OhioEPA

State of Ohio Environmental Protection Agency

STREET ADDRESS:

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P.O. Box 1049
Columbus, Ohio 43216-1049

CERTIFIED MAIL

January 8, 2008

Re: Von Roll America, Inc.
EPA ID No: OHD 980 613 541
Ohio ID No: 02-15-0589
Modified Hazardous Waste Permit

Ms. Allison Knowles
Von Roll America, Inc.
1250 St. George Street
East Liverpool, Ohio 43920-3400

Dear Ms. Knowles:

On January 12, 2006, Ohio EPA received Von Roll America, Inc.'s (Von Roll) request to modify the language in its Permit and Part B permit application to allow Von Roll to manage infectious waste that is also hazardous waste. This is referred to as mixed infectious and hazardous waste (MIHW). For this modification, Von Roll submitted a Class 3 modification application[1]. The Agency received written comments concerning this Class 3 modification application and these comments were addressed in the responsiveness summary. I have enclosed the final modified Ohio hazardous waste facility installation and operation permit (Permit) that was issued by the director today. Please note that the modified Permit remains in effect until it is renewed, withdrawn, suspended or revoked.

You are hereby notified that this action of the Director is final and may be appealed to the Environmental Review Appeals Commission pursuant to Section 3745.04 of the Ohio Revised Code. The appeal must be in writing and set forth the action complained of and the grounds upon which the appeal is based. The appeal must be filed with the Commission within thirty (30) days after notice of the Director's action. The appeal must be accompanied by a filing fee of $70.00 which the Commission, in its discretion, may reduce if by affidavit you demonstrate that payment of the full amount of the fee would cause extreme hardship. Notice of the filing of the appeal shall be filed with the Director within three (3) days of filing with the Commission. Ohio EPA requests that a copy of the appeal be served upon the Ohio Attorney General's Office, Environmental Enforcement Section. An appeal may be filed with the Environmental Review Appeals Commission at the following address:

[1] Ohio EPA assigned tracking # 060112-3A-1 to this modification application.

Environmental Review Appeals Commission
309 South Fourth Street, Room 222
Columbus, OH 43215

If you have any questions, please contact Patricia Natali of the Northeast District Office at (330) 385-8447.

Sincerely,

David A. Sholtis, Assistant Chief
Division of Hazardous Waste Management

cc: Jeremy Carroll/John Nyers, ERAS, DHWM
Dale Meyer, U.S. EPA, Region V
Frank Popotnik/Patricia Natalie, NEDO, DHWM
Carol Hester, Ohio EPA, PIC

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PUBLIC NOTICE

Columbiana County

OHIO EPA ISSUES FINAL CLASS 3 HAZARDOUS WASTE PERMIT MODIFICATION TO VON ROLL AMERICA, INC.

On January 8, 2008, Ohio EPA issued a final class 3 Hazardous Waste Facility Installation and Operation Permit (Permit) Modification to Von Roll America, Inc., for its facility at 1250 St. George Street, East Liverpool, Ohio 43920. The EPA Identification Number for this facility is OHD980613541.

Why is Von Roll America, Inc., Modifying its Permit?

Von Roll America, Inc., operates a commercial hazardous waste incinerator with associated waste management activities and needs a Permit to store and treat hazardous waste in containers and tanks, and to incinerate hazardous waste. Von Roll wishes to modify the language in its Permit and Part B permit application to allow Von Roll to manage infectious waste that is also hazardous waste. This is referred to as mixed infectious and hazardous waste (MIHW). This final modified permit will allow Von Roll America, Inc., to make the requested changes. To issue this final modified Permit, Ohio EPA determined that the modification application is complete and meets appropriate standards.

Can I appeal this final modified Permit?

Yes, if you are an officer of an agency of the state or of a political subdivision, acting in a representative capacity, or any person who would be aggrieved or adversely affected by this modified Permit, you have the right to appeal this Permit decision to the Environmental Review Appeals Commission (ERAC).

If I decide to appeal this final modified Permit, how and when must I make the appeal?

If you file an appeal, you must put it in writing no later than **February 7, 2008.** Your appeal must explain why you are appealing the action and the grounds you are using for your appeal. The appeal must be accompanied by a filing fee of $70.00 which the Commission, in its discretion, may reduce if by affidavit you demonstrate that payment of the full amount of the fee would cause extreme hardship. Ohio EPA requests that a copy of the appeal be served upon the Ohio Attorney General's Office, Environmental Enforcement Section. You must file your appeal, according to Ohio Revised Code § 3745.04 with ERAC at the following address: ***Environmental Review Appeals Commission***, 309 South Fourth Street, Room 222, Columbus, Ohio 43215. You must send a copy of the appeal to the director of Ohio EPA at the following address no later than three (3) days after you file it with ERAC: ***Chris Korleski, Director of Ohio EPA***, P.O. Box 1049, Columbus, Ohio 43216-1049.

OHIO ENVIRONMENTAL PROTECTION AGENCY
DIVISION OF HAZARDOUS WASTE MANAGEMENT

SUMMARY OF MODIFICATIONS TO HAZARDOUS WASTE INSTALLATION AND OPERATION PERMIT

Von Roll America, Inc.
U.S. EPA ID #: OHD 980 613 541
Ohio ID #: 02-15-0589

Modification of the Hazardous Waste Facility Installation and Operation Permit will authorize Von Roll America, Inc. (VRA) to make the following change(s):

Class 3 Modification:

VRA submitted a permit modification request to manage mixed infectious and hazardous waste, referred to as MIHW. MIHW is defined as infectious waste that is also hazardous waste. According to the Ohio Administrative Code (OAC) rule 3745-27-30(C)(7) "...any infectious waste or infectious waste mixture that meets the definition of hazardous waste as specified in rule 3745-51-03 of the Administrative Code shall be managed as a hazardous waste in accordance with Chapters 3745-50 to 3745-69 of the Administrative Code...". Under this rule, if infectious waste is also hazardous waste then the waste as a whole is managed as hazardous waste.

The modification request is to modify the language in VRA's Permit and Part B permit application (specifically, pages in Sections B, C, D, F, G, H, I, and J) to allow VRA to manage mixed infectious and hazardous waste that is also hazardous waste.

VRA will continue to be prohibited from accepting and treating waste which is only infectious. Infectious waste must also be hazardous waste to be accepted at the VRA facility under this permit modification.

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jms12/27/06

OHIO ENVIRONMENTAL PROTECTION AGENCY

MODIFIED OHIO HAZARDOUS WASTE FACILITY INSTALLATION AND OPERATION PERMIT

Date of Issuance: January 8, 2008
Effective Date: January 8, 2008

U.S. EPA ID No.: OHD 980 613 541
Ohio Permit No.: 02-15-0589

Name of Permittee: Von Roll America, Inc.

Mailing Address: 1250 Saint George Street
East Liverpool, Ohio 43920

Facility Location: 1250 Saint George Street
East Liverpool, Ohio 43920

Person to Contact: John Peterka, President

This Modified Ohio Hazardous Waste Facility Installation and Operation Permit is issued pursuant and subject to Section 3734.05(I) of the Ohio Revised Code and Rule 3745-50-51(D) of the Ohio Administrative Code.

The Ohio Hazardous Waste Facility Installation and Operation Permit with the above-referenced permit number as issued by the Ohio Environmental Protection Agency and journalized on March 23, 2005, is hereby incorporated by reference in its entirety, except as it may be modified herein.

This modification of the permit shall remain in effect until such time as the Ohio Hazardous Waste Facility Installation and Operation Permit is renewed, modified, withdrawn, suspended or revoked.

The Permittee shall comply with all requirements of the modified Part B permit application as amended or supplemented on January 12, 2006, May 5, 2006, October 5, 2006 and November 8, 2006. The information contained in the modified Part B permit application is incorporated herein by reference. Specifically, all written statements regarding the specifications, locations or capabilities of the processes, equipment, containment devices, safety devices or programs or other matters made by the applicant in the permit modification application are hereby incorporated as express, binding terms and conditions of this modified permit.

I certify this to be a true and accurate copy of the official documents as filed in the records of the Ohio Environmental Protection Agency.

By: _____ **Date:** 1-9-08

The modified Terms and Conditions of this permit are attached hereto and are incorporated herein by reference. The modified Terms and Conditions supersede and replace the corresponding pages found in the March 23, 2005 renewal permit.

Chris Korleski
Director

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B. GENERAL FACILITY CONDITIONS

B.1. Design, Maintenance and Operation of Facility
OAC Rule 3745-54-31

(a) The Permittee shall design, construct, maintain, and operate the facility to minimize the possibility of a fire, explosion, or any unplanned sudden or non-sudden release of hazardous waste constituents to air, soil, and ground or surface waters which could threaten human health or the environment.

(b) The Permittee is limited to treating the following quantities of hazardous waste in any one calendar year from any off-site sources during the life of the permit, until such time as this Condition is modified, renewed, or revised. This is a facility wide limitation and includes all units.

(i) The two incinerators (1 existing, 1 not yet constructed) may treat a combined total of 176,000 tons per year of hazardous waste. Each individual incinerator may treat 88,000 tons per year;

(ii) The Inorganic Waste Treatment System (not yet constructed) may treat 83,000 tons per year of hazardous waste; and

(iii) The General Wastewater Treatment System (not yet constructed) may treat up to ten percent of the total waste received at the facility. This ten percent limitation will be subject to revision as required by any agreements between the facility and the city of East Liverpool.

(c) The Permittee may receive off-site generated non-hazardous wastewater (NHW) for use on-site as process water. When needed, the NHW may be treated through the general wastewater treatment system prior to use at the facility.

(d) The Permittee may receive off-site generated waste to be used in fuel blending operations. This waste may, or may not, be blended and stored in permitted tanks prior to transport off-site to permited facilities for treatment.

(e) The Permittee may receive and store off-site generated waste (third party waste) that will not be incinerated at the facility. This waste will be transported off-site to a permitted facility for treatment and/or reclamation. Third party waste will be managed in accordance with this permit and the approved Part B permit application.

(f) The Permittee may manage mixed infectious and hazardous waste (MIHW) in accordance with the specifications in the Part B permit application and Module I(B) of this permit.

B.2. Required Notices
OAC Rule 3745-54-12

(a) The Permittee shall notify the Director in writing at least four weeks in advance of the date the Permittee expects to receive hazardous waste from a foreign source, as required by OAC Rule 3745-54-12(A). Notice of subsequent shipments of the same waste from the same foreign source is not required.

Building C, also known as the Lab Pack Building, is 56' x 60' with racks installed to store up to 13,200 gallons in a variety of container types and sizes. Total secondary containment in this building is 11,200 gallons. The building is used primarily for the storage and management of lab pack and loose pack waste as well as processing third party waste as described in Permit Condition C.1(d) and Section C in the permit application. The building is also used for other processing activities as described in Section D of the permit application. Containers processed or staged in Building C will be no more than five (5) cubic yards in size. The building is equipped with forced air ventilation, a breathing airline, and vapor recovery collection points used during processing activities.

The Container Holding Building, also known as the Slag Canopy, is 50' x 50' with a storage capacity of 100,000 gallons. The building is enclosed on three sides to minimize the accumulation of storm water. Total secondary containment is 10,520 gallons. Containers, greater than 85 gallons, can be stored on the floor and in heavy duty racks installed on the east and west side of the building. Waste stored in this building must be non-reactive and compatible. Processing of waste for use in the Bucket Hoist may be conducted in this building (see Section D-2e(4) of the permit application).

The Truck Holding and Sampling Area, a canopied building, is located west of the Container Processing Building. The building is approximately 60 feet by 96 feet, has a storage capacity of approximately 46,000 gallons, and is permitted for storing containerized and bulk solid wastes. The area is divided into six bays or stations that share a common reinforced sump. Total secondary containment is 22,000 gallons. Containerized waste will not be stored on the floor of this building nor in the racks which are used for consumer products and raw materials. Containers of mixed infectious and hazardous waste (MIHW), highly reactive waste, and/or pyrophoric hazardous wastes are prohibited from storage in this area. All waste will be stored according to compatibility guidelines and, if incompatible wastes are stored in adjacent bays, the Permittee will take action as described in Section D of the Part B permit application to prevent mixing should a release occur. In addition to storage, this area is also used for sampling, staging, and processing waste, decontamination of equipment, and dewatering of bulk solid waste containers.

The volume of all wastes received and stored is limited by storage capacity as defined in this permit; the total volume of waste treated is limited by the permitted process flow of the incineration system. Additional treatment processes employed at the facility, or permitted as future activities, prior to incineration include: (1) polymerization of isocyanates with a permitted treatment capacity of 1,000 gallons per day; (2) blending of wastes; (3) consolidation of waste in the facility's bucket hoist and in containers; (4) splitting of waste; (5) addition of absorbent material; (6) size reduction; (7) steam heating in the facility's drum heater; and (8) slurrification of some waste streams.

Several types of mechanical processing are included in the Part A permit application, all of which are described in Section D of the permit application. These include: (1) extrusion of waste at a rate of 18,000 pounds per hour per extruder; and (2) extruding (or pushing) of solid waste from drums at a rate of 18,000 pounds per hour using a pusher. One of two permitted extruders currently exists and one is planned for construction in the future. The pusher unit has not been constructed.

The facility is permitted to accept lab packs in containers less than 85 gallons in size. Lab packs typically are received in drums of varying composition, pails, and fiber boxes. A predetermined number of lab packs are audited by the Permittee and compared to the generator's inventory sheet. The facility also accepts waste in containers described as loose packs. Loose pack waste constitutes the consolidation of consumer packaged waste. Management of loose pack and lab pack waste is described in Section C of the permit application.

The facility is permitted to manage mixed infectious and hazardous waste (MIHW) in accordance with the requirements in Sections C and D of the Part B permit application and Module I(B) of this permit.

C.1. Process Capacity/Annual Quantity Limitation
OAC Rule 3745-50-43(A)(7)

(a) The Permittee shall not store more than 684,380 total gallons of containerized waste at any given time in the permitted container storage areas and waste staging areas at the facility. Waste staging areas at the facility are described in Section D of the approved permit application. Container storage areas are listed below:

Building A (Drum Warehouse)	510,000 gallons
Building B (External Truck Wash Building)	15,180 gallons
Building C (Lab Pack Building)	13,200 gallons
Container Holding Building (Slag Canopy)	100,000 gallons
Truck Holding and Sampling	46,000 gallons

C.14 Container Staging

As applied to this permit, staging refers to the temporary placement of off-site generated waste within the facility. Staging areas are identified and described in the Part B permit application. Staging areas must meet secondary containment standards, have automatic fire detection and suppression systems, and have a roof or canopy when possible. The Permittee will ensure that the volume of containers staged in permitted areas does not exceed the secondary containment capacities for each area. The volume of hazardous waste placed in any staging area will be accrued toward the maximum storage inventory limit established by this permit.

Time limits for staging have been designated and are described below. Anticipated time for staging containers over these periods must be brought to the attention of Ohio EPA on-site inspectors in advance. Additional time may be acceptable under certain circumstances. Ohio EPA retains the right to disallow staging of waste in any portion of the facility and require the Permittee to incinerate the waste or place it into storage. Please refer to Section D of the Part B permit application for more information regarding specific staging requirements and conditions.

The facility is permitted to manage mixed infectious and hazardous waste (MIHW) in accordance with Sections C and D the Part B permit application and Module I(B) of this permit. Refer to Sections C and D of the Part B permit application and Module I(B) of this permit for specific staging requirements for MIHW.

(a) Waste may be staged in the Truck Holding and Sampling area for up to 3 days. See permit application section D-2c.

(b) Containers in the Container Processing Building (CPB) shall be staged according to the specific processes being performed. Staging areas have different uses that include, but are not limited to, containers destined for processing through various means and staging of orphan and discrepant containers. See permit application section D-2d.

(1) Container Receiving Area (Unloading Docks) and Receiving Conveyor - Containers can be staged at the Container Receiving Area for up to 1 day. Bulk waste containers and container trucks may be staged in the Unloading Dock for up to 3 days. Containers may be staged on the Receiving Conveyor up to 1 day. See permit application section D-2d and D-2d(1).

(2) Splitting Station (split staging area/area north of splitting station) - Containers may be staged in this area up to 14 days. All split containers must be managed following compatibility rules and be inspected daily. See permit application section D-2d(2) and section D-2d.

D. TANK STORAGE, TREATMENT AND MANAGEMENT

General Overview

The Permittee is authorized for tank storage and treatment activities associated with organic and inorganic waste treatment operations, laboratory processes, internal and external truck washes, general wastewater treatment, and fuel blending. These activities are described below. Construction has not been started or is only partially completed for many of the permitted operations. Additional specific details for tank systems, including piping and instrumentation diagrams (P&IDs), are provided in Section D of the permit application.

Mixed infectious and hazardous waste (MIHW) must not be placed into any tank system. See Sections C and D of the Part B permit application and Module I(B) of this permit for more information.

(A) Organic Waste Treatment Operations

Organic waste treatment operations include bulk solid waste storage tanks, an organic tank farm, pump-out tanks, and flue gas scrubber effluent treatment. The bulk solid waste storage tanks are located in the Incinerator Feed Building. These tanks are utilized to process loose solid waste received in containers, end-dumps and roll off boxes. Four tanks with a total capacity not to exceed 2,400 cubic yards of waste are permitted. Two of these have been installed. The installed tanks are each 18 feet by 33 feet and hold up to 600 cubic yards each of waste. The tanks are reinforced concrete, in-ground, open-topped tanks. There are no pumps, piping, bypass systems, or pressure relief devices associated with these tanks. Waste destined for the bulk solid waste storage tanks cannot carry RCRA waste codes of D002 and D003 or contain any free liquids.

The installed portion of the organic tank farm is located in a building at the southeast end of the facility. It contains 18 aboveground tanks with a capacity of 288,000 gallons. The Permittee is authorized to eventually store a total capacity of 612,300 gallons of waste in 52 tanks. The purpose of the Organic Waste Tank Farm is to receive, blend, and store bulk liquid and sludge waste prior to treatment in the Incineration System.

Tanks may also be used to accumulate waste for fuel blending operations. Waste received from off-site may be blended in tanks in the organic waste tank farm and in container pump-out tanks prior to transport off-site to a permitted facility to be used as fuel or for further treatment. Section C of the approved Part B permit application includes waste restrictions associated with the fuel blending operations.

Existing tanks have secondary containment sized to contain the volume of the largest tank in each group. Tanks are equipped with level and temperature alarms, safety cutoffs, bypass systems, pressure and vacuum relief safety devices, and inert gas blanketing. Section D of the permit application describes each tank as well as the material of construction and the tank specifications.

handling, processing, or treatment considerations.

(e) Mixed infectious and hazardous waste (MIHW) must not be placed into any tank system. See Sections C and D of the Part B permit application and Module I(B) of this permit for more information.

D.2. Design and Installation of New Tank Systems or Components
OAC Rule 3745-55-92

(a) The Permittee shall construct any future new tank system(s) in accordance with Section D-9 of the approved Part B permit application.

(b) Prior to operation of the newly constructed tank system, the Permittee shall submit the certification of installation of the tank system in accordance with OAC Rule 3745-55-92(B) to ensure that proper handling procedures were adhered to in order to prevent damage to the system during installation.

D.3. Containment and Detection of Releases
OAC Rule 3745-55-93

The Permittee shall construct and operate the secondary containment system in accordance with requirements of OAC Rules 3745-55-93(B) through (F), and Section D and F of the approved Part B permit application.

D.4. Operating Requirements
OAC Rule 3745-55-94

(a) The Permittee shall not place hazardous wastes or treatment reagents in the tank system if they could cause the tank, its ancillary equipment, or a containment system to rupture, leak, corrode, or otherwise fail.

(b) The Permittee shall prevent spills and overflows from the tank or containment systems using the methods described in the approved Part B permit application. The Permittee shall comply with the requirements of OAC Rule 3745-55-96 if a leak or spill occurs in the tank system.

(c) The Permittee shall operate and manage tanks in accordance with Permit Condition D.1, B.7, and Section D of the Part B permit application. This shall include, for example, temperature and pressure sensors in the tanks, nitrogen blanketing, and rupture disks which release to the facility's vapor recovery system.

D.5. Inspection Schedules and Procedures
OAC Rule 3745-55-95

(a) The Permittee shall inspect the tank systems, in accordance with the inspection schedule in Section F of the approved Part B permit application and shall complete the items in Permit Conditions D.5(b) and D.5(c) as part of those inspections.

(b) The Permittee shall inspect the overfill controls, in accordance with the procedure and schedule in Section F of the approved Part B permit application.

(c) The Permittee shall inspect the following components of the tank system once each operating day:

(i) aboveground portions of the tank system, if any, to detect corrosion or releases of waste;

(ii) data gathered from monitoring and leak detection equipment (e.g., pressure or temperature gauges, monitoring wells) to ensure that the tank system is being operated according to its design; and

(iii) construction materials and the area immediately surrounding the externally accessible portion of the tank system, including the secondary containment system, to detect erosion or signs of releases of hazardous waste (e.g., wet spots, dead vegetation).

(d) Reserved.

(e) The Permittee shall immediately remove from service any permitted tank with a remaining wall thickness that is less than the design minimum wall thickness. The design minimum wall thickness is the total design wall thickness minus the design corrosion allowance. The wall thickness of each active tank shall be inspected and measured on an annual basis and compared to the design wall thickness found in Section D of the approved Part B permit application. Section D also includes the design corrosion allowance for each tank in the relevant attachment to Section D. This procedure will be conducted in order to evaluate the integrity of the tanks.

F.3. Waste Identification
OAC Rule 3745-50-43

The Permittee shall treat, in the permitted miscellaneous units, only the hazardous waste codes specified in Part A of the approved permit application for which incineration and wastewater treatment is permissible. Waste restrictions that apply to any of the miscellaneous units are described in Section C of the permit application.

Mixed infectious and hazardous waste (MIHW) must not be placed into any miscellaneous unit. Treatment of MIHW shall be in accordance with the Part B permit application and Module I(B) of this permit.

F.4. Assessment/Certification of Miscellaneous Unit
OAC Rule 3745-57-91, 3745-50-42(D)

The Permittee shall obtain and keep on file at the facility, a written statement by a qualified, registered professional engineer that attests that the miscellaneous units were properly designed and installed. The written statement must also include the certification as required by OAC Rule 3745-50-42(D).

This section also includes information about the facility's vapor recovery system used for controlling fugitive emissions during processing and storage of waste on-site and to supply combustion air to the incineration system.

Permitted staging, processing, and storage locations are also described in Section D of the approved permit application. Section D includes descriptions of receiving procedures and the procedures in place for sampling, processing, storing, and tracking wastes on-site. Section B details the times and days the facility can receive waste.

The facility is permitted to manage mixed infectious and hazardous waste (MIHW) in accordance with the requirements in the Part B permit application and Module I(B) of this permit. VRA must also remain in compliance with the parameters listed in Module I(A) of this permit.

(b) Operating Parameters

Key operating parameters for the incineration system include, but are not limited to:

(i) Reserved;

(ii) negative pressure in the SCC to prevent fugitive emissions;

(iii) Reserved;

(iv) Reserved;

(v) outlet temperature of the spray dryer/inlet temperature of ESP, as a control for dioxin/furan formation;

(vi) Reserved;

(vii) Reserved;

(viii) Reserved;

(ix) Reserved;

(x) carbon feed rate to the enhanced carbon injection system (ECIS) which collects dioxins/furans that may have formed during the incineration process;

(xi) Reserved

(xii) Reserved;

(xiii) Reserved;

(xiv) Reserved;

(xv) Reserved;

(xvi) annual metal feed and carbon feed restrictions to the system, to ensure permit limits are not exceeded;

(xvii) Reserved;

(xviii) Reserved.

Operating limits for the incineration system were based on: (1) the trial burn conducted by the facility in 1993, 1994, and 2003, (2) manufacturer's recommendations and specifications, and (3) results of performance testing conducted at the facility as described in Section D of the approved Part B permit application and listed in Attachment 1 and 3 to this permit.

(c) Description of Waste Feed Cut-Off System

The facility's waste feed cut-off (WFCO) system is part of the Bailey Distributed Control System (DCS). The system is utilized to terminate waste feed to the incineration system when a triggering event occurs. Operating parameters which have been identified as risk based or as more stringent than the corresponding requirement in

Reserved.

I(A).9. Re-generable Activated Carbon Adsorption Cleaning System

The Permittee shall maintain the re-generable activated carbon adsorption cleaning system to ensure a removal of, at a minimum, 95% of the total organic vapors from the exhaust gas prior to being discharged from the system to the atmosphere and in accordance with the terms and conditions of this permit and Section D of the approved Part B permit application.

(a) The replacement of the carbon boxes, in accordance with Section D of the approved Part B permit application, shall be recorded in the facility's operating record.

I(A).10 Treatment Residual

Unless the Permittee can show otherwise, per OAC Rule 3745-51-03(D), residue from the incinerator is hazardous waste and the Permittee is considered the generator.

(a) The Permittee shall sample and analyze the treatment residue generated from the incineration system and all ancillary systems in accordance with the procedures outlined in Section C of the approved Part B permit application.

(b) The Permittee shall manage the treatment residue generated from the incineration system in accordance with procedures outlined in Section D of the approved Part B permit application and all applicable Ohio hazardous waste regulations.

I(B). MIXED INFECTIOUS AND HAZARDOUS WASTE (MIHW)

I(B).1. Module Highlights

This module contains special requirements that apply, in addition to Module I(A), to the management of mixed infectious and hazardous waste (MIHW). Whenever MIHW is in the incinerator, the standards in Module I(A) must also be met.

MIHW is defined as infectious waste that is also hazardous waste. Hazardous waste is defined in Ohio Administrative Code (OAC) Rule 3745-51-03, and thus requires the application of one or more hazardous waste codes in order to be managed as hazardous waste.

Infectious waste must also be hazardous waste to be managed as MIHW. Waste that is solely infectious waste cannot be managed at the facility.

Under OAC Rule 3745-50-51(D)(4)(a)(v), the Director has the authority to include such additional permit conditions necessary to protect human health and the environment.

I(B).2. Management Criteria for MIHW

Unless otherwise authorized, the Permittee may incinerate mixed infectious and hazardous waste (MIHW), as specified in this Permit and in the Part B permit application. The following criteria must be adhered to when determining the acceptability of MIHW for management at the facility.

(a) The Permittee shall accept only MIHW with hazardous waste codes listed in the Part A permit application.

(i) The Permittee is prohibited from accepting MIHW containing prion waste or prion-contaminated debris, or prion-related waste or contaminated debris.

(b) The Permittee shall manage MIHW in accordance with the requirements and time limitations stated in the facility's Part B permit application and Ohio Hazardous Waste Facility Installation and Operation Permit. On occasion, and with sufficient justification, Ohio EPA may allow additional time, up to a maximum of thirty (30) days, for managing MIHW at the facility.

(i) MIHW will be managed as "high priority" waste. MIHW will be restricted in packaging, concentration, size, quantity, type, and as scheduled by the Permittee to ensure safe handling and incineration at the facility. MIHW will also be restricted to specific processing, staging, and/or storage areas prior to incineration.

(ii) Containers of MIHW will not be opened for any reason, including sampling or splitting into smaller charge sizes. However, containers being processed to the incinerator through the direct tanker bays or the direct drum Pump-out stations can be opened for that purpose.

(iii) Only the feed mechanisms specified in Sections C and D of the approved Part B permit application may be used to feed MIHW to the incineration system.

(iv) MIHW will not be placed into any tank system or into any miscellaneous unit.

(v) MIHW shall not be managed during periods of precipitation unless the waste and the waste management operations are protected from the elements of weather.

(vi) The Permittee will follow standard operating procedures (SOPs) for the management of MIHW. All SOPs will be made available to Ohio EPA upon request, for review and inclusion of comments. If significant changes are made to SOPs regarding the management of MIHW, the Permittee will submit those SOPs to Ohio EPA for review and inclusion of comments.

(c) Waste Profile Sheets (WPS) for MIHW will be prepared, reviewed, and approved in accordance with the requirements in Section C, Waste Characteristics and Waste Analysis Plan, of the Part B permit application. Exceptions to the requirements in Section C and additional requirements are stated below.

(i) Pre-acceptance and fingerprint samples for MIHW will not be analyzed at the facility. However, each container of MIHW must be monitored for radioactivity to ensure levels do not exceed background concentrations.

(ii) A signed certification from the generator/customer documenting the waste is MIHW must be included with the WPS. The WPS must provide sufficient information to properly characterize the waste and apply hazardous waste codes.

a) The WPS must include a calculation of the metals content present in the waste itself, if applicable, to justify the application of characteristic hazardous waste codes for metals by the generator/customer.

b) If applicable, the WPS must also include a concentration range for hazardous metals (for example, cadmium, chromium, and/or lead) that may be used as a pigmenting agent in bags or other containers of MIHW. This concentration range would be used to calculate the metals feed rate to the incineration system.

c) The metal concentration present as pigmenting agents in any bags or containers cannot be included in the calculation of metals to justify the application of characteristic waste codes to the actual waste.

(iii) The WPS and the individual waste labels must include specific designations to indicate the waste is MIHW, "high priority" waste, and that the MIHW is to be processed only through the feed mechanisms specified in the Part B permit application and permit.

(iv) MIHW may only be received as lab packs when a specific waste profile sheet is prepared for each lab pack waste stream.

(d) Individual containers of MIHW to be fed intact into the incinerator shall not exceed a total volume of more than 55 gallons and are restricted to non-metal containers such as plastic or fiber (cardboard). For specific waste streams that are packaged in an appropriate container size and/or waste concentration, metal containers may be acceptable depending on Ohio EPA review and approval of the WPS. Individual 55 gallon containers of MIHW may be over packed into a larger non-metal container, if necessary.

(e) MIHW will be evaluated upon receipt at the facility for conformity to the WPS. Non-conforming waste will be managed in accordance with the Part B permit application.

Ohio EPA may require the Permittee to temporarily restrict or disallow receipt of MIHW from any specific customer who demonstrates a continuing history of non-conforming containers or containers which result in an injury or contingency plan activation.

(f) A tracking system for MIHW must be developed and utilized by the Permitee in accordance with the Part B permit application. The tracking system will be provided to Ohio EPA for review on a regular basis and upon request at any time.

I(B).3. Operational Performance Requirements

The minimum temperature for the incineration of MIHW shall be no less than the minimum temperature for incinerating either hazardous waste or infectious waste, whichever temperature is more protective.

I(B).4. Process Capacity

MIHW must be scheduled for receipt only when the incinerator is operational. MIHW must be received at the facility in accordance with the requirements stated in the Part B permit application in Section C-2e(4).

(a) The Permittee must consider potential scheduling conflicts, operational capacity, processing and/or operating conditions, and equipment availability when scheduling MIHW.

(b) The Permittee must not schedule for receipt or receive more than 35,000 gallons (292,000 pounds) per day of MIHW at the facility and must not have onsite more than 100,000 gallons (834,000 pounds) total of MIHW in permitted container storage and waste staging areas. Shipments of MIHW must be re-scheduled if the existing inventory of waste limits the capability of the facility for managing the waste in accordance with facility guidelines and the requirements listed in the Part B permit application.

(c) All efforts will be made to immediately re-schedule MIHW from arriving at the facility if an unplanned outage occurs. If shipments inadvertently arrive during an outage, the waste may be staged and/or stored in designated areas in accordance with Sections C and D of the Part B permit application.

(d) Safety precautions and applicable SOPs must be discussed with appropriate facility personnel prior to unloading and processing each shipment of MIHW. Notifications to Ohio EPA must also occur prior to unloading each shipment of MIHW at the facility.

(e) If MIHW arrives as unscheduled waste, the generator/customer will be contacted immediately by facility personnel and additional training provided. If unscheduled waste arrives on a regular basis, Ohio EPA may take action to reduce the volume of MIHW which may be received by the Permittee.

I(B).5. Processing, Staging, and/or Storage of MIHW

MIHW shall be processed, staged and/or stored only in designated areas at the facility, in accordance with Section C-2e(4) of the Part B permit application.

(a) If unforeseen circumstances occur that would cause the Permittee to request that MIHW remain on-site longer than the time limitations stated in the Part B permit application, Ohio EPA may allow additional time, up to a maximum of thirty (30) days, for processing this waste, on occasion and with sufficient justification.

(b) Each container of MIHW is considered to contain an amount of waste equal to its capacity, regardless of the actual quantity in the container.

(c) If a container of MIHW is not in good condition (e.g. apparent structural defects) or if it begins to leak, the Permittee shall over pack in a second container that is in good condition or otherwise manage the waste in accordance with the terms and conditions of this permit or the Part B permit application.

(d) Containers of MIHW shall be impervious to moisture, shall be kept in good repair, shall be clean on the outside, shall be leak resistant, shall have tight-fitting covers, and shall have sufficient strength to withstand handling during transport without compromising their integrity.

(e) Containers of MIHW shall not be dropped, managed, or transferred in such manner as to cause damage to the container.

(f) MIHW will be managed in a manner that maintains the waste in a non-putrescent state, in accordance with the Part B permit application. The Permittee and/or Ohio EPA may require certain MIHW to be packaged for transport in sufficient amounts of ice and/or to be shipped in refrigerated vehicles to ensure the waste is maintained in a non-putrescent state. Waste suspected of being putrescent will be processed immediately regardless of any staging and/or storage time frames.

(g) All container storage and staging areas where MIHW may be located shall be visibly labeled with signs stating "high priority" and "mixed infectious and hazardous waste" at all points of access.

(h) MIHW must be stored in a manner that affords protection from animals and does not provide a breeding place or a food source for insects or rodents.

I(B).6. Inspection Schedules and Procedures
OAC Rules 3745-54-15 and 3745-54-73

Inspections shall be conducted in accordance with the Part B permit application. Inspections shall monitor the condition of containers and for the deterioration of the containment system caused by corrosion or other factors, at minimum. The Permittee shall document the results of these inspections on inspection forms, along with any remedial action taken in accordance with the procedures contained in Section F of the approved Part B permit application.

(a) The Permittee shall inspect all containers of MIHW while the waste is being managed at the facility, in accordance with the requirements and inspection schedule contained in Sections C and F of the approved Part B permit application.

(b) Visual inspection of treatment residual (slag) removed from the rotary kiln is required during periods of treatment of MIHW, in accordance with the Part B permit application.

(i) Inspections shall be conducted in accordance with Section F of the Part B permit application, and shall be documented on inspection forms.

(ii) Wastes not combusted to ash or slag, except for metallic, glass, and ceramic items, shall be handled and treated as MIHW and will be re-incinerated or may be sent off-site to an alternative treatment facility.

(iii) If MIHW is observed to be incompletely combusted, that waste must be removed from the slag and placed in a collection container that is covered and labeled, in accordance with SOPs and the Part B permit application.

(c) Inspection records associated with the management of MIHW will be maintained by the Permittee and provided to Ohio EPA on a routine basis and upon request.

I(B).7. Response to Leaks or Spills

Additional precautions are required for the management of MIHW at the facility. The Permittee shall respond to any releases of MIHW in accordance with SOPs and the Part B permit application.

(a) Releases of MIHW shall be cleaned by utilizing either a U.S. EPA registered hospital disinfectant that is also tuberculocidal, for a contact time as specified by the manufacturer, an unexpired dated stabilized bleach product that is a U.S. EPA registered hospital disinfectant that is also tuberculocidal, for a contact time as specified by the manufacturer, or a minimum ten percent sodium hypochlorite solution prepared immediately prior to use with a minimum thirty minutes of contact time with the waste.

(b) Any wastewater or other materials resulting from a spill of MIHW or debris resulting from the cleanup of a spill or MIHW shall be managed as MIHW.

(c) Spill kits will be stationed and maintained at designated locations and in areas where MIHW will be managed. Spill kits will be easily accessible when processing MIHW, in accordance with SOPs and the Part B permit application.

I(B).8. Record Keeping
OAC Rule 3745-54-73

The Permittee shall record and maintain, in the operating record for the facility, all monitoring and inspection data compiled under the requirements of this permit and in accordance with OAC Rule 3745-54-73 and all applicable sections of the Part B permit application.

I(B).9. Periodic Incineration System Testing

Incineration testing may be required by the Ohio EPA upon written notification. The test protocol and requirements will be in accordance with test procedures provided by Ohio EPA.

I(B).10. Closure

The Permittee must follow the procedures in the Closure Plan in Section I of the permit application, and the terms and conditions of this permit.

If the facility permanently ceases treating MIHW, the Permittee shall:

(a) Provide written notification to the Ohio EPA DHWM within seven calendar days of the actual date that the facility ceased to treat MIHW;

(b) Not later than fourteen days after the facility has ceased to treat MIHW, all untreated MIHW shall be removed from the facility to an authorized treatment facility that is in compliance with all applicable laws; and

(c) Not later than thirty days after the facility has ceased to treat MIHW, all waste handling facilities, equipment, and areas on the premises where MIHW was managed shall be thoroughly cleaned as follows:

(i) All areas of the facility, including, but not limited to, all containers, equipment, machines, floors and facility surfaces that were in contact with untreated MIHW at any time during the operation of the facility shall be washed or otherwise subjected to procedures that substantially reduce or eliminate any remaining constituents or contaminants derived from contact with MIHW using the following approved disinfectants:

(a) a U.S. EPA registered hospital disinfectant that is also tuberculocidal, for a contact time as specified by the manufacturer, or

(b) an unexpired dated stabilized bleach product that is a U.S. EPA registered hospital disinfectant that is also tuberculocidal, for a contact time as specified by the manufacturer, or

(c) a minimum ten percent sodium hypochlorite solution prepared immediately prior to use with a minimum thirty minutes of contact time with the waste.

(ii) Remove and properly dispose of any quench pit or liquid residues remaining at the facility.

(d) Not later than thirty days after completing the requirements as specified, or before the closed facility may be converted to other uses, whichever occurs first, the Permittee shall submit to the appropriate Ohio EPA district office, written certification that the facility has been closed in accordance with these requirements.

I(B).11. Treatment Residuals

Unless the Permittee can show otherwise, per OAC Rule 3745-51-03(D), treatment residual from the incinerator is hazardous waste and the Permittee is considered the generator. The Permittee shall ensure the treatment residual does not contain any incompletely combusted MIHW, in accordance with the Part B permit application.

The Permittee shall sample, analyze, and manage the treatment residue generated from the incineration system and all ancillary systems in accordance with the procedures outlined in Sections C and D of the permit application, SOPs, and all applicable Ohio hazardous waste regulations.

End of Permit Conditions

OhioEPA
State of Ohio Environmental Protection Agency

STREET ADDRESS:
Lazarus Government Center
50 W. Town St., Suite 700
Columbus, Ohio 43215

TELE: (614) 644-3020 FAX: (614) 644-3184
www.epa.state.oh.us

MAILING ADDRESS:
P.O. Box 1049
Columbus, OH 43216-1049

MEMORANDUM

TO: Edwin Y. Lim, Manager, RCRA Engineering Section, DHWM

FROM: Harry HES Sarvis, Manager, Compliance Assurance Section, DHWM

SUBJECT: **Von Roll America, Inc. East Liverpool OHD980613541, Permit # 02-15-0589, Recommendation for Permit Action Based on the Compliance History**

DATE: December 18, 2007

As you requested, the Compliance Assurance Section has prepared a summary of the compliance history for Von Roll America, Inc. (Von Roll). This information is a summary of reports of inspections conducted since the current permit was issued (March 23,2005) to the present, contained in both Central and District Office files that was prepared by the Enforcement Unit and reviewed by the District Office.

The column "RTC" in the summary of the compliance history contains the date on which each violation was documented as returned-to-compliance. A date in parentheses indicates that the file does not contain an RTC letter, however, the violation was either not cited in the following inspection or returned-to-compliance after the subsequent inspection. The "ESC" column refers to escalated enforcement actions. The facility is currently in substantial compliance with all applicable Hazardous Waste regulations.

Based on the attached summary of the company's hazardous waste compliance history at this facility, the Compliance Assurance Section would not recommend denial of Von Roll's class 3 permit modification.

As always, if you have any questions, do not hesitate to call.

Attachment

cc: Patricia Natali\Michelle Tarka\Frank Popotnik, DHWM, NEDO
John Nyers, ERAS, DHWM

Compliance History
VonRoll America, Inc. (dba WTI)
OHD 980 613 541 / 02-15-0589
December 18, 2007

OAC Rule/Permit Condition	Description of Violation	RTC	ESC
Date of Inspection: 4/12/2005 Compliance Evaluation Inspection			
	No violations cited.		
Date of Inspection: 7/13/2005 NRR Inspection - Review of Semi-Annual Groundwater Monitoring Results			
	No violations cited.		
Date of Inspection: 7/13/2005 Ground Water Operation and Maintenance Inspection			
	No violations cited.		
Date of Inspection: 7/20/2005 FRR Inspection - Review of Von Roll's Financial Assurance Documentation			
	No violations cited.		
Date of Inspection: 8/31/2005 NRR Inspection - Review of Documentation of Von Roll's Exceedance of RCRA one-hour average feed limit for mercury on 8/25/2005			
3845-50-58(A), PC A..3.f	Exceeded hourly feed rate for mercury	8/25/2005	
Date of Inspection: 10/18/2005 Compliance Evaluation Inspection			
	No violations cited.		
Date of Inspection: 10/24/2005 Focused Compliance Inspection			

Compliance History
VonRoll America, Inc. (dba WTI)
OHD 980 613 541 / 02-15-0589
December 18, 2007

OAC Rule/Permit Condition	Description of Violation	RTC	ESC
3845-50-58(A), PC D.(A)	Free liquid offloaded into pits	1/8/2007	
Date of Inspection: 2/15/2006 NRR Inspection - Review of Semi-Annual Groundwater Monitoring Results			
	No violations cited.		
Date of Inspection: 3/29/2006 Compliance Evaluation Inspection			
	No violations cited.		
Date of Inspection: 6/19/2006 FRR Inspection - Review of Von Roll's Financial Assurance Documentation			
	No violations cited.		
Date of Inspection: 7/7/2006 NRR Inspection - Result of the explosion in the Vapor Recovery System Summary - on 7/7/2006, an explosion occurred in the vapor recovery system. The explosion was the culmination of a chemical reaction in one of the waste storage tanks. Damage was localized to the facility's vapor recovery system.			
3845-54-31, PC B.1	Failure to operate the facility in a manner to minimize the possibility of an explosion. Von Roll transferred a water reactive waste into a tank without ensuring the receiving tank did not contain an incompatible material.	11/14/06	
3845-54-17(A), PC B.7.a	Failure to take the appropriate precautions to prevent an accidental reaction by transferring a water reactive waste into a tank without ensuring the receiving tank did not contain an incompatible material	8/18/06	
3845-55-98(A), PC D.9	Facility transferred a water reactive waste into a tank without ensuring the receiving tank did not contain an incompatible material, thereby resulting in a chemical reaction and ultimately, an explosion	8/18/06	

Compliance History
VonRoll America, Inc. (dba WTI)
OHD 980 613 541 / 02-15-0589
December 18, 2007

OAC Rule/Permit Condition	Description of Violation	RTC	ESC
Date of Inspection: 8/18/2006 NRR Inspection - Review of Documentation submitted by Von Roll in response to explosion in the Vapor Recovery System			
	No new violations cited.		
Date of Inspection: 9/26/2006 Compliance Evaluation Inspection			
3745-54-33	Some items of emergency equipment missing from designated locations	12/7/06	
PC B.1.a	Waste shipments received outside of time frame in permit	12/7/06	
PC C.2.a.1	Not meeting all conditions of pre-acceptance waste analysis	12/7/06	
Date of Inspection: 11/14/2006 NRR Inspection - Review of Facility Documentation			
	No violations cited.		
Date of Inspection: 12/7/2006 NRR Inspection - Review of Facility Documentation			
	No violations cited.		
Date of Inspection: 1/8/2007 NRR Inspection - Review of Facility Documentation			
	No violations cited.		
Date of Inspection: 1/23/2007 FRR Inspection - Review of Von Roll's Financial Assurance Documentation			
	No violations cited.		

Compliance History
VonRoll America, Inc. (dba WTI)
OHD 980 613 541 / 02-15-0589
December 18, 2007

OAC Rule/Permit Condition	Description of Violation	RTC	ESC
Date of Inspection: 1/25/2007 NRR Inspection - Review of Semi-Annual Ground Water Monitoring Results			
	No violations cited.		
Date of Inspection: 3/22/2007 NRR Inspection - Facility notification of Non-Compliance			
3845-54-76, PC B.24.c	Facility notified Ohio EPA that it had received a shipment of hazardous waste on a non-hazardous waste manifest, failed to notify director within 15 days. The violation occurred on 2/27/2007.	3/20/07	
Date of Inspection: 3/28/2007 NRR Inspection - Review of 2006 Annual Report			
3845-52-41(A)(5)	Facility did not report all wastes shipped off-site	05/04/07	
3845-52-41(A)(3)	Facility did not report shipping all wastes off-site	05/04/07	
Date of Inspection: 3/29/2007 NRR Inspection - Review of Supplementary Ground Water Annual Report			
	No violations cited.		
Date of Inspection: 4/12/2007 FRR Inspection - Review of Von Roll's Financial Assurance Documentation			
	No violations cited.		
Date of Inspection: 4/23/2007 Compliance Evaluation Inspection			
3745-55-77(C)	Storage of containers of incompatible waste without proper separation.	4/23/07	
3745-54-15(D)	Failure to fully record inspections in an inspection log.	[11/13/07]	

Compliance History
VonRoll America, Inc. (dba WTI)
OHD 980 613 541 / 02-15-0589
December 18, 2007

OAC Rule/Permit Condition	Description of Violation	RTC	ESC
Date of Inspection: 11/13/2007 Compliance Evaluation Inspection			
3745-52-34(A)(1)(a)	Storage of incineration slag on the ground in the facility's < 90 day accumulation area	11/13/07	
3734.11(b), PC C.5(a), PC C.14(b)(5)	Storing hazardous waste containers in areas not permitted for storage.	11/13/07	

From: <Cunningham.Michael@epamail.epa.gov>
To: <harry.sarvis@epa.state.oh.us>
Date: 11/27/2007 3:27 PM
Subject: Von Roll status

Hi Harry,

Von Roll has completed the supplemental environmental project required by the Consent Decree and has submitted the Supplemental Environmental Project completion report. There are currently no other enforcement issues regarding this site.
- Mike C. (312) 886-4464

Division of Hazardous Waste Management

Response to Comments

Project: Von Roll America, Inc. ("VRA"); Class 3A modification
Ohio EPA ID #: OHD 980 613 541 / 02-15-0589

Agency Contacts for this Project

Division Contact: Michelle Tarka, DHWM, 330-385-8421,
michelle.tarka@epa.state.oh.us

Public Involvement Coordinator: Caroline Markworth, 614-644-2160,
caroline.markworth@epa.state.oh.us

Ohio EPA held a public hearing on February 21, 2007 regarding VRA's request to manage mixed infectious and hazardous waste, referred to as MIHW. MIHW is defined as infectious waste that is also hazardous. That is, in order to be managed as MIHW, waste must be both infectious waste and hazardous waste. Infectious waste is defined under Ohio Administrative Code ("OAC") 3745-27; hazardous waste is defined under OAC 3745-51-03. Waste that is solely infectious waste cannot be managed under this permit modification request. This document summarizes the comments and questions received at the public hearing and/or during the associated comment period, which ended on March 5, 2007.

Ohio EPA reviewed and considered all comments received during the public comment period. By law, Ohio EPA has authority to consider specific issues related to protection of the environment and public health. Often, public concerns fall outside the scope of that authority. Ohio EPA may respond to those concerns in this document by identifying another government agency with more direct authority over the issue.

In an effort to help you review this document, the questions are grouped by topic and organized in a consistent format. It should also be noted that permit application pages have been updated for changes resulting from other un-related permit modifications approved between the date of issuance of the draft permit modification and the date of issuance of the final permit modification.

Concerns Regarding Compliance:

Comment 1:
Alonzo Spencer made the following remarks: "I want to raise an issue regarding the public notice. I would like to know what the justification for it was. I'll read this – "Ohio EPA determined that the permit application is complete and meets appropriate standards and that the applicant has a history of compliance with relevant environmental laws… I read this notice again, where it states that Ohio determined that the permit application is complete and meets appropriate standards and that the applicant has a

history of compliance. How does the EPA justify that statement put out in this public notice based on the history of this facility?"

Response 1:
The compliance history of the VRA facility dating back to March 2005 has been evaluated and Ohio EPA has found that the facility has an overall history of compliance (copy attached).

Concerns Regarding Anthrax:

Comment 2:
Alonzo Spencer had the following question: "Will this facility be permitted to handle Anthrax at all?"

Richard Wolf questioned: "…whether or not Anthrax is going to be incinerated."

Response 2:
Yes, VRA will be authorized under this permit modification to manage anthrax, if it meets the definition of a mixed infectious and hazardous waste (MIHW). MIHW is defined as infectious waste that is also hazardous waste. In order to be managed as MIHW, waste must be both infectious waste and hazardous waste simultaneously. If a waste stream contained a mixture of untreated anthrax and hazardous waste with hazardous waste codes, then VRA could request to manage the waste under this permit modification request. Based upon Ohio EPA knowledge of waste generation, it is unlikely waste streams containing both anthrax and hazardous waste will be generated.

Untreated anthrax, by itself, does not meet the description of mixed infectious and hazardous waste (MIHW) because no hazardous waste codes are associated with it. Therefore, untreated anthrax without a hazardous component is solely infectious waste and cannot be accepted and managed at VRA at all. Solely infectious waste must be managed at an infectious waste treatment facility.

According to the Ohio Administrative Code (OAC) rule 3745-27-30(C)(7) "…any infectious waste or infectious waste mixture that meets the definition of hazardous waste as specified in rule 3745-51-03 of the Administrative Code shall be managed as a hazardous waste…". This is because the hazardous component of the waste would not be adequately addressed using the treatment methods approved for rendering infectious waste non-infectious. On the other hand, the infectious component of the waste would be rendered non-infectious while the hazardous portion is being addressed, i.e., at a hazardous waste incinerator. That is why mixed infectious and hazardous waste (MIHW) must be managed as a hazardous waste. Managing MIHW as a hazardous waste is the safest manner of treating MIHW.

Ohio EPA is responsible for review and final approval of MIHW on a case-by-case basis for acceptance and management at VRA. Ohio EPA would determine if the anthrax waste was also hazardous (i.e., carrying applicable hazardous waste codes) and whether the waste could be safely managed at VRA.

As additional information, the "Public Health Security and Bioterrorism Preparedness and Response Act of 2002 and the Agricultural Protection Act of 2002" require entities to register with the U.S. Department of Health and Human Services (HHS) or Agriculture (USDA) if they possess, use, or transfer biological agents or toxins (i.e. anthrax) that could pose a severe threat to public health and safety. In addition to ensuring that laboratories safely handle these select agents and toxins, the Acts also require increased safeguards and security measures for these agents, including controlling access, screening entities and personnel (i.e. security risk assessments performed by the FBI) and establishing a comprehensive and detailed national database of registered entities. The Act also imposes criminal and civil penalties for the inappropriate use of select agents and toxins. In order to gain access to anthrax, an individual or entity must acquire approval from the Center for Disease Control Select Agent Program. Because anthrax is a Select Agent, it is required to be rendered non-infectious before it leaves the room in which it was used, and is not sent out for incineration.

Concerns Regarding Mixing of Waste:

Comment 3:
Alonzo Spencer had the following questions: "Will this waste be mixed together, by human or mechanical means, and at what point will the infectious and the hazardous waste come to be mixed? Will that be at the point of origin or will that be done at the facility?"

Richard Wolf had related questions, such as: "Concentration of what? What percentage of it is infectious; what percentage is hazardous? When does infectious waste contaminate hazardous waste? When does hazardous waste contain infectious?"

Response 3:
The word "mixed" in mixed infectious and hazardous waste refers to the waste being simultaneously infectious as well as hazardous at the point of generation. VRA is prohibited from accepting solely infectious waste, and that will not change with the approval of this permit modification request. Therefore, solely infectious waste cannot be accepted at the VRA facility and then mixed with hazardous waste, as a means of creating mixed infectious and hazardous waste.

Human handling of MIHW will be kept to a minimum at the facility to ensure the safety of the personnel. Containers of MIHW will not be opened for sampling or splitting into smaller charges. However, containers being processed to the incinerator through the direct tanker bays or the direct drum pump-out stations can be opened for that purpose.

By law, the generator of the waste must properly characterize it to determine whether the waste is infectious, hazardous, both, or neither. The generator is also responsible for proper management, and disposal of waste in accordance with applicable regulations. Documentation that a waste is MIHW must be included for review by Ohio EPA prior to waste acceptance at VRA. VRA is not a generator of the MIHW it accepts for processing.

There is no "set concentration" at which waste is deemed infectious. An infectious determination is based upon the categories of infectious waste listed in the Ohio

Administrative Code and the expertise of Ohio EPA. In general, infectious waste does not "contaminate" hazardous waste, or vice versa.

MIHW could be generated in a variety of ways. For example, one way would be through the manufacture of a product, such as a vaccine that also contains a hazardous component such as mercury. The vaccine with mercury is not waste until the manufacturer (the generator) wishes to dispose of it. Disposal could be a result of materials being outdated or not in accordance with manufacturer's specifications

MIHW could also be generated in hospitals, where patients may be treated with certain chemotherapy drugs that are considered hazardous waste at the time of disposal. To be hazardous, the waste would have to contain enough of the hazardous chemical or waste to carry a characteristic hazardous waste code or be a listed hazardous waste. To be MIHW, the waste would have to carry a hazardous waste code, and must also meet one of the definitions of infectious waste. Otherwise, the waste would be solely infectious, solely hazardous, or neither.

It is important to note that Ohio EPA relies upon the DSIWM for assistance in determining whether a waste is infectious, not infectious, or has been properly rendered non-infectious in accordance with Ohio regulations and requirements.

Concerns Regarding Waste Origins:

Comment 4:
Alonzo Spencer had the following question: "Will waste be brought from outside the confines – the infectious waste – outside the confines of the United States?"

Response 4:
Waste must be both infectious and hazardous simultaneously in order to be managed as mixed infectious and hazardous waste. VRA is not permitted to manage solely infectious waste. There is no prohibition against VRA receiving waste from outside the confines of the United States now, and there is no prohibition against VRA receiving MIHW from outside the United States.

Concerns Regarding Analysis and Sampling:

Comment 5:
Alonzo Spencer asked: "What analysis protocol will be required for the infectious waste?", and "What degree of sampling will be done for the concentrations, bacterial or viral types, and other constituents which may be present in this waste?"

Response 5:
Today's final permit does not require the Permittee to analyze MIHW at the East Liverpool facility. Containers of MIHW are not to be opened except for processing waste to the incinerator. MIHW will not be sampled or analyzed at VRA. As noted in response to Comment #3, a determination of whether the waste is MIHW will be based upon the generator's description of the waste, the waste generating process, and the generator's certification of the waste. Ohio EPA will review the generator's determination of

hazardous waste codes to ensure applicability and will evaluate the waste to determine whether it is considered infectious waste.

Concerns Regarding Waste Constituents:

Comment 6:
Alonzo Spencer had the following question: "Will medical needles or laboratory beakers be allowed as a part of this waste?"

Response 6:
Yes, it is highly probable that some MIHW will contain medical needles or laboratory beakers as part of the waste stream. Waste is evaluated on a specific case-by-case basis, and a generator must be able to describe the waste generating process and explain why the needles or beakers are a legitimate part of the waste stream. This is true of waste already being received by VRA. Sharps, including lab instruments and needles used for hazardous chemicals (but not used for infectious materials) and laboratory glassware, (both broken and unbroken), are currently legitimate constituents of hazardous and non-hazardous waste streams received by VRA.

Concerns Regarding Examples of MIHW:

Comment 7:
Alonzo Spencer asked: "Why was there a difference in the protocol of the waste that was handled, from the first handout and there were other ingredients added to the second? Why weren't they the same?"

Response 7:
During the hearing, it was clarified that the citizen was referring to the fact that examples of possible mixed infectious and hazardous waste streams were provided on two occasions. The examples provided were not identical on those two occasions, and the citizen wondered why.

In the VRA news release for their public information meeting held on February 13, 2006, VRA provided possible examples of MIHW including "...mixtures of these materials are found during environmental cleanups such as those following the hurricanes that pounded the Gulf Coast states. It is not uncommon in these and other disasters that chemicals would be co-mingled with pharmaceuticals and other medicinal materials".

In the Ohio EPA news release dated February 9, 2007, entitled Ohio EPA Schedules Public Meeting Concerning East Liverpool Incinerator, examples included "...vaccines containing mercury; sharps containing chemotherapy drugs; growth plates and Petri dishes containing hazardous components; tissue and organs from small lab animals preserved in ethanol...".

To clarify, the examples provided by VRA and Ohio EPA on those two occasions may have been different examples. However, both examples are <u>possible</u> examples of MIHW. As stated previously, waste is evaluated on a specific case-by-case basis, and while many examples of <u>possible</u> waste streams can be provided, there is no finite list of

MIHW that can be distributed to the public. Each waste stream proposed as MIHW will be evaluated individually.

Concerns Regarding Federally Approved Waste Codes:

Comment 8:
Richard Wolf had this question: "In your permit application it says that permitting [*sic*, the Permittee] may accept MIHW with federally approved hazardous waste codes the state has not yet promulgated. That seems a little ridiculous to me."

Response 8:
The commenter is referring to Condition I(B).2.(a), which includes the following statement "The Permittee may accept MIHW with federally approved hazardous waste codes the state has not yet promulgated." Ohio EPA agrees that this is not authorized by Ohio Administrative Code (OAC) rule 3745-27-30(C)(7) and has removed the statement. OAC rule 3745-27-30(C)(7) specifies that "…any infectious waste or infectious waste mixture that meets the definition of hazardous waste as specified in rule 3745-51-03 of the Administrative Code shall be managed as a hazardous waste…". Federal hazardous waste codes that have not been promulgated by the state are not defined as hazardous waste under OAC rule 3745-51-03.

Concerns Regarding Radioactivity:

Comment 9:
Richard Wolf had the following question: "It says MIHW must be monitored for radioactivity to ensure levels do not exceed background concentration. How about letting us know what the background concentrations are?"

Response 9:
Radioactivity of incoming hazardous waste is currently evaluated by VRA personnel during analysis of samples in accordance with the Waste Characteristics and Waste Analysis Plan (WAP). Radioactivity levels of individual containers are also monitored as appropriate. In the case of MIHW waste, each individual container will be monitored.

Radioactivity measurements taken for quality control purposes to calibrate the monitor are measured inside of the VRA laboratory on a daily basis. Measurements between 11 and 14 counts per second are considered background levels. During waste evaluations, radioactivity readings above 14 would be considered unusual and VRA would take further action at that time. This data is considered "raw" and the monitor does not differentiate between the various forms of radioactivity.

In addition, any infectious waste that is also radioactive must be managed in accordance with applicable Ohio Department of Health and U.S. Nuclear Regulatory Commission regulations. Questions and concerns regarding radioactivity are referred to the Ohio Department of Health.

Concerns Regarding Refrigeration of MIHW:

Comment 10:
Richard Wolf asked: "You're talking about either icing or refrigerating this putrescent infectious hazardous waste but you don't tell us to what degree you're going to refrigerate it or freeze it. Is there a level at which it must be maintained?"

Response 10:
In general, refrigeration of mixed infectious and hazardous waste should not be necessary. MIHW will be managed as high priority waste and incinerated within 48 hours of acceptance at VRA. However, if there are unforeseen circumstances that result in a delay, or waste arrives in refrigerated vehicles or on ice, or waste becomes putrescent while in route to the facility , then the waste will be incinerated immediately or refrigeration/ice may be utilized. Depending on the distance the waste travels, VRA may require the waste to be shipped on refrigerated vehicles or placed on ice.

Current Ohio EPA, DSIWM regulations for refrigeration of solely infectious wastes state "Maintain a maximum temperature of eight degrees centigrade or forty-six degrees Fahrenheit if either the infectious waste is left within a vehicle or trailer for greater than thirty-six hours from the time of receipt from the generator…".

While this is not addressed in the permit application for mixed infectious and hazardous waste, Standard Operating Procedures at VRA include monitoring of temperature sensitive waste, as appropriate. During routine inspections, the temperature of any refrigerated vehicles on-site is monitored to ensure the temperature is being maintained appropriately. If mixed infectious and hazardous waste is placed on ice or refrigerated, the waste will be monitored to ensure the ice is maintained in an adequate amount or the refrigeration temperature is maintained.

It is important to note that most mixed infectious and hazardous waste will not be putrescent or have the potential to become putrescent. Most MIHW will be managed without refrigeration or ice.

Concerns Regarding Location of Public Meetings:

Comment 11:
Several citizens raised concerns about the public hearing/meeting location and the acoustics of the building. Linda Zeigler specifically requested "Please have all future meetings for Von Roll America, Ohio EPA at either East Elementary or other East Liverpool east end public facilities."

Response 11:
One of the comments made during the 2005 permit renewal hearing indicated that it was not convenient to the citizens for Ohio EPA to provide information just prior to the public hearing. As a result, Ohio EPA personnel contacted at least 2 dozen concerned citizens by phone approximately two weeks prior to publishing the announcement for the public hearing in two local newspapers. Citizens were provided with the location, date, and time of the meeting during those phone calls.

During those phone calls, citizens were offered personal, one-on-one meetings with Ohio EPA representatives in advance of the public hearing. The only members of the community to accept the offer of personal meetings were public officials (Mayor, Safety-Service Director, Health Director, Nursing Director, City Council member). Personal meetings were offered by Ohio EPA in a sincere attempt to provide information well in advance of the actual meeting. It is unfortunate that nearly all the concerned citizens who were personally contacted declined the opportunity to discuss this modification with Ohio EPA personnel in advance of the actual public hearing.

During the public hearing, citizens indicated that they could not hear well. When this occurred, the presenter accommodated by moving closer and speaking even louder. Other attendees indicated the presenter was speaking loudly and clearly enough to be heard throughout the room.

None of the contacted citizens expressed an interest or desire to move the meeting location until the night of the actual meeting. Ohio EPA believes this is the first time citizens have requested that Agency-led meetings be held at East Elementary or in the East end of town. That request can be honored for future Agency-led meetings. Ohio EPA understands that East Elementary has nearly identical meeting conditions available as other schools utilized for public meetings (i.e., a gymnasium).

Please note that Ohio EPA cannot dictate where Von Roll America holds their public meetings, as long as they meet the requirements in the Ohio Administrative Code.

<u>Concerns Regarding Contagiousness of MIHW:</u>

Comment 12:
Sandy Estell had the following comment: "...untreated infectious waste, which leads me to believe that it is still contagious, it is still infectious and an even greater risk for us."

Response 12:
Untreated infectious waste is infectious waste that has not been treated to render it non-infectious. Untreated infectious waste may be contagious (or non-contagious) to a wide degree. The designation of a waste as infectious does not differentiate the degree to which that waste could actually cause infection. In most cases, a person must have direct contact with infectious waste in order to become infected. As mentioned previously, solely infectious waste (untreated infectious waste) cannot be managed at VRA under this modification request.

In the case of MIHW, chemicals may have been used that would cause the waste to be less infectious, yet the waste may still be considered infectious waste. This is because other states accept methods of rendering a waste non-infectious that the state of Ohio does not recognize as an approved method. That means a waste may be rendered non-infectious or regarded as not infectious in one state, but when the generator attempts to dispose of that waste in another state, they are informed the waste is still considered infectious in that other state. In addition those chemicals may cause the infectious waste to also be hazardous, resulting in MIHW.

Concerns Regarding the Number of Modifications:

Comment 13:
Virgil Reynolds made the comment: "This permit doesn't look anything like it did back in the early '80s when it (the facility) was permitted. You've had dozens and dozens of modifications."

Response 13:
The modification process is described in detail in the regulations to provide time lines and structure to both the regulated community and Ohio EPA. The permit must be modified to reflect changes that are incorporated at the VRA facility. Many of the modifications describe improvements in operations, include more descriptive language, or incorporate additional restrictions into the application and permit.

Concerns Regarding Permit Restrictions:

Comment 14:
Linda Ziegler had the following comment: "Keep the times, storage, and other restrictions in the permit as you just presented to us."

Response 14:
The citizen made this comment due to a comment made by another citizen during the question session after the presentation (prior to the public hearing portion represented by the comments in this transcript). The other citizen expressed a desire for the Ohio EPA to eliminate the 48-hour restrictions and the 14 day restrictions, and simply allow VRA up to 30 days to process mixed infectious and hazardous waste (MIHW). Ohio EPA explained that the 48-hour, 14 day, and with rare exception, up to 30 days to manage mixed infectious and hazardous waste were developed as safety precautions to ensure the MIHW was managed in an appropriate manner. The language was very detailed in order to fully explain this. In the future, VRA may request to alter the time, storage, and/or processing restrictions included in this modification. Ohio EPA will evaluate any future modification requests in accordance with the regulations.

The citizen made the comment to "keep the times, storage, and other restrictions" noted above as a response to the other citizens' comment, to have the language remain as originally drafted. The time frames for storage and related restrictions in today's final permit have not changed from how these issues were detailed in the draft permit.

Concerns Regarding Waste With Similar Restrictions:

Comment 15:
Linda Ziegler asked the question: "Are there other wastes that Von Roll America accepts at East Liverpool that have similar restrictions to the ones you presented and, generally speaking, what are they?"

Response 15:
Yes, there are other wastes already accepted by VRA with similar restrictions in regards to processing methods, storage and/or staging restrictions, sampling and/or analysis requirements, and temperature sensitive waste that may be maintained on refrigerated vehicles or on ice. For some waste streams, restrictions are added on a specific case-by-case basis. For other waste, general restrictions are applied to waste types. The specific details for processing, staging, and storage restrictions are located in the permit application and the facility's permit.

For example, temperature sensitive waste may be received by VRA and staged on a refrigerated vehicle in accordance with pre-existing time restrictions. Temperature sensitive waste is inspected at the same frequency and for the same criteria (i.e., leaks, labels, etc.) as other waste. However, the temperature of the truck is monitored, as well as the fuel level to maintain the refrigeration unit. Not all temperature sensitive waste is kept on a refrigerated vehicle. Some containers may arrive packed in ice, and may be sent immediately for incineration.

Other waste is processed directly to the incinerator without any allowable storage of this waste in permitted storage areas. This would be similar to the restriction placed upon mixed infectious and hazardous waste, to be managed as "high priority" waste and incinerated within 48 hours of acceptance at VRA.

Other waste is staged and/or stored only in certain areas. Waste processed through the Bucket Hoist can only be processed, staged, and/or stored in certain locations and for certain lengths of time. Similar types of restrictions were applied to where mixed infectious waste can be processed, staged, and/or stored.

Because Ohio EPA recognized the management of MIHW at a hazardous waste incinerator would be a concern, additional precautions, safeguards, and restrictions were developed. Those precautions resulted in the development of additional language in the permit application and a new permit module IB. Restrictions were also added to limit the amount of MIHW which may be received on any one day, and the amount of MIHW which may be on-site at any one time.

<u>Concerns Regarding Temperature-Sensitive Waste:</u>

Comment 16:
Linda Ziegler asked the following question: "...the air and noise pollution from a truck idling to keep cold this infectious hazardous waste is unduly intrusive to the neighborhood. And any infectious hazardous waste, which is temperature-sensitive should be kept within the Von Roll America buildings not on trucks."

Response 16:
Language has been included in VRA's permit application and their permit to limit the manner in which MIHW is received, to limit management of MIHW to certain areas of the facility, and to limit the amount of time MIHW will be on-site by being managed as "high priority" waste.

All of those restrictions should be sufficient to limit the amount of MIHW which would require a refrigerated vehicle, and ensure that any refrigeration unit would be of adequate size. The operation of a refrigerated unit for MIHW is not expected to be any different from the refrigerated units currently operated at VRA as necessary. To clarify, the truck itself does not need to be running in order for the refrigeration unit to be operable – the refrigeration unit has a separate motor. The truck itself is not creating noise because it is not running, and there are no carbon dioxide emissions. Ohio EPA is not aware of any increase in noise levels in the neighborhood by any currently operated refrigeration units or vehicles within the VRA facility, and thus would not expect this to be an issue.

Once vehicles containing waste are accepted into the VRA facility, those vehicles are directed to locations where secondary containment and concrete curbing exist. Refrigerated vehicles provide a contained, temperature-controlled location for staging waste. Currently, VRA does not have a refrigeration unit located inside a building. In addition, temperature sensitive waste is not received on a daily basis. It may not be necessary to utilize a refrigerated vehicle on a regular basis. Ohio EPA believes it is appropriate to allow VRA to maintain temperature sensitive waste at the facility on refrigerated vehicles, as appropriate and necessary.

Concerns Regarding the Transportation of Hazardous Waste:

Comment 17:
Linda Ziegler made the comment: "I particularly oppose the transportation of hazardous waste through East Liverpool and the risks inherent in that..."

Response 17:
As the citizen noted, the regulations that pertain to the proper transportation of hazardous waste are under the jurisdiction of the Department of Transportation (DOT). DOT is also responsible for the regulations that pertain to the transportation of consumer packaged materials, which may or may not be dangerous, throughout our roadways.

The transport volume, or the amount of waste received at the facility, is not expected to increase significantly with the facility's ability to manage MIHW.

Concerns Regarding the 10-Day Transfer Facility:

Comment 18:
Linda Ziegler made the following comment: "...the parking of trucks with hazardous waste beside the Ohio River without containment around the trucks."

Response 18:
Ohio EPA recognizes the citizen's concern, however this comment is not in regards to the VRA facility. The citizen is referring to the 10-Day Transfer Facility operated by Heritage Environmental Services (HES). The HES Transfer Facility is located in a gravel lot, without secondary containment, on property leased from the Columbiana County Port Authority. The Transfer Facility is a separate facility from the VRA commercial hazardous waste incinerator. The regulations pertaining to Transfer Facilities can be

found in the Ohio Administrative Code. Those regulations do not specify a requirement for containment.

To clarify, the entire VRA facility is constructed with concrete secondary containment system and concrete curbing to ensure any spills, releases, and run-off (rain) water are collected throughout the facility and managed properly.

General Comments:

Comment 19:
Ohio EPA received two e-mails from citizens opposing the modification. The e-mails include requests for Ohio EPA to not approve the modification.

Comment 20:
Ohio EPA received two letters of support for the modification request by VRA to manage mixed infectious and hazardous waste.

Ohio EPA Note

Concerns Regarding MIHW Containing Prions:
During the public comment period, Ohio EPA considered the potential that prion-contaminated waste could be accepted at the facility if this permit modification is approved. A prion is a disease-causing agent that is neither bacterial nor fungal nor viral and contains no genetic material. Prions have been held responsible for a number of degenerative brain diseases, including scrapie (a fatal disease of sheep and goats), mad cow disease and Creutzfeldt–Jacob disease. Ohio EPA could not determine conclusively the effectiveness of incineration as an adequate treatment technology for prion-containing waste.

As a result, Ohio EPA has added condition I(B).2.(a)(i), which includes the following statement “The Permittee is prohibited from accepting MIHW containing prion waste or prion-contaminated debris, or prion-related waste or contaminated debris. VRA has similarly included this prohibition from accepting MIHW containing prions on page C-6a of the permit application.

End of Response to Comments

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