



**UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
REGION 7**

11201 Renner Boulevard  
Lenexa, Kansas 66219

**DEC 23 2013**

Mr. Brian Power  
Area Environmental Manager  
Republic Services, Inc.  
13570 St. Charles Rock Road  
Bridgeton, Missouri 63044

Re: Core Sampling (Phases 1B, 1C and 2) Work Plan and Health and Safety Plan for the Bridgeton Landfill – West Lake Landfill, December 18, 2013

Dear Mr. Power:

The U.S. Environmental Protection Agency has reviewed the subject documents received via electronic mail on December 18, 2013. The EPA does not approve the Health and Safety Plans. The EPA hereby conditionally approves the work plan subject to resolution of the following remaining issues:

1. The proposed phasing of the work is unacceptable to the EPA in that it leads to an excessively lengthy schedule for the work. The stated goals of Phases 1B and 1C overlap extensively, so separating their fieldwork and laboratory analyses as proposed is counterproductive. The EPA requires that the proposed borings for Phases 1B and 1C be installed in one continuous field mobilization, with samples sent to the laboratory in batches as they are collected, and with the borings being gamma-logged as soon as they are completed. If additional "step-out" boring locations are required to define the area of potential radiologically-impacted material (RIM) based on field screening and gamma logging results from the Phase 1B and/or 1C locations currently proposed, the EPA must be informed and additional "step-out" borings must be installed immediately until the limits of RIM are fully defined.

Once the gamma logs from Phase 1B and 1C locations are available in draft form, Republic Services, Inc. (Republic), and their contractors shall immediately schedule a teleconference with the EPA to select representative confirmation boring locations for Phase 2 based on the Phase 1, 1B and 1C gamma logs. Republic shall then immediately mobilize to drill the Phase 2 borings and collect samples and gamma logs as specified in the work plan. This will lead to a single, shorter interval of time for the laboratory analytical work and for the data validation. Weekly conference calls with the EPA should be held to expedite decision making as gamma logs and other field data are received.

2. The revised work plan does not address comments 4 and 6 on the draft work plan that requested clarification on the circumstances under which methods other than sonic drilling would be used to advance these borings. These comments must be addressed and the issue may need to be reevaluated in light of the continuous field mobilization required in issue 1 above.



3. The revised work plan does not address comment 14 on the draft work plan as it pertains to the Missouri Department of Natural Resources' request for source gas sampling from the open bore holes. This comment must be addressed and MDNR must be consulted on the logistics and schedule for collecting these samples during Phase 2 of the work.

4. During our teleconference on December 6, 2013, to discuss the EPA's comments on the draft work plan, Republic indicated that the PVC sleeves to be installed in the borings for gamma-logging purposes would be left in place for possible future use. The EPA does not object to this; however, the revised work plan must specify and describe how these sleeves will be fixed in place in a manner that prevents surface water entry, but does not attenuate gamma flux from the surrounding waste nor use materials that would contribute their own gamma flux. References to or description of previous installation methods for PVC gamma-logging sleeves at the site may be appropriate.

5. Section 4.2.1 of the work plan provides decision rules for excluding certain locations where the gamma cone penetrometer test (GCPT) encountered shallow refusal from the Phase 1B/1C investigation, based on results from the first few proposed drilling locations. In order to provide the level of understanding of the waste mass envisioned when scoping the network of GCPT push locations, all locations that exhibited shallow GCPT refusal must be drilled during Phase 1B/1C and gamma logged. Laboratory sampling of these borings may or may not be warranted and should be discussed with the EPA based on the results of the gamma logs.

6. Table 3 of the work plan does not provide a reference for quality assurance element B5, "Quality Control." The location of the relevant information in the work plan for this element must be specified here.

Please provide a revised work plan incorporating these changes within 10 working days of your receipt of this letter. The necessary revisions to the work plan must not delay the planned mobilization to the site to begin this work during the week of January 6, 2014. If you have any questions, please contact Dan Gravatt of my staff at (913) 551-7324.

Sincerely,



Jeffrey L. Field, Chief  
Missouri/Kansas Remedial Branch  
Superfund Division

cc: Leanne Tippet-Mosby, MDNR  
Jonathan Garoutte, MDHSS  
Joseph Bindbeutel, Missouri Attorney General's Office