

US EPA ARCHIVE DOCUMENT



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
WASHINGTON, D.C. 20460

SEP 14 2009

OFFICE OF  
SOLID WASTE AND  
EMERGENCY RESPONSE

VIA E-MAIL AND FEDERAL EXPRESS

Mr. Fred Holt  
Progress Energy Carolinas  
P.O. Box 1551  
Raleigh, North Carolina 27602

Dear Mr. Holt,

On May 27-28, 2009, the United States Environmental Protection Agency ("EPA") and its engineering contractors conducted a site assessment of the 1964 and 1982 dams at the Asheville facility. The purpose of this visit was to assess the structural stability of the impoundments or other similar management units that contain "wet" handled coal combustion residuals (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 Asheville and requested that you submit comments on the factual accuracy of the draft report to EPA. We have received your comments and have considered them, as appropriate in the preparation of the final report .

The final report for Asheville is enclosed. This report includes a specific 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 Asheville. These recommendations are found on pages 1-2 in the final assessment report and are listed in Enclosure 2.

Since these recommendations relate to actions which could affect the structural stability of the CCR management units 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 explain why. Please provide a response to this request within 14 calendar days of receipt of this letter. Please send your response to:

Mr. Stephen Hoffman  
US 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  
US Environmental Protection Agency  
Two Potomac Yard  
2733 S. Crystal Drive  
5<sup>th</sup> Floor, N-237  
Arlington, VA 22202-2733

You may also provide a response by e-mail to [hoffman.stephen@epa.gov](mailto:hoffman.stephen@epa.gov)

This request has been approved by the Office of Management and Budget under EPA ICR Number 2350.01.

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.

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 ongoing efforts to ensure protection of human health and the environment.

Sincerely,



Matt Hale, Director  
Office of Resource Conservation and Recovery

Enclosures

Enclosure 2  
Asheville Recommendations

1.2.1 Recommendations Regarding the Structural Stability

1964 Dam – Slope stability analysis should be performed to confirm that acceptable margins of safety exist.

1982 Dam – None appear warranted at this time.

1.2.2 Recommendations Regarding the Hydrologic/Hydraulic Safety

1964 Dam – None appear warranted at this time; however, a dam break analysis should be performed as part of an emergency action plan.

1982 Dam – None appear warranted at this time; however, a dam break analysis should be performed as part of an emergency action plan.

1.2.3 Recommendations Regarding the Supporting Technical Documentation

	<b>1964 Dam</b>	<b>1982 Dam</b>
<b>Hydrologic/Hydraulic Safety</b>	Perform inflow design flood analysis Perform dam break analysis	Perform dam break analysis
<b>Structural Stability</b>	Perform detailed slope stability analysis	None

1.2.4 Recommendations Regarding the Description of the Management Unit(s)

1964 Dam – None appear warranted at this time.

1982 Dam – None appear warranted at this time.

1.2.5 Recommendations Regarding the Field Observations

1964 Dam – None appear warranted at this time.

1982 Dam – None appear warranted at this time.

1.2.6 Recommendations Regarding the Maintenance and Methods of Operation

1964 Dam – It is recommended that

- The embankment should be cleared of any trees or deep rooted vegetation that is beginning to be established;
- A program be established to have the rip-rapped embankment slope cleared of vegetation at least once every year;
- Additional rip-rap placed in the ditch along the right groin to minimize erosion;

- Under drain outlets be protected with small-animal guards attached with a hinge allowing for unobstructed flow (a removable screen placed over the front of the weir box is an acceptable alternative providing it is affixed with a mechanism providing for unobstructed flow should clogging occur).

1982 Dam - It is recommended that:

- Precaution be taken to not mow the embankment when wet or to take necessary measures to not create ruts perpendicular to the embankment slope;
- Grass, or similar shallow rooted herbaceous vegetative cover, needs to be established in bare areas where soil is visible;
- Small-animal burrows found on the downstream slope should be filled in with the appropriate material; and
- Under drain outlets be protected with small-animal guards attached with a hinge allowing for unobstructed flow (a removable screen placed over the front of the weir box is an acceptable alternative providing it is affixed with a mechanism providing for unobstructed flow should clogging occur).

#### 1.2.7 Recommendations Regarding the Surveillance and Monitoring Program

1964 Dam – Continue current surveillance program and begin seepage monitoring at internal drain outlets. Implement additional monitoring recommendations as may be identified in a slope stability analysis.

1982 Dam – Continue current program.

#### 1.2.8 Recommendations Regarding Continued Safe and Reliable Operation

1964 Dam – Perform a slope stability analysis and implement potential recommendations. Perform dam break analysis and develop an emergency action plan in the event of dam failure.

1982 Dam – Perform dam break analysis and develop an emergency action plan in the event of dam failure.