US ERA ARCHIVE DOCUMENT



#### UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

WASHINGTON, D.C. 20460

March 13, 2013

OFFICE OF SOLID WASTE AND EMERGENCY RESPONSE

### VIA E-MAIL

Mr. Alan Wood American Electric Power 1 Riverside Plaza Columbus, Ohio 43215-2373

Re: Request for Action Plan regarding American Electric Power's—Columbus Southern Power Co - Picway Power Station

Dear Mr. Wood,

On June 9, 2011 the United States Environmental Protection Agency ("EPA") and its engineering contractors conducted a coal combustion residual (CCR) site assessment at the American Electric Power's—Columbus Southern Power Co - Picway Power Station facility. The purpose of this visit was to assess the structural stability of the impoundment or other similar management units that contain "wet" handled CCRs. We thank you and your staff for your cooperation during the site visit. Subsequent to the site visit, EPA sent you a copy of the draft report evaluating the structural stability of the units at the American Electric Power's—Columbus Southern Power Co - Picway Power Station facility and requested that you submit comments on the factual accuracy of the draft report to EPA. Your comments were considered in the preparation of the final report.

The final report for the American Electric Power's—Columbus Southern Power Co-Picway Power Station facility can be accessed at the secured link below. The secured link will expire in 60 days.

Here is the link: http://www.yousendit.com/download/UVJqV28rd0FPSHkwYjhUQw

This report includes a specific condition rating for each CCR management unit and recommendations and actions that our engineering contractors believe should be undertaken to ensure the stability of the CCR impoundment(s) located at the American Electric Power's—Columbus Southern Power Co - Picway Power Station facility. These recommendations are listed in Enclosure 1.

Since these recommendations relate to actions which could affect the structural stability of the CCR management unit(s) and, therefore, protection of human health and the environment, EPA believes their implementation should receive the highest priority. Therefore, we request that you inform us on how you intend to address each of the recommendations found in the final report. Your response should include specific plans and schedules for implementing each of the

recommendations. If you will not implement a recommendation, please provide a rationale. Please provide a response to this request by **April 15, 2013**. Please send your response to:

Mr. Stephen Hoffman U.S. Environmental Protection Agency (5304P) 1200 Pennsylvania Avenue, NW Washington, DC 20460

If you are using overnight or hand delivery mail, please use the following address:

Mr. Stephen Hoffman U.S. Environmental Protection Agency Two Potomac Yard 2733 S. Crystal Drive 5<sup>th</sup> Floor, N-5838 Arlington, VA 22202-2733

You may also provide a response by e-mail to <a href="https://hoffman.stephen@epa.gov">hoffman.stephen@epa.gov</a>, dufficy.craig@epa.gov, <a href="https://kelly.patrickm@epa.gov">kelly.patrickm@epa.gov</a> and englander.jana@epa.gov.

You may assert a business confidentiality claim covering all or part of the information requested, in the manner described by 40 C. F. R. Part 2, Subpart B. Information covered by such a claim will be disclosed by EPA only to the extent and only by means of the procedures set forth in 40 C.F.R. Part 2, Subpart B. If no such claim accompanies the information when EPA receives it, the information may be made available to the public by EPA without further notice to you. If you wish EPA to treat any of your response as "confidential" you must so advise EPA when you submit your response.

EPA will be closely monitoring your progress in implementing the recommendations from these reports and could decide to take additional action if the circumstances warrant.

You should be aware that EPA will be posting the report for this facility on the Agency website shortly.

Given that the site visit related solely to structural stability of the management units, this report and its conclusions in no way relate to compliance with RCRA, CWA, or any other environmental law and are not intended to convey any position related to statutory or regulatory compliance.

Please be advised that providing false, fictitious, or fraudulent statements of representation may subject you to criminal penalties under 18 U.S.C. § 1001.

If you have any questions concerning this matter, please contact Mr. Hoffman in the Office of Resource Conservation and Recovery at (703) 308-8413. Thank you for your continued efforts to ensure protection of human health and the environment.

Sincerely, /Suzanne Rudzinski/, Director Office of Resource Conservation and Recovery

# American Electric Power's—Columbus Southern Power Co - Picway Power Station Recommendations (from the final assessment report)

#### **CONCLUSIONS**

Based on the results of the visual inspection, discussions with AEP personnel, and a review of available design documentation, the Ash Pond was found to have the following deficiencies:

- 1. Portions of the outer embankment slopes had not been mowed recently;
- 2. Presence of minor rodent burrows in the exterior slopes of the embankments;
- 3. Presence of a bare area on the western exterior embankment of the south pond;
- 4. No instrumentation (i.e., staff gauge) to observe the elevation of the water within the pond/impoundment;
- 5. No instrumentation (i.e., survey/settlement monuments) to monitor crest elevations and/or embankment movement;
- 6. Bare areas, areas of limited vegetative growth or areas of gravel cover present on crest;
- 7. Presence of vegetation on the interior slopes of the embankment;
- 8. AEP personnel were unsure if the discharge pipe from the concrete discharge structure has been inspected internally since it was installed;
- 9. Visible variations in crest elevations, particularly along the west embankment of the south pond;
- 10. Minor ruts on crest from vehicle traffic;
- 11. Minor surficial pitting or flaking/cracking on the concrete discharge structure;
- 12. Reported crest and maximum pool elevations indicate potential for non-compliance with state freeboard requirement of five feet for Class II dams per OAC Rule 1501:21-13-07; and,
- 13. Presence of standing water at or near the toe of the exterior embankment slopes of the south pond, particularly near the southwest corner.

#### RECOMMENDATIONS

#### **GZA** recommends that the Owner arrange for the following to be performed:

## **Studies and Analyses:**

- 1. Survey of the crest of both ponds by a licensed Professional Surveyor to evaluate the current elevation profile of the crest and confirm that survey monuments are not moving horizontally;
- 2. Evaluate freeboard conditions based on maximum pool elevation and more recent topographical data; and,
- 3. Camera survey of the CMP outfall should be performed.

#### **Operation & Maintenance Activities:**

- 1. Frequent monitoring of steep slopes for evidence of sloughing or erosion that could lead to instability, movement or failure of the embankments;
- 2. Review emergency action plan annually per OAC Rule 1501:21-21-04 and update as applicable;
- 3. Clear vegetation from the interior embankment slopes;
- 4. Remove trees and resulting stumps on or near the exterior slopes of the embankment, particularly near the west embankment of the south pond, Outfall 601 and the northern end of the clearwater pond;
- 5. Continue to monitor and control rodent activities and repair burrows as they are discovered. Keeping the embankments mowed can help to reduce populations of certain species;
- 6. Maintain interior slopes of at least 2H:1V during ash excavation as recommended by BBC&M;
- 7. Install a staff gauge on or near the outlet structure in Cell S3 and on or near the concrete discharge structure in the clearwater pond in order to take periodic measurements of the Ash Pond water surface elevation;
- 8. Inspect each of the monitoring wells installed in 2009 and ensure each well has a cap, lockable protective cover/casing and is visible during mowing operations;
- 9. Perform periodic water level measurements in the monitoring wells to evaluate water levels below the crest and at the toe of the embankments; and,

10. If AEP has the opportunity to stop discharging from the clearwater pond for a limited time period, inspect the discharge pipe from the concrete discharge structure to the duck-bill flap gate to verify that the pipe is operating correctly and is in good condition. This may be performed by video photography.

## **Repair Recommendations:**

- 1. Minor concrete repair work on the concrete discharge structure in the clearwater pond;
- 2. Re-seed and/or over seed bare areas of the embankments and crest to establish healthy grass cover;
- 3. Clear the area of established vegetation near the lower portion and toe of the outer embankment slopes near the outfall structure; and,
- 4. Regrade areas near the toe of exterior slopes to facilitate proper drainage away from the embankments.