control.	satisfactory	Satisfactory	Sample Collected dtd. 30.04.2010 BOD - 3.00 mg/L COD - 12 mg/L pH - 8.24 S.S. - 24.0 TDS - 317 TS - 341	Sample collected on 26.07.10.
17.	M/s. NCL, Dhudhichwa, Project Dhudhichuwa, Sonebhadra.	CU	Coal 3.0MT/Y	ETP is installed for industrial effluent Domestic effluent is being treated by septic tank/soak pit tank.	Hall road, CHP water spray, system for air pollution control and dust extraction installed at collection pit.	Satisfactory	Satisfactory	Sample Collected dtd. 30.04.2010 BOD - 3.0 mg/L COD - 12.00 mg/L pH - 7.72 S.S. - 22.0 TDS - 317 TS - 339 Re - .16	Sample collected on 26.07.10.
18.	M/s. NCL, Krishnshila Project, PO. Bina, Distt. Sonebhara.	CU	Coal 4.0 Million Ton/ Annum	No ETP	Hall road, CHP water spray, system for air pollution control and dust extraction installed at collection pit.	Unsatisfactory	Unsatisfactory	New Project	Sample collected on 26.07.10.
19.	M/s. Orient Micro- Abrasives Ltd., Renukoot, Distt. Sonebhadra.	PU	CPW	Neutralization Tank, Settling Tank	Wet Scrubber	satisfactory	satisfactory	-	-

Contd....p/6.

(6)

1	2	3	4	5	6	7	8	9	10
20.	M/s. Prajapati Chemical Industries Ltd., Renukoot.	PU	CPW	Neutralization Tank, Settling Tank	Wet Scrubber	satisfactory	--	--	Merged in M/S Kanoria chemicals & Inds.
21.	M/s. Vikas Industrial Gases, Renukoot, Sonebhadra.	PU	----- Closed its own -----						--

(A) TOTAL AIR POLLUTING INDUSTRIES = 21
INDUSTRY CLOSED = 01
APCS INSTALLED = 20
OPRS = 16
OPRNS = 04

(B) TOTAL WATER POLLUTING INDUSTRIES = 20
INDUSTRY CLOSED = 01
ETP INSTALLED = 19
ETP NOT INSTALLED = 02
OPRS = 17

ANNEXURE- VI**ANALYSIS REPORT OF BALLIA NALA**

Sl. No.	Date	Analysed Parameters									
		Colour	Odour	pH	BOD	COD	TSS	TDS	TS	Cr ⁺⁶	Ni
1.	09.03.10	Grey	Light Sewage	7.81	49	480	126	402	528	-	-
2.	08.04.10	Blackish Grey	Not Specific	7.89	120	480	353	828	1181	Nil	0.07
3.	13.05.10	Blackish Grey	Not Specific	7.67	150	720	372	910	1282	-	-
4.	13.07.10	Blackish Grey	Not Specific	7.59	110	368	164	408	572	-	-

ANALYSIS REPORT OF DONGIA NALA

Sl. No.	Date	Analysed Parameters									
		Colour	Odour	pH	BOD	COD	TSS	TDS	TS	Fluoride	Ni
1.	13.07.10	Light Muddy	Odourless	7.84	10	44	88	320	408	-	-
2.	26.05.10	Colourless	Odourless	7.77	4.3	20	33	268	301	-	-
3.	31.03.10	Earthy Muddy	Punget smell	10.16	6	88	112	406	518	0.72	-

ANALYSIS REPORT OF MURDHAWA NALA

Sl. No.	Date	Analysed Parameters									
		Colour	Odour	pH	BOD	COD	TSS	TDS	TS	Cr ⁺⁶	Ni
1.	08.04.10	Light Grey (Turbid)	Not Specific	6.89	46	168	156	387	543	Nil	0.08
2.	13.07.10	Colourless (Suspended particle present)	Odourless	7.22	18	76	62	321	383	-	-
3.	26.05.10	Grey (Turbid)	Mild Sewage	9.26	50	384	162	415	577	-	-

ANALYSIS REPORT OF RIHAND RESERVOIR

Sl. No.	Date	Analysed Parameters								
		Colour	Odour	pH	BOD	DO	MPN	TOTAL MPN	NITRATE	COLOUTIMETRY
1.	8.3.10	Colourless	Odourless	8.16	2.2	8.1	1400	2100	1.8	-
2.	8.4.10	Colourless	Odourless	6.28	1.2	-	-	-	0.80	-
3.	7.6.10	Colourless	Odourless	7.98	2.3	7.0	1600	2400	0.93	1.33
4.	6.7.10	Colourless	Odourless	7.90	2.4	6.8	1700	2400	0.95	1.37

Analysis results of Rihand Reservoir for the month of April, 2010 under MINARS Project for testing of heavy metals and Pesticides are as follows:-

T. BHC mg/L	Alkalinity mg/L	Total Fixed Solides mg/L	T.S.S. mg/L	Fluoride	Sulphate mg/L	Sodium mg/L	Potassium	Zn	Iron
252.69	112	102	38	0.91	6.37	8.0	10.0	0.050	1.60

The analysis report of river Sone

Sl. No.	Month	Sampling Points	Analysed Parameters						
			pH	BOD (mg/L)	COD (mg/L)	TSS (mg/L)	TDS (mg/L)	TS (mg/L)	Floride (mg/L)
1.	April, 09	U/S	8.02	1.2	6.8	36	185	221	-
		D/S	7.51	1.5	8.0	44	201	245	-
2.	May, 09	U/S	N.A.	-	-	-	-	-	-
		D/S	N.A.	-	-	-	-	-	-
3.	June, 09	U/S	7.47	3.4	18.4	34	256	290	-
		D/S	7.35	1.9	10.4	31.0	238	269	-
4.	July, 09	U/S	7.62	3.6	16.4	42.0	268	310	-
		D/S	7.45	4.2	20.0	51.0	280	331	-
5.	Aug., 09	U/S	7.43	3.0	14.0	46.0	272	318	0.40 Floride
		D/S	7.24	2.4	12.4	42.0	264	306	0.52
6.	Sept., 09	U/S	7.88	3.2	16.0	32.0	265	297	-
		D/S	7.73	2.0	8.0	22.0	260	282	-
7.	Oct., 09	U/S	7.94	1.2	4.0	-	260	-	-
		D/S	7.30	2.3	6.0	-	288	-	-
8.	Nov., 09	U/S	7.92	1.6	9.2	34.0	208	242.0	-
		D/S	6.94	2.4	14.4	46.0	232.0	278.0	-
9.	Dec., 09	U/S	8.05	1.4	8.0	32.0	210.0	242	-
		D/S	7.68	2.2	12.8	41.0	222.0	263	-
10.	Jan., 10	U/S	7.91	1.4	7.6	36.0	228.0	264	0.40
		D/S	7.82	2.1	12.0	39.0	237.0	276	0.46
11.	Feb., 10	U/S	7.91	1.9	11.6	22.0	158.0	180	-
		D/S	7.94	2.2	14.0	26.0	167.0	193	-
12.	Mar, 10	U/S	7.73	2.4	13.6	34.0	244.0	240	-
		D/S	7.88	22.0	96.0	46.0	316.0	358	-
13.	Apr, 10	U/S							-
		D/S							-
14.	May, 10	U/S	7.56	2.3	12.0	32.0	245.02	77.0	-
		D/S	7.31	2.6	16.0	38.0	268.0	306.0	-
15.	June, 10	U/S	8.24	2.1	15.2	26.0	285.0	291.0	-
		D/S	7.91	2.7	19.6	29.0	269.0	298.0	-

Air Quality- Anpara

ANNEXURE NO. VII

STN Code	Sampling Date	Monitoring Station	Type of Location	City	Monitoring Agency	General Weather Condition	SO ₂ _6AM_1 0AM	SO ₂ _10AM_2PM	SO ₂ _2PM_6PM	SO ₂ _6PM_10PM	SO ₂ _10PM_2AM	SO ₂ _2AM_6AM	NO ₂ _6AM_10AM	NO ₂ _10AM_2PM	NO ₂ _2PM_6PM	NO ₂ _6PM_10PM	NO ₂ _10PM_2AM
6	2.4.10	Anpara	I	REN	UPPCB	CLEAR	18.57	15.96	17.41	16.25	19.15	16.97	33.03	23.12	28.63	24.22	35.23
6	6.4.10	Anpara	I	REN	UPPCB	CLEAR	19.00	16.54	17.12	15.66	18.71	16.68	34.68	25.32	27.53	22.02	33.58
6	9.4.10	Anpara	I	REN	UPPCB	CLEAR	18.28	16.25	17.55	15.08	18.86	16.39	31.93	24.22	29.18	20.92	34.13
6	13.4.10	Anpara	I	REN	UPPCB	CLEAR	19.15	16.68	16.82	16.10	18.13	17.26	35.23	25.87	26.42	23.67	31.38
6	16.4.10	Anpara	I	REN	UPPCB	CLEAR	18.86	15.81	17.26	16.54	18.57	17.97	34.13	22.57	28.08	25.32	33.03
6	20.4.10	Anpara	I	REN	UPPCB	CLEAR	18.42	16.39	17.70	16.25	18.86	17.55	32.48	24.77	29.73	24.22	34.13
6	23.4.10	Anpara	I	REN	UPPCB	CLEAR	18.71	15.96	17.26	16.39	18.13	17.12	33.58	23.12	28.07	24.77	31.38
6	27.4.10	Anpara	I	REN	UPPCB	CLOUDY	17.99	15.38	16.83	15.96	18.57	16.83	30.83	20.92	26.42	23.12	33.03
6	30.4.10	Anpara	I	REN	UPPCB	CLEAR	18.71	16.39	17.41	16.54	17.84	16.68	33.58	24.77	28.62	25.32	30.28

Air Quality- Renusagar

STN Code	Sampling Date	Monitoring Station	Type of Location	City	Monitoring Agency	General Weather Condition	SO ₂ _6AM_1 0AM	SO ₂ _10AM_2PM	SO ₂ _2PM_6PM	SO ₂ _6PM_10PM	SO ₂ _10PM_2AM	SO ₂ _2AM_6AM	NO ₂ _6AM_10AM	NO ₂ _10AM_2PM	NO ₂ _2PM_6PM	NO ₂ _6PM_10PM	NO ₂ _10PM_2AM
7	1.4.10	REN	I	REN	UPPCB	CLEAR	18.71	16.54	17.41	16.25	17.99	17.12	23.58	25.32	28.63	24.22	30.83
7	5.4.10	REN	I	REN	UPPCB	CLEAR	19.15	15.96	16.97	15.38	18.42	16.83	35.23	23.12	26.98	20.92	32.48
7	8.4.10	REN	I	REN	UPPCB	CLEAR	18.13	15.52	17.26	15.96	18.71	17.26	31.38	20.92	28.08	23.12	33.58
7	12.4.10	REN	I	REN	UPPCB	CLEAR	18.42	16.25	17.55	16.39	19.00	16.97	32.48	24.22	29.18	24.77	34.68
7	15.4.10	REN	I	REN	UPPCB	CLEAR	18.86	16.68	17.12	16.1	18.23	17.41	34.13	25.87	27.53	23.68	21.93
7	19.4.10	REN	I	REN	UPPCB	CLEAR	18.28	15.67	17.68	15.52	18.57	17.7	31.93	22.02	25.87	20.92	23.03
7	22.4.10	REN	I	REN	UPPCB	CLEAR	18.13	16.25	17.26	15.96	17.84	17.12	31.38	24.22	28.08	23.12	30.28
7	26.4.10	REN	I	REN	UPPCB	SEMI-CLEAR	18.42	16.68	16.97	15.09	18.71	17.55	32.48	25.87	22.57	20.37	33.58
7	29.4.10	REN	I	REN	UPPCB	SEMI-CLEAR	18.86	16.39	17.41	16.25	18.28	17.26	34.13	24.77	28.63	24.22	31.93

Air Quality- Anpara

STN Code	Sampling Date	Monitoring Station	Type Of Location	City	Monitoring Agency	General Weather Condition	SO2_6AM_1 0AM	SO2_10AM_2PM	SO2_2PM_6PM	SO2_6PM_10PM	SO2_10PM_2AM	SO2_2AM_6AM	NO2_6AM_10AM	NO2_10AM_2PM	NO2_2PM_6PM	NO2_6PM_10PM	NO2_10PM_2AM	NO2_2AM_6AM
6	4.5.10	Anpara	I	REN	UPPCB	Clear	17.70	15.96	16.54	15.66	18.28	17.26	29.73	23.12	25.32	22.02	31.92	28.07
6	6.5.10	Anpara	I	REN	UPPCB	Clear	18.13	15.09	17.12	14.50	17.99	16.97	31.28	21.46	27.52	20.92	30.83	26.97
6	11.5.10	Anpara	I	REN	UPPCB	Clear	18.42	15.66	16.68	15.23	18.71	16.54	32.48	22.02	25.87	21.47	33.54	25.32
6	13.5.10	Anpara	I	REN	UPPCB	Clear	17.99	16.25	17.41	15.96	17.70	17.12	30.83	24.22	28.62	23.12	29.73	27.52
6	18.5.10	Anpara	I	REN	UPPCB	Clear	18.28	15.23	16.97	16.29	18.13	17.41	31.93	20.92	26.97	24.77	31.38	28.63
6	20.5.10	Anpara	I	REN	UPPCB	Clear	17.84	P.F.	17.55	15.81	17.34	16.83	20.28	P.F.	29.18	22.57	20.28	25.42
6	25.5.10	Anpara	I	REN	UPPCB	Clear	18.13	16.24	17.26	15.23	18.42	17.12	31.38	24.22	28.08	20.92	32.48	27.53
6	27.5.10	Anpara	I	REN	UPPCB	Clear	17.70	15.96	16.82	15.96	17.99	17.55	29.73	23.12	26.42	23.12	30.83	29.18

Air Quality- Renusagar

STN Code	Sampling Date	Monitoring Station	Type Of Location	City	Monitoring Agency	General Weather Condition	SO2_6AM_1 0AM	SO2_10AM_2PM	SO2_2PM_6PM	SO2_6PM_10PM	SO2_10PM_2AM	SO2_2AM_6AM	NO2_6AM_10AM	NO2_10AM_2PM	NO2_2PM_6PM	NO2_6PM_10PM	NO2_10PM_2AM	NO2_2AM_6AM
7	3.5.10	REN	I	REN	UPPCB	Clear	17.90	15.63	16.90	15.06	18.33	17.19	31.64	22.91	27.82	20.73	33.28	28.91
7	5.5.10	REN	I	REN	UPPCB	Cloudy	18.18	14.77	17.33	16.19	17.61	16.62	32.73	20.73	29.46	25.09	30.55	26.73
7	10.5.10	REN	I	REN	UPPCB	Clear	17.76	15.24	16.76	15.91	17.33	17.05	31.09	21.82	27.28	24.00	29.46	28.37
7	12.5.10	REN	I	REN	UPPCB	Clear	17.47	16.05	16.48	15.63	17.76	16.76	30.00	24.55	26.18	22.91	31.09	27.28
7	17.5.10	REN	I	REN	UPPCB	Clear	18.04	15.63	16.90	15.06	17.47	16.48	32.19	22.91	27.82	20.73	30.00	26.18
7	19.5.10	REN	I	REN	UPPCB	Clear	17.61	14.92	16.62	15.48	17.90	17.19	30.55	20.73	26.73	22.37	31.64	28.91
7	24.5.10	REN	I	REN	UPPCB	Semi Clear	18.18	15.48	17.33	15.91	17.61	16.76	32.73	22.37	29.46	24.00	30.55	27.28
7	26.5.10	REN	I	REN	UPPCB	Light Rain	17.76	16.05	16.34	14.92	17.33	17.05	31.09	24.55	25.64	20.73	29.46	28.37

Air Quality- Anpara

STN Code	Sampling Date	Monitoring Station	TypeOf Location	City	Monitoring Agency	General WeatherCon dit	SO2_6AM_1 0AM	SO2_10AM_ 2PM	SO2_2PM_6 PM	SO2_6PM_1 0PM	SO2_10PM_ 2AM	SO2_2AM_6 AM	NO2_6AM_1 0AM	NO2_10AM_ 2PM	NO2_2PM_6 PM	NO2_6PM_1 0PM	NO2_10PM_ 2AM
6	2.6.10	Anpara colony,	I	REN	UPPCB	CLOUDY	18.13	16.24	16.97	15.37	18.56	17.4	31.38	24.22	26.97	20.91	33.03
6	4.6.10	Anpara colony,	I	REN	UPPCB	CLEAR	17.84	15.95	16.53	16.24	18.13	16.89	30.27	23.12	25.32	24.22	31.37
6	9.6.10	Anpara colony,	I	REN	UPPCB	CLEAR	18.27	15.23	17.26	15.66	17.69	17.11	31.92	20.91	28.07	22.02	29.72
6	11.6.10	Anpara colony,	I	REN	UPPCB	CLEAR	17.98	15.81	16.68	15.95	17.4	16.39	30.82	22.57	25.87	23.12	28.62
6	16.6.10	Anpara colony,	I	REN	UPPCB	CLOUDY	18.13	16.24	16.96	15.23	17.84	16.68	31.37	24.22	24.97	20.91	30.27
6	18.6.10	Anpara colony,	I	REN	UPPCB	CLEAR	17.55	15.52	17.11	16.1	17.98	16.97	29.17	21.46	27.52	23.67	30.82
6	23.6.10	Anpara colony,	I	REN	UPPCB	CLEAR	17.84	15.37	17.4	15.66	17.69	16.53	30.27	20.91	28.62	22.02	29.72
6	25.6.10	Anpara colony,	I	REN	UPPCB	CLOUDY	18.27	16.39	16.82	15.95	18.13	17.26	31.92	24.77	26.42	23.12	31.37
6	30.6.10	Anpara colony,	I	REN	UPPCB	CLOUDY	17.55	15.96	16.54	15.22	17.84	16.68	29.18	23.12	25.32	20.92	30.28

Air Quality- Renusagar

STN Code	Sampling Date	Monitoring Station	TypeOf Location	City	Monitoring Agency	General WeatherCon dit	SO2_6AM_1 0AM	SO2_10AM_ 2PM	SO2_2PM_6 PM	SO2_6PM_1 0PM	SO2_10PM_ 2AM	SO2_2AM_6 AM	NO2_6AM_1 0AM	NO2_10AM_ 2PM	NO2_2PM_6 PM	NO2_6PM_1 0PM	NO2_10PM_ 2AM
7	1.6.10	REN	I	REN	UPPCB	CLEAR	17.84	15.96	17.26	16.25	18.28	17.12	30.28	23.12	28.08	24.22	31.93
7	3.6.10	REN	I	REN	UPPCB	CLEAR	18.13	16.54	17.55	16.68	17.84	16.83	31.38	25.32	29.18	25.87	30.28
7	8.6.10	REN	I	REN	UPPCB	SEMI CLEAR	17.7	15.96	17.26	16.25	18.13	17.26	29.73	23.12	28.08	24.22	31.38
7	10.6.10	REN	I	REN	UPPCB	CLOUDY	17.99	15.38	16.83	15.67	17.55	16.97	30.83	20.92	26.42	22.02	29.18
7	15.6.10	REN	I	REN	UPPCB	CLOUDY & RAIN	18.57	16.25	17.55	16.39	18.13	17.41	NIL	23.12	29.18	24.77	31.38
7	17.6.10	REN	I	REN	UPPCB	CLOUDY	18.57	16.68	17.12	16.1	17.7	16.68	33.03	25.87	27.53	23.67	29.73
7	22.6.10	REN	I	REN	UPPCB	CLEAR	17.84	16.39	17.26	15.38	17.99	17.55	30.28	24.77	28.08	20.92	30.83
7	24.6.10	REN	I	REN	UPPCB	CLOUDY	18.13	15.38	17.7	15.81	18.42	17.26	31.38	20.92	29.73	22.57	32.48
7	29.6.10	REN	I	REN	UPPCB	CLOUDY	17.55	15.96	16.97	16.54	17.84	16.97	29.18	23.12	26.98	25.32	30.28



UTTAR PRADESH POLLUTION CONTROL BOARD

REGIONAL OFFICE : SONEBHADRA

Annexure-IV

Table A : Ambient Air Quality Data for SO₂ and NO₂ Monitored by U.P.P.C.B. State Pollution Control Board

Sampling Location Address:- Anpara Colony, Sonebhadra.

City :- REN

State:- UTP

Station Code:-

06

Station type :-

I

Month:- December

Year:- 2009

Parameter	Units
SO ₂	ug/m ³
NO ₂	ug/m ³

S. No	Hrs. → Date →	SO ₂								NO ₂								Weather Condition **	Remarks
		06-10	10-14	14-18	18-22	22-02	02-06	4 hrs. Max	24 hrs. Avg.	06-10	10-14	14-18	18-22	22-02	02-06	4 hrs. Max	24 hrs. Avg.		
1)	02.12.09	21.09	18.61	19.38	18.30	20.47	18.92	21.09	19.46	38.11	29.41	32.23	28.28	36.19	30.54	38.11	32.46	Clear	
2)	04.12.09	20.62	18.14	18.76	17.99	21.40	19.38	21.40	19.38	36.76	27.71	29.97	27.14	39.59	32.23	39.59	32.23	Clear	
3)	09.12.09	21.40	18.61	19.54	18.45	20.93	19.07	21.40	19.67	39.59	29.41	32.80	28.84	37.89	31.10	39.59	33.27	Clear	
4)	11.12.09	20.78	17.83	19.07	18.30	21.24	19.69	21.24	19.49	37.32	26.58	31.10	28.28	39.02	33.37	39.02	32.61	Clear	
5)	16.12.09	21.24	18.92	19.85	19.23	20.47	19.23	21.24	19.82	39.02	30.54	33.93	31.67	36.19	31.67	39.02	33.84	Clear	
6)	18.12.09	20.62	18.14	21.09	19.23	20.93	18.85	21.09	19.81	36.76	27.71	38.45	31.67	37.89	33.93	38.45	34.40	Clear	
7)	23.12.09	21.09	18.45	20.62	18.61	20.31	19.38	21.09	19.74	38.45	28.84	36.76	29.47	35.63	32.23	38.45	33.56	Clear	
8)	25.12.09	21.55	19.07	20.16	19.54	20.78	19.69	21.55	20.13	40.15	31.10	35.06	32.80	37.32	33.37	40.15	34.97	Clear	
9)	30.12.09	20.93	18.30	19.54	18.72	21.40	19.07	21.40	19.66	37.89	28.28	32.80	30.54	39.59	31.10	39.59	33.37	Clear	

Prescribed Standards:

SO₂ - 80.00 ug/nm³

NO_x - 80.00 ug/nm³

* - Kindly fill in 'R' if station falls in Residential area, I if station falls in Industrial Area, S if station falls in sensitive area.

** - Kindly fill in Weather Conditions as Clear/Cloudy/Rainy/Cyclone/Dust Storm/Calm condition (one or more may be applicable)

Remarks:-

Note:- 1) Kindly indicate reason if monitoring is not carried out for 24 hrs. in a day or less than 8 days in a month.



UTTAR PRADESH POLLUTION CONTROL BOARD

REGIONAL OFFICE : SONEBHADRA

Table D : Meteorological Data Monitored by U.P.P.C.B. State Pollution Control Board
Sampling Location Address:- Renusagar Colony, Sonebhadra.

City :- REN
State:- UTP

Station Code :- 07

Station Type :- I

Month :- December

Year :- 2009

S. NO	Hrs. → Date →	06-10				10-14				14-18				18-22				22-02				02-06				Weather Condition	Remarks
		Temp.	R.H.	W.S.	W.D.	Temp.	R.H.	W.S.	W.D.	Temp.	R.H.	W.S.	W.D.	Temp.	R.H.	W.S.	W.D.	Temp.	R.H.	W.S.	W.D.	Temp.	R.H.	W.S.	W.D.		
1)	01.12.09	15.5	69.6	--	NE	20.7	59.6	--	SE	20.8	55.6	--	SW	17.0	59.2	--	NW	15.0	63.6	--	NW	13.3	70.0	--	SE	Clear	
2)	03.12.09	15.4	69.8	--	SE	21.0	60.2	--	SW	21.7	55.6	--	SW	17.7	58.8	--	NW	14.9	62.4	--	NW	13.4	70.2	--	SW	Clear	
3)	08.12.09	14.5	69.4	--	NW	20.5	59.6	--	W	21.3	55.2	--	W	17.0	58.8	--	SW	14.4	62.0	--	SW	12.5	69.2	--	SE	Clear	
4)	10.12.09	14.0	67.0	--	NE	20.4	58.4	--	SE	21.2	55.2	--	SE	17.0	59.2	--	S	14.6	62.4	--	S	13.0	69.6	--	SE	Clear	
5)	15.12.09	13.0	67.2	--	SW	20.1	57.6	--	NW	20.8	54.2	--	NW	16.1	58.0	--	SW	13.5	63.4	--	SW	11.6	69.8	--	SE	Clear	
6)	17.12.09	12.5	67.8	--	NW	19.4	57.2	--	SW	21.0	53.6	--	SW	18.4	58.2	--	SE	14.7	62.4	--	SE	11.6	69.6	--	SW	Clear	
7)	22.12.09	11.9	66.2	--	SW	19.1	56.8	--	NW	20.5	54.4	--	NW	17.5	58.6	--	SW	13.7	62.4	--	SW	10.3	68.8	--	SE	Clear	
8)	24.12.09	11.5	66.0	--	SE	18.3	55.0	--	SW	19.9	53.2	--	SW	17.4	57.4	--	NW	14.0	62.4	--	NW	10.2	68.8	--	SW	Clear	
9)	29.12.09	12.5	65.8	--	SW	19.4	54.4	--	NW	21.0	50.8	--	NW	18.3	55.8	--	SW	15.0	62.2	--	SW	11.2	68.2	--	SE	Clear	

* - Kindly fill in 'R' if station falls in Residential area, 'I' if station falls in Industrial Area, 'S' if station falls in sensitive area.

** - Kindly fill in Weather Conditions as Clear/Cloudy/Rainy/Cyclone/Dust Storm/Calm condition (one or more may be applicable).

Note:- Temp. : Average Temperature (in °C)
R.H. : Average Relative Humidity (in%)
W.S. : Average Wind Speed (in Km/hr.)
W.D. : Predominant Wind Direction.



UTTAR PRADESH POLLUTION CONTROL BOARD

REGIONAL OFFICE : SONEBHADRA

Table B : Ambient Air Quality Data for RSPM and SPM Monitored by U.P.P.C.B. State Pollution Control Board
Sampling Location Address:- Anpara Colony, Sonebhadra.

City :- REN
State:- UTP

Station Code:- 06 Station type:- I Month:- December Year:- 2009

Parameter	Units
SO ₂	ug/m ³
NO ₂	ug/m ³

S.NO.	Hrs. → Date ↓	RSPM					SPM				24 hrs. Avg.	Weather Condition **	Remarks
		06-14	14-22	22-06	8 hrs. Max.	24 hrs. Avg.	06-14	14-22	22-06	8 hrs. Max.			
1)	02.12.09	128	142	138	142	136	261	287	289	289	279	Clear	
2)	04.12.09	133	151	148	151	144	264	297	295	297	285	Clear	
3)	09.12.09	152	153	150	153	152	301	303	291	303	298	Clear	
4)	11.12.09	134	150	147	150	144	268	292	290	292	283	Clear	
5)	16.12.09	147	142	136	142	142	289	276	275	289	280	Clear	
6)	18.12.09	136	144	135	144	138	271	284	268	284	274	Clear	
7)	23.12.09	140	153	134	153	142	279	301	270	301	283	Clear	
8)	25.12.09	135	156	141	156	144	274	285	279	285	279	Clear	
9)	30.12.09	145	152	137	152	145	286	300	251	300	279	Clear	

Prescribed Standards:

RSPM - 120.00 ug/nm³

SPM - 360 ug/nm³

* - Kindly fill in 'R' if station falls in Residential area, 'I' if station falls in Industrial Area, 'S' if station falls in sensitive area.

** - Kindly fill in Weather Conditions as Clear/Cloudy/Rainy/Cyclone/Dust Storm/Calm condition (one or more may be applicable)

Remarks:-

Note:- 1) Kindly indicate reason if monitoring is not carried out for 24 hrs. in a day or less than 24 days in a month



UTTAR PRADESH POLLUTION CONTROL BOARD

REGIONAL OFFICE : SONEBHADRA

Table B : Ambient Air Quality Data for RSPM and SPM Monitored by U.P.P.C.B. State Pollution Control Board

Sampling Location Address:- Renusagar Colony, Sonebhadra.

City :- REN

State:- UTP

Station Code:-

07

Station type :-

I

Month:- December

Year:- 2009

Parameter	Units
SO ₂	ug/m ³
NO ₂	ug/m ³

S. NO.	Hrs. → Date ↘	RSPM					SPM					Weather Condition **	Remarks
		06-14	14-22	22-06	8 hrs. Max.	24 hrs. Avg.	06-14	14-22	22-06	8 hrs. Max.	24 hrs. Avg.		
1)	01.12.09	145	140	152	152	146	273	268	287	287	276	Clear	
2)	03.12.09	150	148	165	165	154	277	272	290	290	280	Clear	
3)	08.12.09	156	150	170	170	159	280	275	305	305	287	Clear	
4)	10.12.09	153	138	164	164	152	278	265	293	293	279	Clear	
5)	15.12.09	168	155	175	175	166	315	300	325	325	313	Clear	
6)	17.12.09	173	163	169	173	168	320	310	330	330	320	Clear	
7)	22.12.09	164	158	178	178	167	324	315	333	333	324	Clear	
8)	24.12.09	148	142	155	155	148	308	325	338	338	324	Clear	
9)	29.12.09	170	166	179	179	172	290	305	332	332	309	Clear	

Prescribed Standards:

RSPM - 120.00 ug/nm³

SPM - 360 ug/nm³

* - Kindly fill in 'R' if station falls in Residential area, 'I' if station falls in Industrial Area, 'S' if station falls in sensitive area.

** - Kindly fill in Weather Conditions as Clear/Cloudy/Rainy/Cyclone/Dust Storm/Calm condition (one or more may be applicable)

Remarks:-

Note:- 1) Kindly indicate reason if monitoring is not carried out for 24 hrs. in a day or less than 8 days in a month



UTTAR PRADESH POLLUTION CONTROL BOARD

REGIONAL OFFICE : SONEBHADRA

Table D : Meteorological Data Monitored by U.P.P.C.B. State Pollution Control Board
Sampling Location Address:- Anpara Colony, Sonebhadra.

City :- REN
State:- UTP

Station Code :- 06

Station Type :- I

Month :- December

Year :- 2009

State of Karnataka																												Weather Condition	Remarks
S. NO	Hrs. → Date →	06-10				10-14				14-18				18-22			22-02					02-06							
		Temp.	R.H	w.S	W.D	Temp.	R.H.	W.S	W.D.	Temp.	R.H.	W.S	W.D	Temp.	R.H.	W.S	W.D.	Temp.	R.H	W.S	W.D	Temp.	R.H.	W.S	W.D				
1)	02.12.09	16.6	66.6	--	NE	22.3	60.0	--	E	24.0	55.0	--	E	21.7	56.8	--	SE	19.1	61.8	--	SE	15.4	66.8	--	NE	Clear			
2)	04.12.09	15.7	64.0	--	NW	21.4	96.0	--	W	23.0	50.8	--	W	21.0	52.2	--	SW	18.7	57.0	--	SW	14.6	64.6	--	S	Clear			
3)	09.12.09	15.2	61.8	--	N	21.0	54.0	--	W	22.6	49.0	--	W	20.2	52.0	--	SW	17.2	57.0	--	SW	13.8	63.2	--	NW	Clear			
4)	11.12.09	16.2	60.8	--	E	21.4	53.0	--	SE	22.5	48.0	--	SE	20.2	51.0	--	E	16.5	56.4	--	E	13.0	63.6	--	NE	Clear			
5)	16.12.09	14.7	58.8	--	NE	20.4	51.0	--	E	21.9	46.0	--	E	19.9	49.2	--	SE	16.9	56.0	--	SE	13.2	63.2	--	S	Clear			
6)	18.12.09	12.3	60.8	--	N	19.0	53.0	--	NW	21.0	48.8	--	NW	18.7	50.8	--	W	15.4	56.0	--	W	12.0	62.6	--	SW	Clear			
7)	23.12.09	12.6	57.0	--	W	18.4	49.0	--	SW	19.6	43.8	--	SW	17.5	46.0	--	W	15.2	52.0	--	W	11.5	59.6	--	NW	Clear			
8)	25.12.09	11.7	57.0	--	NE	17.5	49.0	--	E	19.5	44.0	--	E	16.9	47.2	--	SE	14.2	54.0	--	SE	10.7	60.6	--	NE	Clear			
9)	30.12.09	11.6	58.8	--	N	16.4	51.0	--	E	19.0	46.0	--	E	16.4	50.4	--	SE	13.2	57.0	--	SE	9.8	62.0	--	NE	Clear			

* - Kindly fill in 'R' if station falls in Residential area, 'I' if station falls in Industrial Area, 'S' if station falls in sensitive area

** - Kindly fill in Weather Conditions as Clear/Cloudy/Rainy/Cyclone/Dust Storm/Calm condition (one or more may be applicable)

Note:- Temp. : Average Temperature (in °C)
R.H. : Average Relative Humidity (in%)
W.S. : Average Wind Speed (in Km/hr.)
W.D. : Predominant Wind Direction.



UTTAR PRADESH POLLUTION CONTROL BOARD
REGIONAL OFFICE : SONEBHADRA

Annexure-IV

Table A : Ambient Air Quality Data for SO₂ and NO₂ Monitored by U.P.P.C.B. State Pollution Control Board
 Sampling Location Address:- Renusagar Colony, Sonebhadra.

City :- REN
 State:- UTP

Station Code:- 07 Station type :- I Month:- December Year:- 2009

Parameter	Units
SO ₂	ug/m ³
NO ₂	ug/m ³

S. No	Hrs. → Date →	SO ₂								NO ₂								Weather Condition **	Remarks
		06-10	10-14	14-18	18-22	22-02	02-06	4 hrs. Max	24 hrs. Avg.	06-10	10-14	14-18	18-22	22-02	02-06	4 hrs. Max	24 hrs. Avg.		
1)	01.12.09	20.31	18.14	20.00	18.61	20.78	18.92	20.78	19.46	35.63	33.37	34.50	29.41	37.32	30.54	37.32	33.46	Clear	
2)	03.12.09	21.09	19.07	20.47	19.23	20.16	18.61	21.09	19.77	38.45	31.10	36.19	31.67	35.06	29.41	38.45	33.65	Clear	
3)	08.12.09	21.40	19.54	20.16	18.76	20.62	19.38	21.40	19.98	39.59	32.80	35.06	29.97	36.76	32.23	39.59	34.40	Clear	
4)	10.12.09	21.08	18.92	19.85	19.38	20.93	20.00	21.09	20.03	38.45	30.54	33.93	32.23	37.89	34.50	38.45	34.59	Clear	
5)	15.12.09	20.78	19.69	20.16	19.23	21.24	19.54	21.24	20.11	37.32	33.37	35.06	31.67	38.99	32.80	38.99	34.87	Clear	
6)	17.12.09	21.40	19.23	19.54	18.76	20.62	18.92	21.40	19.75	39.59	31.67	32.80	29.97	36.76	30.54	39.59	33.56	Clear	
7)	22.12.09	21.09	19.85	20.62	19.44	21.24	20.00	21.24	20.37	38.45	33.93	36.76	32.23	39.02	34.50	39.02	35.82	Clear	
8)	24.12.09	21.71	19.38	20.16	19.23	20.62	20.31	21.71	20.24	40.72	32.23	35.06	31.67	36.76	35.63	40.72	35.35	Clear	
9)	29.12.09	21.24	20.00	20.78	19.69	21.55	19.69	21.55	20.49	39.02	34.50	37.32	33.37	40.15	39.02	40.15	37.23	Clear	

Prescribed Standards:

SO₂ - 80.00 ug/nm³

NO_x - 80.00 ug/nm³

* - Kindly fill in 'R' if station falls in Residential area, 'I' if station falls in Industrial Area, 'S' if station falls in sensitive area

** - Kindly fill in Weather Conditions as Clear/Cloudy/Rainy/Cyclone/Dust Storm/Calm condition (one or more may be applicable)

Remarks:-

Note:- 1) Kindly indicate reason if monitoring is not carried out for 24 hrs. in a day or less that & days in a month.



UTTAR PRADESH POLLUTION CONTROL BOARD

REGIONAL OFFICE : SONEBHADRA

Table C : Summary of Ambient Air Quality Data Monitored by U.P.P.C.B. State Pollution Control Board
Sampling Location Address:- Anpara Colony, Sonebhadra.

City :- REN
State :- UTP

S No	Sampling Location Address	Station Type	Station Code	Month and Year	SO ₂				NO ₂				RSPM				SPM					
					n	A.M.	S.D.	Max.	n	A.M.	S.D.	Max.	n	A.M.	G.M.	S.D.	Max.	n	A.M.	G.M.	S. D.	Max.
1)	Anpara Colony III-50 Anpara Sonebhadra	I	06	Dec., 2009	54	19.68	0.2285	21.55	54	33.41	0.8957	40.15	27	143	142	4.5277	156	27	282	282	6.7268	303
2)	Renusagar Colony N-23/10 Renusagar Sonebhadra	I	07	Dec., 2009	54	20.01	0.3263	21.71	54	34.77	1.2301	40.72	27	159	158	9.5328	179	27	301	300	20.5335	338

* - Kindly fill in 'R' if station falls in Residential area, 'I' if station falls in Industrial Area, 'S' if station falls in sensitive area.

Note:- n = Number of observations (in days)
A.M. = Arithmetic mean in ug/m³
S.D. = Standard Deviation
Max. = Maximum value (24 hours average in ug/m³).
G.M. = Geometric Mean in ug/m³



UTTAR PRADESH POLLUTION CONTROL BOARD

REGIONAL OFFICE : SONEBHADRA

Details of Stations and Sources

S. No.	Complete Mailing Address of Monitoring Station	Type of Station	Height above ground where Instrument is located	Major Sources of Air Pollutants near the monitoring site** (a) Vehicular (b) Domestic (c) DG sets etc.	Remarks
1)	Anpara Colony III-50 Anpara, Sonebhadra.	I	24 Feet	A.T.P.S. and B.T.P.S. Near Highway Varanasi-Shaktinagar (U.P.)	
2)	Renusagar Colony N-23/10 Renusagar, Sonebhadra.	I	22 Feet	Renusagar Power Co. (HINDALCO) 2 nd Near Coalgate Div. Ist (U.P.)	

* - Kindly fill in 'R' if station falls in Residential area, 'I' if station falls in Industrial Area, 'S' if station falls in sensitive area.

** - Kindly fill in details of industries, fuel used, pollutants emitted, vehicle density and type of vehicles, domestic fuel used or any other sources.

STATUS OF POLLUTION CONTROL IN THE LARGE AND MEDIUM INDUSTRIES OF 17 CATEGORIES:

Sl. No.	Name of Industries with complete Address	17 Category type	Sector whether CU/SU/PU/CP	Pollution Control System		Analyzed parameter of stacks emission
				ETP Unit	Emission Control System	
1	2	3	4	5	6	7
1.	NTPC, Shaktinagar, Sonebhadra	Thermal Power 2x500 MW 5X200 MW	CU	Ash Slurry discharges into dyke and finally after proper settling discharges into Rihand Dam. For coal handling plant effluent treatment plant is installed and also STP installed for domestic waste water treatment.	With each units ESP is installed and emissions are as per board norms.	SPM = 135 mg/NM ³ CO ₂ = 11.7 % NO ₂ = 7.5 % Velocity = 1309050 Nm ³ /hr.
2.	NTPC, Rihand Nagar, Sonebhadra	Power Generation- 2x500 MW 2x500 MW	CU	Ash Slurry after proper treatment through ashdyke, total effluent is being recycled into plant for different purposes, Industry has septic Tank/Oxidation Pond for domestic wastewater treatment. For coal handling plant effluent passes through settling pond. Only in case of flood effluent may be discharged into Rihand reservoir.	With each units ESP is installed and emission are being emit as per board norms.	SPM = 143 mg/NM ³
3.	Anpara Thermal Power Station Unit-A, Anpara, Sonebhadra	Power Generation- 3x210 MW	SU	Ash slurry effluent discharge into ash dyke after proper settling finally goes into Rihand reservoir. Industry has installed sewage treatment plant for domestic wastewater.	With each units ESP is installed and due to less capacity emission are not being as per board norms.	SPM = 413 mg/NM ³ Volume = 460Lt. Vel. = 16.7 m/s Temp. = 136C
4.	Anpara Thermal Power Station Unit-B, Anpara, Sonebhadra	Power Generation- 2x500 MW	SU	Ash slurry discharges into dykes after proper settling finally goes into Rihand reservoir. Effluents are not being treated as per board norms.	With each units ESP is installed and due to less capacity emission are not being as per board norms.	SPM = 145 mg/NM ³ SO ₂ = 959 NO _x = 530 mg/NM ³ CO ₂ = 11.7 % CO = 15% O ₂ = 7.5 % Vel. = 25.48 m/s flow Rate = 292496 NM ³ /h temp = 142.2 C
5.	Obra Thermal Power Station Unit-A, Obra, Sonebhadra	Power Generation- 5x50 MW 3x100 MW	SU	Ash slurry discharges into dykes. Domestic effluent are being treated in septic tank. Effluents are not being treated as per board norms.	In 3x100MW unit mechanical precipitator and ESP are being installed and wit 5x50 MW unit mechanical dust collectors are being installed. Emissions are much more as compare with board norms.	SPM = 1942 mg/NM ³

Contd...p/2.

1	2	3	4	5	6	7
6.	Obra Thermal Power Station Unit-B , Obra, Sonebhadra	Power Generation- 5x200 MW	SU	Ash slurry discharges into dykes and rest quantity is being passed by Jhariya Nala. Domestic effluent is being treated in septic tank. Effluents are not being treated as per board norms.	In all units less capacity ESP's are being installed which are failed to work as board norms.	SPM = 1454 mg/NM ³ (Dated 14.4.06) SPM = 6217 mg/NM ³ (Dated 31.7.06)
7.	M/s. Dalla Cement Factory, (A Unit of Jai Prakash Associates) Dalla, Sonebhadra.	Cement Clinker- 66000MT/M PPC- 30000MT/M CPP 27 M.W.	PU	Only domestic Septic Tanks Soak Pit – STP -Proposed.	ESP – Kiln ESP – Coller Bag Filters - Coal Mill & Transfer Point	SPM = 45 mg/NM ³ Velocity = 16.58 m/s Ht.=110 m
8.	M/s. Churk Cement Factory, Churk, Sonebhadra.	Cement	PU	-----Not operational-----		
9.	Hindalco Industries Ltd. (Renusagar Power Division) Renusagar.	Thermal Power Gen 750MW.	PU	Ash slurry effluent discharged into ash dykes and finally after proper treatment total effluent is being reused in industrial process. Effluent generated from floor washing after neutralizing kept in pit and then finally by pip into ash dyke. Industry has STP for domestic wastewater treatment.	With each units ESP is installed and emission are being emit as per board norms.	SPM = 126 583 mg/NM ³
10.	Hindalco Industries Ltd. Renukoot, Sonebhadra	Aluminium metal	PU	ETP & STP both has been upgraded and treated effluent is recycled back for process use and etc. Industrial effluent treated by collection pit, neutralization tank, HRSCC, Centrifuge and sludge drying bed. Domestic effluent is being treated by Fluidised Aerobic Bio-reactor	Air pollution control unit consist ESP, DSS, FTP, Computerized Oil Firing system and emission are as per well below PCB norms.	PM = 127.20
11.	Kanoria Chemicals & Industries Ltd. Renukoot, Sonebhadra.	Chemical Industry	PU	Treatment unit for Industrial effluent. Mercury effluent is being totally recycled. Effluent is being treated as per PCB norms. Domestic effluent treated by septic tank/Soak pit.	Proper system for air pollution control unit. Chlorine neutralization plant, hypo plant and fume scrubber are there. MCDC & Bag Filter are installed in Boiler.	SPM = 79 mg/NM ³ SO ₂ = 93 Flow rate = 215865 m ³ /hr.
12.	Kanoria Chemicals (Power Generation Unit) Renukoot, Sonebhadra.	Thermal Power 2x25MW	PU	Dry as disposal for brick manufacturing.	ESP & Bag filter.	Flow rate = 219186 m ³ /hr SPM = 120 mg/NM ³ SO ₂ = 212
13.	Hitech Carbon Renukoot, Sonebhadra	Carbon Black 170T/Y	PU	Industrial effluent treated by primary treatment pit oil skimmer, oil separator imhoff clarifier settling tank pH adjustment tank Sludge drying bed. Domestic effluent is being treated by septic tank/soak pit tank.	Plume consist Bag filter purge bag filter. Emission are being emit as per board norms.	SPM = 112 mg/NM ³ SO ₂ = 890 NO _x = 22.50 CO = 10 ppm

The analysis result of soil testing of Village Renukoot, Govindpur, Myorpur, Hathinala, Murdhua and Pipri

SOIL ANALYSIS RESULTS

Sr. No.	Parameter	UOM	S1	S2	S3	S4	S5
1	pH (1:5 Aq.Extract)	----	7.8	7.6	7.2	6.6	7.5
2	Conductivity (1:5 Aq.Extract)	μS/cm	156	143	297	208	163
3	Texture	----	Sandy clay	Sandy clay	Sandy clay	Sandy clay	Sandy clay
4	Sand	%	62	52	56	46	46
5	Silt	%	18	12	08	12	06
6	Clay	%	20	36	36	42	48
7	Bulk Density	mg/cc	1.1	1.1	1.2	1.1	1.2
8	Exchangeable Calcium as Ca	mg/kg	953	598	2150	2594	1710
9	Exchangeable Magnesium as Mg	mg/kg	579	242	1838	1819	918
10	Exchangeable Sodium as Na	mg/kg	87.4	81.7	280.7	128.7	162.5
11	Available Potassium as K	Kg/ha	1003	697	3968	640	594
12	Available Phosphorous as P	Kg/ha	63.3	12.4	56.9	62	94.3
13	Available Nitrogen as N	Kg/ha	67.9	98.7	86.4	124	151.8
14	Organic Matter	%	0.65	0.93	0.74	1.16	1.31
15	Organic Carbon	%	0.38	0.54	0.43	0.68	0.76
16	Water Soluble Chloride as Cl	mg/kg	70.8	84.9	127.5	85	56.6
17	Water Soluble Sulphate as SO ₄	mg/kg	62.1	29.8	20.1	110.4	19.7
18	Sodium Absorption Ratio	----	0.25	0.32	0.48	0.21	0.35
19	Aluminium	%	1.92	1.48	1.69	1.43	1.60
20	Total Iron	%	0.86	0.93	0.79	1.02	0.69
21	Manganese	mg/kg	162.8	148.6	188.4	148.1	158.4
22	Zinc	mg/kg	143.4	118.1	128.3	101.9	162.4
23	Boron	mg/kg	44.8	42.1	61.8	53.9	68.2
24	Fluoride	mg/kg	185.7	120.6	98.3	168.4	114.8

SOIL ANALYSIS RESULTS

Sr. No.	Parameter	UOM	S6	S7	S8	S9	S10
1	pH (1:5 Aq.Extract)	----	6.5	10.8	6.9	7.2	6.9
2	Conductivity (1:5 Aq.Extract)	μS/cm	326	3869	276	451	237
3	Texture	----	Sandy Clay		Sandy Clay	Sandy Clay	Sandy Clay
4	Sand	%	54	-	46	51	58
5	Silt	%	10	-	09	03	07
6	Clay	%	36	-	45	46	35
7	Bulk Density	mg/cc	1.2	1.1	1.1	1.1	1.1
8	Exchangeable Calcium as Ca	mg/kg	3593	1435	1637	1112	1838
9	Exchangeable Magnesium as Mg	mg/kg	3128	2834	1504	893	1653
10	Exchangeable Sodium as Na	mg/kg	214	209	172	278	443.5
11	Available Potassium as K	Kg/ha	2378	860	1947	5934	933
12	Available Phosphorous as P	Kg/ha	121.1	156	63	83.4	58
13	Available Nitrogen as N	Kg/ha	158	128	102.2	113	73.3
14	Organic Matter	%	1.36	1.21	0.96	1.06	0.69
15	Organic Carbon	%	0.79	0.70	0.56	0.51	0.4
16	Water Soluble Chloride as Cl	mg/kg	99.1	85	113.2	115.6	70.7
17	Water Soluble Sulphate as SO ₄	mg/kg	23.2	13.9	16.0	16.7	32.1
18	Sodium Absorption Ratio	----	0.28	0.33	0.33	0.68	0.81
19	Aluminium	%	1.62	1.48	1.86	1.69	1.92
20	Total Iron	%	0.86	0.98	1.21	0.72	0.88
21	Manganese	mg/kg	183.6	148.9	162.5	182.8	206.3
22	Zinc	mg/kg	112.6	162.8	118.9	132.6	142.4
23	Boron	mg/kg	38.9	46.3	32.1	36.2	46.9
24	Fluoride	mg/kg	177.6	192.7	154.1	180.5	191.4

Soil samples locations

S.N.	Name of village	Distance (Km)	Direction from site
1.	Chakari	3.4	North - West
2.	Garbani	7.9	South - East
3.	Kariya	3.2	South - West
4.	Bari	7.3	North - East
5.	Karamsar	3.9	South - West
6.	Parsoi	6.9	West

Analysis Results of Soil Samples

S.N.	Parameters	Unit	Location					
			S1	S2	S3	S4	S5	S6
1.	pH		7.82	8.32	8.11	7.85	8.02	8.21
2.	Arsenic	µg/g	ND	ND	ND	ND	ND	ND
3.	Cadmium	µg /g	ND	ND	ND	ND	ND	ND
4.	Calcium	µg /g	10448	13778	12240	11749	12534	13497
5.	Lead	µg/gm	10.13	13.74	15.44	22.57	7.09	9.19
6.	Magnesium	µg/gm	4805	9515	12884	6393	5910	7376
7.	Nickel	µg/gm	15.73	30.06	45.14	152.04	156.56	58.65
8.	Phosphorus	µg/gm	390	240	300	730	430	600
9.	Potassium	µg/gm	4256	5511	4138	3598	5590	4338
10.	Total Chromium	µg/gm	31	42	55	56	49	68
11.	Zinc	µg/gm	40	64	54	72	45	50
12.	Nitrogen	%	0.11	0.07	0.05	0.013	0.07	0.084
13.	Conductivity	µmhos/cm	0.200	0.141	0.211	0.191	0.178	0.245

analysis result of soil testing of Villages Renusagar, Termuni, ati, Rehata and Churidel.

SOIL ANALYSIS RESULTS (POST MONSOON SEASON- 2008)

Parameter	UOM	S1	S2	S3	S4	S5	S6
pH(1:5 Aq.Extract)	--	7.4	7.3	6.9	7.4	7.2	6.5
Conductivity	μS/cm	320	290	380	210	450	332
Texture	--	Sand loam	Sand loam	Sand Clay	Slit Clay	Sand loam	Sand loam
Sand	%	52	47	45	14	56	36
Silt	%	28	28	30	45	24	40
Clay	%	20	35	20	41	20	14
Bulk Density	g/cc	1.4	1.2	1.8	1.3	1.6	1.5
Exchangeable Calcium as Ca	mg/kg	272	258	253	485	313	289
Exchangeable Magnesium as Mg	mg/kg	13	11	16	65	14	45
Exchangeable Sodium as Na	mg/kg	31	29	32	31	38	19
Available Potassium as K	Kg/ha	9.9	9.4	11	39	11	28
Available Phosphorous as P	Kg/ha	2.1	2.2	2.6	2.9	3.0	3.8
Available Nitrogen as N	Kg/ha	4.0	4.1	4.5	3.9	5.7	4.5
Organic Matter	%	0.2	0.9	0.8	0.3	0.5	0.3
Organic Carbon	%	0.3	1.5	1.4	0.5	1.8	0.5
Water Soluble Chloride as Cl	mg/kg	11	12	14	16	17	13
Water Soluble Sulphate as SO ₄	mg/kg	26	24	27	25	31	24
Sodium Absorption Ratio	--	0.43	0.07	0.04	0.17	0.10	0.08

Source: EIA studies, Vimta Labs Limited

The analysis result of soil testing of Village Jurwani, Dahkudandi, Kota, Chhikra, Pakari, Chopan, Obra Bazar, Ningha, Paraspani, Kanauja, Dalla, Bari, Kajrahat.

SUMMARY OF THE SOIL QUALITY

S.No.	Parameters	Plant Site	Villages
1	pH	7.7	7.5 – 8.01
2	Soluble salts [mg/Kg]	192	96 – 342
3	Organic carbon [%]	0.48	0.34 – 0.58
4	Texture	Silty Clay	Sandy Clay/Silty Clay
5	Sand [%]	22	18 - 68
6	Silt [%]	45	17 – 47
7	Clay [%]	33	15-43
8	Chlorides [mg/kg]	38	12-65
9	Nitrates[mg/kg]	10	7-25
10	Phosphorus[mg/kg]	8	7-23
11	Potassium[mg/kg]	74	47-228

Note:- The soil sampling results have been taken from the EIA reports of different Industries of Singrauli Area.

Annexure No. XI

ANALYSIS RESULT OF GROUND WATER

Sl. No.	Date	Place	Analysed Parameters							
			pH	Ca	Mg	Hardness	Chloride	Alkalinity	TDS	Floride
1.	29.07.10	Primary School Govindpur	7.21	54.0	20.0	74.0	17.0	212.0	292.0	Not detectable
2.	29.07.10	Near House of Vill. Kusumaha	6.85	96.0	126.0	232.0	83.0	244.0	328.0	0.90
3.	29.07.10	Infront of Panchayat Bhavan, Vill. Kusumaha	7.36	92.0	82.0	174.0	56.0	192.0	342.0	0.460
4.	29.07.10	Near Pokhra of west of pokhra Ramvilas	7.76	58.0	50.0	108.0	27.0	116.0	256.0	0.84
5.	29.07.10	Infront of House of Shri Kevel under Pepal Tree	6.79	72.0	118.0	190.0	38.0	198.0	304.0	0.87

Sl. No.	Sampling points of Hand Pumps underground water	Date	Analysed Parameters				
			pH	Iron (mg/L)	Flouride (mg/L)	Mercury (mg/L)	Lindane (ppb)
1	2	3	4	5	6	7	8
1.	Hand Pump India Marka-II - Kushmaha Vill. Renukoot near Ramshakal Ka Pokhras West of Road.	28.07.08	1.37	0.21	2.3	< 0.001	--
2.	India Marka-II - Kushmaha Vill. Renukoot at the residence Gram Pradhan.	27.07.08	1.04	1.95	1.78	0.007	--

1	2	3	4	5	6	7	8
3.	<u>India Marka-II</u> 1. Near the House of Chhedi, Saraju, Ramesh. 2. Near the House of Ram Kawal, Pannalal, Madan. 3. Near the House of Ram Shakal, Angad, Pradumn. 4. West of Ram Shakal Ka Pokhara 5. Infront of Vill. Pradhan House.	20.10.08 ,, ,, ,, ,,					0.04 0.03 0.04 0.03 0.03
4.	<u>India Marka-II</u> 1. Hand Pump Village Khatal near Dongiya Nala 2. Hand Pump Village Labhari	09.03.10 ,,	6.37 6.61	-	0.98 0.93	- -	- -

Note: The analysis result of sample collected on dated 27.7.08 & 28.7.08 pertains to persevered .

Photocopy of ground Quality report for the month of April 2010 under MINARS PROJECT is being enclosed for the sampling points of Hand pump (Kanoria Chemical Industries) near Railway Station Renukoot and Handpump of Singrauli industrial area near Bus Station Sakti Nagar Sonebhadra.

I.S.I. Standards for drinking water (I.S. 10500 – 1983)

Iron mg/L = 0.3
 Flouride mg/L = 06 – 1.2
 Mercury mg/L = 0.001
 Pestisides = Absent

Ground Water Quality Report for the month of April 2010 under MHNARS project

S No	PARAMETER	SAMPLING POINTS					
		Hand Pump Mirzapur Industrial area Mirzapur	Hand Pump IFFCO phulpur near Fazilapur Allahabad	Hand Pump (KCI) near Railway station Renukoot Sonebhadra	Hand Pump Singrauli Industrial Area Near Bus station Shakti nagar Sonebhadra	Hand Pump At Industrial Area Naini Allahabad	Hand Pump At Industrial Area Fatehpur
	Station Number	1757	1759	1760	1761	2469	2470
	Date of sampling	9-Apr	9-Apr	8-Apr	8-Apr	7-Apr	7-Apr
	GENERAL PARAMETERS						
1	Total Alkalinity (mg/L)	420	412	152	200	176	772
2	P-Alkalinity (mg/L)	NT	NT	NT	NT	NT	NT
3	Total Fixed Solids (mg/L)	290	215	284	175	247	490
4	Total Suspended Solids (mg/L)	44	36	40	55	35	48
5	Fluoride (mg/L)	1.2	1.4	2.7	2.2	0.9	1.8
6	Sulphate (mg/L)	8.16	35.0	22.2	13.7	9.38	24.6
7	Sodium (mg/L)	10	8	14	16	8	14
8	Potassium (mg/L)	8	7	12	15	9	12
	TRACE METALS						
1	Arsenic (mg/L)	NT	NT	NT	NT	NT	NT
2	Nickel (mg/L)	NT	NT	NT	NT	NT	NT
3	Copper (mg/L)	NT	NT	NT	NT	NT	NT
4	Mercury (mg/L)	---	---	---	---	---	---
5	Chromium (mg/L)	NT	NT	NT	NT	NT	NT
6	Cadmium (mg/L)	NT	NT	NT	NT	NT	NT
7	Zinc (mg/L)	0.025	0.027	0.029	0.044	0.026	0.032
8	Lead (mg/L)	NT	NT	NT	NT	NT	NT
9	Iron (mg/L)	0.285	0.268	0.649	0.783	0.276	0.335
	PESTICIDE						
1	Total BHC (ng/L)	NT	NT	NT	NT	NT	NT
2	DDT (ng/L)	NT	NT	NT	NT	NT	NT
3	PP DDT (ng/L)	NT	NT	NT	NT	NT	NT
4	Alpha Endosulphan (ng/L)	NT	NT	NT	NT	NT	NT
5	Beta Endosulphan (ng/L)	NT	NT	NT	NT	NT	NT
6	Dieldrin (ng/L)	NT	NT	NT	NT	NT	NT
7	Carbonyl(Carbamate) (ng/L)	---	---	---	---	---	---
8	2,4D (ng/L)	---	---	---	---	---	---
9	Aldrin (ng/L)	NT	NT	NT	NT	NT	NT
10	Malathion (ng/L)	---	---	---	---	---	---
11	Methyl Parathion (ng/L)	---	---	---	---	---	---
12	Anilophos (ng/L)	---	---	---	---	---	---
13	Chloropyriphos (ng/L)	---	---	---	---	---	---

Note: 1- NT - Not Traceable.

2- Trace Metals & Pesticide are analysed in the other laboratories.

3- ---Not analysed.

Asstt.
08/06/10

Scientific Assistant

Asstt. Scientific Officer

Regional Officer

Summary of proposed action points - Short term action points (NTPC Rihand & Shakti Nagar)

Sl.No.	Action Points	Compliance Status
1.	An action plan to achieve PM emission of 100mg/NM ³	1. Action for Feasibility study has been initiated. Study has been started also. The report shall be sent on completion of study.
2.	Provision of dry ash collection system.	2. Action plan for 100% dry ash utilization submitted.
3.	On line opacity meter has been install in stack of all power plants of NTPC. The matter of linking data of CPCB/UPPCB Network will be carried out with in six months.	3. Data has been made available on station server. Operational security and net working is being examined as it is directly related with operational control of unit.
4.	Five continuous Ambient Air Quality Monitoring Stations (Rihand 3 & Shakti Nagar 2) are commissioned and the same will be linked with CPCB/UPPCB network within six month.	4. Continuous ambient air quality monitoring stations has been stabilized. Action for data transmission from Singrauli station to CPCB network is in advance stage and will be complied by end July, 2010.
5.	Complete recirculation of new ash pond over flow to achieve zero discharge effluents shall be achieved by NTPC Shakti Nagar.	5. Work of installation of AWRS for new ash pond has been awarded in June, 2010 and completion target is 27 months. Since the work has been awarded, the condition stated was difficult to be met & NTPC-Shaktinagar has requested UPPCB and CPCB to off bank guarantee vide letter dated 15.04.2010 & 22.04.2010 respectively, it is requested that condition of bank guarantee may please be waived off.
6.	Facilities shall be installed for control and treatment of Oil spillage.	6. Complied.
7.	Hazardous Waste shall be treated and disposed properly.	7. Complied. HW Waste is being sold to registered recyclers through MSTC.
8.	Proper Management of Bio-Medical Waste generated from Hospital of NTPC Units shall be ensured.	8. Complied.

Summary of proposed action points - Short term action points
ISSUES REGARDING UPPCL POWER PLANTS (OBRA & ANPARA)

Sl.No.	Action Points	Compliance Status
1.	Complete recycle of ash pond over flow.	Refurbishment Package has been sanctioned for Up gradation of Obra Power Plant in terms of ash water recirculation system. Anpara Power Plant is yet to get sanction of Ash water recirculation system.
2.	Provision of dry ash collection system.	Refurbishment Package has been sanctioned for Up gradation of Obra Power Plant in terms of ash water recirculation system. Anpara Power Plant has yet to submit the Action Plan.
3.	High Oil spillage has been observed in the drain. Up-gradation of ETP shall be completed within 2 years by Obra TPS.	Refurbishment Package has been sanctioned for Up gradation of Obra Power Plant in terms of ash water recirculation system.

ISSUES REGARDING HINDLACO CAPTIVE POWER PLANT

Sl.No.	Action Points	Compliance Status
1.	Installation of continuous Ambient Air Quality Monitoring Station.	Offers for continuous monitoring equipment have been received and discussed with vendors as per our criteria.
2.	Complete recycle of ash pond over flow.	AWRS system has been installed and effluent after treatment is recycled and reused in the process. There is no discharge.

Summary of proposed action points - Short term action points

ISSUES REGARDING HINDLACO INDUSTRIES LTD. ALUMINUM DIVISION

Sl.No.	Action Points	Compliance Status
1.	Up gradation / retrofitting in baking furnace	The emissions of retrofitted Baking Furnace No. 4 are being monitored regularly. Technical discussions for retrofitting of other furnaces are in progress. Bank Guarantee for Rs.10.0 lacs (Rs. Ten Lacs only) has been submitted to SPCB on April 29, 2010.
2.	To achieve of PM emission ($< 50\text{mg}/\text{Nm}^3$) should be carried out by March, 2011.	Industry has completed first phase of retrofitting work for Furnace # 4 ($\text{PM } 86\text{-}96 \text{ mg}/\text{Nm}^3$) its 2 nd phase retrofitting in progress. Except in case of Furnace # 5 ($\text{PM-}38\text{-}46\text{mg}/\text{Nm}^3$), conc. Of PM in other furnaces (1, 2 & 3) remain in the range of $86\text{-}117 \text{ mg}/\text{Nm}^3$.
3.	Installation of one continuous Ambient Air Quality Monitoring Station should be installed in collaboration with Kanoria Chemicals Limited & Hi- Tech Carbon Limited.	Offers for continuous monitoring equipment have been received and discussed with vendors as per our criteria. A visit has been scheduled in this month to see the Opsis instrument installed at IGI Airport, New Delhi in collaboration with Hi-Tech and Kanoria Chemicals, Renukoot. The final order would be released after monitoring the performance of installed equipment.
4.	Monitoring of Fluoride in all Stack.	On-line monitoring of PM and F performed in all pot-line stacks ($F_{\text{gas}} - 0.44 - 1.06 \text{ mg}/\text{Nm}^3$; $F_{\text{part}} - 1.51 - 2.69 \text{ mg}/\text{Nm}^3$).
5.	Monitoring of Fluoride emission in pot room and roof top.	Periodic monitoring by LVS undertaken for fugitive and roof top emissions (roof top SPM – $335 \mu\text{gm}/\text{m}^3$, $F_{\text{gas}} - 159 \mu\text{gm}/\text{m}^3$).
6.	Monitoring of PAH and HC in Anode Baking stack.	PAH and HC monitoring awarded to outside agency (PAH reported not detectable and HC- $8.17\text{mg}/\text{Nm}^3$); latest report (Dec, 2008) awaited.
7.	Monitoring of Ground water (at least two locations) near the Red mud Pond, for Fe, F, CN & reporting of data to CPCB & UPPCB.	Six piezometers drilled. Work for quarterly monitoring awarded to ITRC. Data regularly submitted.

Summary of proposed action points - Short term action points

ISSUES REGARDING KANORIA CHEMICALS & INDUSTRIES LTD. (CHEMICAL DIVISION)

Sl.No.	Action Points	Compliance Status
1.	Treatment of brine sludge to reduce mercury concentration in the leach ate to less than 0.1 mg/L.	Brine sludge treatment with chlorinated brine started (Hg content in sludge reduced from 80-100mg/Kg to 12-15 mg/Kg), Sludge generation is 19 Kg/t of Caustic soda (2008), records maintained. As per ITRC report leachable mercury in sludge is of the order of 0.06 mg/l. Waste from Lindane plant earth capped, sodium hypo plant installed to reduce cau-sludge generation, TCB sludge and other hazardous sludge being stored in impervious area, Salt used conform to BIS norm.
2.	Quantification of brine sludge generation and submission of reports to CPCB and SPCB.	
3.	Reduction in mercury emission to less than 2 gm/T of the product.	Total mercury emission are appx. 6 g/t of product. The emission in cell room is of the order of 0.6 to 1.0 gm/ton of product. Total Hg loss is 41.5 g/t of product, whereas unaccounted Hg is 3.4 g/t of product.
4.	Installation of online mercury analyzer and individual flow meters for quantification of effluent discharge from cell house, brine plant, chlorine handling and HCL plant.	Industry claims not required as total recycling of mercury bearing waste water is claimed. Flow records maintained.
5.	Complete recycling of effluent from the plant.	Completed.
6.	Monitoring of groundwater for at least two locations (Hg, Res. Cl, OCPs and general parameters) near sludge/HW disposal area and reporting of data to CPCB and SPCB.	The sampling and analysis of three locations have been awarded to ITRC Lucknow and reports submitted to CPCB & UPPCB.
7.	Installation of new boilers with adequate APCS.	Boilers of both 25MW power plant are equipped with ESPs. Fly-ash brick plant produces 10 lakh brick/y & rest, ash delivered to cement mfr. New boiler with adequate APCS, commissioned, the old boilers phased out.
8.	Adequate measures for proper utilization of fly ash to be taken.	
9.	Reduction of Hg conc. In Cell House Ventilation gas to 1 g/T.	KCIL is undertaking 'in-house' R&D efforts. The complete system is under stabilization. As per CPCB Study (2005) the Hg concentration was observed to be 6g/T. The industry claims to have achieved to bring it down to 0.09-0.6 g/T of product.

10.	Monitoring of HCL furnace stack for HCL and send reports to CPCB and SPCB.	
11.	Establishment of two AAQMS for Hg, RSPM, SPM, Sox & NOx.	Order has been placed for procurement of equipment.
12.	Monitoring ambient air quality as per 18.1 and reporting data to CPCB and SPCB.	As above.

Summary of proposed action points - Short term action points

ISSUES REGARDING NORTHERN COAL FIELDS LTD. MINE UNITS (BINA, KAKRI, KHADIA, DHUDICHUA AND KRISHNASHILA)

Sl.No.	Action Points	Compliance Status
1.	Coal characterization in terms of ash, fluoride and mercury and submission of results to CPCB and SPCB.	As per the results submitted of CMPDI Ash – 33%; F BDL; Hg 0.01 – 0.09 PPM.
2.	Monitoring of effluent and noise for compliance of standards and reporting of data to CPCB and SPCB.	Monitoring regularly performed and report submitted.
3.	Preparation and implementation of action plan for achieving zero discharge from the plant.	A portion of treated effluent is utilized in haul road sprinkling, use in CHP plant, yet a major portion reaches Rihand reservoir. Action plan submitted.
4.	Establishment of AAQMS (at least 2) for monitoring SO _x , NO _x , RSPM and SPM and reporting the data to CPCB and SPCB.	Monitoring regularly performed and report submitted.

ISSUES REGARDING HI-TECH CARBON (HC)

Sl.No.	Action Points	Compliance Status
1.	Regular monitoring of Sox, NO _x , RSPM, SPM in stack emission and submission of data to CPCB and SPCB.	System for monitoring is in place. Data submission is regular.
2.	Ambient Air Quality Monitoring.	As above.
3.	Establishment of AAQMS for RSPM, SPM, SO _x & NO _x .	As above.
4.	Monitoring ambient air quality and reporting data to CPCB and SPCB.	As above.
5.	Monitoring of effluent for compliance of standards and reporting of data to CPCB and SPCB.	As above.

Summary of proposed action points - Short term action points

ISSUES REGARDING STONE CRUSHERS IN SINGRAULI AREA DISTRICT SONEBHADRA

Sl.No.	Action Points	Compliance Status
1.	Installation and proper operation of dry dust collection system, dust containment-cum-suppression system, Wind breaking walls and noise containment system.	To implement the provision of EPA, the UPPCB has taken strict action and issued closure orders to 14 units, show cause notices have been issued to 12 units. Random inspection and air monitoring is being carried out by the UPPCB.
2.	Development of green belt along the periphery of their respective units.	The compliance is partial.
3.	Regular cleaning and wetting of ground within the premises.	Complied.
4.	Proper dumping of stone rejects.	The dumping is indiscriminate in general.
5.	Disposal of stone rejects on road side to be strictly avoided by all the stone crushers.	The compliance is partial.
6.	Identification and development of proper site for dumping of stone rejects.	Yet to be identified.
7.	Dumping of stone rejects at the site.	As above.
8.	Establishment of AAQMS to monitor the impact of stone crushers on ambient air quality (at least one).	Yet to be established.

Summary of proposed action points - Short term action points

ISSUES REGARDING DALLA CEMENT FACTORY, DALLA IN SINGRAULI AREA DISTT. SONEBHADRA

Sl.No.	Action Points	Compliance Status
1.	Installation of continuous Stack and AAQ monitoring stations.	Dalla Cement Factory have placed the order for the equipment and it will be functional in October, 2010, <i>opacity Meter Installed at stack.</i>
2.	Proper implementation of Mine Management Plan.	Complying.

ANNEXURE NO. XIII**Summary of proposed action point - Long term action point****Issues Regarding NTPC Power Plants (Rihand & Shakti Nagar)**

Sl.No.	Action Points	Compliance Status
1.	Road maps are 100% fly ash utilization by 2014.	1. NTPC mentioned difficulties 100% utilization by 2014. They stated that studies have shown it can be utilized in active over burden dump in Coal Mines. It was decided that NTPC will submit self contained proposal to MoEF and the Joint Secretary, MoEF will write letter to Ministry of Coal/Power in this regard.
2.	Continuous operation an maintenance of APCS & oil spillage treatment	2. The reports should be submitted regularly CPCB & UPPCB and online linking would be done.

ISSUES REGARDING UPPCL POWER PLANTS (OBRA & ANPARA)

Sl.No.	Action Points	Compliance Status
1.	Installation and renovation of ESPs to achieve PM emission of 100 mg/NM ³ .	New ESP's in 2x50MW (Unit # 1 & 2) have been installed and commissioned under refurbishment scheme and working satisfactorily in as per the norms fixed by CPCB. ATPS has submitted the proposal for renovation of ESP's in Corporate Office.
2.	Road map for 100% fly ash utilization by 2014.	M/s. J.P. Associates has already started the work for installation of dry ash extraction system for 5x200MW construction of compressor house/switch gear room. Work of Laying of Pipe Line etc. shall be started as soon as erection of ESP's is completed in Obra TPS. ATPS has already submitted the Action Plan.
3.	Very high fugitive emission observed in Obra TPS.	Process of tendering for construction of ETP and recirculation system of ash slurry has also been invited which is scheduled to be opened in the third week of Jan, 2010. Installation of opacity meter in Unit no. 2 of 50 MW has already been completed and in II unit opacity meter to be commissioned.

ISSUES REGARDING HINDLACO CAPTIVE POWER PLANT

Sl.No.	Action Points	Compliance Status
1.	Road map for 100% fly ash utilization by 2014.	Action Plan submitted.
2.	Provision of dry ash collection system.	Dry Ash collection system has been installed in all the units and sent to Cement manufacturer.

ISSUES REGARDING HINDLACO INDUSTRY LTD. ALUMINUM DIVISION

Sl.No.	Action Points	Compliance Status
1.	Utilization of Red Mud.	There is no economical process for utilization of Red Mud word-wide till date. Currently red-mud is disposed as 60-70% solids and partially utilized in soil conditioning/plantation. Scheme from AAI still awaited.

ISSUES REGARDING KANORIA CHEMICALS & INDUSTRIES LTD. (CHEMICAL DIVISION)

Sl.No.	Action Points	Compliance Status
1.	Completion of changeover to Membrane Cell Process.	The industry commits to have all expansion based on Membrane Technology and sequential phase-out of mercury cell based plants. First new plant 110MT/d Caustic Soda Plant based on membrane technology commissioned as Phase-I. Another 110 Tonne plant based on Membrane Technology has been installed and commissioned as Phase-II expansion. After commissioning of Phase-II plant, the industry has phased out 32 nos. of 50 KA Mercury Cells producing appx. 60 Tonne/d. Another plant of 110 MT/d in Phase-II expansion is to be commissioned by Jan, 2012. After installation of third stream on Membrane Technology, the industry commits itself to phase-out balance 28 nos. of 100KA Mercury Cells producing 85 MT/d by March 2012. Hence 100% switch-over shall be achieved (for current capacity of Mercury cell based production of 145 MT/d).
2.	Reduction in mercury consumption to less than 50 gm/T of the product.	Hg consumption reduced from 155 gm/t(2002) to 60-90 gm/t (Jan 2004) 55 gm/t (Sep 2005) and 45 gm/t (2009) as reported by the industry.
3.	The Industry should ensure removal and safe disposal of Hazardous waste stored in the Industry premises to the TSDF in time bound manner.	The Industry has taken the membership of TSDF(U.P. Waste Management, Kanpur).

ISSUES REGARDING NORTHERN COAL FIELDS LTD. MINE UNITS (BINA, KAKRI, KHADIA, DHUDICHUA AND KRISHNASHILA)

Sl.No.	Action Points	Compliance Status
4.	Ensuring supply of washed coal to the power plant/users away from the pithead.	Pleaded difficulty in terms of cost/economics factor. The issue may be taken up at higher/ corporate level.

ISSUES REGARDING STONE CRUSHERS IN SINGRAULI AREA DISTRICT SONEBHADRA

Sl.No.	Action Points	Compliance Status
1.	Wind breaking walls (height > 15 ft) will be provided alongwith dust suppression system.	The Stone Crushers Association has demanded one year time for the same.
2.	No new stone crusher nor any capacity expansion for existing stone crushers shall be allowed.	UPPCB is not issuing No Objection Certificates to New Units.
3.	During summer months (2 month period) when water scarcity exists. Stone crushing shall be stopped. Only those units having dry scrubbing facilities shall be allowed for operation during the summer months.	The one year time has been demanded for installation of dry dust collection systems by the Stone Crushers Association.
4.	Installation of chute or closed conveyor belt shall be ensured for dust control during loading/unloading operations.	The one year time has been demanded for installation of chute of closed conveyor belt by the Stone Crushers Association.
5.	Shifting of stone crushers exit along the road side in Dala at suitable site	Action to be taken by state government/ central government/UPPCB

Issues regarding the State Government of U.P. and Central Government

1. Construction of Varanasi-Shaktinagar Highway and Roads in the Stone Crusher area of Dala.
2. Development of M.S.W. Municipal solid Wastes sites to be done by local body.
3. Supply of LPG Gas to resident of Villages to avoid the deforestation.
4. To ban the use of recycled plastic bags.
5. Safe Drinking Water Supply should be provided in the affected villages Govindpur, Myorepur, Labhari, Kamaridar, Garbandha, Kushmha and Renukoot etc.
6. District Sonbhadra of U.P. is power hub of India and the electric supply is in very poor condition. The steps are required to strengthen the electric supply to the residence of Distt. Sonbhadra.
7. To shift the Stone Crusher Units situated along Road side in Dala, Distt. Sonbhadra to suitable site.

Issues regarding U.P. Pollution Control Board

1. Regular monitoring of surface water sources and Ground water.
2. To install automatic ambient Quality monitoring stations at sensitive places in the area.
3. Regular monitoring of Industrial E.T.P. and APCS.
4. To shift the Stone Crusher Units situated along Road side in Dala, Distt. Sonbhdra to suitable site with the help of State Govt./Central Govt.