

SOP for allocation of Mines for Ash filling

As per MoEFFC notification on 3rd November 2009, "fly ash" means and includes all categories or groups of coal or lignite ash generated at the thermal power plant and collected by Electrostatic Precipitator (ESP) or bag filters or other similar suitable equipments; bottom ash is the ash collected separately at the bottom of the boiler; pond ash is the mixture of ESP Fly ash and bottom ash, but, for the purpose of this notification, the term "fly ash" means and includes all ash generated such as Electrostatic Precipitator (ESP) ash, dry fly ash, bottom ash, pond ash and mound ash as the objective is to utilise all the ashes.

- 1. As per the Central Level Working Group (CLWG) deliberations, the following mines shall be considered for allotment for the purpose of fly ash filling/stowing:
- i. Closed or abandoned open cast mines.
- ii. Closed or abandoned voids of the working open cast mines.
- iii. Closed underground mine or working underground mine where the proposed extraction of coal is by stowing method.
- 2. The coal companies shall identify the mines that are suitable/available for the disposal of fly ash and the mines that will be available in the next 03 years. The Coal companies (CIL/SCCL/NLC) shall compile the list of suitable/available/ to be available mines and share the list of the mines so identified, with the Ministry of Coal by 10th of every month. In case no mines are available to be offered, a NIL report shall be sent.
- 3. The TPPs shall identify the suitable mines and make their requests for the allocation of the respective mine for the purpose of fly ash filling to the Central Electricity Authority (CEA). The format for the application to CEA is attached as Annexure 1. The requests shall be sent to CEA by 10th of every month.
- 4. CEA shall examine, compile and forward the requests to the Ministry of Coal along with its comments on the same.
- 5. For the request made by the TPPs for the allocation of Captive/commercial coal blocks allotted by the Ministry of Coal, a copy of the request shall also be sent to the Ministry of Coal for examining the same with the concerned coal block owner.
- 6. A Central Level Working Group (CLWG) meeting shall be organized by the Ministry of Coal on or after 20th of every month for the purpose of allocation of the mines to TPPs to dispose the fly ash.
- 7. The thermal power plants that have been allotted mines for the disposal of fly ash shall have responsibilities, with respect to safety related to

environment, transport and other administrative-related matters as per **Annexure-2**.

- 8. The Coal Companies shall have the responsibilities as specified in the **Annexure-3** for the safe disposal of fly ash and other administrative-related matters.
- 9. In case where the mine and TPP belong to the same owner, there shall be no need for the allocation by CLWG.
- 10. MoU shall be concluded by the Coal company and the TP within 3 months of publication of the minutes having the allocation of the same, failing which, the same shall be deemed cancelled and will be considered for further allocation, unless the request for extension is agreed by the Chairman, CLWG.

Annexure1 Format of the request to CEA by TPPs for the allocation of the Mines

| | Name of the TPP | Name of the mines | Distance | Void | Void | Tentative | Proposed | |
|----|---|------------------------|----------|--------------------|-----------------------------------|------------------------------------|-------------------|----|
| 1 | | | (km) | space available | space required (L cum.) | time required for dumping | mode transport | of |
| | | | | | | damping | | |
| 2. | | | | | | | | |
| 3. | | | | | | | | |
| • | | | | | | | | |
| | | | | | | | | |
| | | | | | | | | |
| | | id space e/required | | | | | | |
| | Details of past allotments to the company | | | | | | | |
| | Name of the TPP | Name of the mines | | Date of allotment | Status of MoU and operation | | Remarks | |
| 1. | 111 | | | | operation | | | |
| 2. | | | | | | | | |
| 3. | | | | | | | | |
| | | | | | | | | |
| | | | | | | | | |
| D | Suggestions/grievances etc. | | | | | | | |
| | | | | | | | | |

Responsibilities of TPPs

- i.All the regulatory compliances, safety and environmental & operational issues associated with fly ash disposal into mine voids will rest with the TPPs.
- ii.TPPs should do scientific study as per OM dated 28.08.2019 issued by MoEF&CC and CPCB guidelines and amendment thereof. The TPPs should obtain NoC from concerned State Pollution Control Boards.
- iii. The TPPs shall be responsible for complying with the requirements of OM dated 28.08.2019 issued by MoEF&CC including. However, if need arises to obtain requisite permission from DGMS, the Coal Companies shall, on behalf of the TPPs apply for the same at DGMS but the follow up works shall be done by the TPPs. Transport, handling and disposal of ash to prevent surface and sub surface water pollution shall be the sole responsibility of TPPs.
- iv.Fly ash disposal & monitoring shall be as per OM dated 28.08.2019 issued by MoEF&CC by TTP on regular basis. In case of any adverse impact, the fly ash filling shall be stopped and appropriate remediation measures shall be taken.
- v. The closure of the mine void site after fly ash disposal up to permitted height should be associated with blanketing with top soil as per study but not less than minimum 30 cms thickness and ecological restoration of the site through suitable landscaping and plantation of native species.
- vi. Alternatively, installation of ground mounted solar or other repurposing activities may be explored.
- vii. During post-closure, garland drains should be provided around the site to ensure that there is no ingress of water into the disposal site.
- viii. In the case of UG mines submission of details for design, drawing location etc. of the Stowing plant will be assisted by the mine owner. The cost of supply, erection and commission of the Stowing plant, borehole as well as the cost of laying pipelines and other infrastructure

- for the fly ash filling purpose both above & below ground shall be borne by TPPs.
- ix. The reclamation of filled in mine site and post closure monitoring shall be done by TPPs accordance with the directive issued by MoEFCC vide O.M. dated 29/08/2019 before handing over the site to coal transportation.
- x. TPPs in consultation with the Coal Companies shall prepare a Hazard identification and Safety Management plan.
- xi. Scientific studies, if required, shall be done in consultation with the Coal Companies before commencement of fly ash filling and all the recommendation made in the scientific study shall be complied with. The monitoring shall be carried out for at least for two monsoon seasons after completion of fly ash filling in the OC voids.
- xii. Monitoring by TPPs or agencies for entire ash disposal operation, conducting different studies and maintaining all records as prescribed, are to be certified by concerned coal company as per OM of MoEFCC dated 28.8.2019. After closure of the site, it shall be ensured by TPPs that the disposal site has been suitably reclaimed through plantation of native tree species and other measures in accordance with the prescribed guidelines/statutes.
- xiii. In case of any adverse report/notice by the regulatory agency for the non-compliance/damage to environment, the mine owner shall have liberty to cancel the MoU and stop the fly ash operations. Fly ash filling will resume after mitigation measures are taken and clearance from the regulatory authority is obtained.
- xiv. Since the Coal Companies remain the custodians of the land as per CB Act, 1957, the liability in terms of legal, environmental and safety issues shall lie with the TPPs, in accordance with the mutually agreed MoU, starting from preparation of the site and fly ash disposal up to the time of closure of the site.
- xv. Lease rent which has been paid to the State Government by Coal Companies is to be recovered from TPPs. Further policy guidelines for the use of land acquired under the Coal Bearing Areas (A&D) Act, 1987, vide MoC OM no. 43022/1/2020-LAIR dt: 22-04-2022 may be followed.
- xvi. The guidelines issued by MOC regarding responsibility of mine owners and TPPs after the site is handed over to TPPs for fly ash disposal, shall apply.

Annexure 3

Responsibilities of the Coal Companies

- i. The Coal Companies shall examine all the clearances, studies and permissions obtained by the Thermal Power Plant vis-à-vis OM dated 28.8.2019 by MoEF&CC and various decisions taken in the Fly Ash Management and Utilisation Mission meeting organized from time to time by MoEF&CC. If found satisfactory, coal companies will communicate to the concerned TPP or agency to enter into a MoU and also related formalities for the disposal of fly ash.
- ii. In the case of working UG mine, the concerned subsidiary of Coal Company/ Coal company shall be associated with TPPs for all the works below the surface (laying of pipelines, barricading etc). For the closed/old underground workings, the coal company shall facilitate the TPPs for drilling of boreholes and laying of surface pipeline for filling of fly ash slurry.
- iii. The guidelines issued by MOC regarding responsibility of mine owners and TPPs after the site is handed over to TPPs for fly ash disposal, shall apply.