



STATE LEVEL ENVIRONMENT IMPACT ASSESSMENT AUTHORITY
ODISHA, BHUBANESWAR

(Constituted under the EP Act, 1986 and EIA Notification, 2006 by the MoEF & CC, Govt. of India)
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Letter No _____

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SEIAA File No. 70222/65-MINB1/12-2021

Sub: Proposal of M/s Odisha Mining Corporation Limited for mining of Decorative Stone from Sukhapada Decorative stone Mine over an area of 114.062Acres or 46.159Ha at Village- Bandareswar & Kesharaipur, Tahasil- Darpan, Dist- Jajpur - environmental clearance regarding.

Ref: Your online application dated 18.12.2021 for issue of EC vide File No: SIA/OR/MIN/70222/2021.

Sir,

This has reference to your online application seeking environmental clearance of the mining project for mining of Decorative Stone from Sukhapada Decorative stone Mine over an area of 114.062Acres or 46.159Ha at Village- Bandareswar & Kesharaipur, Tahasil- Darpan, Dist- Jajpur. The proposal falls in the category 1(a)- 'Mining of minerals' in the schedule of EIA Notification, 2006 as amended from time to time. The proposal has been appraised on the basis of the documents enclosed with the application, such as Form-2, Form-1, PFR, Mining plan, Final EIA/EMP, Public Hearing Proceedings, DSR.

The Project Proposal in nutshell:

1. The is a proposal of Environmental Clearance of M/s Odisha Mining Corporation Limited for mining of decorative stone from Sukhapada Decorative stone Mine over an area of 114.062Acres or 46.159Ha at Village- Bandareswar & Kesharaipur, Tahasil- Darpan, Dist- Jajpur filed by Sri. Suman Krishna Sit.
2. As per the EIA Notification S.O. 1533, dated 14th September 2006 and subsequent amendments, this project falls under Category B (B1).
3. The Terms of Reference (ToR) was issued by SEIAA on dated 31.8.2021 vide letter no. 2344/SEIAA for undertaking detailed EIA studies.
4. Public Hearing was conducted on 15.12.2021 at Palei Gram panchayat office in Jajpur district as per the guidelines of EIA Notification, 2006. The issues raised by the public were on air & water pollution, green belt development, protection of wildlife, protection of agriculture and irrigation canal, protection of archeological monument and temple, protection of livelihood of artisan, construction of road and lighting, peripheral development, etc. The proponent has allocated a budget of Rs.60 Lakhs towards social development plan to the issues raised by the public.

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The mining lease was granted by Department of Steel & Mines, Govt. of Odisha vide letter no. 9804/ IV(DS)SM-39/2019 dated 11.12.2019 to Odisha Mining Corporation for a period of 30years subject to submission of the approved mining plan along with other conditions. The proponent has submitted the approved mining plan.

6. The mining plan is approved by Joint Director of Mines, Directorate of Mines, Odisha Bhubaneswar vide letter no. MXXII-(C)-1/2021 5587/DM dated 27.07.2021.
7. **Location and Connectivity:** - The area of mining lease area is located in the Survey of India Toposheet no. F45U6 from latitude:20°35'33.5422"N to 20°36'1.8569"N and longitude: 86°15'32.7960"E to 86°16'9.88396" E. The land use pattern of the mining lease area comes under the non forest agricultural land (Abada Ajogya Anabadi), bearing Khata no. /Plot No./Area/Kisam: 389/29/ 37.685 Acres/Pahada, 388/31/37.17 Acres/ Pahada & 261/248/39.206 Acres/Abada Ajogya Anabadi. The PP has submitted that No forest land is involved in the mining lease area. The applied area of 46.159 Ha in village Bandareswar No-1219 & Kesharaipur No-1218, Tahasil-Darpanin Jajpur district of Odisha. The lease area can be approached from NH: 5A (Daitari - Paradeep Express Highway) at a distance of 0.2Km. Nearest major habitation is at Bandareswar & Kesharaipur which is at a distance of 1km. Nearest Archaeological site is Ratnagiri Budhist Site at 10 Km. Nearest wildlife sanctuary is Kapilash Wildlife Sanctuary which is at a distance of 33.7km away from lease boundary.
8. **Method of Mining:** -The proponent has submitted that mining will be carried out by opencast and semi mechanized method with the deployment of machines like L/D bore machine, jack hammer drill, compressor, hydraulic excavators & tippers. The major activities in this quarry will be removal of waste materials, block cutting/splitting & dressing, loading & transportation of decorative stone as well as waste disposal. The decorative stone blocks will be extracted, loaded and transferred from a quarry face to the stone cutting shop/processing plant through trailers/ trucks. Mineral rejects, rubble stone will be transported by trucks to the waste dump area as waste/ rejects.
9. **Total Geological, Mineable Reserves & Production:** - The geological and mineable reserve of Sukhuapada Decorative Stone Mine is 61,99,785cum and 57,27,717cum respectively. The project has been proposed for maximum production of 28,975 cum per annum and 1,38,025 cum of total production of decorative stone during the plan period from the lease area as per the approved mining plan.

Table No.1.1:- Details of the Geological Reserve during the Plan Period:

Reserve Category	Decorative Stone (m ³)	Vol. of Waste Rock In (m ³)	Vol. of Sub Grade In (m ³)	Total In (m ³)
Proved	6199785	11159614	7439742	24799141

Table No.1.2:- Details of the Mineable Reserve during the Plan Period:

Reserve Category	Decorative Stone (m ³)	Vol. of Waste Rock In (m ³)	Vol. of Sub Grade In (m ³)	Total In (m ³)
Proved	5727717	6873261	10309890	22910868

Table No.1.3:- Details of the proposed production during the Plan Period:

Year	LOI (M)	Vol of Total Excavation (m ³)	Vol of Decorative Stone (m ³)	Vol. of Presently Non-Saleable Ore (m ³)	Vol. of Waste (m ³)	Vol. of Weathered Rock (m ³)
1st Year	100	106600	26650	31980	47970	122800
2nd Year	100	115900	28975	34770	52155	35700
3 rd Year	100	109800	27450	32940	49410	32800
4 th Year	100	109200	27300	32760	49410	30900
5th Year	100	110600	27650	33180	49770	32500
Total		552100	138025	165630	248445	254700

10. **Waste generation and utilization** - The proponent has submitted that a total of 248,445cum waste is likely to be generated during the plan period. These wastes will be utilized concurrently for construction and maintenance of road in the lease area. For temporary storing of these wastes, an area of 2.01 Ha has been earmarked in the southern part of the mining lease area. After the plan period a total of 11.3736 Ha will be utilized for mining, dumping, stack yard and ancillary activities along with the safety zone over 2.272Ha. During the life of the mine, a total of 5.180 Ha of lease area will be degraded under mining.
11. **Green Belt:** - The plantation will be developed over an area of 2.272 Ha along the lease boundary, safety zone, and open spaces available. By the end of conceptual period, the dumping and stacking area will be covered under plantation.
12. **Water Requirement:** - Total water requirement for the project will be 5 KLD out of which 1.5 KLD will be required for drinking and domestic purpose and 2.0 KLD for dust suppression and 1.5 KLD for plantation purpose. Source of domestic water will be nearby village well.
13. **Power Requirement** - Power Requirement will be met through DG sets.
14. **Employment Potential** - The mining activity will generate employment for 40nos consisting of Skilled, Semiskilled, Unskilled, and Administrative Staffs.
15. The baseline studies were conducted during the period from March 2021 to May 2021(summer season).

16. The project cost is Rs. 4.00 crores and funds under EMP is Rs. 40 lakhs (capital) and Rs. 5.2 lakhs (Recurring).
17. There is no DLC land involved in the lease area as certified by the concerned DFO, Cuttack Division vide their letter no.2765 dated 08.04.2021 and letter no.5506 dated 26.07.2021.
18. The Environment Consultant M/s Kalyani Laboratories (Pvt) Ltd. Bhubaneswar along with the proponent made a detailed presentation on the proposal before the Committee on 28.12.2021.
19. The SEAC have appraised the proposal in its meeting held on 28.12.2021 and have recommended for grant of Environmental Clearance for the project stipulating various conditions.

The State Environment Impact Assessment Authority (SEIAA) after considering the proposal and recommendations of SEAC, Odisha hereby accords Environmental Clearance in favour of the project valid from the date of Environmental Clearance accorded upto the lease period under the provisions of EIA Notification 2006 and subsequent amendments thereto, subject to strict compliance of all stipulated conditions, as follows. Detailed half yearly compliance report of these conditions has to be submitted by the project proponent to the Member Secretary, SEIAA on the 1st June and 1st December each year.

Stipulated Conditions:

A. Specific Conditions:

1. While Land use of the proposed project site is stated to be "Non forest Agricultural land (Abada Ajogya Anabadi)" by the lessee, it is also said to be of "Parbat-2" Kisam by the lessee. Therefore, land conversion / diversion for mining purpose shall be done with the approval of the concerned authority confirming to land use policy of the State.
2. The lessee shall provide the settling tank of suitable design & capacity to accommodate run-off / wash off from non – saleable stone / waste dumps without out flowing in addition to retaining wall & garland drain.
3. The lessee shall prepare the "SOP" for silt management in place including desiltation (if any, by analysing the presence of silt and fine sand and other fine minerals if any) of water bodies/Birupa river / Agricultural & Crop lands and implement the same.
4. Permission for use of village road shall be obtained from appropriate Govt authority before use of the same.
5. Perennial periodical maintenance of the above said village road shall be done by the lessee in consultation & as advised by the authority of the road or it will be maintained by the authority of the road as required based on the "deposit scheme" of appropriate fund by the lessee with the authority.
6. Suitable haulage road shall be constructed by the lessee from lease boundary till NH- 5A (Daitari- Paradeep State Highway) of 200 meters & also maintained by them

- with permanent auto sprinkling arrangement on the said road for fugitive dust suppression.
7. The lessee shall provide the permanent sprinkling system inside the mines. Rain water harvesting Management shall be in place with the pond for use in green belt, water sprinkling etc., and reduce the burden of water drawal from elsewhere.
 8. The lessee shall make all efforts for transplantation of trees / saplings / afforestation done earlier in the hillocks fall, within the safety zone and non mineral zone of mining area. Besides this, compensatory plantation/ afforestation shall be done for the trees to be cut if unavoidable with due permission of the appropriate Govt. Forest authority under deposit scheme as per the Govt. rules, Three tier/ dense green belt shall be maintained in safety zone around mining area by planting more saplings.
 9. Lessee shall make avenue plantation on both sides of haulage road and village road.
 10. Since the manpower is more than forty including floating population, the lessee shall install a STP of minimum 5 KLD capacity of suitable design for treatment of domestic waste water.
 11. The lessee shall make all efforts for "Zero discharge" to outside the lease boundary.
 12. The Lessee should provide large Sumps in the mined out/ non-mining area for collection of rain water & simultaneously recharge the Ground water.
 13. Provision of matching capacity of Settling Pond for sedimentation shall be provided to release the supernatant water through Check dam/ grass way/stone gabions if the water quality is within permissible limit and if Zero Discharge concept is not achieved in exigencies.
 14. This EC is granted subject to strict compliance by the lessee / PP on the commitments made by them during Public Hearing.
 15. This EC is granted without prejudice to any order or direction from any court of competent jurisdiction or competent authority under applicable laws.
 16. The lessee shall comply with all the conditions of EC and if anything is found otherwise at any point of time, the EC so granted shall be deemed to have withdrawn / revoked with immediately effect besides levy of penalty as applicable under the applicable laws.
 17. Mines closure plan shall be strictly followed by the lessee.
 18. Protection of Nalas/ Water body(s)/ ponds at the bottom of the Hillock shall be ensured by the Lessee with the construction of " Retention Wall" of appropriate length, height and construction materials that will also protect fish cultivation and arrest erosion.
 19. This EC for the proposal shall be operational after submission of an undertaking through affidavit to SEIAA, Odisha within 15 days of receipt of the EC letter for compliance of all the conditions prescribed herein.
 20. EC for the proposal shall be operational after getting necessary approval from the CGWA.
 21. Consent / NoC shall be obtained from the concerned village Sarpanch for use of village road for mineral transport. The said road shall also be maintained by the lessee.

22. No mining activities will be allowed in forest area, if any, for which the Forest Clearance is not available.
23. The environmental clearance granted shall be valid up to the lease period and coterminous with lease period. Exploitation shall be as per the mining plan and reclamation plan.
24. Tree cutting inside the area, if any, shall be with prior permission of competent authority.
25. The Project Proponent shall obtain consent from the State Pollution Control Board, Odisha and effectively implement all the conditions stipulated therein.
26. Project Proponent shall appoint an Occupational Health Specialist for Regular and Periodical medical examination of the workers engaged in the Project and records maintained; also, Occupational health check-ups for workers having some ailments like BP, diabetes, habitual smokers, etc. shall be undertaken once in six months and necessary remedial/preventive measures taken accordingly. Recommendations of National Institute for Labour for ensuring good occupational environment for mine workers would also be adopted; All the old age people of the surrounding villages may be provided medical facilities.
27. Transport of minerals shall be done either by dedicated road or it should be ensured that the trucks/dumpers carrying the mineral should not be allowed to pass through the villages. The Project Proponent shall ensure that the road may not be damaged due to transportation of the mineral; and transport of minerals will be as per IRC Guidelines with respect to complying with traffic congestion and density.
28. Project Proponent shall ensure the safeguard and wellbeing of villagers and school, regular health monitoring of all residents in the area and the compliance Report shall be submitted to the Regional office of the Ministry and SEIAA, Odisha.

B. Standard conditions:

(I) Statutory compliance:

1. This Environmental Clearance (EC) is subject to orders/ judgment of Hon'ble Supreme Court of India, Hon'ble High Court, Hon'ble NGT and any other Court of Law, Common Cause Conditions as may be applicable.
2. Project Proponent (PP) shall obtain Consent to Operate after grant of EC and effectively implement all the conditions stipulated therein. The mining activity shall not commence prior to obtaining Consent to Establish / Consent to Operate from the concerned State Pollution Control Board.
3. The PP shall adhere to the provision of the Mines Act, 1952, Mines and Mineral (Development & Regulation), Act, 2015 and rules & regulations made there under. PP shall adhere to various circulars issued by Directorate General Mines Safety (DGMS) and Indian Bureau of Mines from time to time.
4. The Project Proponent shall obtain consents from all the concerned land owners, before start of mining operations, as per the provisions of MMDR Act, 1957 and rules made there under in respect of lands which are not owned by it.
5. The Project Proponent shall follow the mitigation measures provided in MoEF&CC's 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”.
6. The Project Proponent shall obtain necessary prior permission of the competent authorities for drawl of requisite quantity of surface water and from CGWA for withdrawal of ground water for the project.
 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 and SEIAA, Odisha.
 8. A copy of EC letter will be marked to concerned Panchayat / local NGO etc. if any, from whom suggestion / representation has been received while processing the proposal.
 9. State Pollution Control Board shall be responsible for display of this EC letter at its Regional office, District Industries Centre and Collector's office/ Tehsildar's Office for 30 days.
 10. The Project Authorities should widely advertise about the grant of this EC letter by printing the same in at least two local newspapers, one of which shall be in vernacular language of the concerned area. The advertisement shall be done within 7 days of the issue of the clearance letter mentioning that the instant project has been accorded EC and copy of the EC letter is available with the State Pollution Control Board and web site of the Ministry of Environment, Forest and Climate Change (parivesh.nic.in). A copy of the advertisement may be forwarded to the concerned MoEF & CC Regional Office for compliance and record.
 11. The Project Proponent shall inform the MoEF&CC/SEIAA, Odisha for any change in ownership of the mining lease. In case there is any change in ownership or mining lease is transferred than mining operation shall only be carried out after transfer of EC as per provisions of the para 11 of EIA Notification, 2006 as amended from time to time.

(II) Air quality monitoring and preservation:

12. The Project Proponent shall install a minimum of 1 (one) online Ambient Air Quality Monitoring Stations within the lease area to monitor critical parameters, relevant for mining operations, of air pollution viz. PM₁₀, PM_{2.5}, NO₂, CO and SO₂ etc. as per the methodology mentioned in NAAQS Notification No. B-29016/20/90/PC/II, dated 18.11.2009 covering the aspects of transportation and use of heavy machinery in the impact zone. The ambient air quality shall also be monitored at prominent places like office building, canteen etc. as per the site condition to ascertain the exposure characteristics at specific places. The above data shall be digitally displayed within 03 months in front of the main Gate of the mine site.
13. Effective safeguard measures for prevention of dust generation and subsequent suppression (like regular water sprinkling, metalled road construction etc.) shall be carried out in areas prone to air pollution wherein high levels of PM₁₀ and PM_{2.5} are evident such as haul road, loading and unloading point and transfer points. The fugitive dust emissions from all the sources shall be regularly controlled by installation of required equipments/ machineries and preventive maintenance. Use of suitable water-soluble chemical dust suppressing agents may be explored for better effectiveness of dust control system. It shall be ensured that air pollution level conform to the standards prescribed by the MoEF & CC/ Central Pollution Control

Board.

(III) Water quality monitoring and preservation:

14. In case, immediate mining scheme envisages intersection of ground water table, then Environmental Clearance shall become operational only after receiving formal clearance from CGWA. In case, mining operation involves intersection of ground water table at a later stage, then PP shall ensure that prior approval from CGWA and MoEF&CC, is in place before such mining operations. The permission for intersection of ground water table shall essentially be based on detailed hydro-geological study of the area.
15. 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.
16. 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.
17. The project proponent shall construct retaining wall and settling pond within the lease area. Further, check dams shall be constructed at strategic locations in which rain water passes in rainy season. Finally, the excess supernatant after sedimentation shall be allowed to spill away through stone pitch structure to the nearby valley.
18. De-silting of agricultural lands in buffer zone and beyond including nearby Nalas/rivers perennially periodically and perpetually caused due to wash up of minerals/OB/dumps shall be done as per SOP submitted. A legal affidavit shall be submitted within 6 months from the date of issue of Environmental Clearance to this effect with periodicity of de-silting.
19. An area of 0.0025Ha shall be kept for public to use as road. Hence, remaining 2.272Ha shall be planted during life of the mine in a phased manner i.e. within a period of 5 years.
20. Project Proponent shall plan, develop and implement rainwater harvesting measures on long term basis to augment ground water resources in the area in consultation with Central Ground Water Board/ State Groundwater Department. A report on amount of water recharged needs to be submitted to Regional Office, MoEF & CC annually.

(IV) Noise and vibration monitoring and prevention:

21. 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. 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.

(V) Mining Plan:

22. It shall be ensured that quarrying is not carried out within 500 m of structures, bridges, embankment, dams, weirs, ground water extraction points, water supply head works, extraction points for irrigation and any other cross drainage structures.
23. The Project Proponent shall adhere to the working parameters of mining plan which was submitted at the time of EC appraisal wherein year-wise plan was mentioned for total excavation i.e. quantum of mineral, waste, over burden, inter burden and top soil etc..No change in basic mining proposal like mining technology, total excavation, mineral & waste production, lease area and scope of working (viz. method of mining, overburden & dump management, O.B & dump mining, mineral transportation mode, ultimate depth of mining etc.) shall not be carried out without prior approval of the Ministry of Environment, Forest and Climate Change, which entail adverse environmental impacts, even if it is a part of approved mining plan modified after grant of EC or granted by State Govt. in the form to Short Term Permit (STP), Query license or any other name.
24. The Project Proponent shall get the Final Mine Closure Plan along with Financial Assurance approved from Indian Bureau of Mines/Department of Mining & Geology as required under the Provision of the MMDR Act, 1957 and Rules/ Guidelines made there under. A copy of approved final mine closure plan shall be submitted within 2 months of the approval of the same from the competent authority to the concerned Regional Office of the Ministry of Environment, Forest and Climate Change for record and verification.
25. The land-use of the mine lease area at various stages of mining scheme as well as at the end-of-life shall be governed as per the approved Mining Plan. The excavation vis-a-vis backfilling in the mine lease area and corresponding afforestation to be raised in the reclaimed area shall be governed as per approved mining plan. PP shall ensure the monitoring and management of rehabilitated areas until the vegetation becomes self-sustaining. The compliance status shall be submitted half-yearly to the MoEF & CC and its concerned Regional Office / SEIAA, Odisha.

(VI) Land reclamation:

26. The Overburden (O.B.) generated during the mining operations shall be stacked at earmarked OB dump site(s) only and it should not be kept active for a long period of time. The physical parameters of the OB dumps like height, width and angle of slope shall be governed as per the approved Mining Plan as per the guidelines/circulars issued by D.G.M.S w.r.t. safety in mining operations shall be strictly adhered to maintain the stability of top soil/OB dumps. The topsoil shall be used for land reclamation and plantation.
27. The reject/waste generated during the mining operations shall be stacked at earmarked waste dump site(s) only. The physical parameters of the waste dumps like height, width and angle of slope shall be governed as per the approved Mining Plan as per the guidelines/circulars issued by DGMS w.r.t. safety in mining operations shall be strictly adhered to maintain the stability of waste dumps.
28. The reclamation of waste dump sites shall be done in scientific manner as per the Approved Mining Plan cum Progressive Mine Closure Plan.

29. The slope of dumps shall be vegetated in scientific manner with suitable native species to maintain the slope stability, prevent erosion and surface run off. The selection of local species regulates local climatic parameters and help in adaptation of plant species to the microclimate. The gullies formed on slopes should be adequately taken care of as it impacts the overall stability of dumps. The dump mass should be consolidated with the help of dozer/ compactors thereby ensuring proper filling/ leveling of dump mass. In critical areas, use of geo textiles/ geo-membranes / clay liners / Bentonite etc. shall be undertaken for stabilization of the dump.
30. The Project Proponent shall carry out slope stability study in case the dump height is more than 30 meters. The slope stability report shall be submitted to concerned regional office of MoEF&CC, Govt. of India, Bhubaneswar as well as SEIAA, Odisha.
31. Catch drains, settling tanks and siltation ponds of appropriate size shall be constructed around the mine working, mineral yards and topsoil / OB / waste dumps to prevent runoff of water and flow of sediments directly into the water bodies (Nallah/ River/ Pond etc.). The collected water should be utilized for watering the mine area, roads, green belt development, plantation etc. The drains/ sedimentation sumps etc. shall be de-silted regularly, particularly after monsoon season, and maintained properly.
32. Check dams of appropriate size, gradient and length shall be constructed around mine pit and OB dumps to prevent storm run-off and sediment flow into adjoining water bodies. A safety margin of 50% shall be kept for designing of sump structures over and above peak rainfall (based on 50 years data) and maximum discharge in the mine and its adjoining area which shall also help in providing adequate retention time period thereby allowing proper settling of sediments/ silt material. The sedimentation pits/ sumps shall be constructed at the corners of the garland drains.
33. The top soil, if any, shall temporarily be stored at earmarked site(s) within the mine lease only and should not be kept unutilized for long. The physical parameters of the top soil dumps like height, width and angle of slope shall be governed as per the approved Mining Plan and as per the guidelines framed by DGMS w.r.t. safety in mining operations shall be strictly adhered to maintain the stability of dumps. The topsoil shall be used for land reclamation and plantation purpose.
34. The mining lease holders shall, after ceasing mining operations, undertake re-grassing the mining area and any other area which may have been disturbed due to their mining activities and restore the land to a condition which is fit for growth of fodder, flora, fauna etc.

(VII) Transportation

35. No transportation of the minerals shall be allowed on any road passing through villages/habitations without prior explicit permission. Transportation of minerals through existing rural roads can be allowed only by the concerned Govt. Department/ Gram Panchayat/BDO and only after required strengthening such that the carrying capacity of road is increased to handle the mineral carrying truck traffic. The project proponent shall bear the cost towards the widening and strengthening of existing public roads in case the same is proposed to be used for the project. No movement on any road is allowed on existing village road network without

appropriately increasing the carrying capacity of such roads. Project proponent shall ensure that the road may not be damaged due to transportation of the mineral and transport of minerals will be as per IRC Guidelines with respect to complying with traffic congestion and traffic density.

36. The Main haulage road within the mine lease should be provided with a permanent water arrangement for dust suppression. Other roads within the mine lease should be wetted regularly with tanker-mounted water sprinkling system. PP shall take necessary measures to avoid generation of fugitive dust emissions.
37. Traffic management shall be done as per recommendation of Traffic Management Study Report.

(VIII) Green Belt

38. The Project Proponent shall develop greenbelt in 7.5 m wide safety zone all along the mine lease boundary as per the guidelines of CPCB in order to arrest pollution emanating from mining operations within the lease. The whole Green belt shall be developed within first 5 years starting from windward side of the active mining area.
39. The Project Proponent shall carryout plantation/ afforestation in backfilled and reclaimed area of mining lease, around water body, along the roadsides, in community areas etc. by planting the native species in consultation with the State Forest Department/ Agriculture Department/ Rural development department/ Tribal Welfare Department/ Gram Panchayat such that only those species be selected which are of use to the local people. The CPCB guidelines in this respect shall also be adhered. The density of the trees should be around 2500 saplings per Hectare. Adequate budgetary provision shall be made for protection and care of trees.
40. 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.

(IX) Public hearing and human health issues:

41. The Project Proponent shall appoint an Occupational Health Specialist for Regular as well as Periodical medical examination of the workers engaged in the mining activities, as per the DGMS guidelines. The records shall be maintained properly. PP shall also carryout Occupational health check-ups in respect of workers which are having ailments like BP, diabetes, habitual smoking, etc. The check-ups shall be undertaken once in six months and necessary remedial/ preventive measures be taken. A status report on the same may be sent to MoEF&CC Regional Office and DGMS on half-yearly basis.
42. A commitment in form of an undertaking for periodical occupational health checkup of the employee and the local people shall be done through an occupational health expert as per the detailed action plan submitted with the proposal within 6 months from the date of issue of Environmental Clearance.
43. The Project Proponent shall ensure that 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.

44. Project Proponent shall make provision for the housing for workers/labors or shall construct labor camps within/outside (company owned land) with necessary basic infrastructure/ facilities like fuel for cooking, mobile toilets, mobile STP, safe drinking water, medical health care, creche for kids etc. The housing may be provided in the form of temporary structures which can be removed after the completion of the project related infrastructure. The domestic waste water should be treated with STP in order to avoid contamination of underground water.
45. The activities proposed in Action plan prepared for addressing the issues raised during the Public Hearing shall be completed as per the budgetary provisions mentioned in the Action Plan and within the stipulated time frame. The Status Report on implementation of Action Plan shall be submitted to the concerned Regional Office of the Ministry along with District Administration.
46. Issues raised and recorded in proceedings of public hearing w.r.t. environment / pollution / CER shall be complied by the Mining Authority as per OM F. No. 22-65/2017-IA.III, dated 30.09.2020 of MoEF & CC, Govt. of India.

(X) Corporate Environment Responsibility (CER):

47. The activities and budget earmarked for Corporate Environmental Responsibility (CER) as per Ministry's 30.09.2020 should be kept in a separate bank account. The activities proposed for CER shall be implemented in a time bound manner and annual report of implementation of the same along with documentary proof viz. photographs, purchase documents, latitude & longitude of infrastructure developed & road constructed needs to be submitted to Regional Office MoEF&CC annually along with audited statement.
48. Project Proponent shall keep the funds earmarked for environmental protection measures in a separate account and refrain from diverting the same for other purposes. The Year wise expenditure of such funds should be reported to the MoEF & CC and its concerned Regional Office / SEIAA, Odisha.

(XI) Miscellaneous:

49. The Project Proponent shall prepare digital map (land use & land cover) of the entire lease area once in five years purpose of monitoring land use pattern and submit a report to concerned Regional Office of the MoEF&CC.
50. 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.
51. The Project Proponent shall submit six monthly compliance reports on the status of the implementation of the stipulated environmental safeguards to the MoEF & CC & its concerned Regional Office, SEIAA, Odisha, Central Pollution Control Board and State Pollution Control Board.
52. The applicant will submit half-yearly compliance report on post environmental monitoring in respect of the stipulated terms and conditions in the Environmental Clearance to the State Environmental Assessment Authority (SEIAA), Odisha, SPCB & Regional Office of the Ministry of Environment & Forest, Odisha on 1st June and 1st December of each Calendar Year. The proponent shall also upload the compliance report on the website of the MoEF & CC for monitoring.
53. A separate 'Environmental Management Cell' with suitable qualified manpower should be set-up under the control of a Senior Executive. The Senior Executive

- shall directly report to Head of the Organization. Adequate number of qualified Environmental Scientists and Mining Engineers shall be appointed and submit report to RO, MoEF & CC.
54. The mining lease holders shall, after ceasing mining operations, undertake re-grassing the mining area and any other area which may have been disturbed due to their mining activities and restore the land to a condition which is fit for growth of fodder, flora, fauna etc.
 55. The project proponent shall augment infrastructure on drinking water, health care and education in nearby villages as per time bound action plan submitted.
 56. The project proponent shall obtain permission from DGMS under 106(2b) to carry out blasting operation within the lease area, if any.
 57. The concerned Regional Office of the MoEF&CC shall randomly monitor compliance of the stipulated conditions. The project authorities should extend full cooperation to the MoEF&CC officer(s) by furnishing the requisite data / information / monitoring reports.
 58. 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.

Yours Faithfully,


Member Secretary

Copy to

1. Joint Secretary (Environment), Ministry of Environment, Forests and Climate Change Govt. of India, Indira Paryavaran Bhavan, Jor Bagh Road, Aliganj, New Delhi-110003 for information.
2. Additional Chief Secretary, Forests & Environment Dept., Government of Odisha for information.
3. Additional Principal Conservator of Forests, Regional Office (EZ), Ministry of Environment & Forests, A-31, Chandrasekharapur, Bhubaneswar for information.
4. Member Secretary, State Pollution Control Board, Odisha, Paribesh Bhawan, A/118, Nilakantha Nagar, Unit-8, Bhubaneswar for information.
5. Chairman, Central Pollution Control Board, CBD-cum-office Complex, East Arjun Nagar, New Delhi-110032 for information.
6. Member Secretary, CGWA, 18/11, Jamnagar House, ManSingh Road, New Delhi-110011 for information.
7. Copy to the Collector, Jajpur for information.
8. Chairman/Member/Member Secretary, SEIAA for kind information.
9. Chairman, SEAC/Secretary, SEAC, Paribesh Bhawan, A/118, Nilakantha Nagar, Unit-VIII, Bhubaneswar for kind information
10. Guard file for record/Website/Parivesh Portal.


Member Secretary

Validity unknown

Digitally signed by Sri Susanta
Nanda
Member Secretary

Date: 1/6/2022 6:22:09 PM
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