

Sub: SEIAA Kerala - Quarry project in Survey Nos. 91/1-7, 91/1-3, 91/1-4 and 91/1-2 in Enanalloor Village, Ayavana Panchayat, Muvattupuzha Taluk, Ernakulam district by M/s Mudakkalil Granites Pvt Ltd - Environmental Clearance - Accorded

Environmental Clearance

No. 154/SEIAA/KL/3974/2013

dated, Thiruvananthapuram 01.10.2014

- Ref:- 1. Application dated 30.10.2013 of Mudakkalil Granites Private Ltd, Ayavana P.O, Karimattam, Moovattupuzha, pin 686 676
2. Minutes of the 24th meeting of SEAC Kerala held on 07.12.2013
 3. Minutes of the 25th meeting of SEAC, Kerala held on 14/15.02.2014
 4. Minutes of the 30th meeting of SEAC Kerala held on 6/7.06.2014
 5. Minutes of the 33rd meeting of SEIAA, Kerala held on 24.09.2014

ORDER

Sri M.A Mathai, authorized signatory of M/s Mudakkalil Granites Pvt. Ltd, Ayavana Panchayath, Karimattom, Muvattupuzha Taluk has applied for Environmental Clearance vide application received on 08.11.2013 for the quarry project of M/s Mudakkalil Granites Pvt. Ltd in Sy. Nos. 91/1-7, 91/1-3, 91/1-4 and 91/1-2 at Enanalloor Village, Ayavana Panchayath, Muvattupuzha Taluk, Ernakulam district, Kerala from 6.7571 hectares for extraction of building stone. The project comes under Category B, Activity 1 (a), (i) as per the Schedule of EIA Notification 2006 (since it is below 50 hectares) and as per O.M No. L-11011/47/2011-IA.II(M) dated 18th May 2012 of Ministry of Environment and Forests. It is further categorized as Category B2 as per the O.M No. J-13012/12/2013-IA-II (I) dt. 24.12.2013 of Ministry of Environment and Forests, since the area of the project is below 25 hectares. Proposed Capacity is 2, 70,000 MTA. It is an existing quarry with mine over about 2.730 ha of pit area. Geographical location of the project site in 9⁰59'21.50 to 9⁰59' 12.22" Latitude (N) and 76⁰37'20.43" to 76⁰37'06.07"(E). The quarry is interlinked with a Crusher/M sand unit located within the complex. It is stated that there are no litigations against the lease area or applicant in any court of law. Lease area is a private land. Topography is hilly. Highest elevation is 88m MSL and lowest 38m MSL. Expected cost of the project is 1.42 crores. Daily water demand is 5 KLD. The total power requirement is 75 kw which will be taken from diesel engines of fuel quantity 16 to 20 l/hr. The nearest house is located at 108m south west of the proposed quarry. Diesel engine emissions, gaseous emissions due to transportation, dust, and construction activities are estimated as possible pollutants.

2. The quarry project is situated 25 meters north of the quarry area at 25m and 'Appu Granites', Ayavana 3kms south. It is assured that at the end of life of the mine, excavated pit will be back-filled

and reclaimed and rehabilitated by plantation with native species so as to restore the natural eco-system. As a part of Corporate Social Responsibility Rs 5.5khs per annum for different activities and consultations with local village authorities is proposed to be implemented. As a part of access and benefit sharing (ABS) one percent of the annual profit of the firm would be given to the Biodiversity Management Committee (BMC) of the concerned Gramapanchayat, towards restoration of biodiversity loss due to the mining activity. As an eco-restoration programme, yearwise afforestation programme for the life of the mine, about 5000 trees will be planted to restore the ecosystem to its original form to the maximum possible extent by designing the green cover with the same native species.

The application was considered in the 22nd SEAC meeting held on 7th December 2013 as agenda item no. 22.12 and the Committee deferred the item for site visit. The proponent was also directed to provide the certain documents to SEAC for further consideration of the proposal. Subsequently a subcommittee of SEAC consisting of Dr. N.G.K Pillai, Chairman, SEAC and Sri. John Mathai, Member, SEAC inspected the site on 10th December 2013 and in the mean time the proponent has submitted the clarifications/additional documents. The site is located in the elevated lands to the east of Karimattom-Randar road and is approachable through Muvattupuzha-Kalloorkad road by taking northerly deviation near Randar. The quarry is located in an east-west hill ridge with peak elevation of 92 m AMSL. The general slope is moderate towards south and south east. Over burden thickness varies but thicker cover is noticed in the western side. Charnockite is the main rock type. Dominant land use in the area is rubber plantations. The site has existing quarry and a crusher unit. Abandoned quarry pit is presently used as storm water collection pond. Steep cliff face is seen in the eastern boundary of excavation.

- The area presents two blocks – a) currently being exploited and b) area yet to be developed with a narrow land in between. The area under exploitation may be completed first and the second area subsequently. In this process the exploited area can be restored by using part of the overburden.
- The storm water from the upper slopes needs to be managed properly by providing garland drains and directed to the streams in the lower valley.
- The cliff like faces of old workings must be provided with fencings.
- The RWH pit must be provided with protective fencing.
- There is another quarry adjacent to the proponent's quarry. The boundary between the two units does not provide statutory distance. Hazardous condition exists, which needs to be addressed.

In view of the site inspection report and additional clarifications by the proponent, the matter was placed before SEAC in its 25th meeting held on 14th and 15th February 2014 as agenda item no. 25.44, for verification of the documents. The Committee verified the additional clarifications/documents submitted by the proponent, and felt that the same requires detailed examination and the item was deferred to be considered in the next SEAC meeting. Hence the item was placed for reconsideration of SEAC in its 26th meeting held on 20th and 21st March 2014. The Committee verified the additional

clarifications were submitted by the project proponent. Subsequent to the inspection conducted by sub-committee of SEAC and examining the report thereon, the item was deferred directing the proponent to submit detailed plan the following for further consideration of the proposal:

1. The area currently being exploited which has to be completed first.
2. The area for subsequent exploitation with narrow land in between.
3. The reclamation plan for the exploited area using part of the overburden.
4. Detailed plan to provide statutory distance between the quarry adjacent to the proponent's quarry.

Upon furnishing of the additional clarifications the application and reports were again placed in the 30th meeting of the SEAC as item 30:63. The committee recommended the project also subject to the usual conditions. The recommendations were placed before the 33rd meeting of the SEIAA held on 24.05.2014. The SEIAA considered the recommendation of SEIAA, the assurances given by the project proponent in various reports and clarifications submitted by him, inspection report and all other relevant documents. It was decided to approve the project and to issue Environmental Clearance under the EIA notification 2006, as per the documents submitted by the project proponent as appraised and recommended by the SEAC.

4. Environmental Clearance under the EIA notification 2006 is accorded for the proposed quarry project of M/s Mudakkal Granites Pvt Ltd in Survey No.s 91/1-7, 91/1-3, 91/1-4, 91/1-2 at Enanalloor Village, Ayavana Panchayat, Moovattupuzha Taluk, Ernakulam district subject to all the mining features, Environmental management plans as undertaken in the pre feasibility report and Environment Management plan as submitted to the SEIAA, which will be deemed to be a part of this proceedings as if incorporated herein, the following additional specific conditions and the general conditions of mining of minor minerals appended hereto:

- The area presents two blocks – a) currently being exploited and b) area yet to be developed with a narrow land in between. The area under exploitation may be completed first and the second area subsequently. In this process the exploited area can be restored by using part of the overburden.
- The storm water from the upper slopes needs to be managed properly by providing garland drains and directed to the streams in the lower valley.
- The cliff like faces of old workings must be provided with fencing.
- The RWH pit must be provided with protective fencing.
- There is another quarry adjacent to the proponent's quarry. The boundary between the two units does not provide statutory distance. Hazardous condition exists, which needs to be addressed.

The Validity of this EAC will be 14 years from 01.10.2014 to be reviewed once in five years, subject to review at anytime on violation of any conditions in this order.

- i) Compliance of the conditions herein will be monitored by the Directorate of Environment and Climate Change or its agencies and also by the Regional office of the Ministry of Environment and Forest, Govt. of India, Bangalore.
- ii) Necessary assistance for entry and inspection should be provided by the project Proponent and those who are engaged entrusted by him to the staff for inspection or monitoring.
- iii) Instances of violation if any shall be reported to the District Collector, Ernakulam to take legal action under the Environment (Protection) Act 1986.

The given address of correspondence for the authorized signatory of the project is Sri M A Mathai, Managing Director, M/s Mudakkalil Granites Pvt Ltd, Ayavana P.O, Karimattam, Muvattupuzha Ernakulam, Kerala - 686676. Tel No. 0485-2282056 Mob. No. 09447379058, 09388256656, gmail - mgpl93@yahoo.co.in

Agency with NABET accreditation for EIA is M/s Enkay Enviro Services Pvt Ltd, 24-B, Dabu Marg, Gopal Bari, Ajmer Road, Jaipur, Rajasthan - 302001.

To

Sri M B Mathai
Managing Director
M/s Mundakkalil Granite Pvt Ltd.
Ayavana P.O, Karimattam, Moovattupuzha
Ernakulam - 686 676



[Signature]

For Member Secretary, SEIAA

Copy to :

1. IA-Division, Monitoring Cell, MoEF, Paryavaran Bhavan, CGO Complex, Lodhi Road, New Delhi - 110003
2. MoEF Regional Office, Southern Zone, Kendriya Sadan, 4th Floor, E&F Wing, II Block Koramangala, Bangalore-560034
3. The Addl. Chief Secretary to Government, Environment Dept., Government of Kerala
4. The District Collector, Ernakulam
5. The Director, Dept. of Environment and Climate Change, Govt. of Kerala, Tvm - 24.
6. The Director, Mining and Geology Department, Government of Kerala
7. The Secretary, Ayavana Grama Panchayat, Muvattupuzha, Ernakulam
8. Chairman of SEIAA Kerala
9. Website
10. Stock file
11. O/c

ENVIRONMENTAL IMPACT ASSESSMENT AUTHORITY KERALA
GENERAL CONDITIONS (Mining projects)

- (i) Rain Water Harvesting capacity should be installed as per the prevailing provisions of MBR / KPBR, unless otherwise specified elsewhere.
- (ii) Environment Monitoring Cell as agreed under the MOU filed by the proponent should be formed and made functional.
- (iii) Suitable avenue trees should be planted along either side of the tarred road and open parking areas, if any, inclusive of approach road and internal roads.
- (iv) The project shall incorporate devices for solar energy generation and utilization wherever possible.
- (v) Sprinklers shall be installed and used in the project site to contain dust emissions.
- (vi) Eco-restoration including the mine closure plan shall be done at the own cost of the project proponent.
- (vii) At least 10 percent out of the total excavated pit area should be retained as water storage areas and the remaining area should be reclaimed with stacked dumpings and overburden and planted with indigenous plant species that are eco-friendly.
- (viii) Corporate Social Responsibility (CSR) agreed upon by the proponent should be implemented in tune with the conditions specified in the Companies Act, 2013.
- (ix) Barbed metal wire fencing around the mining area shall be provided with a height of not less than 5 ft so that falling of animals/human beings/dumping of garbages etc. does not happen.
- (x) Warning alarms indicating the time of blasting (to be done at specific timings) has to be arranged as per stipulations of Explosive Department.
- (xi) Control measures on noise and vibration prescribed by KSPCB should be implemented.
- (xii) Quarrying activities should be limited to day time as per KSPCB guidelines.
- (xiii) Blasting should be done in a controlled manner as specified by the regulations of Explosives Department or any other concerned agency.
- (xiv) A licensed person should supervise/ control the blasting operations.
- (xv) Access roads to the quarry shall be tarred to contain dust emissions that may arise during transportation of materials.
- (xvi) Overburden materials should be managed within the site and the old quarries, if any, should be reclaimed and restored.
- (xvii) Height of benches should not exceed 5 m and width should not be less than 5 m.
- (xviii) Mats to reduce fly rock blast to a maximum of 10 PPV should be provided.
- (xix) Mining depth should not exceed beyond 40 m, unless otherwise specified or not below the level of nearest stream bed, whichever is less.
- (xx) No mining operations should be carried out at places having a slope greater than 45°.
- (xxi) Acoustic enclosures should have been provided to reduce sound amplifications in addition to the provisions of green belt and hollow brick envelop for crushers so that the noise level is kept within prescribed standards given by CPCB/KSPCB.
- (xxii) The workers on the site should be provided with the required protective equipment such as ear muffs, helmet, etc.
- (xxiii) Garland drains with clarifiers to be provided in the lower slopes around the core area to channelize storm water.
- (xxiv) The transportation of minerals should be done in covered trucks to contain dust emissions.
- (xxv) The proponent should plant trees at least 5 times of the loss that has been occurred while clearing the land for the project.
- (xxvi) Disposal of spent oil from diesel engines should be as specified under relevant Rules/ Regulations.
- (xxvii) Explosives should be stored in magazines in isolated place specified and approved by the Explosives Department.
- (xxviii) Norms of Kerala State Pollution Control Board should be adhered to regarding distance criteria of residences, roads, rivers and worship places.
- (xxix) 200 m buffer distance should be maintained from forest boundaries.
- (xxx) Consent from Kerala State Pollution Control Board under Water and Air Act(s) should have been obtained before initiating activity.

- (xxxi) All other statutory clearances should have been obtained applicable, by project proponents from the respective competent authorities including that for blasting and storage of explosive.
- (xxxii) In the case of any change(s) in the scope of the project, the project would require a fresh approval by this Authority.
- (xxxiii) The Authority reserves the right to add additional safeguard measures subsequently, if found necessary, and to take action including revoking of the environment clearance under the provisions of the Environment (Protection) Act, 1986, to ensure effective implementation of the suggested safeguard measures in a time bound and satisfactory manner.
- (xxxiv) The stipulations by Statutory Authorities under different Acts and Notifications should be complied with, including the provisions of Water (Prevention and Control of Pollution) Act, 1974, the Air (Prevention and Control of Pollution) Act, 1981, the Environment (Protection) Act, 1986, the Public Liability (Insurance) Act, 1991 and EIA Notification, 2006.
- (xxxv) The project proponent should advertise in at least two local newspapers widely circulated in the region, one of which (both the advertisement and the newspaper) shall be in the vernacular language informing that the project has been accorded Environmental Clearance and copies of clearance letters are available with the Department of Environment and Climate Change, Govt. of Kerala and may also be seen on the website of the Authority at www.seiaakerala.org. The advertisement should be made within 10 days from the date of receipt of the Clearance letter and a copy of the same signed in all pages should be forwarded to the office of this Authority as confirmation.
- (xxxvi) A copy of the clearance letter shall be sent by the proponent to concerned Grama Panchayat/ District Panchayat/ Municipality/ Corporation/ Urban Local Body and also to the Local NGO, if any, from whom suggestions / representations, if any, were received while processing the proposal. The Environmental Clearance shall also be put on the website of the company by the proponent.
- (xxxvii) The proponent shall submit half yearly reports on the status of compliance of the stipulated EC conditions including results of monitored data (both in hard copies as well as by e-mail) and upload the status of compliance of the stipulated EC conditions, including results of monitored data on their website and shall update the same periodically. It shall simultaneously be sent to the respective Regional Office of MoEF, Govt. of India and also to the Directorate of Environment and Climate Change, Govt. of Kerala.
- (xxxviii) The details of Environmental Clearance should be prominently displayed in a metallic board of 3 ft x 3 ft with green background and yellow letters of Times New Roman font of size of not less than 40.
- (xxxix) The proponent should provide notarized affidavit (indicating the number and date of Environmental Clearance proceedings) that all the conditions stipulated in the EC shall be scrupulously followed.




 For Member Secretary, SEIAA Kerala