



**INITIAL STRUCTURAL STABILITY ASSESSMENT
40 C.F.R. 257.7100(e)(3)(v)
PLANT HAMMOND ASH POND 3 (AP-3)
GEORGIA POWER COMPANY**

The Environmental Protection Agency's "Disposal of Coal Combustion Residuals from Electric Utilities" Final Rule (40 C.F.R. Part 257 & Part 261) was published in the Federal Register on April 17, 2015. A direct final rule revision in response to a partial vacatur of the Final Rule became effective on October 4, 2016. This revision eliminated the exemption for inactive coal combustion residual (CCR) surface impoundments and required such units to meet the same requirements as existing CCR surface impoundments. An extended timeline was given to inactive CCR surface impoundments that had prepared Notification of Intent to Initiate Closure compliant with 40 C.F.R. §257.105(i)(1), 40 C.F.R. §257.106(i)(1) and 40 C.F.R. §257.107(i)(1). 40 C.F.R. §257.100(e)(3)(v) for inactive CCR surface impoundments requires an initial structural stability assessment to be completed as set forth by 40 C.F.R. §257.73(d).

40 C.F.R. §257.73(d) requires the owner or operator of an existing coal combustion residual (CCR) surface impoundment to conduct initial and periodic structural stability assessments. The owner or operator must conduct an assessment of the CCR unit and document whether the design, construction, operation and maintenance of the CCR unit is consistent with recognized and generally accepted good engineering practices for the maximum volume of CCR and CCR wastewater which can be impounded therein.

Plant Hammond AP-3 is located in Floyd County, Georgia, approximately one mile west of the Rome, Georgia city limits in Floyd County on Plant Hammond property. AP-3 is formed by an engineered perimeter earth embankment. The embankment foundation generally consists of stiff to very stiff low plasticity clayey silts, sandy clays, and clayey sands of varying thickness. Underlying the foundation soils is a stratum of weathered argillaceous limestone bedrock that overlies unweathered argillaceous limestone bedrock.

Capping of Hammond AP-3 has been completed, and AP-3 no longer impounds water and no longer receives waste. Cap construction activities completed on AP-3 have rendered the former surface impoundment incapable of receiving, discharging or impounding water; thus, AP-3 no longer functions as a surface impoundment thereby rendering the applicability of Rule 40 C.F.R. §257.73(d) inconsistent with the CCR unit's current condition. Further, Georgia Power Company is in the process of obtaining a solid waste permit for AP-3 under the Georgia Rules for Solid Waste Management, 391-3-4-.10. The closure method has eliminated the future impoundment of water, sediment, or slurry. Therefore, the interior dike slope is not subjected to rapid drawdown conditions.

Available construction documentation includes reports of field density testing performed on the AP-3 dikes. The dike materials were compacted to 100% of the standard proctor density.



Additionally, Standard Penetration Test results from historical borings advanced in the perimeter dike indicate a general strength consistency of stiff to very stiff strength. This strength consistency indicates the dikes were constructed using mechanical compaction methods.

Vegetated slopes of the embankment have been properly maintained to a manageable height that allows for routine visual inspections.

The spillway pipes were removed as part of closure construction. Stormwater drainage is now conveyed through a series of riprap covered ditches around the unit and discharged at three locations from the perimeter of the unit. The stormwater drainage system was designed to manage the flow from a 25-year, 24-hour storm event.

A portion of the downstream slope in the north corner of the AP-3 embankment is subject to inundation from the 100-year flood of the Coosa River. The downstream slopes are well vegetated and have not been impacted from past floods. The FEMA base flood elevation is Elevation 586 feet and the top of the dike was constructed to approximate Elevation 608 feet. Approximately 5 feet of the exterior slope is inundated by the 100-year flood event. The north corner of AP-3 is approximately 3,000 feet from the floodway of the Coosa River. As such, AP-3 is not subject to significant erosion velocities from the floodway of the Coosa River.

The downstream slopes are well vegetated and reportedly have not been impacted from past floods. The AP-3 closure configuration top of dike ranges from Elevation 600 feet to Elevation 608 feet.

I hereby certify that the structural stability assessment was conducted in accordance with 40 C.F.R. §257.73(d).



Jonathan D. Keeling, PE
Licensed, State of GA, PE No. 038169