

Six Monthly Compliance Report of Environmental Clearance

MAHADEOPURI UNDERGROUND MINE

[0.25 MTPA in Area of 172.87 HA]

EC No.: J-11015/434/2006-IA.II(M), Date-17.04.2007



Western Coalfields Limited
Pench Area
Po: Parasia, Chhindwara (MP)- 480441

PERIOD: 01.10.2022 to 31.03.2023

EC Compliance Report
EC Letter No.- J-11015/434/2006-IA.II(M) Date.17.05.2007

S.N.	CONDITIONS	COMPLIANCES
1.	Regular monitoring of subsidence movement on the surface over and around the working area and impact on natural drainage pattern, water bodies, vegetation structures, 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.	Coal seam at this mine is presently under development. There is no subsidence movement on surface over and around the working areas during development stage. Subsidence movement occurs on surface only after the depillaring operations are started. Hence, regular monitoring of subsidence on surface will be done during depillaring operations and corrective measures will also be taken for plugging the cracks.
2.	Garland drain (size, gradient & length around the safety areas such as mineshaft and low-lying areas and sump capacity should be designed keeping 50% safety margin discharge in the area adjoining the mine site. Sump capacity should also provide adequate retention period to allow proper setting of silt material.	This is an underground mine. All precautions under coal mines regulations 1957 have been taken to protect mine entries from danger of inundations. Garland drain around the mine at the surface has been constructed in order to prevent entry of water into the mine. There is sufficient capacity of sump underground to allow adequate settling time for silt.
3.	Water sprinkling systems should be provided to check fugitive emissions from loading operations, conveyor system, haulage roads, and transfer points etc.	Presently water spraying is done by mobile water sprayers in coal stock and on transport road..
4.	Drills should be wet operated only.	Drilling operations in underground mining are carried out under wet conditions as per Coal Mines Regulations. Drilling operation in underground mine are at very small scale as compared with opencast mines.
5.	Blasting should be practiced with use of delay detonators.	Blasting operations are carried out at small scale and as per permission of D.G.M.S. Delay detonators are used during blasting as per statutory permission.
6.	A progressive afforestation plan shall be prepared and implemented for the undisturbed area and shall include 3 ha brought under green belt development, areas along roads, along ML boundary, township outside the lease area etc. by planting native plant species in consultation with the local DFO/ Agriculture department. The density of the trees should be around 2500 plants per ha.	10000 plantations have been be carried out by state owned Madhya Pradesh Rajya Van Viskas Nigam with their expertise. There is no room available with mine for further plantatation.
7.	Regular monitoring of ground water level and quality should be carried out by establishing a network of existing wells and constructing new peizometers. The	Monitoring of ground water level through the network of existing wells has already been commenced and will continue during the mining operations at the intervals specified. The records

	monitoring for water levels should be done at least 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 MOEF & CGWB Regional Office quarterly within one month of monitoring.	are being maintained through CMPDIL-RIV, Nagpur.
8.	The Company shall put artificial groundwater recharge measures for augmentation of groundwater resource. The project authorities should meet water requirement of nearby village (S) in case the village wells go dry due to dewatering of the mine.	Sand bags dams have been provided at the natural nalla to recharge artificially the ground water level. Roof top water harvesting have been constructed at three places in the area as such there is no marked lowering of water level of nearby village wells. However, if well goes dry because of mining then water requirement of nearby village will be met.
9.	Besides carrying out periodic health check up of their workers, 10 % of the workers identified from the work force engaged in active mining operations shall be subjected to health check up for occupational diseases and hearing impairment, if any, through as agency such as NIOH, Ahmadabad with in a period and the results reported to this Ministry and to DGMS.	Noted. Periodic health check up for all workman in carried out once in every 5 years and for workers above 50 years of age, the same is carried out once in 2 ½ years. WCL has full fledged occupational health surveillance system in operation. The programmed is carried out as per statute, As such separate monitoring through NIOH is not required.
10.	For monitoring land use pattern and for post mining land use, a time series of land use maps. Based on satellite imagery (a scale of 1:5000) of the 4 core zone and buffer zone, from the start of the projects until end of the life shall be prepared once in 3 years (for any particular season which is consistent in the time series) and the report submitted to MOEF and its Regional office at Bhopal.	This is an underground mine of small production. Mining operation is carried out underground. Only infrastructure such as office, coal stockyard, dispatch arrangement is over ground. These will not alter land use, as these are permanent structure. However, work order for satellite imagery has been given to CMPDIL (HQ.) report will be submitted on receipt of the same.
11.	A final mine closure plan along with details of Corpus Fund should be submitted to Environment & Forests 5 years in advance of final mine closure for approval.	Noted. However, no closure is envisaged at present
12.	Consent to operate shall be obtained before starting mining operations after fulfillment of the conditions imposed in NOC.	Mine is already running one and consented by S.P.C.B up to 30.04.2022.

B. GENERAL CONDITIONS:-

S.N.	CONDITIONS	COMPLIANCE
1..	No change in mining technology and scope of working should be made without prior approval of the Ministry of Environment &	No changes in mining technology and scope of working have been made nor it is proposed in future.

	Forests.	
2.	No change in the calendar plan including excavation quantum of mine out coal and waste should be made.	No change in the calendar plan including excavation, quantum of mineral coal and waste has been made nor is it proposed.
3.	Four ambient air quality monitoring stations should be established in the core zone as well as in the buffer zone for RPM, SPM, SO ₂ , NOX & CO monitoring location of the stations should be decided based on the meteorological data, topographical features and environmentally and ecologically sensitive targets in consultations with the state Pollution Control Board.	Ambient air quality monitoring stations have been established to monitor RPM, SP, SO ₂ , NOX & CO monitoring is being done as per environment protection (Amendment) Rules 2000. All parameters have been found to be well within the permissible limits.
4.	Data on ambient air quality (RPM, SPM, SO ₂ , NOX & CO) should be regularly submitted to the Ministry including its regional office at Bhopal and the state pollution Control Board/ Central Pollution Control Board once in six months.	This is being done quarterly reports are being sent regularly to MPPCB.
5	Fugitive dust emissions from all the sources should be controlled regularly monitored and data recorded properly. Water spraying arrangements on haul roads, wagon loading dump truck, (loading & unloading) should be provided and properly maintained.	This is an underground mine and there is a little chance of fugitive dust emission since no haul road, OB dumping and wagon loading is involved. However water spraying is carried out on roads by mobile water tankers and some fixed water sprinklers are installed in the coal stock.
6	Adequate measures should be taken for control of noise levels below 85 dB (A) in the work environment. Workers engaged in blasting and drilling operations, operations of HEMM, etc should be provided with ear plugs/muffs.	Adequate measures like development of green belts are being taken up to control the noise level below the permissible limit in the work environment. This is an underground mine; hence operation of HEMM is not involved.
7	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 31 st December, 1993 or as amended from time to time, oil & grease trap should be installed before discharge of workshop effluents.	There is no HEMM workshop where oil and grease is generated. There is no workshop as such in the mine; water from the mine is collected and sedimented for sufficient time in the mine sump. This is followed by secondary sedimentation at the surface tank before it is used for internal use of the mine. The water discharged from the mine confirms to TLV of Environment Protection Rules 2000.
8	Vehicular emissions should be kept under control and regularly monitored. Vehicles	Vehicular emission is kept under control by proper maintenance of vehicles. Since this is as

	used for transporting and mineral should be covered with tarpaulin and optimally loaded.	underground mine, do not involve heavy vehicles. Vehicles being used for transporting minerals are covered with tarpaulin and optimally loaded.
9	Environmental laboratory should be established with adequate number and type of pollution monitoring and analysis equipment in consultation with the state pollution control Board.	Well equipped and recognized Environmental laboratory of CMPDIL exists at Nagpur, which carries monitoring of air water noise levels.
10.	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. Occupational health surveillances program of the workers should be undertaken periodically to observe any contradictions due to exposure to coal dust and take corrective measures, if needed	Personnel working in dusty areas are being provided with Protective devices and persons using them are adequately trained and informed on safety and health aspects from time to time. Periodic health check up for all workman is carried out once in every 5 years and for workers above 50 years of age, the same is carried out once in 2 ½ years.
11	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.	Environment Management Cell exists Cell exists at project level having Nodal officer of Environment , headed by sub area Manager at area level- Area Nodal officer of Environment , headed by Chief General Manager, at Company Headquarters- General Manager (Environment) with a team of the Engineers of multidisciplinary subjects and General Manager (Environment) reports directly to the Head of the Company.
12	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 located at Bhopal.	Noted and agreed for compliance. No fund is being diverted for other purpose.
13	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.	Full cooperation is extended to the officers of MOEF Regional office, Bhopal and requisite information, data etc. is provided as and when required.

14	A copy of clearance letter will be marked to concerned panchayat/local NGO. If any from whom and suggestion/representation has been received while processing the proposal.	A copy of the clearance letter has been forwarded to the Khamra Village panchayat .
15	State pollution Control Board should display a copy of the clearance letter at the Regional office, District Industry Centre and Collector's office/ Tehsildar office for 30 days.	This is related to state Pollution control Board.
16	The Project Authorities should advertise at least in two local news papers widely circulated around the project, one of which shall be in the vernacular language of the locality concerned I within seven days of the clearance letter informing that the project has been accorded environmental clearance and a copy of the clearance letter also be seen at web site of the Ministry of Environment & Forests at http://.nic.in	Advertisement have been given in two local Newspapers namely as under (Copies enclosed) The Hitavada on Dated. 1.6.2006 Jabalpur Express on Dated. 1.6.2006
3.0	The Ministry or any other competent authority may alter/modify the above conditions or stipulate any further condition in the interest of environment protection.	Noted and agreed.
4.0	Failure to comply with any of the conditions mentioned above may result withdrawal of this clearance and attract action under the provisions of Environment (Protection) Act, 1986	Noted and agreed.
5.0	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.	Noted and agreed.