

No. J-11015/17/2013-IA.II (M)
Government of India
Ministry of Environment, Forest and Climate Change
Impact Assessment Division

Indira Paryavaran Bhavan,
Vayu Wing, 3rd Floor,
Aliganj, Jorbagh Road,
New Delhi-110 003

Dated: 28th November, 2016

To,

M/s Lafarge Umiam Mining Private Limited
Hotel Polo Tower,
Oakland, Shillong, District East Khasi Hills,
Meghalaya – 793001
Email: narayan.sharma@lafarge.com

Sub.: Enhancement of Nongtraï Limestone Mine with production capacity from 2.0 million TPA to 5.0 million TPA of limestone by M/s Lafarge Umiam Mining Private Limited, located at village-Nongtraï, District East Khasi Hills, Meghalaya (MLA: 100.00 ha) – Environmental Clearance

Reference: Online Proposal no. IA/ML/MIN/18322/2013

Sir,

This has reference to your online application for the above mentioned proposal for Enhancement of Nongtraï Limestone Mine with production capacity from 2.0 million TPA to 5.0 million TPA of limestone in the mine lease area of 100 ha. The mine lease area is located at village Nongtraï, Mawsynram Block, District East Khasi Hills, Meghalaya. The Coordinates of the four corners of the 100 ha mining lease area are: NW Corner: 25°11'49.90"N, 91°36'53.50"E; NE Corner 25°11'48.70"N, 91°37'29.20"E, SW Corner: 25°11'17.40"N, 91°36'52.10"E, SE Corner 25°11'16.20"N, 91°37'27.80"E. The International Boundaries between India and Bangladesh lies at 1.5 km (from the nearest location) to south of the mine site. Study area falls within the Survey of India, Toposheet No. 78 O/12. The Project is located in Seismic zone-V.

2. The proposal of Terms of Reference (ToR) was considered by the EAC in its Meeting held during March 13th -15th, 2013 and ToR were issued vide letter of even no dated 30th April, 2013. The extension of validity of ToR was appraised by the EAC in its Meeting held during March 16th-18th, 2015. The Proponent submitted the EIA/EMP Report online to Ministry portal for seeking environmental clearance after conducting the Public Hearing. The proposal of EC was appraised in the EAC meeting held during May 23-24, 2016 wherein the Committee deferred the Proposal and sought the information/clarifications for further consideration. The Project Proponent, vide letter dated 05.08.2016 has submitted the information online and accordingly the project was placed in the EAC meeting held during September 19-20, 2016 wherein the Committee recommended the proposal for Environmental Clearance for Enhancement of Nongtraï Limestone Mine with production capacity from 2.0 million TPA to 5.0 million TPA of limestone.

3. The proposal is for enhancement of Nongtraï Limestone Mine with production capacity from 2.0 million TPA to 5.0 million TPA of limestone. The mine lease area is 100 ha. The total land involved is 139.026 ha. Out of total land 116.589 ha has been designated as the forestland including 100 ha of mine lease area. The Ministry, vide letter no. 8-64/2007-FC, dated 29.02.2012 has issued Stage II Forest Clearance for diversion of 116.589ha forest land for limestone mining and other ancillary activities. The Government of Meghalaya, vide letter no. MG.41/94/223, dated 29th August, 2001, has transferred the mine lease from M/s Lum Mawshun Minerals Private Limited, Shillong to M/s Lafarge Umiam Mining Private Limited over an area of 100ha. The Mining Scheme with Progressive Mine Closure Plan for 100 ha was approved by the Regional Controller of Mines, Indian Bureau of Mines, vide letter No. 314(3)(2012)-MCCM(CZ)/S-57/325, dated 4th October, 2013, corrigendum dated 18th October, 2013. Further, Regional Controller of Mines, Indian Bureau of Mines, vide letter No. IBM/GHY/MEG/EKH/LST/MP-683, VOL-II, dated August 27th, 2015 has approved the modification on approved Scheme of Mining including Progressive Mine Closure Plan.

4. Project Proponent reported that limestone mining is being carried out by fully mechanized opencast method using Heavy Earth Moving Machines and deep hole drilling and blasting with large dia holes. At the conceptual stage, out of the total mining lease area (i.e. 100 ha), total mined-out area will be 90.557ha out of which about 18.24 Ha area will be used for bench slope afforestation and remaining 67.40ha area will be developed as water reservoir. A new crusher will be installed adjacent to the existing crusher with dust suppression system to handle dust generated. The limestone produced from the mine is being/will be sent to Lafarge Surma's Cement plant at Bangladesh established solely in reliance of the limestone source from Meghalaya as per agreement between India and Bangladesh via existing covered conveyor belt of 17 km (of which 7 km lies in India). Total water requirement is 200 KLD. Project Proponent reported that mining will not intersect ground water table at the conceptual stage. The ultimate pit depth will be at 90 m RL (reduced level). No overburden waste generation is involved as the mine is devoid of overburden.

5. The Project Proponent reported that there is no National Parks/Wildlife Sanctuaries / Biosphere Reserves / Wildlife Corridors/Tiger/Elephant Reserves are located within the 10 km study area of the mine lease. The authenticated location map has been submitted by the Principal Conservator of Forests, Meghalaya, vide letter no MFG16/18/PCCF(T) Vol-1/7587, dated 12.09.2014. List of flora and fauna has been authenticated from Additional Principal Chief Conservator of Forests, Wildlife and Chief Wildlife Warden, Meghalaya, Shillong, vide letter no FWC/G/117/1342, dated 11.09.2015. Project Proponent reported that Six Schedule-I species have been reported in the buffer area. These include *Bengal Monitor – Varanus bengalensis* (VU (IUCN) Schedule I (WPA)); *Peacock Softshell turtle – Nilssonina hurum* (VU (IUCN) Schedule I (WPA)); *Oriental Pied Hornbill– Anthracoceros albiros tris*) LC (IUCN) Schedule I (WPA); *Blood Pheasant– Ithaginis cruetus* LC (IUCN) Schedule I (WPA); *Mountain Bamboo Partridge– Bambusicola fytchii* (LC (IUCN) Schedule I (WPA)); *Hill Myna – Gracula religiosa* (LC (IUCN) Schedule I (WPA). An Addendum to Conservation Plan for Schedule I Faunal Species encountered in the Study Area has been prepared by North East Hill University (NEHU), Dr. SK Barik, Project Coordinator. An Addendum Conservation Plan with budgetary provisions of Rs 41 lakhs has been approved by the Additional Chief Conservator of Forests, Wildlife & Wildlife Warden, vide letter no. FWC/G/117/Pt/1058, dated 1st August 2016.

6. The Baseline data was collected for the period October 2013 – January 2014. The analytical results of samples collected for all parameters were found within permissible limits. The Committee deliberated the baseline data presented by the Project Proponent. Ambient air quality has been conducted at nine locations during June and July 2016 by Netel (India) Limited. At each locations CO monitoring was conducted thrice on 8-hourly basis on four occasions i.e. at each locations 12 nos. of 8 hourly CO monitoring were conducted. The laboratory reported 8 hourly CO values at Shella Bazaar (~1.6 km ESE) ranged from 210 µg/m³ to 510 µg/m³ with 98 percentile value of 482 µg/m³ while at Nongtraï village (~2.3 km NNW) the reported values ranged from 170 µg/m³ to 470 µg/m³ with 98 percentile value of 461µg/m³. All the reported values have been found within the prescribed National Ambient Air Quality Standard of 2 mg/m³ (2000 µg/m³).

7. Public Hearing was conducted on January 22nd, 2016 near Nongtraï Limestone Mines premises of Lafarge Umiam Mining Private Limited, East Khasi Hills District, Meghalaya. The Public Hearing was presided over by Shri P S Dkhar, Deputy Commissioner, East Khasi Hills District. The representative of the Meghalaya State Pollution Control Board, Shillong was also present. The issues raised during Public Hearing were also considered and discussed during the meeting, which inter-alia, included CSR activities, impact of blasting and vibrations, benefit of expansion project and providing assistance for employment. Action plan with budgetary allocation has been given against points raised in the Public Hearing.

8. The Ministry had earlier accorded the Environmental Clearance for this mine for production capacity 2.0 million TPA, vide letter no. J-11015/10/2000-IA.II (M), dated August 9th, 2001 to Lum Mawshun Minerals Private Limited (LMMPL). The Environmental Clearance was transferred to LUMPL on July 30th, 2002, and was partially modified vide letter no. J-11015/10/2000-IA.II(M), dated April 19th, 2010 for mining of 2.0 million TPA of limestone and its transportation to a Cement Plant in Bangladesh through a belt conveyor of 17 km (of which 7 km lies in India). First limestone export initiated in December 2005. In April 2007, MoEF ordered stoppage of the mine on the ground that the mine site covers forest land as per "forest" definition and requires approval under section 2 of the FCA, 1980. Mine resumed operations on August 5th 2011 after MoEF approval for resumption of the operations on July 29th 2011. The Ministry, vide letter no. 8-64/2007-FC, dated 29.02.2012 has issued Stage-II Forest Clearance for diversion of 116.589ha forest land for limestone mining and other ancillary activities. The MoEFCC Regional Office had issued the certified EC compliance report, vide letter R0-NE/E/I.A/ML/MI/3/Vol -II 2310, dated November 19th 2014. The Committee deliberated the status of certified compliance report and was of the view that status of compliance was adequate. However, the Committee was of the view that the certified compliance Report was old and the Regional Office of the MoEFCC Regional Office, Shillong might be requested to provide the latest certified compliance report. Accordingly the MoEFCC Regional Office, Shillong has inspected the mine on 4th July 2016 and submitted the latest compliance report on MoEFCC website. The report, inter-alia, has observed the following:-

- a. It is observed that some exotic species have been planted for green belt. M/s Lafarge Umiam Mining Private Limited should plant only native species for green belt development. Plantation of local species should be carried out during this Monsoon Season;

- b. Average ground water level based on Piezometer reading in three locations indicates that there is a decrease in ground water level from 52.24 m during 2012 to 51.05 m during 2015. PP should implement the ground water recharge system at several locations in and around the lease area to augment the ground water resource;
- c. For display of critical pollutants near the main gate, M/s Lafrage Umiam Mining Private Limited should consider installing LCD projector connected to online monitor instead of manual display board;
- d. The project should also implement community Development and Welfare programme in the area of Health, Education and Environmental Protection.

9. Total cost of the Project is Rs. 194 Crores. Capital Cost for Environmental Protection measures is Rs. 7.1 Crores and Recurring cost is Rs. 2.1 Crores per annum and Rs. 55 Lakhs for mine closure plan as per current Scheme of Mining. Project Proponent has earmarked Rs. 1.15 Crores towards CSR activities for 2016-2017 w.r.t. sustainable livelihood, education, capacity building, health care, social reforms and community development. LUMPL is making payments to the Special Purpose Vehicle (SPV) in accordance with the directive of the Hon'ble Supreme Court @ Rs. 90/tonne of limestone with an annual contribution of Rs. 18 Crores for 2.0 million TPA which will be up to Rs. 45 Crores per annum for 5.0 million TPA limestone production.

10. Project Proponent reported that no environment related court case/litigation is pending against the project. However, four court cases/litigation related to title dispute are pending against the project. The current status of the court cases is given as below:

S. No.	Case No. and Description	Court of Law	Order/ Direction	Current Status
1	Review Petition no 20/2014 in PIL 2/2013 alleging legality of land transfer.	High Court of Meghalaya	Nil	The Hon'ble Court is hearing the petition for condonation of delay filed by the other party.
2	TS Case no 6 (T) of 2015 (previously WP 45/2014 before the High Court of Meghalaya, WP 43/2007 before the High Court of Guwahati) alleging mining land area belonging to petitioners i.e. Tremdon Wansai and others.	Court of the Assistant to the Deputy Commissioner at Shillong	Nil	The matter is in preliminary stages. Defendants are yet to file Written Statements.

3	Title Suit no 1 of 2007, (Petitioners: Himani Malngiang and Others). The Petitioners raised a dispute over title of LBC land.	In the Court of the Assistant to the Deputy Commissioner (Judicial) at Sohra.	Nil	Issues have been framed by the Hon'ble Court. Deposition, examination & cross-examination of evidence is yet to commence.
4	Title Suit no. 1(T) of 2013 (previously Title Suit no. 25(T) of 2004), Injunction Misc. case No. 62(T) of 2004, (Respondent: Prince Starwell Sarubai, petitioners: LMMPL and LUMPL) dispute over title of land on one of the plots on LBC corridor.	In the Court of the Assistant to the Deputy Commissioner (Judicial) at Sohra.	Nil	The matter is at the stage of recording evidence.

11. The Ministry of Environment, Forest and Climate Change has examined the proposal in accordance with the Environmental Impact Assessment Notification, 2006 and further amendments thereto and hereby accords the environmental clearance under the provisions thereof to the above mentioned proposal of **M/s Lafarge Umiam Mining Private Limited for Enhancement of Nongtraï Limestone Mine with production capacity from 2.0 million TPA to 5.0 million TPA of limestone, located at village-Nongtraï, District East Khasi Hills, Meghalaya subject to compliance of the followings terms and conditions and environmental safeguards mentioned below as well as compliance of observations in para 8 above:**

A. Specific conditions

- 1) Environmental clearance is granted subject to final outcome of Hon'ble Supreme Court of India, Hon'ble High Court of Meghalaya, Hon'ble NGT and any other Court of Law, if any, as may be applicable to this project.
- 2) This Environmental Clearance is subject to obtaining requisite NBWL Clearance from the Standing Committee of National Board for Wildlife, if any, as applicable for this Mining project.
- 3) The Project Proponent shall obtain Consent to Operate from the State Pollution Control Board, Meghalaya and effectively implement all the conditions stipulated therein.
- 4) Project Proponent reported that Six Schedule-I species have been reported in the buffer area. An Addendum to Conservation Plan for Schedule I Faunal Species encountered in the Study Area has been prepared by North East Hill University (NEHU). An Addendum Conservation Plan with budgetary provisions of Rs 41 lakhs has been approved by the Additional Chief Conservator of Forests, Wildlife & Wildlife Warden, vide letter no.

FWC/G/117/Pt/1058, dated 1st August 2016. Project Implementation of species specific conservation plan for Schedule I species. The project proponent shall take all precautionary measures for conservation and protection of flora and fauna spotted in the study area.

- 5) Project Proponent shall plant only native species for green belt development. Plantation of local species should be carried out during the Monsoon Season.
- 6) Average ground water level based on Piezometer reading in three locations indicates that there is a decrease in ground water level from 52.24 m during 2012 to 51.05 m during 2015. Project Proponent should implement the ground water recharge system at several locations in and around the lease area to augment the ground water resource.
- 7) The Proponent shall install online Ambient Air Quality Monitoring System and there should be system for display of digital AAQ data within 03 months at least at three locations as per wind direction. Online provisions of pH and turbidity meters at discharge points of STP and ETP and also at water storage ponds in the mining area may be made. Project Proponent should display the result digitally in front of the main Gate of the mine site.
- 8) The project proponent shall implement the Catchment Area Treatment Plan in consultation with the State Government should also implement Community Development and Welfare program in the area of Health, Education and Environmental Protection.
- 9) Proponent shall appoint an Occupational Health Specialist for Regular and Periodical medical examination of the workers engaged in the Project and maintain records accordingly; also, Occupational health check-ups for workers having some ailments like BP, diabetes, habitual smoking, etc. shall be undertaken once in six months and necessary remedial/preventive measures taken accordingly. The Recommendations of National Institute for ensuring good occupational environment for mine workers shall be implemented; The prevention measure for burns, malaria and provision of anti-snake venom including all other paramedical safeguards may be ensured before initiating the mining activities.
- 10) Sewage treatment plant for treating residential and waste from industrial area should be provided. ETP shall also be provided for the workshop and wastewater generated during the mining operation.
- 11) The project proponent shall carry out scientific investigation in respect of "Blast induced ground vibration, fly rock & air blast". Based on this study, Project Proponent should design an effective blast design to curb blast induced menace & public annoyance.
- 12) Implementation of Action Plan on the issues raised during the Public Hearing. The Proponent shall complete all the tasks as per the Action Plan submitted with the budgetary provisions during the Public Hearing.
- 13) The pollution due to transportation load on the environment will be effectively controlled & water sprinkling will also be done regularly. Vehicles with Pucc only will be allowed to ply. The mineral transportation shall be carried out through covered trucks only and the vehicles carrying the mineral

shall not be overloaded. Project should obtain 'PUC' certificate for all the vehicles from authorized pollution testing centre.

B. Standard conditions

- 1). A Final Mine Closure Plan along with details of Corpus Fund shall be submitted to the Ministry of Environment, Forest and Climate Change 5 years in advance of final mine closure for approval.
- 2). No change in mining technology and scope of working should be made without prior approval of the Ministry of Environment, Forest and Climate Change.
- 3). No change in the calendar plan including excavation, quantum of limestone and waste should be made.
- 4). The project proponent shall obtain necessary prior permission of the competent authorities for drawl of requisite quantity of water (surface water and ground water) for the project.
- 5). Mining shall be carried out as per the provisions outlined in mining plan approved by Indian Bureau of Mines (IBM)/State Mines and Geology Department as well as by abiding to the guidelines of Directorate General Mines Safety (DGMS).
- 6). The lands which are not owned by Proponent, mining will be carried out only after obtaining the consents from all the concerned land owners as per the provisions of the Mineral Concession Rules, 1960 and MMDR Act, 1957.
- 7). Digital processing of the entire lease area using remote sensing technique shall be carried out regularly once in three years for monitoring land use pattern and report submitted to Ministry of Environment, Forest and Climate Change its Regional Office.
- 8). Five ambient air quality-monitoring stations shall be established in the core zone as well as in the buffer zone for PM₁₀, PM_{2.5}, SO₂ and NO_x monitoring. Location of the station be decided based on the meteorological data topographical features and environmentally and ecologically sensitive targets and frequency of monitoring should be undertaken in consultation with the state Pollution Control Board.
- 9). The critical parameters as per the Notification 2009 such as PM₁₀, PM_{2.5}, NO_x, and SO_x etc. in the ambient air within the impact zone, peak particle velocity at 300m distance or within the nearest habitation, whichever is closer shall be monitored periodically. Further, quality of discharged water shall also be monitored [(TDS, DO, PH and Total Suspended Solids (TSS)]. The monitored data shall be uploaded on the website of the company as well as displayed on a display board digitally at the project site at a suitable location near the main gate of the Company in public domain. The circular No. J-20012/1/2006-IA.II (M) dated 27.05.2009 issued by Ministry of Environment, Forest and Climate Change shall also be referred in this regard for its compliance.
- 10). Effective safeguard measures such as regular water sprinkling shall be carried out in critical areas prone to air pollution and having high levels of

PM₁₀ and PM_{2.5} such as haul road, loading and unloading point and transfer points. Fugitive dust emissions from all the sources shall be controlled regularly. It shall be ensured that the Ambient Air Quality parameters conform to the norms prescribed by the Central Pollution Control Board in this regard. Monitoring of Ambient Air Quality to be carried out based on the Notification 2009, as amended from time to time by the Central Pollution Control Board.

- 11). Regular monitoring of ground water level and quality shall be carried out in and around the mine lease by establishing a network of existing wells and constructing new piezometers during the mining operation. The project proponent shall ensure that no natural water course and/or water resources shall be obstructed due to any mining operations. The monitoring shall 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 Ministry of Environment, Forest and Climate Change and its Regional Office, Central Ground Water Authority and Regional Director, Central Ground Water Board.
- 12). Regular monitoring of the flow rate of the springs and perennial nallahs flowing in and around the mine lease shall be carried out and records maintain. The natural water bodies and or streams which are flowing in an around the village, should not be disturbed. The Water Table should be nurtured so as not to go down below the pre-mining period. In case of any water scarcity in the area, the Project Proponent has to provide water to the villagers for their use. A provision for regular monitoring of water table in open dug wall located in village should be incorporated to ascertain the impact of mining over ground water table.
- 13). Regular monitoring of water quality upstream and downstream of water bodies shall be carried out and record of monitoring data should be maintained and submitted to the Ministry of Environment, Forest and Climate Change and its Regional Office, Central Ground Water Authority, Regional Director, Central Ground Water Board, State Pollution Control Board and Central Pollution Control Board.
- 14). Transportation of the minerals by road passing through the village shall not be allowed. A 'bypass' road should be constructed (say, leaving a gap of at least 200 meters) for the purpose of transportation of the minerals so that the impact of sound, dust and accidents could be mitigated. The project proponent shall bear the cost towards the widening and strengthening of existing public road network in case the same is proposed to be used for the Project. No road movement should be allowed on existing village road network without appropriately increasing the carrying capacity of such roads.
- 15). The illumination and sound at night at project sites disturb the villages in respect of both human and animal population. Consequent sleeping disorders and stress may affect the health in the villages located close to mining operations. Habitations have a right for darkness and minimal noise levels at night. PPs must ensure that the biological clock of the villages is not disturbed; by orienting the floodlights/ masks away from the villagers and keeping the noise levels well within the prescribed limits for day light/night hours.

- 16). Main haulage road in the mine should be provided with permanent water sprinklers and other roads should be regularly wetted with water tankers fitted with sprinklers. Crusher and material transfer points should invariably be provided with Bag filters and or dry fogging system. Belt-conveyors should be fully covered to avoid air borne dust.
- 17). Main haulage road in the mine should be provided with permanent water sprinklers and other roads should be regularly wetted with water tankers fitted with sprinklers. The material transfer points should invariably be provided with Bag filters and or dry fogging system. In case of Belt-conveyors facilities the system should be fully covered to avoid air borne dust; Use of effective sprinkler system to suppress fugitive dust on haul roads and other transport roads shall be ensured.
- 18). Sufficient number of Gullies to be provided for better management of water. Regular Monitoring of pH shall be included in the monitoring plan and report shall be submitted to the Ministry of Environment, Forest and Climate Change and its Regional Office on six monthly basis.
- 19). There shall be planning, developing and implementing facility of rainwater harvesting measures on long term basis and implementation of conservation measures to augment ground water resources in the area in consultation with Central Ground Water Board.
- 20). The Project Proponent has to take care of gullies formed on slopes. Dump mass should be consolidated with proper filling/leveling with the help of dozer/compactors.
- 21). The reclamation at waste dump sites shall be ecologically sustainable. Scientific reclamation shall be followed. The local species may be encouraged and species are so chosen that the slope, bottom of the dumps and top of the dumps are able to sustain these species. The aspect of the dump is also a factor which regulates some climatic parameters and allows only species adopted to that micro climate.
- 22). The top soil, if any, shall temporarily be stored at earmarked site(s) only and it should not be kept unutilized for long. The topsoil shall be used for land reclamation and plantation. The over burden (OB) generated during the mining operations shall be stacked at earmarked dump site(s) only and it should not be kept active for a long period of time. The maximum height of the dumps shall not exceed 8m and width 20 m and overall slope of the dumps shall be maintained to 45°. The OB dumps should be scientifically vegetated with suitable native species to prevent erosion and surface run off. In critical areas, use of geo textiles shall be undertaken for stabilization of the dump. The entire excavated area shall be backfilled and afforested. Monitoring and management of rehabilitated areas should continue until the vegetation becomes self-sustaining. Compliance status shall be submitted to the Ministry of Environment, Forest and Climate Change and its Regional Office on six monthly basis.
- 23). Catch drains and siltation ponds of appropriate size shall be constructed around the mine working, mineral and OB dumps to prevent run off of water and flow of sediments directly into the river and other water bodies. The

water so collected should be utilized for watering the mine area, roads, green belt development etc. The drains shall be regularly desilted particularly after monsoon and maintained properly. The drains, settling tanks and check dams of appropriate size, gradient and length shall be constructed both around the mine pit and over burden dumps to prevent run off of water and flow of sediments directly into the river and other water bodies 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 shall be constructed at the corners of the garland drains and desilted at regular intervals.

- 24). Plantation shall be raised in a 7.5m wide green belt in the safety zone around the mining lease, backfilled and reclaimed area, around water body, along the roads etc. by planting the native species in consultation with the local DFO/Agriculture Department and as per CPCB Guidelines. The density of the trees should be around 2500 plants per ha. Greenbelt shall be developed all along the mine lease area in a phased manner and shall be completed within first five years.
- 25). Project Proponent shall follow the mitigation measures provided in Office Memorandum No. Z-11013/57/2014-IA.II (M), dated 29th October, 2014, titled "Impact of mining activities on Habitations-Issues related to the mining Projects wherein Habitations and villages are the part of mine lease areas or Habitations and villages are surrounded by the mine lease area".
- 26). The Project Proponent shall make necessary alternative arrangements, where required, in consultation with the State Government to provide alternate areas for livestock grazing, if any. In this context, Project Proponent should implement the directions of the Hon'ble Supreme Court with regard to acquiring grazing land. The sparse trees on such grazing ground, which provide mid-day shelter from the scorching sun, should be scrupulously guarded against felling and plantation of such trees should be promoted.
- 27). The project proponent shall take all precautionary measures during mining operation for conservation and protection of endangered fauna, if any, spotted in the study area. Action plan for conservation of flora and fauna shall be prepared and implemented in consultation with the State Forest and Wildlife Department. A copy of action plan shall be submitted to the Ministry of Environment, Forest and Climate Change and its Regional Office.
- 28). As per the Company Act, the CSR cost should be 2 % of average net profit of last three years. Hence CSR expenses should be as per the Company Act/Rule for the Socio Economic Development of the neighborhood Habitats which could be planned and executed by the Project Proponent more systematically based on the 'Need based door to door survey' by established Social Institutes/Workers. The report shall be submitted to the Ministry of Environment, Forest and Climate Change and its Regional Office on six monthly basis.
- 29). Provision shall be made for the housing of construction labour within the site with all necessary infrastructure and facilities such as fuel for cooking, mobile toilets, mobile STP, safe drinking water, medical health care, crèche etc. The

housing may be in the form of temporary structures to be removed after the completion of the project.

- 30). Measures should be taken for control of noise levels below 85 dBA in the work environment. Workers engaged in operations of HEMM, etc. should be provided with ear plugs / muffs.
- 31). Industrial waste water (workshop and waste water from the mine) should be properly collected, treated so as to conform to the standards prescribed under GSR 422 (E) dated 19th May, 1993 and 31st December, 1993 or as amended from time to time. Oil and grease trap should be installed before discharge of workshop effluents.
- 32). Personnel working in dusty areas should wear protective respiratory devices and they should also be provided with adequate training and information on safety and health aspects.
- 33). A separate environmental management cell with suitable qualified personnel should be set-up under the control of a Senior Executive, who will report directly to the Head of the Organization.
- 34). The funds earmarked for environmental protection measures should be kept in separate account and should not be diverted for other purpose. Year wise expenditure should be reported to the Ministry and its Regional Office.
- 35). The project authorities should inform to the Regional Office regarding date of financial closures and final approval of the project by the concerned authorities and the date of start of land development work.
- 36). The Regional Office of this Ministry shall monitor compliance of the stipulated conditions. The project authorities should extend full cooperation to the officer (s) of the Regional Office by furnishing the requisite data / information / monitoring reports.
- 37). The project proponent shall submit six monthly reports on the status of the implementation of the stipulated environmental safeguards to the Ministry of Environment, Forest and Climate Change, its Regional Office, Central Pollution Control Board and State Pollution Control Board.
- 38). A copy of clearance letter will be marked to concerned Panchayat / local NGO, if any, from whom suggestion / representation has been received while processing the proposal.
- 39). State Pollution Control Board should display a copy of the clearance letter at the Regional office, District Industry Centre and Collector's office/ Tehsildar's Office for 30 days.
- 40). The project authorities should advertise at least in two local newspapers widely circulated, one of which shall be in the vernacular language of the locality concerned, within 7 days of the issue of the clearance letter informing that the project has been accorded environmental clearance and a copy of the clearance letter is available with the State Pollution Control Board and also at web site of the Ministry of Environment, Forest and Climate Change at www.environmentclearance.nic.in and a copy of the same should be forwarded to the Regional Office.

12. The Ministry or any other competent authority may alter/modify the above conditions or stipulate any further condition in the interest of environment protection.

13. Concealing factual data or submission of false/fabricated data and failure to comply with any of the conditions mentioned above may result in withdrawal of this clearance and attract action under the provisions of Environment (Protection) Act, 1986.

14. The above conditions will be enforced inter-alia, under the provisions of the Water (Prevention & Control of Pollution) Act, 1974, the Air (Prevention & Control of Pollution) Act, 1981, the Environment (Protection) Act, 1986 and the Public Liability Insurance Act, 1991 along with their amendments and rules made there under and also any other orders passed by the Hon'ble Supreme Court of India/ High Court of Meghalaya and any other Court of Law relating to the subject matter.

15. Any appeal against this environmental clearance shall lie with the National Green Tribunal, if preferred, within a period of 30 days as prescribed under Section 16 of the National Green Tribunal Act, 2010.


(Surendra Kumar)
Director (S)

Copy to:-

- 1). **The Secretary**, Ministry of Mines, Government of India, Shastri Bhawan, New Delhi.
- 2). **The Secretary**, Department of Mines & Geology, Government of Meghalaya, Secretariat, Shillong.
- 3). **The Secretary**, Department of Environment, Government of Meghalaya, Secretariat, Shillong.
- 4). **The Secretary**, Department of Forest, Government of Meghalaya, Secretariat, Shillong.
- 5). **The Controller General**, Indian Bureau of Mines, Indira Bhawan, Civil Lines, Nagpur-440 001.
- 6). **The Chief Wildlife Warden** of the State Govt. of Meghalaya, Secretariat, Shillong.
- 7). **The Additional Principal Chief Conservator of Forests**, Ministry of Environment, Forest & Climate Change, Regional Office (NEZ), Law-U-Sib, Lumbatngan, Near MTC Workshop, Shillong, Meghalaya.
- 8). **The Chairman**, Central Pollution Control Board, Parivesh Bhawan, CBD-cum-Office Complex, East Arjun Nagar, Delhi-110032.
- 9). **The Chairman**, Meghalaya State Pollution Control Board, ARDEN Lumpyngrigad, Shillong, Pin- 793 003.
- 10). **The Member Secretary**, Central Ground Water Authority, A-2, W3, Curzon Road Barracks, K.G. Marg, New Delhi-110001.
- 11). **The District Collector**, District- **East Khasi Hills**, Meghalaya.
- 12). **Guard File.**
- 13). **MoEFCC website.**


(Surendra Kumar)
Director (S)