

No.J-11015/308/2005.IA.II (M)  
Government of India  
Ministry of Environment & Forests

Paryavaran Bhawan,  
C.G.O. Complex, Lodi Road,  
New Delhi - 110 003

Dated the 7<sup>th</sup> April 2006

To,  
Executive Director,  
M/s MSPL Ltd.,  
Co-operative Colony,  
Hospet-583 203,  
Karnataka

Subject: Vyasnakere Iron Ore Mining Project of M/s MSPL Ltd. located in Village Vyasnakere, Tehsil Hospet, District Bellary of Karnataka environmental clearance reg.

Sir,

This has reference to your letter No. MSPL/EDR/M(E)/096 dated 29.07.2005 and subsequent letters dated 30.08.2005 and 19.12.2005 on the subject mentioned above. The Ministry of Environment and Forests has examined the application. It has been noted that the proposal is for enhancement of production of iron ore from 19,80,000 (1.98 million tonnes per annum) to 25,00,000 TPA (2.5 million tonnes per annum). Total mine lease area of the project is 347.22 ha which is a forestland. Area proposed for mining is 91.73 ha, an area of 40.15 ha is kept for OB dumps, 31.20 ha for mineral storage, 09.78 ha for infrastructure, 19.00 ha for roads, 138.72 ha for green belt, 02.72 ha for mineral separation plant and 13.92 ha for others (08.67 ha - 7.5 m boundary under MMR 1961 and 05.25 ha - is unbroken area). No ecologically sensitive area such as National park/ wildlife sanctuary/biosphere reserve etc. located in the core and buffer zone. The Daroji Bear Sanctuary is located at a distance of 12 km from the mine lease. About 80 households comprising a population of 300 people reported in the core zone. Displacement of population and R&R is not envisaged. The annual targeted production capacity of the mine is 2.5 million tonnes. About 6,350 TPD of mineral will be transported by road to a distance of 3 to 5 km away to railway siding and 35 km to direct/local consumers. Working is opencast by mechanised method involving drilling and blasting. Present working depth is 65 m bgl and ultimate working depth is 110 m bgl (730 m RL). The topography of the area is hilly and elevation above mean sea level is in the range of 515 m RL to 886 m RL. Water table in the core zone is at 470 m RL and in the buffer zone it is at 480 m RL. Working will not intersect ground water table. Average water requirement is 434 KLD, out of which 30 KLD will be met from ground water and remaining 404 KLD purchased from outside. It has been envisaged that about 1,05,000 m<sup>3</sup>/month of over burden will be generated. A total of 8.7 Mm<sup>3</sup> of OB has already been accumulated and another 12.60 Mm<sup>3</sup> of OB proposed to be generated throughout the mine life. Out of 12.60 Mm<sup>3</sup> of OB, 5.04 Mm<sup>3</sup> will be backfilled and remaining quantity will be dumped externally. It has been mentioned that backfilling will start from the year 2008-2009. Consent to Establish obtained from Karnataka State Pollution Control Board on 28.07.2005 & 30.07.2005 for enhancement of production capacity of mine from 19,80,000 TPA to

To,  
Mr. U.W. Datta

- (vii) Plantation shall be raised in an area of 345.22 ha including a green belt of 138.72 ha by planting the native species around ML area, mineral separation plant, OB dump sites, roads etc. in consultation with the local DFO / Agriculture Department. The density of the trees should be around 2000 plants per ha.
- (viii) The project authority should implement suitable conservation measures to augment ground water resources in the area in consultation with the Regional Director, Central Ground Water Board.
- (ix) Regular monitoring of ground water level and quality should be carried out by establishing a network of existing wells and constructing new piezometers during the mining operation. The monitoring should be carried out four times in a year - pre-monsoon (April-May), monsoon (August), post-monsoon (November) and winter (January) and the data thus collected may be sent regularly to MOEF, Central Ground Water Authority and Regional Director Central Ground water Board.
- (x) Permission from the competent authority should be obtained for drawal of ground water.
- (xi) Vehicular emissions should be kept under control and regularly monitored. Measures shall be taken for maintenance of vehicles used in mining operations and in transportation of mineral. The vehicles should be covered with a tarpaulin and shall not be overloaded.
- (xii) The higher benches of the excavated void/ mine pit to be converted in to water body shall be terraced and afforested to stabilize the slopes. Peripheral fencing shall be carried out along the excavated area.
- (xiii) Consent to operate should be obtained from SPCB before enhancing the production capacity of the mine.
- (xiv) The project proponent should take all precautionary measures during mining operation for conservation and protection of endangered fauna such as Indian pangolin, leopard, sloth bear, wolf etc. spotted in the study area in consultation with the concerned forest officials. Action plan for conservation of endangered fauna should be prepared and submitted to the Ministry and its Regional Office within 3 months.
- (xv) Sewage treatment plant should be installed for the colony. ETP should also be provided for workshop and mineral separation plant wastewater.
- (xvi) Drills should either be operated with dust extractors or should be equipped with water injection system.
- (xvii) Blasting operation should be carried out only during the daytime. Controlled blasting should be practiced. The mitigative measures for control of ground vibrations and to arrest fly rocks and boulders should be implemented.
- (xviii) The proponent shall ensure that mining operations involve wet beneficiation.

25,00,000 TPA iron ore involving lease area of 347.22 ha. Indian Bureau of Mines (IBM) has approved mining plan on 25.04.2005. Public hearing held on 14.06.2005 Ministry of Environment & Forests granted renewal of mining lease for diversion of 347.20 ha forestland on 07.04.1987. Capital cost of the project is 9.54 crores.

2. The Ministry of Environment and Forests hereby accords environmental clearance to the above mentioned Vysanakere Iron ore mining project M/s MSPL Ltd. for production capacity of 2.5 million tonnes per annum of iron ore by open cast manual method involving total lease area of 347.22 ha under the provisions of the EIA Notification 1994 and its subsequent amendments issued under Environment (Protection) Act, 1986 subject to implementation of the following conditions/safeguards.

**A. Specific conditions**

- (i) The mining operations shall not intersect groundwater table. Prior approval of the Ministry of Environment & Forests and Central Ground Water Authority shall be obtained for mining below water table.
- (ii) Top soil, if any shall be stacked properly with proper slope with adequate measures and should be used for reclamation and rehabilitation of mined out areas.
- (iii) Over burden shall be stacked at earmarked dump site(s) only and should not be kept active for long period. The maximum height of the dump should not exceed 15 m and over all slope of the dump shall not exceed 26°. Backfilling shall start from the year 2008 onwards. Monitoring and management of rehabilitated areas should continue until the vegetation becomes self-sustaining. Compliance status should be submitted to the Ministry of Environment & Forests on six monthly basis.
- (iv) In critical areas use of geo textiles shall be undertaken for stabilization of the dump.
- (v) Catch drains and siltation ponds of appropriate size should be constructed to arrest silt and sediment flows from soil, OB and mineral dumps. The water so collected should be utilized for watering the mine area, roads, green belt development etc. The drains should be regularly desilted particularly after monsoon and maintained properly.

Garland drain (size, gradient and length) shall be constructed for both mine pit and for waste dump and sump capacity should be designed keeping 50% safety margin over and above peak sudden rainfall (based on 50 years data) and maximum discharge in the area adjoining the mine site. Sump capacity should also provide adequate retention period to allow proper settling of silt material. Sedimentation pits should be constructed at the corners of the garland drains and desilted at regular intervals.

- (vi) Dimension of the retaining wall at the toe of dumps and OB benches within the mine to check run-off and siltation should be based on the rain fall data.