

EXPANSION OF BALLARPUR COLLIERY 3&4 PITS COAL MINE.

MOEF Clearance Letter No.J- 11015 /31 / 2009 - I.A.II (M) Dated. 22-07-2009.

Ballarpur Colliery 3&4 Pits Coal Mines Project (0.60 MTPA).

Sr. No.	Specific Conditions	Compliance
i)	No mining shall be undertaken in forest land until forestry clearance has been obtained.	Complied.
ii)	Regular monitoring of subsidence movement on the surface over and around the working area and impact on natural drainage pattern, water bodies, vegetation, structure, roads, and surroundings should be continued till movement ceases completely. In case of observation of any high rate of subsidence movement, appropriate effective corrective measures should be taken to avoid loss of life and material. Cracks should be effectively plugged with ballast and clayey soil/ suitable material.	Till date we have not received any intimation regarding subsidence of surface. However, surface over and around the working area are regularly inspected and due care is taken in this regard.
iii)	High root density tree species shall be selected and planted over areas likely to be affected by subsidence.	Complied.
iv)	Coal extraction shall also be optimized in areas where agricultural production is continuing. Some pillars shall be left below the agricultural land. No coal depillaring shall be undertaken below areas of habitation.	Being complied.
v)	Subsidence shall be monitored closely and if subsidence is found exceeding the permitted limits, then the landowners shall be adequately compensated with mutual agreement of land owners.	Till date we have not received any intimation regarding subsidence of surface. However, surface over and around the working area are regularly inspected and due care is taken in this regard.
vi)	Garland drains (size, gradient and length) around the safety areas such as mine shaft and low lying areas shall be constructed and sump capacity should be designed keeping 50% safety margin over an above the peak sudden rainfall and maximum discharge in the area adjoining the mine sites. Sump capacity should also provide adequate retention period to allow proper settling of silt material.	Permanent drain is provided around mine shaft for proper discharge of rain water and the same is cleaned before commencement of rainy season every year.
vii)	Water sprinkling system should be provided to check fugitive emissions from CHP, crushing operations, conveyor	Water is being sprinkled through 1 no (16 KL) mobile water tanker on coal transportation road. 5 nos of sprinklers are provided at CHP.

	system, haulage roads, transfer points, etc.	
viii)	Major approach roads shall be black topped and properly maintained. A 3 tier plantation shall be developed along all major roads, near CHP, near coal bunker, infrastructure. A mist spray water sprinkling system shall be installed at CHP and at transfer points.	2.00 Km of internal roads are black topped. It is being complied.
ix)	Drills should be wet operated only.	Yes, drilling operation is being done in wet condition.
x)	A progressive afforestation plan shall be prepared and implemented over the mine lease area and shall include areas under green belt development, areas along roads, infrastructure, along ML boundary and township outside the lease area etc by planting native species in consultation with the local DFO/Agriculture Department. The density of the trees should be around 2500 plants per Ha.	About 1000 (One thousand) nos. of saplings are planted near CHP of RO incline on the available vacant land.
xi)	Regular monitoring of groundwater level quality should be carried out by establishing a network of Existing Wells and construction of new piezometers. The monitoring for quantity should be done four times a year in pre-monsoon (may), monsoon (August), post monsoon (November) and winter (January) seasons and for quality in May. Data thus collected should be submitted to the Ministry of Environment Forests and to the Central Pollution Control Board quarterly within one month of monitoring.	Regular monitoring of ground water level is being carried out by CMPDIL in the Area. Ground water Quality and Analysis report attached as ANNEXURE A .
xii)	The company shall put up artificial groundwater recharge measures for augmentation of groundwater resource. The project authorities should meet water requirement of nearby villages(s) in case the village wells go dry due to dewatering of mine.	Rain water harvesting measures undertaken at manager office of Ballarpur Colliery. During summer water will be supplied to nearby villages on demand through mobile tanker.
xiii)	Mine discharge water particularly TDS shall be treated to conform to prescribed levels before discharge into natural environment.	Complied.

xiv)	Besides carrying out regular periodic health checkup of their workers, 10% of the workers identified from workforce engaged in active mining operations shall be subjected to health checkup for occupational diseases and hearing impairment, if any, through an agency such as NIOH, Ahmedabad within a period of one year and the results reported to this Ministry and to DGMS.	Periodical medical examination is being carried out once in every five years at Area Hospital.
xv)	For monitoring land use pattern and for post mining land use, a time series of land use maps, based on satellite imagery(on a scale of 1: 5000) of core zone and buffer zone, from start of project until end shall be prepared once in 3 years and report should be submitted to MoEFCC and its concerned Regional authority.	Complied.
xvi)	A final Mine Closure plan along with details of Corpus Fund should be submitted to the Ministry of Environment & Forests 5 Years in advance of final mine closure for approval.	Not applicable at present. The final mine closure plan will be submitted to MOEF , five years in advance of actual closure.
xvii)	The project proponent shall undertake socio-economic survey for identifying and taking up need based activities required in the area.	Being done.

B. GENERAL CONDITIONS

i	No change in mining technology & scope of working should be made without prior approval of the Ministry of Environment & Forest.	Complied.
ii	No change in calendar plan including excavation quantum of minerals coal & waste should be made.	Complied.
iii	Four ambient air quality monitoring stations should be established in the core zone as well as in the buffer zone of SPM,RPM,SO2and NOx monitoring. Location of the stations should be decided based on the meteorological data, topographical features and environmentally and ecologically sensitive targets in consultation with the state pollution Control Board.	Four ambient air quality monitoring stations are - (i)Manager Office – Ballarpur UG (ii)Premises of SAM office (iii)Substation – Ballarpur OC (iv) Filter Plant/ Colony And it is in consultation with MPCB, Chandrapur. It is being monitored by CMPDIL regularly. Monitoring reports for the period 01.10.2022 to 31.03.2023 enclosed as ANNEXURE – B.

iv	<p>Data on ambient air quality (SPM, RSPM, SO₂ and NO_x) should be regularly submitted to the Ministry including its Regional office at Bhopal and to the State Pollution Control Board.</p> <p>Fugitive dust emissions from all the sources should be controlled regularly monitored and data recorded properly. Water spraying arrangement on haul roads, wagon loading, dump trucks (loading and unloading) points should be provided and properly maintained.</p>	<p>Being submitted to MOEF, Nagpur & MPCB office.</p> <p>Monitoring reports for the period 01.10.2022 to 31.03.2023 enclosed as ANNEXURE – B.</p> <p>Water is being sprinkled at coal transportation road to suppress dust and water jets and sprinklers are used at CHP and coal transfer points.</p>
v	<p>Adequate measures should be taken for control of noise levels below 85 dBA in the work environment. Workers engaged in blasting and drilling operations, operation of HEMM, etc should be provided with earplugs/muffs.</p>	<p>Adequate measures are taken for control of Noise pollution. Workers engaged in blasting and drilling operations, operation of HEMM, etc are provided with ear plugs/muffs</p>
vi	<p>Industrial wastewater (workshop and wastewater from the mine) should be properly collected, treated so as to conform to the standard prescribed under GSR 422 (E) dated 19 the May 1993 and 31 December or as amended from time to time before discharge .Oil and grease trap should be installed before discharge of workshop effluents.</p>	<p>Used oil collected is being re-used for lubricating tub wheels.</p>
vii	<p>Vehicular emissions should be kept under control and regularly monitored. Vehicles used for transporting the mineral and stowing sand should be covered with tarpaulins and optionally loaded.</p>	<p>Coal transportation vehicles are covered with tarpaulins and are optimally loaded. Vehicular emissions are kept under control PUC certificate for all light & passenger vehicles are taken.</p>
viii	<p>Appropriate measures shall be taken to avoid hazards of fire and explosions due to methane gas.</p>	<p>Complied.</p>
ix	<p>Environmental laboratory should be established with adequate number and type of pollution monitoring and analysis equipment in consultation with the State Pollution Control Board.</p>	<p>Monitoring of environmental quality parameters is done by CMPDIL, Nagpur. There is a full-fledged NABL accredited Env. Laboratory of CMPDIL. The Monitoring is done through this laboratory at fortnightly interval. Mine has procured a portable testing kit for field monitoring of pH , TDS etc.</p>
x	<p>Personal 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.</p>	<p>Protective respiratory devices are provided to workmen exposed to dust area. Workers are also regularly given training on safety and health aspects at VTC (this is the statutory requirement under mines safety</p>

	Occupational health surveillance programmed of the workers should be undertaken periodically to observe any contractions due to exposure to dust & to take corrective measures if needed.	act). Periodical medical examination of every worker is being done every five years in our area hospital to detect any disease so that the appropriate action can be taken up at project level.
xi	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 company.	At HQ, WCL- The cell is headed by GM (Env) reporting to Director (Technical). The team comprises of multi-disciplinary trained executive. At Area level – Area General Manager heads the Environment Department assisted by GM (oprn), ANO(Envt) & 1 nos. Assistant Managers of Environment discipline. At Unit Level- Environment Management Cell is headed by Sub-Area Manager and assisted by Mine Manager, Project Nodal Officer (Env) at unit level.
xii	The funds earmarked for environmental protection measures should kept in separate account and should not be diverted for other purpose. Year wise expenditure should be reported to this Ministry and its regional Office at Bhopal.	The funds earmarked for environment protection measures are kept in separate account and it is not used for any other purpose. Expenditure statement is shown in every six monthly compliance report sent to MoEF&CC.
xiii	The Regional Office of this Ministry located at Bhopal shall monitor compliance of the stipulated conditions. the project authorities should extend full co-operation to the officer(s) of the Regional Office by furnishing the requisite data/ information/ monitoring reports.	Agreed.
xiv	A copy of the environment clearance letter shall be marked to concerned panchayat / local NGO, if any from whom any suggestion /representation has been received while processing the proposal.	Copy of clearance letter sent to Panchayat& Chief Officer, Nagar parisad. Enclosed as ANNEXURE – C
xv	State Pollution Control Board. Should display a copy of the clearance letter at the Regional Office, District Industry Center and collector's Office / Tahsildar's Office for 30 days.	Noted.

xvi	<p>.The project authorities Should advertise at least in two local newspapers widely circulated around the project ,one of which shall be in the vernacular language of the locality concerned within seven days of 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 may also be seen at the website of the ministry of Environment & Forests at http://envfor.nic.in</p> <p>The ministry or any other competent authority may stipulate any further condition for environmental protection</p>	Complied. Attached as ANNEXURE D.
4	Failure to comply with any of the conditions above may result in withdrawal of this clearance and attract the provisions of the Environment (protection ACT1986)..	Agreed
5	The above condition will be enforced inter-alia 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.	Agreed


 SAM, Ballarpur Sub Area