

Proceedings of the public hearing conducted on 20.9.2011 in connection with the application filed by Municipal Corporation, Ludhiana for getting Environmental clearance as required under the EIA notification dated 14.9.2006 for setting up of an Integrated Municipal Solid Waste Management Facility, at Village Jamalpur, Ludhiana (Punjab).

The following were present to supervise the proceedings:-

1. Sh. Pardeep Aggarwal, IAS,
Addl. Deputy Commissioner, Ludhiana
2. Er. Krunesh Garg,
Senior Environmental Engineer,
Zonal Office-2, Ludhiana.
3. Sh. A.S. Sekhon,
Additional Commissioner,
Municipal Corporation, Ludhiana
4. Er. Telinder Kumar,
Environmental Engineer,
Punjab Pollution Control Board,
Regional Office, Ludhiana.
5. Er. S.S. Matharu,
Environmental Engineer (Mega),
Punjab Pollution Control Board,
Head Office, Patiala.

Environmental Engineer (Mega), Punjab Pollution Control Board, Patiala welcomed the officers supervising and presiding over the hearing and people from adjoining towns/villages, who came to attend the public hearing of the project. He informed that the Municipal Corporation, Ludhiana has applied for environmental clearance in the office of the State Level Environment Impact Assessment Authority, Punjab for getting environment clearance under EIA notification no. 1533 (E) dated 14.9.2006 for establishment of an Integrated Municipal Solid Waste Management Facility, at Jamalpur Village, Ludhiana (Punjab) and after considering the project proposal by the said Authority, 'Terms of Reference' were issued to Municipal Corporation for preparation of draft rapid EIA report. However, after issuance of Office Memorandum dated 28.4.2011 by the MoEF regarding critically polluted areas, the

application was forwarded to MoEF, New Delhi due applicability of General Condition to this project. He apprised the persons present there about the requirement of public hearing before deciding the application filed by the Corporation for getting the said clearance. He also brought into the notice of public that the Corporation has submitted copies of draft rapid EIA report along with the Executive summary of the same and a copy of each said documents was placed in the office of Deputy Commissioner, Ludhiana; E.O., M.C., Ludhiana, Zila Parishad, Ludhiana; General Manager, District Industries Centre, Ludhiana, Regional Office of MoEF at Chandigarh and Regional Office, Ludhiana of the PPCB for access to the public and other stakeholders. He further brought out that a notice of public hearing was published in 'The Tribune' and 'Ajit' on 20.8.2011 to make the public aware regarding date, time & venue of public hearing and about the places / offices, where the public could access the draft EIA report and its Executive summary report before the said hearing. Thereafter, he requested the representative of the Environmental Consultant of the Corporation to elaborate about the main features of the project and the draft EIA study report.

Dr. Ravinder Mohan Mehta, who is the Environmental Consultant of Municipal Corporation, Ludhiana for preparation of Rapid EIA report brought out the details of the project before the public as under:

1. To improve the scenario of Municipal Solid Waste (MSW) management in the State of Punjab, Department of Local Government, Government of Punjab has initiated development of Municipal Solid Waste (MSW) projects for collection, storage, segregation, transportation, processing and disposal of MSW in a scientific manner.
2. Ludhiana cluster Project is one of the 8 MSW cluster Projects being developed by Govt. of Punjab. It is proposed to connect 13 Urban Local Bodies with Ludhiana cluster for management and handling of MSW in a scientific manner.
3. Municipal solid waste will be converted to produce a utilizable Refuse Derived Fuel (RDF). The fines to be separated from the MSW containing organic component and nutrient value will be processed in a composting

- plant to produce utilizable manure and soil enrichment product. An engineered landfill facility will be developed at the site for disposal of inerts/rejects.
4. An integrated MSW management facility of capacity to handle 735 TPD of solid waste is proposed to be set up at existing dumping site near Jamalpur village, Ludhiana. Dumping site is spread over an area of 99 acres and the same is located at a distance of about 10 Km from the city centre bus terminus.
 5. Currently, the total waste generated by the Ludhiana city and in the other towns/cities of Ludhiana cluster is being transported to the earmarked sites in the respective towns/ cities where waste is being dumped indiscriminately in an unscientific manner.
 6. Ludhiana City has been divided into four zones and the MSW collected from all four Zone is being disposed off at Jamalpur site.
 7. The State Level Environment Impact Assessment Authority (SEIAA), Punjab had issued Terms of Reference for preparation of draft EIA study report.
 8. A Rapid EIA study report has been prepared for this project based the secondary information collected from the published sources, reconnaissance survey, primary socio-economic survey and environmental monitoring of air, noise, soil, ground water and surface water in the study area. The baseline data was generated on meteorology, air quality, noise levels, ground and surface water quality, land environment including soil quality, land use pattern, biological environment and the socio-economic status. The meteorological data for one season (May, June, July, 2011) has also been collected to know the prevailing seasonal conditions.
 9. The integrated facility will have the following components:
 - i. Direct collection of segregated MSW (Door to Door Collection) within Municipal limits of all ULBs of Ludhiana Cluster.
 - ii. Storage & Transportation of segregated MSW from secondary collection points of all ULBs of Ludhiana cluster to the MSW processing site at Ludhiana.

- iii. Transfer stations (optional) if required at designated site (s) will be developed.
 - iv. MSW processing facility to process 735 TPD of MSW has been planned.
 - v. Compost Plant to handle organic waste will be installed. Organic components of MSW segregated during RDF Process will be treated in the compost plant to produce manure.
 - vi. An engineered sanitary landfill site for scientific disposal of rejects/inerts at existing site of Village Jamalpur will be developed.
10. At present, the entire municipal solid waste generated in Ludhiana city is dumped at the site located at Jamalpur Ludhiana in an area of 99 acres. Present system of MSW management is lacking in basic facility of collection of waste from source. At present, the residents of Ludhiana have to dump waste on the streets, open spaces, drains, and water bodies in the vicinity creating insanitary conditions.
11. The proposed site is accessible from National Highway- 1 and it is located at a distance of 4.5 km, 1.09 km, 9 km and 9.27 km from nearest Railway Station, Budha Nallah, Airport and river Sutlej, respectively.

12. PROJECT UTILITIES/AMENITIES

- The water requirement for the proposed project has been estimated to be around 50 m³/day and would be supplied by Municipal corporation. The sewage generated during the operation phase will be sent to sewage treatment plant located adjacent to the facility.
- Required power will be sourced from state electricity Board.
- Fire protection system will be provided as per LPA (Loss Prevention Association) norms. For every 100 m² area of plant, one DCP type and one CO₂ type fire extinguisher will be provided. "No Smoking" and hazard / danger warning stickers will be put up at appropriate places. All personnel deployed for the construction, erection and operation of the plant will be given proper training for fire drill. Emergency numbers will also be put up at appropriate places. Empty fuel drums / tanks and other inflammable

material will be stored in earmarked place and removed from the premises as soon as possible. Storage yard for chemicals and fuel lubricants will also be provided with fire extinguishers and sand bucket racks.

- All roads in the plant area will be well-designed bitumen roads and will be of 4 m wide with 1m wide berm on each side.

13. ENVIRONMENTAL SETTING OF THE STUDY AREA

The baseline environmental status was assessed based on primary and secondary data collected through on-site field observations and obtained from agencies such as IMD, Geological Survey of India, State Ground Water Department, Central Ground Water Board, State Pollution Control Board, Census of India and Local Forest Department. The following environmental components were focused at during this study:

- Air Environment (Meteorology, Ambient Air Quality, Noise Levels, Traffic Pattern, etc.)
- Water Environment (Quality and Quantity of Surface and Groundwater sources)
- Land Environment (Geology, Hydrogeology, Landuse, Solid Waste generation and characteristics)
- Ecological Environment (Terrestrial and Aquatic Flora & Fauna)
- Socio-Economic Environment (Demographic profile, Occupational structure, Educational status, Literacy status, etc.)

14. ENVIRONMENTAL IMPACT ASSESSMENT & ENVIRONMENTAL MANAGEMENT PLAN

- Environmental impact due to the construction and operation stages of the project were predicted quantitatively using models such as ISCST3 for air dispersion calculations.
- Adequate environmental management measures will be incorporated during the entire planning, construction and operation stages of the project to minimize the adverse environmental impacts and assure sustainable development of the area.

- The impacts during the construction phase will be temporary in nature.
15. The summary details of the pollution sources and mitigation measures proposed for the project are as under

a) Air Environment

- During the construction phase, operation of construction equipments and vehicles will be the main sources of pollution. A dust control plan will be implemented and regular maintenance of vehicles and equipment will be carried out.
- During the operation phase, from RDF plant, fugitive dust and odor emissions from waste handling and processing and emissions due to vehicular movement. Adequate mitigation measures shall be implemented. Emissions from waste handling areas shall be controlled by provision of covered areas, proper ventilation and by maintaining negative pressure. The RDF plant shall be provided with adequate dust control systems such as cyclones and bag filters to control the dust emissions.

b. Noise Environment

- During the construction phase, adequate mitigative measures such as controlled time of construction, job rotation etc. will be implemented.
- During the operation phase, the sources of noise emissions shall be equipments such as shredders, and vehicular movement. Noise enclosures shall be provided wherever possible and workers shall be provided with ear plugs.

c. Water Environment

During the construction phase, a septic tank shall be provided to treat the domestic wastewater to be generated. Effluent generated from the process will be recirculated back to the RDF plant. Spill over from the process would be collected and treated prior to proper disposal. The small quantities of leachate generated will be collected in the sump and treated in Effluent Treatment Plant.

d. **Ecological Environment**

There is no ecologically sensitive area within a 10 km radial distance of the project site. No wildlife sanctuary or national park is present within the study area. A peripheral greenbelt will be provided.

e. **Socio Economic Environment**

The proposed project will lead to employment generation and will have a positive impact on the socio economic environment. Preference to local population shall be given and adequate mitigation measures will be ensured to reduce odor emissions and disease vectors from proposed site.

f. **Environmental management system**

For the effective implementation of the EMP, an Environmental Management System (EMS) will be established at the proposed project. The EMS will include the following:

- An Environmental Management cell
- Environmental Monitoring Program
- Personnel Training
- Regular Environmental Audits and Corrective Action
- Documentation – Standard operating procedures Environmental Management Plans and other records.

Thereafter, Environmental Engineer brought into the notice of public present at the venue of hearing that as per the provisions of EIA notification dated 14.9.2006 as amended time to time, the persons present at the venue may seek information or clarifications on the project from the project promoter/consultant. It was also brought into the notice of the persons present there that the information or clarifications sought by them and reply given by the project promoter will be recorded in the proceeding of the hearing, which will be sent to the MoEF, New Delhi for further consideration. Accordingly, he requested the persons present in the hearing to seek information or clarifications on the project one by one.

Thereupon, the detail of the information/ clarifications raised by the persons present at the venue of hearing and the reply given by the consultant of the industry / project proponent is as under:

Sr. No	Name of the person	Detail of query / statement / information / clarification sought by the person present at the venue of hearing.	Reply of the query / statement / information / clarification given by the consultant of the industry / project promoter
1.	Sh. Rajinder Singh Grewal, Vill. Jamalpur, Ludhiana	<ul style="list-style-type: none"> ➤ The residents of our village contacted the Worthy Deputy Commissioner, Ludhiana way back not to dump solid waste at this site being source of odour problem and he assured that these will be no odour problem from the solid waste to be dumped at this site but nothing has been done practically at the site in this regard. ➤ The worth of this land site is about Rs. 3 crores per acre and the total cost of this land (66 acres) is Rs. 200 crores. In case, the Municipal Corporation, Ludhiana identifies any other land away from Ludhiana, the same may of worth Rs. 35-40 lacs/acre. Therefore, after selling this site, the Municipal Corporation, Ludhiana will be able to purchase enough land and to establish the Municipal Solid Waste facility 	-Nil-

		<p>without making any arrangement of funds.</p> <ul style="list-style-type: none"> ➤ We wish that this facility is to be established at Laddowal or Mattewara instead of this place, where the Govt. has its own enough barren land and there is no residential area nearby the said sites. 	
2.	<p>Dr. R.P.S Grewal, Head Applied Sciences Deptt, Punjab Agriculture University, Ludhiana</p>	<ul style="list-style-type: none"> ➤ In the year 1993, the Corporation had started dumping solid waste forcibly at this site. ➤ This facility should be established either at Laddowal or Mattewara where the Govt., has its own enough land. ➤ The Government has declared this site as industrial zone. Thus, such type of facility should not be established at this site and only industrial units should be established at this site. ➤ With the establishment of Municipal Solid Waste facility, there would be odour problem, due to which diseases will spread in area, as such, we oppose the establishment of Municipal Solid Waste facility at this site. 	-Nil-
3.	<p>Sh. Shammi Dayal, Guru Teg Bahadur Colony, Ludhiana</p>	<ul style="list-style-type: none"> ➤ There will be odour problem with the establishment of Municipal Solid Waste facility due to which diseases will spread in 	-Nil-

		<p>the area.</p> <ul style="list-style-type: none"> ➤ We are suffering from respiratory and dengue like diseases, which have ruined our lives and our lives have become hell due to which no one get married their children in our village. 	
4.	Sh. Arvind Goel, Agar Nagar, Ludhiana.	<ul style="list-style-type: none"> ➤ I want to ask the Punjab Pollution Control Board to let me know as to whether the Municipal Corporation, Ludhiana has taken permission from Punjab Pollution Control Board for dumping of solid waste at Jamalpur or not. If not, what action has been initiated against the Corporation. ➤ The children of this area are died of number of diseases due to disposal of solid waste at this site. What steps have been taken by the Punjab Pollution Control Board to stop the dumping of solid waste at this site. 	<ul style="list-style-type: none"> ➤ The Punjab Pollution Control Board has not granted any permission to the Municipal Corporation, Ludhiana for dumping of solid waste at this site in an unscientific manner. The Municipal Corporation, Ludhiana has been issued show cause notice by the Board for violation of provisions of the Municipal Solid Waste (Management & Handling) Rules, 2000. The site has already been declared as contaminated by the Punjab Pollution Control Board due to which the Municipal Corporation, Ludhiana has

			<p>taken steps to establish integrated Municipal Solid Waste facility at this site.</p> <p>➤ The Environment consultant of Municipal Corporation, Ludhiana informed that the solid waste will be treated scientifically and there will be no odour problems in the area from the said facility and a part of this site will also be developed as green belts.</p>
5	Sh. Paramjit Singh, Vill. Jamalpur, Ludhiana	<p>➤ The Municipal Solid Waste facility should be established at Laddowal, which is far away from the habitation area.</p> <p>➤ My agricultural land is adjoining to the Municipal Solid Waste dumping site due to which the solid waste comes my agricultural fields, which makes us very difficult to work in our agricultural fields.</p> <p>➤ The drivers of trucks/trailers used to transport the solid waste, generally remain in drunk condition with alcohol and they drive the vehicles rashly due to which some children</p>	-Nil-

		<p>died in past by hitting with these vehicles.</p> <ul style="list-style-type: none"> ➤ We are at fault since we had not opposed dumping of solid waste at this site previously and now, we will not allow to establish the Integrated Municipal Solid Waste facility at this site, in any case. 	
6.	Sh. Jaspal Singh Grewal, Vill. Jamalpur, Ludhiana	<ul style="list-style-type: none"> ➤ At what distance the Municipal Solid Waste facility is to be established from the Central Jail. ➤ Let me know as to how the Punjab Pollution Control Board has granted permission to the PUDA approved residential colonies near to this project. ➤ What are the siting guidelines for establishment of a residential colony. ➤ The proposed site of the facility is located in the industrial zone, as such, the facility cannot be established at this site. 	<ul style="list-style-type: none"> ➤ The Senior Environmental Engineer, Zonal Office-II, Ludhiana informed that there is no such prescribed distance of the facility from the Central Jail. ➤ There is no approved residential colony within a radius of 500 m from the site of the project to whom the Punjab Pollution Control Board has granted permission. ➤ The Govt., of Punjab has laid down siting guidelines for residential colonies vide order dated 25.7.2008, which are available at the official web site of the Board.
7.	Sh. Sewa Singh, R/o Shankar Colony,	<ul style="list-style-type: none"> ➤ There is a need to check the distance of 	-Nil-

	Ludhiana	residential area from the proposed site of the facility since Shankar Colony is adjoining to it. We oppose the establishment of the facility at this site and we will not allow to establishment the same at this site.	
8.	Sh. Hans Raj, Sarpanch Vill. Kakka, Distt. Ludhiana	➤ There are residential colonies adjoining to the proposed site of the Municipal Solid Waste facility, thus, it should not be established at this site. We will have to face so many difficulties due to this project, as such, we will not allow to establish the same at this site.	-Nil-

Environmental Engineer of the Board further requested the persons present at the venue of hearing that if any one else want to seek any information / clarification on the proposed project, but no one came forward. The public hearing was attended by 38 no. of people.

The detail of the comments/objections received in writing during public hearing are as under:

Sr. No.	Name of the person/organization	Date of receipt	Comments/Objections /Suggestions	Remarks
1.	Sh. Rajinder Singh Grewal, House No. 3627, Village Jamalpur, District Ludhiana	20.09.2011	The MSW facility should not be established at this site and it should be established in the Govt. land available at Laddowal or the abandoned Punjab Govt. Potato farm land located at Rahon Road, Ludhiana.	Annexure-1

2.	Dr. R.P.S. Grewal, and other residents of the area.	20.09.2011	-do-	Annexure-2
3.	Mohalla Sudhar Committee, Guru Tegh Colony, Near Jail, Ludhiana	20.09.2011	The municipal solid waste dump site is a source of diseases and the solid waste dumped at this site should be shifted to some other suitable place.	Annexure-3

The hearing ended with vote of thanks to the Supervisor-Cum-
Presiding Officer and the public present in the hearing.

(S.S. Matharu)
Environmental Engineer
Pb. Pollution Control Board,
Head Office, Patiala

(Krunesh Garg)
Senior Env. Engineer
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Addl. Deputy Commissioner,
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Pb. Pollution Control Board,
Regional Office-3, Ludhiana