

Minutes of the nineteenth meeting of the Task Force – set up in compliance with the Orders of the High Court of Madhya Pradesh at Jabalpur dated 30th March, 2005, 13th May, 2005 and 15th March, 2007 respectively – held on 28th October, 2009 at 10.00 a.m. in Room No.501-A, Wing, Shastri Bhavan, New Delhi.

The nineteenth meeting of the Task Force was held on 28th October, 2009 at New Delhi, to review the progress of removal/remediation of toxic waste from the Union Carbide India Ltd. (UCIL) plant site at Bhopal. A list of the officials of the Government of India, Government of Madhya Pradesh(M.P.) and other organizations, who attended the meeting, is at **Annexure-I**.

2. After welcoming the members and participants of the Task Force, the Chairman requested the Joint Secretary(Chemicals) to recapitulate the decisions taken in the last meeting of the Task Force held on 20th July, 2009. The JS stated that the following decisions were taken in the last meeting:-

(i) In regard to the Study assigned to NEERI for remediation of ground water and soil of UCIL plant site, as the hot spots identified by NEERI in their earlier report of 1996 were not sufficient, more hot spots were to be identified after the drilling of the wells is done by NGRI. **The expert from NEERI to give an update to the Task Force on the progress made in this regard.**

(ii) NGRI would furnish to the State Government of M.P. the Utilisation Certificate of fund released earlier in the standard format. **The Expert from NGRI, along with Secretary, BGTR&R Department to apprise the Task Force on compliance in this regard.**

(iii) IICT would visit CBI Office in Bhopal on 30.07.2009 to get copies of relevant drawings of the plan. IICT would submit their report with the Draft Tender Document by the end of August, 2009. **The Expert from IICT, along with the Secretary, BGTR&R Department to apprise the Task Force on compliance in this regard.**

(iv) It was decided to set up an Expert Group with Dr. S.P. Gautam, Chairman as Convenor with five other technical experts as its Members. The Terms of Reference of the Expert Group were to reassess/assess the technical capabilities, readiness and feasibility of incinerating toxic wastes of the UCIL at either of the two facilities at Ankleshwar, Gujarat or at Pithampur, Madhya Pradesh or at any other facility/incinerator which may be available for carrying out this task. After such assessment, the Expert Group was to make a clear recommendation on the most suitable facilities for this purpose, by ranking atleast 5 facilities in order of preference. The Report of the Expert Group has since been received, a copy of which was circulated to the participants in the meeting.

3. The Chairman requested the Director, NEERI to apprise the progress of the Study carried out by the Institute. Director, NEERI informed that they had revisited the hot spots identified in 1996 and taken samples, and based on a preliminary analysis, a report has been prepared by NEERI, in which it is indicated that no

significant toxicity has been found in any of the samples taken. He also informed that no signs of toxicity were detected in the flora and fauna growing on the UCIL Plant site. **He stated that this was only a preliminary assessment, and based on a detailed assessment to be made, NEERI will bring out the final Report by June, 2010.**

4. The expert from NGRI informed that the geophysical study has been carried out by the Institute. However, for carrying out the major work of drilling of wells, they required funds. Secretary, BGTR&R Department, Government of Madhya Pradesh informed that the required funds would be released by 31.10.2009. **NGRI stated that they would be able to submit the Report within the scheduled time limit of June, 2010.**

5. The expert from IICT informed that soon after the last meeting of the Task Force, he had gone to the CBI office in New Delhi and seen the required drawings/documents, however, these were not found to be very relevant. He also went to the CBI Office in Bhopal, where the documents/drawings accessed were found to be quite relevant. **The Chairman requested the expert from IICT to submit their Report, as per the TOR of the Study assigned to them, to the Government of Madhya Pradesh positively by the middle of November, 2009. The representative of IICT agreed to do this.**

6. The Chairman requested Dr. D.D. Basu, CPCB to give a brief presentation on the Report prepared by the Expert Group. The following were some of the salient points in Dr. Basu's presentation:

(i) The Expert Group visited 5 TSDF sites which were all having state-of-art incinerators. After taking into consideration the various parameters such as technology employed, storage facility, incineration capacity, compliance with prescribed emission standards etc., the Expert Group recommended/ranked three incinerators as under:-

- (i) TSDF at Ankleshwar, Gujarat.
- (ii) TSDF at Dungigal, Hyderabad.
- (iii) TSDF at Talaja, Mumbai.

TSDF at Indore and Nagpur have not been ranked as these facilities are still not operational.

(ii) The Expert Group also explored the technical feasibility of incineration of the wastes in cement kilns, as an alternate option. The CPCB through the National Council for Cement and Building Materials (NCB) conducted technical study of co-processing of the sludge of UCIL in a cement kiln. The NCB has recommended to blend all the UCIL sludge materials thoroughly and then feed the blended sludge at the rate of 2 per cent along with coal in the kiln through a well designed feeding system for their safe disposal in the cement kiln. The report, therefore, recommended that keeping in view all the options available for disposal of wastes, co-processing of the wastes in a cement kiln may be technically feasible and an environmentally sound option. It has been suggested in the report that a cement plant may be identified which is willing to conduct the trial run for co-processing of UCIL sludges in cement kiln. If

the trial run is found successful, further decision for co-processing of the whole amount of wastes may be taken.

7. After detailed deliberations, the following options for further course of action emerged:-

(i) Considering the position indicated by Government of Gujarat in the SLP filed in the Supreme Court, it may not be feasible to incinerate the waste at the incinerating facility at Ankleshwar in face of local resistance.

(ii) The physical distance of the incinerator facility at Dingigul, Hyderabad from Bhopal is approximately 839 km and that of Taloja, Maharashtra is approximately 779 km. Thus, both these facilities are quite far off from Bhopal. It may not, therefore, be the best option to incinerate the wastes in the above two facilities as transportation of these wastes over long distances may encounter administrative problems. In addition, Government of Madhya Pradesh /MPPCB will also have to seek NOC from the concerned State Pollution Control Boards/State Governments before incinerating these wastes at these facilities.

(iii) The recommendation of the Expert Group contained in the Report for co-processing of the UCIL waste in a cement kiln as per the prescribed method and procedure appeared to be the most feasible option at this stage. As per the recommendation contained in the report, MPPCB has to first carry out a trial test of co-processing of two tonnes of the toxic waste in a suitable cement kiln in the State, to be identified for the purpose, under the over-all technical supervision of the CPCB. While conducting the trial run, it must be ensured that such co-processing does not cause adverse impact on the environment. The expert from CPCB stated that since the trial run would require only 2 tonnes of waste to be co-processed in the cement kiln, any adverse impact on the environment is highly unlikely.

(iv) Government of Madhya Pradesh/ MPPCB may make all efforts to facilitate the incinerator facility at Pithampur, Madhya Pradesh to become operational at the earliest. The Chairman mentioned that the Parliamentary Standing Committee on Chemicals and Fertilizers during its tour of Bhopal in February, 2009, had been apprised that the incinerator facility at Pithampur would be operational by November, 2009. The Chairman also requested the Government of Madhya Pradesh to expedite and facilitate all necessary clearances to be given by MPPCB.

8. In conclusion it was decided that:

(i) The Government of Madhya Pradesh and MPPCB will take action as follows:

(a) MPPCB with the help of Government of Madhya Pradesh will carry out a trial run of co-processing of the waste in a cement kiln under technical supervision of CPCB. The trial run will be completed within a period of two months viz. by end of December, 2009 and a report on the results submitted to the Task Force in the next meeting to be convened in the first week of January, 2010.

(b) The Government of Madhya Pradesh and MPPCB will extend all necessary support to the TSDF at Pithampur (near Indore) to become operational at the earliest.

(ii) The NEERI would submit its final report to Government of M.P. by June, 2010.

(iii) The NGRI would submit its report by June, 2010.

(iv) The ICT would submit its report to the Government of Madhya Pradesh positively by the middle of November, 2009.

9. The meeting ended with a vote of thanks to the Chair.

Annexure-I

List of officials of the Government of India, Government of M.P. and other organizations present in the nineteenth meeting of the Task Force held on 28th October, 2009 at 10.00 a.m. in Room No. 501, 'A' Wing, Shastri Bhavan, New Delhi.

Department of Chemicals and Petrochemicals:

- (i) Shri Bijoy Chatterjee, Secretary.
- (ii) Shri B.P.Pandey, Joint Secretary.
- (iii) Mrs. Geeta Menon, Director.
- (iv) Shri Sanjay Bansal, Director.
- (v) Ms. Bandana Banerjee, Under Secretary.

Government of Madhya Pradesh:

- (vi) Shri S.R. Mohanty, Secretary, BGTR&R Department
- (vii) Shri K.K. Dubey, Deputy Secretary, BGTR&R Department.

Madhya Pradesh Pollution Control Board (MPPCB):

- (viii) Shri R.K. Jain, Member Secretary.

Ministry of Environment and Forests:

- (ix) Dr. (Ms.) Chhanda Chowdhury, Director

Central Pollution Control Board (CPCB):

- (x) Dr. D.D. Basu, Sr. Scientist.

National Environmental Engineering Research Institute (NEERI):

- (xi) Dr. Tapan Chakrabarti, Acting Director.

National Geophysical Research Institute(NGRI), Hyderabad:

- (xii) Dr. V.P. Dimri, Director
- (xiii) Dr. V.S. Singh, Emeritus Scientist.

Indian Institute of Chemical Technology (IICT):

- (xiv) Dr. A. Krishna Reddy, Scientist-F (Retd.)