



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

October 2, 2013

Ms. Carrie Beringer
EHS Manager
Heritage Thermal Services
1250 St. George Street
East Liverpool, OH 43920

**RE: HERITAGE THERMAL SERVICES, NOTICE OF VIOLATION / NOV
OHD 980613541, RCRA C – HAZARDOUS WASTE, COLUMBIANA COUNTY**

Dear Ms. Beringer:

On July 13, 2013, an incident occurred at the Heritage Thermal Services (HTS) facility located at 1250 Saint George Street in East Liverpool, Ohio (the Facility). HTS owns and operates a commercial hazardous waste incineration system with associated waste storage and waste processing capabilities. HTS holds a valid hazardous waste installation and operation facility permit to conduct these activities. Both hazardous and non-hazardous waste including mixed hazardous and infectious waste, generated by off-site businesses and manufacturing facilities, are transported to, stored, and then treated through a rotary kiln incinerator at HTS.

On July 24, 2013, HTS provided a contingency plan report describing the incident and actions taken in response to the incident. Generally, the report described events which led to a release of ash from the incineration system both on and off site (facility). HTS explained at approximately 12:59 p.m. on July 13, 2013, a steam explosion occurred in the Secondary Combustion Chamber (SCC) as a result of a large ash fall within the unit. The steam explosion propagated an over-pressurization event through the SCC to the Heat Recovery Boiler, causing damage to the duct located between the Heat Recovery Boiler and Spray Dryer.

Ash was released from the incineration system into the secondary containment beneath the damaged duct work (within the Facility). Ash was also released to the air and deposited in the neighborhood adjacent to the facility. HTS estimated 3,297 pounds of ash was released (~2,536 pounds on-site and ~761 pounds off-site). As a result of the over-pressurization event, HTS personnel instituted a shutdown of the incineration system, began a facility-wide outage, and initiated cleanup efforts for the ash release.

Ohio EPA was notified on July 13, 2013, of the incident on that day by HTS personnel. HTS personnel collected air samples on-site and collected ash samples at off-site locations utilizing gauze wipes (wipe samples), prior to the arrival of Ohio EPA. I arrived on-site at approximately 5:00 pm and visually evaluated the ash release within the facility. The wipe samples collected off-site by HTS personnel were later discounted due to irregularities with proper sample collection procedures. HTS personnel also collected grab (volume) samples of ash and slag between July 13th and 16th, 2013. These samples included one from the top of a trailer parked in the Heritage 10-Day Transfer Facility within the fenced area southwest of the Columbiana County Port Authority Building. HTS provided Ohio EPA with split samples of those grab samples.

On July 15, 2013, HTS personnel walked throughout the neighborhood to the west of the facility where the ash was believed to be deposited. I later accompanied an HTS employee while wipe samples were collected from the external surfaces of vehicles and other objects within the neighborhood. HTS personnel also collected samples of ash and slag between 7/13 and 7/16. HTS provided Ohio EPA with matching wipe samples from adjacent locations.

An independent laboratory, Test America, was contracted for analyses on the split and wipe samples provided to Ohio EPA. Test America provided a report (Job ID#240-26964-1) dated July 23, 2013 to Ohio EPA with analyses for four of the grab samples collected of slag and ash collected between July 13th and 16th, 2013. Test America provided a report (Job ID#240-27274-1) dated July 31, 2013 to Ohio EPA with analyses for the wipe samples collected by HTS in the neighborhood on July 15th, 2013.

To address the release of ash into the community, HTS set up a call center to address citizen concerns and deployed cleanup crews to respond to requests to clean external surfaces of houses and other items, and to empty and refill swimming pools, among other activities. HTS voluntarily conducted additional efforts such as cleaning streets with a street sweeper, washing homeowners' vehicles within the facility, and providing baskets of vegetables to the community. Weather conditions also affected the ash cleanup activities. Rain fell throughout several of the days following the incident.

HTS submitted a Contingency Activation Report dated July 24, 2013, for the July 13, 2013 incident. HTS also released a document entitled "Frequently Asked Questions Regarding the HTS Ash Release July 13, 2013" dated July 25, 2013. This document describes the actions taken by HTS, the initial sampling by HTS, a general description of the initial sample results, and a general description of the concentrations and possible effects. HTS contracted with Kathryn Kelly, Dr. P.H., of Delta Toxicology, Crystal Bay, Nevada, for the evaluation of those initial sample results in relation to exposure and for assistance in the preparation of this document. Her evaluations are presented within that document, which is available on the HTS webpage. Ohio EPA has not made a determination whether the statements made within that document regarding public exposure are valid.

Ohio EPA sent an e-mail dated July 24, 2013 to HTS, requesting the submittal of various items. By August 7, 2013 HTS provided paper copies of information to Ohio EPA that addressed the July 24, 2013 e-mail. The submitted documentation included analytical data, a summary of cleanup activities within the affected neighborhood, and copies of photographs indicating the activities performed. HTS contracted with an environmental firm, Cox-Colvin, for additional soil sampling of the area. This sampling was conducted on July 29 and 30, 2013. I witnessed some of the sampling activities and Ohio EPA was provided with splits of all soil samples collected. Those split-samples are currently in storage at Ohio EPA, NEDO, and to date, none have been analyzed. Ohio EPA does not yet have this report from Cox-Colvin.

As a result of the incident on July 13, 2013, violations of Ohio's hazardous waste laws in Chapter 3734 of the Ohio Revised Code (ORC) and Chapter 3745 of the Ohio Administrative Code (OAC), as well as the facility's State of Ohio Hazardous Waste Facility Installation and Operation Permit, were determined.

The following violations were noted:

1. **ORC 3734.02 (E)(F), Unlawful Disposal of Hazardous Waste:** *No person shall store, treat, or dispose of hazardous waste identified or listed under this chapter and rules adopted under it, regardless of whether generated on or off the premises where the waste is stored, treated, or disposed of, or transport or cause to be transported any hazardous waste identified or listed under this chapter and rules adopted under it to any other premises, except to ...a facility operating under a hazardous waste facility installation and operation permit.*

In addition, OAC 3745-51-03(C)(2)(a) states: "...any waste generated from the treatment, storage, or disposal of a hazardous waste, including any sludge, spill residue, ash, emission control dust... is a hazardous waste." Since HTS treats hazardous waste through its incineration system (which is listed hazardous waste in OAC rules 3745-51-30 through 3745-51-35 that has not otherwise been excluded), all treatment residue (e.g., ash) derived from this treatment by HTS is considered, at a minimum, listed hazardous waste and is to be managed pursuant to Ohio's hazardous waste laws and in accordance with HTS's approved Part B permit application.

HTS did make reasonable attempts to clean up the hazardous waste ash which was released off-site. However, issues such as weather conditions (e.g., wind patterns, precipitation events), potential access issues to private properties, and general uncertainty as to the overall deposition of the listed hazardous waste ash, remain. Even with the efforts of HTS, not all of the listed hazardous waste ash deposited off-site the Facility was able to be cleaned up. Therefore, the deposition of ash in the neighborhood adjacent to the Facility as a result of the incident on July 13, 2013, constituted a release of hazardous waste and is considered disposal of hazardous waste off-site of the Facility.

Based upon the sample results currently available, and the clean-up efforts already taken by HTS, no further action with regard to this improper disposal of hazardous waste is required at this time.

2. **OAC 3745-54-31 and Permit Condition B.1(a), Proper Operation and Maintenance:** Facilities shall be designed, constructed, maintained, and operated to minimize the possibility of a fire, explosion or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water which could threaten human health or the environment.

The incident on July 13, 2013 appears to have been caused by a buildup of ash in the SCC, beneath the section referred to as the “nose.” The ash that accumulated may have had a different composition that prevented the ash from fusing together to form a slag. HTS has tentatively attributed the change in composition to the incineration of zeolite-type materials that are present in certain types of petroleum refinery wastes. Due to HTS’s failure to maintain this portion of the Facility, a sudden release of hazardous waste which could have threatened human health or the environment occurred.

To prevent incidents similar to this from occurring in the future, HTS has implemented measures to help identify zeolite-containing materials prior to incineration. Those measures are described in the Preventative Action Plan included in a letter from HTS dated August 22, 2013 and submitted to Ohio EPA, Division of Air Pollution Control (DAPC). Currently, Ohio EPA, DAPC, is reviewing this information and may be requesting further action be taken to address this violation.

RESPOND WITHIN 14 DAYS:

Ohio EPA, Division of Materials and Waste Management (DMWM), requests HTS submit a response within 14 days that includes the following:

1. An evaluation of the approved Part B Permit Application, in particular Section C, Waste Characteristics and Waste Analysis Plan (WAP), for modifications resulting from corrective actions implemented for the July 13, 2013 incident.

The evaluation should include a description of any internal procedures that have been developed or revised by HTS as a result of the incident. Describe restrictions on certain types of wastes or certain constituents, additional laboratory equipment, additional supplemental analyses, or revised procedures including the rejection of specific waste loads by HTS as necessary or modified sample collection methods for bulk waste.

2. A copy of the analytical report prepared by Cox-Colvin on the soil sampling conducted on July 29-30, 2013 within the neighborhood adjacent to the facility.

3. A description of any additional actions or Preventative Action Plan HTS has or will be implementing to prevent a similar incident from happening in the future.

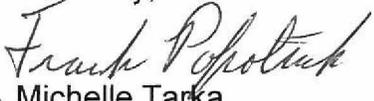
HTS needs to immediately take the necessary measures to return to compliance with Ohio's environmental laws and rules. Within 14 days of receipt of this letter, HTS must provide the above-requested documentation to Ohio EPA including the steps taken to abate the violations cited above. Documentation may be submitted via the postal service or electronically to michelle.tarka@epa.ohio.gov.

Please be advised that violations cited above will continue until the violations have been properly abated. Failure to comply with Chapter 3734 of the Ohio Revised Code and rules promulgated thereunder may result in a civil penalty of up to \$10,000 per day for each violation. It is imperative that you return to compliance. If circumstances delay the abatement of violations, HTS is requested to submit written correspondence of the steps that will be taken by a date certain to attain compliance.

If you have any questions, please contact me at the East Liverpool Field Office at (330) 385-8421.

Please note: Ohio EPA's domain name has changed. Please update your contact information to reflect the e-mail address provided above.

Sincerely,

for 
Michelle Tarka
Environmental Specialist
Division of Materials and Waste Management

MT:ddw

cc: Frank Popotnik, DMWM, NEDO
John Avdellas, Heritage Thermal Services
ec: Natalie Oryshkewych, DMWM, NEDO
Marlene Kinney, DMWM, NEDO
John Nyers, DMWM, CO
Erik Bewley, DAPC, NEDO
Jeff Mayhugh, DMWM, CO
Kristopher Weiss, PIC, CO

Notice: Ohio EPA's failure to list specific deficiencies or violations in this letter does not relieve HTS from the responsibility of complying with all applicable hazardous waste regulations. This letter does not relieve HTS from liability for any past or present violations of the state's hazardous waste laws.

Keywords: NOV, ash, SCC