



John R. Kasich, Governor  
Mary Taylor, Lt. Governor  
Scott J. Nally, Director

March 4, 2013

Mr. Paul Quinn  
Service Director  
City of Westlake  
27216 Hilliard Boulevard  
Westlake, Ohio 44145

**RE: WESTLAKE CITY LANDFILL  
CUYAHOGA COUNTY  
GROUND WATER  
RETURN TO COMPLIANCE**

Dear Mr. Quinn:

The Ohio Environmental Protection Agency (Ohio EPA), Northeast District Office (NEDO), has reviewed the following report for Westlake Landfill:

- Semi-annual Assessment Activities Report, dated December 7, 2011.

The "Notice of Violation, Additional Information Needed Letter" (2011 SAA Response Letter) is dated December 7, 2012. It was received on December 10, 2012. The 2011 SAA Response Letter was submitted in response to a Notice of Violation letter from Ohio EPA dated October 10, 2012 that had detailed violations and other compliance issues in the December 2011 semi-annual assessment activities report (December 2011 SAA report) submitted by the owner or operator. The 2011 SAA Response Letter was prepared and submitted by Mr. Fraser Hamilton of Earth Consulting, LTD, on behalf of the City of Westlake.

Westlake Landfill closed under the 1990 solid waste landfill regulations, but is currently conducting post-closure ground water detection and ground water quality assessment monitoring in accordance with the 2003 revision to the OAC 3745-27-10 solid and infectious waste regulations. Monitoring wells WW-2, WW-5, WW-9, WW-10, WW-11, WW-12, WW-13, WW-14 and WW-15 are currently in the ground water quality assessment program (GWQA) and thus are sampled in accordance with the ground water quality assessment plan (GWQAP). All other downgradient monitoring wells (i.e. WW-1, WW-3R, WW-6R, WW-8) at the facility are currently in the detection monitoring program, and wells WW-4 and WW-7 are used to determine background ground water quality at the facility.

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It was determined that the owner or operator submitted or corrected necessary data and information regarding the December 2011 SAA report and thus returned to compliance regarding the three violations previously issued and the report demonstrated compliance where more information was requested.

Ohio EPA has reviewed the above referenced documents and has the following comments:

## **Comments**

### **Response to Notice of Violation**

- 1) OAC Rule 3745-27-10(B)(5): which requires that the owner or operator evaluate, at least annually until the end of the post-closure care period, the ground water surface elevation data obtained in accordance with paragraph (C)(3) of this rule to determine whether the requirements of paragraph (B) of this rule for locating the monitoring wells continue to be satisfied. The results of this evaluation including potentiometric maps for every geologic unit monitored shall be included in a report to be submitted to the appropriate Ohio EPA district office not later than twelve months from the previous report submitted to comply with this paragraph.

The 2011 SAA Response Letter included potentiometric surface maps for the May 2011 and October 2011 sampling events that included ground water elevations for all wells and depiction of surface water features or ditches at the facility. Additionally, the 2011 SAA Response Letter included statements concluding that the existing monitoring well network has adequate spatial coverage to provide upgradient ground water samples representative of ground water that is unimpacted by the landfill and to provide early detection of any leachate-impacted ground water migrating from the facility, and the June 2012 detection monitoring report contains a similar statement.

Based on the data and information described above, Ohio EPA has determined that the owner or operator has returned to compliance with OAC Rule 3745-27-10(B)(5) regarding the year 2011.

- 2) OAC Rule 3745-27-10(C)(3): which requires during any major sampling event involving more than half the wells in the system that ground water elevations be measured in all wells monitoring the same unit, potentiometric maps be constructed and the direction of ground water flow determined using the collected ground water elevations.

The 2011 SAA Response Letter included potentiometric surface maps for the May 2011 and October 2011 sampling events that included ground water elevations for all wells, including the assessment wells installed at the time. The 2011 SAA Response Letter further included a table displaying depth-to-water measurements and ground water

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elevations for all detection and assessment wells for the May 2011 and October 2011 events and the following statement: "although water levels were measured in all wells, the failure to report those measurements was an oversight."

Based on the data and information described above, Ohio EPA has determined that the owner or operator has returned to compliance with OAC Rule 3745-27-10(C)(3) regarding the May 2011 and October 2011 events.

- 3) OAC Rule 3745-27-10(E)(12) and -10(E)(12)(b): require that the owner or operator submit within the SAA report all data generated as part of the GWQA since the previous report or include a reference to previously-submitted report that contains the data.

The 2011 SAA Response Letter included copies of field data sheets for assessment wells WW-9, WW-10, WW-11, WW-12 and WW-13 from ground water sampling events conducted in January 2011, May 2011, July 2011 and October 2011 during implementation of the GWQAP, and also included a corrected boring/well completion log for WW-12 that reflects the textual data and total depth reported elsewhere.

Based on the data and information described above, Ohio EPA has determined that the owner or operator has returned to compliance with OAC Rules 3745-27-10(E)(12) and -10(E)(12)(b) regarding the December 2011 SAA report.

### **Response to Request for More Information**

- 1) OAC Rules 3745-27-10(E)(1) and -10(E)(4)(e)(i): which require the owner or operator to implement and comply with the GWQAP, including the planned use of statistical data evaluation described in section 3.5 of the GWQAP.

The 2011 SAA Response Letter included several statements indicating that previous statements in the December 2011 SAA report were not intended to be data evaluation procedures, including the following statements from the 2011 SAA Response Letter:

- "We included the statement above only as a means of suggesting that, while chloroethane is present in the samples from WW-5, the concentrations measured in samples collected do not appear to present an imminent threat to human health or the environment based on comparison to the MCL."
- That statistical analysis of assessment data "will be completed prior to the final assessment report and presented as part of the final assessment report."

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- That the owner or operator “is reviewing, with its statistical consultant, the best approach for data evaluation. If changes to the GWQAP are appropriate, we will present those revisions to the OEPA.”

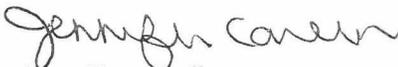
Based on the statements described above, Ohio EPA has determined that the owner or operator has demonstrated compliance with OAC Rules 3745-27-10(E)(1) and -10(E)(4)(e)(i) regarding the December 2011 SAA report.

If you have any technical questions regarding this review, please contact Steve Churchill of the Division of Drinking and Ground Waters at (614) 728-1225. Please submit all correspondence to Jennifer Carlin, Division of Materials and Waste Management, NEDO, Ohio EPA, 2110 East Aurora Road, Twinsburg, OH 44087.

Nothing in this letter shall be construed to authorize any waiver from the requirements of any applicable state or federal laws or regulations. This letter shall not be interpreted to release the owner or operator, or others, from responsibility under Chapters 3704., 3714., 3734., or 6111. of the Ohio Revised Code or under the Federal Clean Water or Comprehensive Environmental Response, Compensation, and Liability Acts remedying conditions resulting from any release of contaminants to the environment.

If you have any questions regarding this letter, please feel free to contact me at (330) 963-1133 or e-mail me at ["jennifer.carlin@epa.state.oh.us."](mailto:jennifer.carlin@epa.state.oh.us)

Sincerely,



Jennifer Carlin  
Environmental Specialist  
Division of Materials and Waste Management

JC/cl

cc: Mike Sekerak, Cuyahoga County Health Department  
Fraser Hamilton, Earth Consulting, LTD  
Stephen Churchill, DDAGW, CO  
File: [Sowers/LAND/Westlake City LF/GRO/18]  
DMWM #4185