

MEMORANDUM – Operating Record (40 CFR 257.105(h)(12))

March 13, 2020
File No. 129342

TO: Indianapolis Power & Light Company

FROM: Haley & Aldrich, Inc.

SUBJECT: Semi-Annual Remedy Selection Progress Report Pursuant to 40 CFR §257.97(a)
Petersburg Generating Station - Ash Pond System and Type I Restricted Waste Landfill

The Indianapolis Power & Light Company (IPL) initiated corrective measures for the Ash Pond System and Type I Restricted Waste Landfill at the Petersburg Generating Station (PGS) on April 15, 2019 in response to a statistically significant level (SSL) of an Appendix IV constituent exceeding Groundwater Protection Standards (GWPS). Pursuant to 40 CFR §257.96(a), a demonstration of need for a 60-day extension for the assessment of corrective measures was completed on July 12, 2019. The Corrective Measures Assessment (CMA) Report was completed and placed in the facility operating record on September 13, 2019 and subsequently amended on October 11, 2019.

Following completion of the CMA, IPL must, as soon as feasible, select a remedy that meets the standards listed in 40 CFR §257.97(b). Pursuant to §257.97(a), the owner or operator of a Coal Combustion Residual (CCR) management unit that has completed a CMA for groundwater to prepare a semi-annual report describing the progress in selecting and designing the remedy. This report constitutes the first semi-annual remedy selection progress report and is comprised of activities during the period of September 13, 2019 through March 13, 2020. A summary of the progress in selecting a remedy is provided below.

SUMMARY OF ACTIONS COMPLETED

The following actions have been completed during this reporting period:

- Efforts to determine the nature and extent (N&E) of the Appendix IV SSLs continued pursuant to § 257.95(g). Groundwater samples were collected from the N&E monitoring wells in November 2019. The analytical results will be used to supplement and enhance the evaluation of the extent of groundwater impacts and assessment of corrective measures. Groundwater characterization of the N&E monitoring wells is ongoing;
- Pressure transducers continued to be used/monitored for collection of groundwater elevations from select monitoring wells located around Pond A to provide additional data to support the groundwater conceptual site model (CSM);
- Four (4) nested piezometers were installed within the limits of Ash Pond A to provide data to refine the understanding of the vertical groundwater flow characteristics and solute transport; and

- Five (5) exploratory borings were completed within the landfill to obtain representative samples to characterize the material to aid in the remedy design process.

PLANNED ACTIVITIES

Anticipated activities for the upcoming six months include the following:

- Continue efforts to establish N&E
 - Install an additional N&E nested monitoring wells along the White River to better define the lateral extent Appendix IV constituents;
 - Assess boring data from the ongoing landfill characterization efforts and install as required supplemental piezometers/wells and additional borings to better define the subsurface conditions immediately surrounding the landfill;
 - Install staff gauges and nested piezometers adjacent to the discharge canal, downgradient of the Ash Pond System to evaluate the affect the discharge canal has on groundwater flow;
 - Evaluate the groundwater analytical data collected during the May 2020 semi-annual sampling event that will include any new N&E monitoring wells;
- Continue the use of pressure transducers for collection of groundwater elevations from select monitoring wells located around Pond A to provide additional data to support the CSM;
- As appropriate, refine CSM and associated groundwater modeling;
- Continue to perform an engineering review of the five (5) potential CMA alternatives. For these reviews, emphases will be placed on understanding and reacting to impacts of newly gathered analytical results, identifying and researching applicability of emerging technologies and their impacts on the selection of remedy process; and
- Provide a semi-annual progress report that summarizes IPL's progress and status regarding a selection of remedy.