COAL COMBUSTION RESIDUALS
FUGITIVE DUST CONTROL ANNUAL REPORT
FOR THE REPORTING PERIOD DEC. 2020 – NOV. 2021

Prepared for:

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List of Acronyms & Abbreviations

Annual Report	Annual Fugitive Dust Control Report
CCR	Coal Combustion Residuals
mph	miles per hour
PADEP	Pennsylvania Department of Environmental Protection
Plan	Fugitive Dust Control Plan
Rule	Disposal of Coal Combustion Residuals (CCR) from Electric Utilities final rule

1.0 Introduction

On December 19, 2014, the administrator of the U.S. Environmental Protection Agency signed the Disposal of Coal Combustion Residuals (CCR) from Electric Utilities final rule (the Rule). The Rule was published in the Federal Register on April 17, 2015 and became effective on October 19, 2015. The Rule establishes a comprehensive set of requirements for the disposal of CCR in landfills and surface impoundments at coal-fired power plants under Subtitle D of the Resource Conservation and Recovery Act. These requirements include compliance with location restrictions, design criteria, operating criteria, groundwater monitoring and corrective action, and closure and post-closure care aspects. The operating criteria include air criteria specified in Title 40 of the Code of Federal Regulations, §257.80, to address the potential pollution caused by windblown dust from CCR units. According to the Rule, owners or operators of CCR units must adopt measures that will effectively minimize CCR from becoming airborne at the facility by developing and operating in accordance with a Fugitive Dust Control Plan (Plan) with adequate dust control measures.

The Conemaugh Generating Station is a coal-fired power plant located in New Florence, Pennsylvania. The Rule applies to this facility due to the management of CCR that is generated from the combustion of coal. CCR units associated with station operations include the Conemaugh Ash Disposal Site and four Ash Filter Ponds (Ponds "A," "B," "C," and "D") used for the management of bottom ash.

According to the Rule, owners or operators of CCR units must adopt measures that will effectively minimize CCR from becoming airborne at the facility by developing and operating in accordance with a Plan with adequate dust control measures. In this regard, a Plan was prepared to comply with the requirements as specified in §257.80(b)(1-7) of the Rule and placed in the Conemaugh facility's operating record on October 19, 2015 per §257.105(g)(1). As required, the Plan was also noticed to the State Director per §257.106(g)(1) and posted to the publicly accessible internet site per §257.107(g)(1). The Plan was most recently amended in November 2021 to incorporate minor technical corrections and administrative changes at the Station. The amended Plan was completed and posted to the facility's operating record in accordance with §257.80(b)(6).

In addition to the above and per §257.80(c), an Annual Fugitive Dust Control Report (Annual Report) must be completed that includes the following:

- Description of actions taken to control CCR fugitive dust
- Record of all citizen complaints
- Summary of any corrective actions taken

The initial Annual Report must be completed no later than 14 months after placing the Plan in the facility's operating record, and subsequent Annual Reports completed every 12 months thereafter. This document represents the sixth Annual Report for the Conemaugh Station and will also be appropriately placed in the facility's operating record per §257.105(g)(2), noticed to the State Director per §257.106(g)(2), and posted to the publicly accessible internet site per §257.107(g)(2).

2.0 Actions Taken to Control CCR Fugitive Dust

As detailed in the Plan and reiterated below, the station has established procedures and inspection requirements which are implemented to minimize/eliminate airborne emissions from potential fugitive dust sources. The results from inspections conducted and associated observations made during CCR handling activities are documented on logs maintained by the station's Environmental Specialist, including those logs specific to the one-year period (December 2020 to November 2021) relevant to this sixth Annual Report.

2.1 Fly Ash Handling

Fly ash is recovered from the hoppers at the base of the electrostatic precipitators and is pneumatically conveyed to silos controlled with a bin vent filter for storage. In the silos, the fly ash is conditioned with water (wetted to approximately 8 to 9 percent moisture) and mixed, and then the wet fly ash is gravity loaded into a truck. After loading is complete, the trucks travel to the Conemaugh Ash Disposal Site via internal roadways that are subject to watering for fugitive dust control. Tarped trucks transporting fly ash offsite for beneficial use applications (i.e., concrete production) are loaded directly via a retractable-chute mechanism, and then can pass through a truck tire wash station if needed prior to exiting the Station. Fly ash transported offsite may or may not be conditioned with water; however, the method of direct and enclosed transfer to the trucks greatly minimizes the potential generation of fugitive dust during loading operations.

2.1.1 Monitoring/Recordkeeping

Observations of visible emissions from the fly ash handling activities are performed daily during normal daylight operations. A trained employee records whether any emissions are observed and whether these emissions extend beyond the facility property line. Records of daily facility inspections are maintained and include the name of the person conducting the inspection, the date and time of the inspection, and the results of each inspection. If instances of unpermitted visible fugitive emissions are observed, records are kept of the corrective actions taken. The completed logs are forwarded to the station's Environmental Specialist and retained for at least five years.

2.2 Ash Filter Ponds Cleaning

As necessary, the Ash Filter Ponds are periodically cleaned out to remove accumulated bottom ash materials and to restore capacity for settling solids. To support the cleaning, operations are first transferred to an idle pond (by re-routing the hydrobin discharge via the valved control system) and then the affected pond is taken out of service. The pond to be cleaned is drained to expose the underlying ash materials, which are then scraped from the bottom and placed along the pond side slopes to promote further dewatering. Once the bottom ash materials have been sufficiently dewatered (but not to the point of becoming dry), they are removed from the pond and loaded into

trucks, which then travel to the Conemaugh Ash Disposal Site. After the cleaning is completed, this pond can be returned to normal operation to facilitate cleaning of another pond as conditions dictate.

Although the ponds are considered CCR units, they are not represented as viable contributing sources of CCR fugitive dust emissions since entering streams (from the hydrobins) are managed in an enclosed conveyance system. Once in the ponds, the materials are maintained in a submerged condition.

2.3 Gypsum Handling

Fugitive dust from the handling and transport of gypsum is controlled using enclosed conveyors and transfer points. Damp gypsum materials awaiting transport are temporarily stored in an enclosed dome, loaded into trucks using a front-end loader inside the dome, and then transported to the Conemaugh Ash Disposal Site. Trucks carrying gypsum off site to commercial markets are tarped and pass through a tire wash prior to leaving the dome area. The roads and area surrounding the gypsum dome are watered on a limited basis. In addition, the paved area immediately surrounding the dome is swept as needed. When gypsum is loaded onto train cars for off-site shipment, the localized areas around the rail lines are also subjected to sweeping.

2.3.1 Monitoring/Recordkeeping

Observations of visible emissions from the gypsum handling activities are performed daily during normal daylight operations. If instances of excessive visible fugitive emissions are observed, they are reported to the station's Environmental Specialist and appropriate corrective actions taken. These observations and record retention activities are completed to address requirements included in the Station's Title V (air) operating permit concerning the need to minimize and, as necessary, enact additional control measures of fugitive dust emissions from the facility.

2.4 Transport Roadways

Paved and unpaved road surfaces to the Conemaugh Ash Disposal Site are watered to reduce fugitive dust emissions. If it is not raining, paved roadways and parking areas are watered at least once daily, and unpaved roadways are watered at least twice daily. Roads and parking lots are also periodically swept to reduce potential entrainment of dust. Fugitive dust emissions are further controlled by posting and maintaining a maximum vehicle speed limit of 10 miles per hour (mph) on unpaved roadways and 15 mph on paved roadways within the boundaries of the station property.

2.4.1 Monitoring/Recordkeeping

Monitoring of fugitive dust from roadways is accomplished by maintaining a log of the time, location, type, and amount of roadway surface treatment. Roadway maintenance records regarding watering/dust control are documented in daily logs completed by station personnel or contractors.

The completed logs are forwarded to the station's Environmental Specialist and retained for at least five years.

2.5 Conemaugh Ash Disposal Site

Fly ash, bottom ash, and gypsum are disposed at the Conemaugh Ash Disposal Site. Fugitive dust is minimized at the Ash Disposal Site by spreading and compacting the materials with a bulldozer as soon as practical after being delivered (i.e., the freshly dumped materials are not left on the landfill surface for extended periods of time). Additionally, a water truck regularly circulates to spread water on the internal roadways and the open operating areas of the disposal site. Vehicle traffic operating within the disposal site is restricted to a 10 mph speed limit on unpaved roads and a 15 mph speed limit on paved roads.

2.5.1 Monitoring/Recordkeeping

Observations of visible emissions from disposal site activities are performed daily during normal daylight operations. A trained employee records whether any emissions are observed and whether these emissions extend beyond the facility property line. Records of daily facility inspections are maintained and include the name of the person conducting the inspection, the date and time of the inspection, and the results of each inspection. If instances of unpermitted visible fugitive emissions are observed, records are kept of the corrective actions taken. The records are forwarded to the station's Environmental Specialist and retained for at least five years.

In addition, four dust fall monitors are installed at the Ash Disposal Site in locations approved by the Pennsylvania Department of Environmental Protection (PADEP). Dust Fall Reports are submitted to PADEP quarterly as a condition of the station's Solid Waste Permit.

3.0 Record of Citizen Complaints

Per the Rule, the Annual Report must include a record of all citizen complaints that were received by the Conemaugh station with regard to fugitive dust emission incidents. In line with established protocols, the station's Environmental Specialist immediately forwards the citizen complaint to the Station General Manager and other Station Management personnel. Following initial evaluation of the complaint, Conemaugh station then conducts a thorough investigation to confirm the reported incident/conditions and implement corrective actions as may be warranted.

No complaints were registered during this Annual Report's period of record covering December 2020 through November 2021.

4.0 Summary of Corrective Actions Taken

For the December 2020 to November 2021 period of record, and based on continued monitoring and inspections as outlined in Section 2.0, the currently established control measures remain effective in minimizing potential fugitive dust emissions. Moreover, this assertion is further validated by the lack of citizen complaints logged over this same period. Accordingly, no corrective actions were undertaken during the past year, either as a result of internally identified deficiencies or from resolution of citizen complaints.