No.10-26/2007-IA-III Government of India Ministry of Environment and Forests (IA-III Division)

Paryavaran Bhavan, CGO Complex, Lodhi Road, New Delhi – 110003.

Dated the 27th August, 2007

Sub: Environmental clearance for storage and handling of imported ammonia at JNPT, Nava Sheva by M/s Deepak Fertilizers and Petrochemicals Corporation Limited (DFPCL) – regarding.

Reference is invited to the letter No.MCZMA2006/166, dated 31.7.2007 from Environment Department, Government of Maharashtra and letters No.Nil, dated 3rd April, 2007, dated 5th April, 2007 and dated 24th May, 2007 from M/s Deepak Fertilizes and Petrochemicals Corporation Limited regarding the subject mentioned above. No Objection Certificate from Maharashtra Pollution Control Board vide Consent No.BO/RONM/EIC-0448-06/E/CC-303, dated 2.8.2006 has been obtained.

- 2. The project involves putting up storage and handling facility (15000 MT) for liquid Ammonia at JNPT Terminal. M/s DFPCL proposes to utilize liquid ammonia for manufacture of ammonia based fertilizers/fertilizers intermediates such as nitric acid, ammonium nitrate, urea and NPK Complex etc. The liquid ammonia will be pumped to storage tank through 16"/18" insulated pipeline from jetty to tank farm. The approximately length of the pipe is 4.2 km. Marine unloading arm of 8"/10" size is foreseen with hydraulic operation. The main facilities for import, storage and despatch are as follows:-
 - (i) Marine unloading arm at the jetty
 - (ii) Pipeline for transfer through pipe rack
 - (iii) Cooling line
 - (iv) Atmospheric Ammonia storage tank
 - (v) Refrigeration compressors
 - (vi) Boil off compressors
 - (vii) Ammonia transfer pumps
 - (viii) Tank lorry loading bay
- 3. Land area required for the project is 150 m X 100 m (including old facilities). The main raw material, liquid ammonia will be received at the liquid cargo jetty in ships through import. The sources of Ammonia are to be identified. Power for operating the facilities will be received from State electric grid through the electric sub-station. HSD for operating the DG set will be received at the site from indigenous sources in tank lorries and stored in an underground tank. Water for the project will be supplied by MIDC. Liquid ammonia is brought ships having a capacity of 9000-14000 MT, once or twice in a month, which will be unloaded by coupling of ship pump manifold to the unloading arm located on the jetty. The unloading rate of liquid ammonia from ship vis-à-vis feeding rate to the storage tank will be about 400 to 700 MT/hr.
- 4. The proposal was considered by Expert Appraisal Committee at its meeting held on 19th 21st April, 2007 and has recommended.
- 5. The proposal has been examined and the environmental clearance to this project is hereby accorded under Coastal Regulation Zone Notification, 1991 (amendment to Coastal Regulation Zone Notification, 1991 vide S.O. 451(E), dated 26.3.2007) and Environment Impact Assessment Notification, 1994/2006 subject to effective implementation of the following environmental safeguards and conditions:

(A) Specific Conditions:



- The project proponent should implement all the measures that have been suggested by them in the clarification letter dated 24th May, 2007 provided to the Ministry of Environment and Forests.
- Damage distance for thermal radiation, over pressure and toxic dispersion should be considered while transporting the products.
- Precautions against damage to the vapour cloud explosion should be adopted. Precautions may be taken
 to avoid release of vapour to the atmosphere. Leakage of ammonia during transfer should be prevented.
- 4. The recommendations given by the Cell for Industrial Safety and Risk Analysis of CLRI should be strictly followed.
- 5. Monitoring of Ambient Air Quality (AAQ) (8 hourly presently) should be done in accordance with CPCB guidelines.
- 6. Monitoring of ground water & soil quality near the storage areas should be carried out six monthly.
- 7. Flow meters at inlet & final out let of Oil Water Separator (2 nos.) should be installed.
- 8. Sensors for detecting ammonia leakage should be installed at strategic locations.
- 9. The MSIHC Rules should be effectively implemented and revised/HAZOP Report should be submitted within 6 months from the date of receipt of this letter. The damage distance should also be reassessed.
- 10. All the conditions stipulated by the Maharashtra Pollution Control Board vide Consent No.BO/RONM/EIC-0448-06/E/CC-303, dated 2.8.2006 should be strictly implemented.
- 11. Leak detection/warning system for each of the chemicals to be handled should be provided at the jetty as well as at other strategic locations. Necessary control measures capable of remote operation to shut down the leakage, if any, should be provided.
- 12. Appropriate safety devices such as masks should be provided for use by the workers handling the chemicals at the site and their usage by them should be ensured.
- 13. No chemicals other than those specified in the Annexure-III of the CRZ Notification, 1991 as amended subsequently shall be stored in the CRZ area.
- 14. Regular monitoring of levels of ammonia in the air environment shall be monitored and records maintained. The periodic report (six monthly) to be submitted to the Regional Office of this Ministry at Bhopal should also contain information about the ammonia level so monitored.
- 15. All approvals from Central and State nodal agencies including OISD, Chief Controller of Explosives, Chief Inspectorate of Factories must be obtained. A Comprehensive Contingency Plan/Disaster Management Plan must be prepared in collaboration with the concerned authorities and a copy submitted to this Ministry before commissioning of the project.
- 16. No mangroves or ecological sensitive areas should be damaged while undertaking the above project.

(B) General Conditions:

i. A separate Environmental Management Cell with suitably qualified staff to carry put various environment related functions should be set up under the charge of a Senior Executive who will report directly to the Chief Executive of the Company.

- ii. The project will be monitored by this Ministry's Regional Office at Bhopal. Full support should be extended to the officers of this Ministry's Regional Office at Bhopal and the officers of the Central and State Pollution Control Boards by the project proponents during the inspection for monitoring purposes by furnishing full details and action plans including the action taken reports in respect of mitigative measures and other environmental protection activities.
- iii. In case of deviation or alteration in the project including the implementing agencies, a fresh reference should be made to this Ministry for modification in the clearance conditions or imposition of new ones for ensuring environmental protection. The project proponents shall be responsible for implementing the suggested safeguard measures.
- iv. This Ministry reserves the right to revoke this clearance, if any of the conditions stipulated are not complied with to the satisfaction of this Ministry.
- v. This Ministry or any other competent authority may stipulate any other additional conditions subsequently, if deemed necessary, for environmental protection, which shall be complied with.
- vi. A copy of the clearance letter shall be marked to the concerned Panchayat/local NGO, if any, from whom any suggestion/representation has been received while processing the proposal.
- vii. State Pollution Control Board/Committee should display a copy of the clearance letter at the Regional Office, District Industries Center and Collector's Office/Tehsildar's Office for 30 days.
- viii. The project proponent should advertise atleast in two local newspapers widely circulated in the region around the project, one of which shall be in the vernacular language of the locality concerned informing that the project has been accorded environmental clearance and copies of clearance letters are available with the Maharashtra Pollution Control Board and may also be seen at Website of the Ministry of Environment & Forests at http://www.envfor.nic.in. The advertisement should be made within 7 days from the date of issue of the clearance letter and a copy of the same should be forwarded to the Regional Office of this Ministry at Bhopal.
- ix. The project proponents should inform the Bhopal Regional Office as well as the Ministry, the date of financial closure and final approval of the project by the concerned authorities and the date of start of Land Development Work.
- x. Separate clearance shall be obtained by individual project proponents for handling and storage of these chemicals.
- 6. The above mentioned stipulations will be enforced among others under the Water (Prevention and Control of Pollution) Act, 1974, the Air (Prevention and Control of Pollution) Act, 1981, the Environment (Protection) Act, 1986, the Hazardous Chemicals (Manufacture, Storage and Import) Rules, 1989, the Coastal Regulation Zone Notification, 1991 as amended subsequently and the Public Liability Insurance Act, 1991 and the Rules made thereunder from time to time. The project proponents should also ensure that the proposal complies with the provisions of the approved Coastal Zone Management Plan of Gujarat State and the Supreme Court's order dated 18th April, 1996 in the Writ petition No.664 of 1993 to the extent the same are applicable to this proposal.

(Dr.A. Senthil Vel) Additional Director

To

Ms. Sharwaree Gokhale, Chairman, Maharashtra State Coastal Zone Management Authority, & Principal Secretary, Environment Department, Mantralaya, Mumbai-400032.

Copy to:

1. The Secretary, Ministry of Oil & Natural Gas, Shastri Bhavan, New Delhi-1.

2. General Manger - Coordination Limited, M/s Deepak Fertilizers and Petrochemicals Corporation Limited, S-1, First Floor, Panchshila Park, New Delhi - 110017.

The Member Secretary, Maharashtra State Coastal Zone Management Authority & Deputy Secretary, Mantralaya, New Administrative Building, 15th Floor, Madam Cama Marg, Mumbai – 400032.

4. The Chairman, Central Pollution Control Board, Parivesh Bhavan, CBD-cum-Office Complex, East Arjun Nagar, Delhi - 110 032.

5. Member Secretary, Maharashtra Pollution Control Board, Kalpataru Point, 3rd and 4th Floors, Opp. Cine Planet, Sion Circle, Mumbai-400 022.

6. The Chief Conservator of Forests, Regional Office (WZ), Kendriya Paryavaran Bhavan, Link Road No.3, Ravi Shankar Nagar, Bhopal - 462016.

7. Chief Controller of Explosives, Department of Explosives, Nagpur.

8. Director (EI), Ministry of Environment & Forests, New Delhi.

9. Guard File.

10. Monitoring Cell.

11. Regional Office (HQ), Ministry of Environment & Forests.

(Dr. A. Senthil Vel) **Additional Director**