State of Ohio Environmental Protection Agency

RE: DRAFT PERMIT TO INSTALL MODIFICATION **CERTIFIED MAIL**
ASHTABULA COUNTY

Street Address: Mailing Address:
Lazarus Gov. Center **TELE:** (614) 644-3020 **FAX:** (614) 644-2329 Lazarus Gov. Center

Application No: 02-18646

DATE: 4/20/2004

USA Waste, Inc. - Geneva Landfill
Scott Herman
PO Box 13680
Akron, OH 44334

You are hereby notified that the Ohio Environmental Protection Agency has made a draft action recommending that the Director issue a Permit to Install modification for the air contaminant source(s) [emissions unit(s)] shown on the enclosed draft permit modification. This draft action is not an authorization to begin construction or modification of your emissions unit(s). The purpose of this draft is to solicit public comments on the proposed installation. A public notice concerning the draft permit will appear in the Ohio EPA Weekly Review and the newspaper in the county where the facility will be located. Public comments will be accepted by the field office within 30 days of the date of publication in the newspaper. Any comments you have on the draft permit modification should be directed to the appropriate field office within the comment period. A copy of your comments should also be mailed to Robert Hodanbosi, Division of Air Pollution Control, Ohio EPA, P.O. Box 1049, Columbus, OH, 43266-0149.

A Permit to Install modification may be issued in proposed of final form based on the draft action, any written public comments received within 30 days of the public notice, or record of a public meeting if one is held. You will be notified in writing of a scheduled public meeting. Upon issuance of a final Permit to Install modification a fee of **$ 625** will be due. Please do not submit any payment now.

The Ohio EPA is urging companies to investigate pollution prevention and energy conservation. Not only will this reduce pollution and energy consumption, but it can also save you money. If you would like to learn ways you can save money while protecting the environment, please contact our Office of Pollution Prevention at (614) 644-3469. If you have any questions about this draft permit, please contact the field office where you submitted your application, or Mike Ahern, Field Operations & Permit Section at (614) 644-3631.

Very truly yours,

Michael W. Ahern

Michael W. Ahern, Supervisor
Field Operations and Permit Section
Division of Air Pollution Control

CC: USEPA NEDO Eastgate Development &n Transportation Study NY PA

ASHTABULA COUNTY

PUBLIC NOTICE
OHIO ENVIRONMENTAL PROTECTION AGENCY
ISSUANCE OF DRAFT PERMIT TO INSTALL
TO USA WASTE, INC.

Public notice is hereby given that the Ohio Environmental Protection Agency (EPA) has issued, on 4-20-2004, a draft action of Permit to Install (PTI) application number 02-18646 to USA Waste, Inc. dba Waste Management, Inc. - Geneva Landfill in Geneva Township, Ohio. This draft permit is an administrative modification of the current air pollution control Permit to Install for this municipal solid waste landfill. No physical change nor change in operational methods is proposed, other than the extension of the current landfill gas collection and control system to all gas-producing parts of the landfill. The particulate emissions limit is proposed to be raised to more accurately reflect the potential emissions from all landfill operations, by including emissions from any construction activities and daily soil cover activities. The proposed allowable emissions rate is listed below in tons per year and was calculated consistent with allowable emissions rates for licensed municipal solid waste landfills.

Pollutant	Tons/yr
Particulate Emissions	85.1

These proposed changes, if approved, would not alter the requirements contained in the facility's solid waste permit, nor will they alter the particulate emissions control requirements in the existing air Permit to Install.

Until the close of the business day on May 20, 2004 interested parties may submit comments or request a public hearing. Comments are to be sent to (Christine McPhee) Division of Air Pollution Control, Ohio EPA, Northeast District Office located at 2110 E. Aurora Road, Twinsburg, Ohio 44087.

Copies of the draft permit application and technical support information may be reviewed and/or copies requested of these materials by contacting Ohio EPA Northeast District Office, 2110 E. Aurora Road, Twinsburg, Ohio 44087, telephone 330-963-1200.

DRAFT MODIFICATION OF PERMIT TO INSTALL 02-18646

Application Number:	02-18646
APS Premise Number:	0204030303
Permit Fee:	**To be entered upon final issuance**
Name of Facility:	USA Waste, Inc. - Geneva Landfill
Person to Contact:	Scott Herman
Address:	PO Box 13680 Akron, OH 44334

Location of proposed air contaminant source(s) [emissions unit(s)]:
4339 Tuttle Rd.
Geneva, Ohio

Description of proposed emissions unit(s):
Administrative modification to increase allowable particulate emissions rate(s) at the landfill operations (F002).

The above named entity is hereby granted a modification to the permit to install described above pursuant to Chapter 3745-31 of the Ohio Administrative Code. Issuance of this modification does not constitute expressed or implied approval or agreement that, if constructed or modified in accordance with the plans included in the application, the above described source(s) of environmental pollutants will operate in compliance with applicable State and Federal laws and regulations, and does not constitute expressed or implied assurance that if constructed or modified in accordance with those plans included in the application, the above described source(s) of pollutants will be granted the necessary operating permits.

This permit is granted subject to the conditions attached hereto.

Ohio Environmental Protection Agency

Director

A. State and Federally Enforceable Permit To Install General Terms and Conditions

1. Monitoring and Related Recordkeeping and Reporting Requirements

a. Except as may otherwise be provided in the terms and conditions for a specific emissions unit, the permittee shall maintain records that include the following, where applicable, for any required monitoring under this permit:

i. The date, place (as defined in the permit), and time of sampling or measurements.

ii. The date(s) analyses were performed.

iii. The company or entity that performed the analyses.

iv. The analytical techniques or methods used.

v. The results of such analyses.

vi. The operating conditions existing at the time of sampling or measurement.

b. Each record of any monitoring data, testing data, and support information required pursuant to this permit shall be retained for a period of five years from the date the record was created. Support information shall include, but not be limited to, all calibration and maintenance records and all original strip-chart recordings for continuous monitoring instrumentation, and copies of all reports required by this permit. Such records may be maintained in computerized form.

c. Except as may otherwise be provided in the terms and conditions for a specific emissions unit, the permittee shall submit required reports in the following manner:

i. Reports of any required monitoring and/or recordkeeping of federally enforceable information shall be submitted to the appropriate Ohio EPA District Office or local air agency.

ii. Quarterly written reports of (i) any deviations from federally enforceable <u>emission limitations</u>, <u>operational restrictions</u>, <u>and control device operating parameter limitations</u>, excluding deviations resulting from malfunctions reported in accordance with OAC rule 3745-15-06, that have been detected by the testing, monitoring and recordkeeping requirements specified in this permit, (ii) the probable cause of such deviations, and (iii) any corrective actions or preventive measures taken, shall be made to the appropriate Ohio EPA District Office or local air agency. The written reports shall be submitted quarterly, i.e., by January 31, April 30, July 31, and October 31 of each year and shall cover the previous calendar quarters. See B.9 below if no deviations occurred during the quarter.

iii. Written reports, which identify any deviations from the federally enforceable monitoring, recordkeeping, and reporting requirements contained in this permit shall be submitted to the appropriate Ohio EPA District Office or local air agency every six months, i.e., by January 31 and July 31 of each year for the previous six calendar months. If no deviations occurred during a six-month period, the permittee shall submit a semi-annual report, which states that no deviations occurred during that period.

iv. Each written report shall be signed by a responsible official certifying that, based on information and belief formed after reasonable inquiry, the statements and information in the report are true, accurate, and complete.

2. Scheduled Maintenance/Malfunction Reporting

Any scheduled maintenance of air pollution control equipment shall be performed in accordance with paragraph (A) of OAC rule 3745-15-06. The malfunction, i.e., upset, of any emissions units or any associated air pollution control system(s) shall be reported to the appropriate Ohio EPA District Office or local air agency in accordance with paragraph (B) of OAC rule 3745-15-06. (The definition of an upset condition shall be the same as that used in OAC rule 3745-15-06(B)(1) for a malfunction.) The verbal and written reports shall be submitted pursuant to OAC rule 3745-15-06.
Except as provided in that rule, any scheduled maintenance or malfunction necessitating the shutdown or bypassing of any air pollution control system(s) shall be accompanied by the shutdown of the emission unit(s) that is (are) served by such control system(s).

3. Risk Management Plans

If the permittee is required to develop and register a risk management plan pursuant to section 112(r) of the Clean Air Act, as amended, 42 U.S.C. 7401 et seq. ("Act"), the permittee shall comply with the requirement to register such a plan.

4. Title IV Provisions

If the permittee is subject to the requirements of 40 CFR Part 72 concerning acid rain, the permittee shall ensure that any affected emissions unit complies with those requirements. Emissions exceeding any allowances that are lawfully held under Title IV of the Act, or any regulations adopted thereunder, are prohibited.

5. Severability Clause

A determination that any term or condition of this permit is invalid shall not invalidate the force or effect of any other term or condition thereof, except to the extent that any other term or condition depends in whole or in part for its operation or implementation upon the term or condition declared invalid.

6. General Requirements

a. The permittee must comply with all terms and conditions of this permit. Any noncompliance with the federally enforceable terms and conditions of this permit constitutes a violation of the Act, and is grounds for enforcement action or for permit revocation, revocation and reissuance, or modification, or for denial of a permit renewal application.

b. It shall not be a defense for the permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the federally enforceable terms and conditions of this permit.

c. This permit may be modified, reopened, revoked, or revoked and reissued, for cause. The filing of a request by the permittee for a permit modification, revocation and reissuance, or revocation, or of a notification of planned changes or anticipated noncompliance does not stay any term and condition of this permit.

d. This permit does not convey any property rights of any sort, or any exclusive privilege.

e. The permittee shall furnish to the Director of the Ohio EPA, or an authorized representative of the Director, upon receipt of a written request and within a reasonable time, any information that may be requested to determine whether cause exists for modifying, reopening or revoking this permit or to determine compliance with this permit. Upon request, the permittee shall also furnish to the Director or an authorized representative of the Director, copies of records required to be kept by this permit. For information claimed to be confidential in the submittal to the Director, if the Administrator of the U.S. EPA requests such information, the permittee may furnish such records directly to the Administrator along with a claim of confidentiality.

7. Fees

The permittee shall pay fees to the Director of the Ohio EPA in accordance with ORC section 3745.11 and OAC Chapter 3745-78. The permittee shall pay all applicable Permit To Install fees within 30 days after the issuance of this Permit To Install.

8. Federal and State Enforceability

Only those terms and conditions designated in this permit as federally enforceable, that are required under the Act, or any of its applicable requirements, including relevant provisions designed to limit the potential to emit of a source, are enforceable by the Administrator of the U.S. EPA, the State, and citizens under the Act. All other terms and conditions of this permit shall not be federally enforceable and shall be enforceable under State law only.

9. Compliance Requirements

a. Any document (including reports) required to be submitted and required by a federally

applicable requirement in this permit shall include a certification by a responsible official that, based on information and belief formed after reasonable inquiry, the statements in the document are true, accurate, and complete.

b. Upon presentation of credentials and other documents as may be required by law, the permittee shall allow the Director of the Ohio EPA or an authorized representative of the Director to:

i. At reasonable times, enter upon the permittee's premises where a source is located or the emissions-related activity is conducted, or where records must be kept under the conditions of this permit.

ii. Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit, subject to the protection from disclosure to the public of confidential information consistent with ORC section 3704.08.

iii. Inspect at reasonable times any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under this permit.

iv. As authorized by the Act, sample or monitor at reasonable times substances or parameters for the purpose of assuring compliance with the permit and applicable requirements.

c. The permittee shall submit progress reports to the appropriate Ohio EPA District Office or local air agency concerning any schedule of compliance for meeting an applicable requirement. Progress reports shall be submitted semiannually, or more frequently if specified in the applicable requirement or by the Director of the Ohio EPA. Progress reports shall contain the following:

i. Dates for achieving the activities, milestones, or compliance required in any schedule of compliance, and dates when such activities, milestones, or compliance were achieved.

ii. An explanation of why any dates in any schedule of compliance were not or will not be met, and any preventive or corrective measures adopted.

10. Permit To Operate Application

a. If the permittee is required to apply for a Title V permit pursuant to OAC Chapter 3745-77, the permittee shall submit a complete Title V permit application or a complete Title V permit modification application within twelve (12) months after commencing operation of the emissions units covered by this permit. However, if the proposed new or modified source(s) would be prohibited by the terms and conditions of an existing Title V permit, a Title V permit modification must be <u>obtained before</u> the operation of such new or modified source(s) pursuant to OAC rule 3745-77-04(D) and OAC rule

3745-77-08(C)(3)(d).

b. If the permittee is required to apply for permit(s) pursuant to OAC Chapter 3745-35, the source(s) identified in this Permit To Install is (are) permitted to operate for a period of up to one year from the date the source(s) commenced operation. Permission to operate is granted only if the facility complies with all requirements contained in this permit and all applicable air pollution laws, regulations, and policies. Pursuant to OAC Chapter 3745-35, the permittee shall submit a complete operating permit application within ninety (90) days after commencing operation of the source(s) covered by this permit.

11. Best Available Technology

As specified in OAC Rule 3745-31-05, all new sources must employ Best Available Technology (BAT). Compliance with the terms and conditions of this permit will fulfill this requirement.

12. Air Pollution Nuisance

The air contaminants emitted by the emissions units covered by this permit shall not cause a public nuisance, in violation of OAC rule 3745-15-07.

B. State Only Enforceable Permit To Install General Terms and Conditions

1. Compliance Requirements

The emissions unit(s) identified in this Permit to Install shall remain in full compliance with all applicable State laws and regulations and the terms and conditions of this permit.

2. Reporting Requirements Related to Monitoring and Recordkeeping Requirements

The permittee shall submit required reports in the following manner:

a. Reports of any required monitoring and/or recordkeeping of state-only enforceable information shall be submitted to the appropriate Ohio EPA District Office or local air agency.

b. Except as otherwise may be provided in the terms and conditions for a specific emissions unit, quarterly written reports of (a) any deviations (excursions) from state-only required emission limitations, operational restrictions, and control device operating parameter limitations that have been detected by the testing, monitoring, and recordkeeping requirements specified in this permit, (b) the probable cause of such deviations, and (c) any corrective actions or preventive measures which have been or will be taken, shall be submitted to the appropriate Ohio EPA District Office or local air agency. If no deviations occurred during a calendar quarter, the permittee shall submit a quarterly report, which states that no deviations occurred during that quarter. The reports shall be submitted quarterly, i.e., by January 31, April 30, July 31, and October 31 of each year and shall cover the previous calendar quarters. (These quarterly reports shall exclude deviations resulting from malfunctions reported in accordance with OAC rule 3745-15-06.)

3. Permit Transfers

Any transferee of this permit shall assume the responsibilities of the prior permit holder. The appropriate Ohio EPA District Office or local air agency must be notified in writing of any transfer of this permit.

4. Termination of Permit To Install

This permit to install shall terminate within eighteen months of the effective date of the permit to install if the owner or operator has not undertaken a continuing program of installation or modification or has not entered into a binding contractual obligation to undertake and complete within a reasonable time a continuing program of installation or modification. This deadline may be extended by up to 12 months if application is made to the Director within a reasonable time before the termination date and the party shows good cause for any such extension.

5. Construction of New Sources(s)

The proposed emissions unit(s) shall be constructed in strict accordance with the plans and application submitted for this permit to the Director of the Ohio Environmental Protection Agency. There may be no deviation from the approved plans without the express, written approval of the Agency. Any deviations from the approved plans or the above conditions may lead to such sanctions and penalties as provided under Ohio law. Approval of these plans does not constitute an assurance that the proposed facilities will operate in compliance with all Ohio laws and regulations. Additional facilities shall be installed upon orders of the Ohio Environmental Protection Agency if the proposed sources cannot meet the requirements of this permit or cannot meet applicable standards.

If the construction of the proposed emissions unit(s) has already begun or has been completed prior to the date the Director of the Environmental Protection Agency approves the permit application and plans, the approval does not constitute expressed or implied assurance that the proposed facility has been constructed in accordance with the approved plans. The action of beginning and/or completing construction prior to obtaining the Director's approval constitutes a violation of OAC rule 3745-31-02. Furthermore, issuance of the Permit to Install does not constitute an assurance that the proposed source will operate in compliance with all Ohio laws and regulations. Approval of the plans in any case is not to be construed as an approval of the facility as constructed and/or completed. Moreover, issuance of the Permit to Install is not to be construed as a waiver of any rights that the Ohio Environmental Protection Agency (or other persons) may have against the applicant for starting construction prior to the effective date of the permit. Additional facilities shall be installed upon orders of the Ohio Environmental Protection Agency if the proposed facilities cannot meet the requirements of this permit or cannot meet applicable standards.

6. Public Disclosure

The facility is hereby notified that this permit, and all agency records concerning the operation of this permitted source, are subject to public disclosure in accordance with OAC rule 3745-49-03.

7. Applicability

This Permit to Install is applicable only to the emissions unit(s) identified in the Permit To Install. Separate application must be made to the Director for the installation or modification of any other emissions unit(s).

8. Construction Compliance Certification

The applicant shall provide Ohio EPA with a written certification (see enclosed form) that the

facility has been constructed in accordance with the Permit To Install application and the terms and conditions of the Permit to Install. The certification shall be provided to Ohio EPA upon completion of construction but prior to startup of the source.

9. Additional Reporting Requirements When There Are No Deviations of Federally Enforceable Emission Limitations, Operational Restrictions, or Control Device Operating Parameter Limitations (See Section A of This Permit)

If no deviations occurred during a calendar quarter, the permittee shall submit a quarterly report, which states that no deviations occurred during that quarter. The reports shall be submitted quarterly, i.e., by January 31, April 30, July 31, and October 31 of each year and shall cover the previous calendar quarters.

C. Permit To Install Summary of Allowable Emissions

The following information summarizes the total allowable emissions, by pollutant, based on the individual allowable emissions of each air contaminant source identified in this permit.

SUMMARY (for informational purposes only)
TOTAL PERMIT TO INSTALL ALLOWABLE EMISSIONS

Pollutant	Tons Per Year	Net Change, Tons Per Year
PE*	85.1	81.3

* The PE are fugitive pollutants.

Part II - FACILITY SPECIFIC TERMS AND CONDITIONS

A. State and Federally Enforceable Permit To Install Facility Specific Terms and Conditions

None

B. State Only Enforceable Permit To Install Facility Specific Terms and Conditions

None

Part III - SPECIAL TERMS AND CONDITIONS FOR SPECIFIC EMISSIONS UNIT(S)

A. State and Federally Enforceable Section

I. Applicable Emissions Limitations and/or Control Requirements

1. The specific operations(s), property, and/or equipment which constitute this emissions unit are listed in the following table along with the applicable rules and/or requirements and with the applicable emissions limitations and/or control measures. Emissions from this unit shall not exceed the listed limitations, and the listed control measures shall be specified in narrative form following the table.

Operations, Property, and/or Equipment	Applicable Rules/Requirements	Applicable Emissions Limitations/Control Measures
F002 - Municipal solid waste landfill with an active gas collection system and an open, non-assisted flare to control methane and non-methane organic compound (NMOC) emissions and odors - administrative modification of PTI 02-12039 issued on March 24, 1999.	OAC rule 3745-31-05(A)(3)	Visible particulate emissions (PE) shall not exceed 10% opacity as a 6-minute average. Best available control measures that are sufficient to minimize or eliminate visible emissions of visible fugitive dust must be employed; see sections A.I.2.c. - A.I.2.f. The fugitive PE rate shall not exceed 85.1 tons/year. The requirements of this rule also include compliance with the requirements of 40 CFR, Part 60, Subpart WWW and 40 CFR, Part 63, Subpart AAAA.
	OAC rule 3745-31-01(VV)(1)(a)(vi)	A Preventative Maintenance Malfunction Abatement Plan (PMMAP) shall be implemented to prevent, detect and correct equipment failures which could result in odors that contribute to a nuisance. The PMMAP, submitted on April 10, 2003 and revised on August 13, 2003, addresses the landfill gas collection (extraction) system, the condensate removal system, the landfill gas blowers (movers), the flare and associated equipment to collect landfill gases, control methane (CH_4)and NMOC

emissions and control odors . Sec section A.I.2.p.		OAC rule 3745-17-07(B)(1) OAC rule 3745-17-08(B)
None; see section A.I.2.a. None; see section A.I.2.b.		40 CFR Parts 60.750 - 60.759
See sections A.I.2.g. - A.I.2.o.		40 CFR Parts 63.1930 - 63.1990
See sections A.I.2.r. - A.I.2.x.		

2. Additional Terms and Conditions

2.a This emissions unit is exempt from the visible particulate emission limitations specified in OAC rule 3745-17-07(B) pursuant to OAC rule 3745-17-07(B)(11)(e).

2.b This facility is not located within an "Appendix A" area as identified in OAC rule 3745-17-08. Therefore, pursuant to OAC rule 3745-17-08(A), this emissions unit is exempt from the requirements of OAC rule 3745-17-08(B).

Fugitive Dust Control Measures

2.c The landfill fugitive dust operations that are covered by this permit are subject to the requirements of OAC rule 3745-31-05(A)(3) are listed below:

Municipal solid waste (MSW) dumping (load-out from haul trucks);
MSW grading;
MSW compacting;
Daily soil cover handling;
Soil load-in to truck for construction support;
Soil load-out from truck for construction support;
Soil grading for construction support; and
Soil compacting for construction support.

2.d The permittee shall employ best available control measures for the above-identified landfill fugitive dust operation(s) for the purpose of ensuring compliance with the above-mentioned applicable requirements. In accordance with the permittee's permit application, the permittee has committed to maintain an inherent moisture content of the materials involved in the landfill fugitive dust operations at a level which is sufficient to comply with all applicable requirements. Any dusty materials likely to become airborne

shall be watered as necessary prior to or during conducting operations in order to minimize or eliminate visible emissions of fugitive dust. No dusty material shall be dumped during periods of high wind speed, unless the material has been treated to prevent fugitive dust emissions from becoming airborne. In order to minimize leachate generation, water shall not be applied to a water saturated landfill working surface; nor shall water be applied at an application rate that allows pooling of liquid. The permittee shall employ the following best available control measure(s) to ensure compliance:

<u>material handling operation(s) - best available control measure(s)</u>
MSW load-out - maintain a low drop height;
MSW grading - maintain adequate moisture, as needed;
MSW compacting - maintain adequate moisture, as needed;
Daily soil cover handling - maintain adequate moisture, as needed, or employ a synthetic cover as approved by the Ohio EPA, Division of Solid and Infectious Waste Management;

Soil load-in - maintain a low drop height;
Soil load-out - maintain a low drop height;
Soil grading - maintain adequate moisture, as needed; and
Soil compacting - employ a water spray, as needed.

Nothing in this paragraph shall prohibit the permittee from employing other control measures to ensure compliance.

2.e The above-identified control measure(s) shall be implemented if the permittee determines, as a result of the inspection conducted pursuant to the monitoring section of this permit, that the control measures are necessary to ensure compliance with the above-mentioned applicable requirements. Any required implementation of the control measure(s) shall continue during the operation of the fugitive dust operation/sources until further observation confirms that use of the control measure(s) is unnecessary.

2.f Implementation of the above-mentioned control measures in accordance with the terms and conditions of this permit is appropriate and sufficient to satisfy the requirements of OAC rule 3745-31-05(A)(3).

<u>New Source Performance Standards for Air Emissions from Municipal Solid Waste Landfills - NSPS, Subpart WWW - MSW Capacity Design Plan</u>

2.g The initial design capacity report estimated the capacity to be 4.8008 million cubic meters of waste volume. The design capacity report, completed on November 7, 2002, fulfills the requirements of 40 CFR 60.752(a).

2.h If the design capacity increases, an amended design capacity report, as provided for in 40 CFR 60.757(a)(3), shall be submitted to the Northeast District Office.

<u>NSPS, Subpart WWW - NMOC Estimates, Gas Collection and Control System (GCCS) Requirements, and Permitting Requirements</u>

2.i The design capacity is greater than 2.5 million megagrams (Mg) so that the permittee is

subject to part 70 or part 71 permitting requirements. When this emissions unit is closed and meets the conditions for control system removal, specified in 40 CFR 60.752(b)(2)(v), a part 70 (Title V) operating permit is no longer required, provided that the operations at this facility are not otherwise subject to the requirements of either part 70 or part 71.

2.j For calendar year 2000 the annual NMOC emissions were estimated to be 242.8 Mg, as noted in an initial report, completed on November 7, 2002. Since the NMOC emissions are greater than 50 Mg/yr, this emissions unit is subject to the GCCS design and operating requirements of 40 CFR 60.752(b)(2).

NSPS, Subpart WWW - GCCS Design Plan Requirements,

2.k A GCCS design plan, prepared in August, 2003 by a professional engineer, was submitted to the Northeast District Office to fulfill the requirements of 40 CFR 60.752(b)(2)(i).

i. The GCCS design plan shall meet the requirements of 40 CFR 60.752(b)(2)(ii).

ii. The GCCS as described in the plan shall include any alternatives to the operational standards, test methods, procedures, compliance measures, monitoring, record keeping or reporting provisions of 40 CFR 60.753 through 40 CFR 60.758 proposed by the permittee.

(1) The methane monitoring of the landfill surface design plan, included with the GCCS design plan, shall include a topographical map with the monitoring route and the rationale for any site-specific deviations from the 30 meter sampling interval operational standard.

(2) An alternate methane monitoring of the landfill surface procedure, per 40 CFR 60.752(b)(2)(i)(B), has been proposed to place the probe inlet as close as possible to 5 to 10 centimeters from the ground surface to the top of the vegetation to prevent flame out of the flame ionization detector.

(3) An alternate procedure, per 40 CFR 60.752(b)(2)(i)(B), has been proposed to determine the net heating value of the flare control inlet using U.S. EPA Method 3C, 40 CFR 60, Appendix A, instead of U.S. EPA Method 18 and ASTM D946-77 or ASTM D946-90.

iii. The GCCS design plan shall either conform with specifications for active collection systems in 40 CFR 60.759 or include a demonstration of alternative provisions to 40 CFR 60.759 per approval from the Ohio EPA.

NSPS, Subpart WWW - GCCS Requirements

2.l The permittee shall install a GCCS that captures the generated landfill gas within 30 months after the first annual report in which the NMOC emission rate equals or exceeds 50 Mg/yr (by April 7, 2005), as specified in the following requirements for an active collection system, as specified in 40 CFR Part 60.752(b)(2)(ii)(A):

i. The system shall be designed to handle the maximum expected gas flow rate from the entire area of the landfill that warrants control over the intended use period of the gas control or treatment system equipment.

ii. The system shall collect gas from each area, cell, or group of cells in the landfill in which the initial waste has been placed for a period of 5 years or more if active, or 2 years or more if closed or at final grade.

iii. The system shall collect gas at a sufficient extraction rate.

iv. The system shall be designed to minimize off-site migration of subsurface gas.

2.m The collected gas shall be vented to an open flare designed and operated as follows, in accordance with requirements specified in 40 CFR Part 60.18:

i. The flare shall be designed for and operated with no visible emissions, except for periods not to exceed a total of 5 minutes during any 2 consecutive hours.

ii. The flare shall be operated with a flame present at all times.

iii. The net heating value of the gas being combusted in the non-assisted flare shall be 7.45 MJ/scm (200 Btu/scf) or greater.

iv. The exit velocity for a non-assisted flare shall be less than 18.3 m/sec (60 ft/sec), except under the following condition(s):

a. the exit velocity may be equal to or greater than 18.3 m/sec (60 ft/sec) but less than 122 m/sec (400 ft/sec) if the net heating value of the gas being combusted is greater than 37.3 MJ/scm (1000 Btu/scf); or

b. the exit velocity, as determined by the methods specified in 40 CFR 60.18(f)(4) (or the method(s) specified in term A.V.4.), is less than the maximum permitted velocity, Vmax, as determined by the methods specified in 40 CFR 60.18(f)(5) (or the methods specified in term A.V.4.), and is less than 122 m/sec (400 ft/sec).

2.n If the permittee plans to route the collected gas to a treatment system that processes the collected gas for subsequent sale or use, all emissions from any atmospheric vent from the gas treatment system shall be subject to the requirements of 40 CFR 60.752(b)(2)(iii)(A) or (B).

2.o The collection and control system may be capped or removed provided that all of the following conditions, as specified in 40 CFR Part 60.752(b)(2)(v), are met:

i. the landfill shall be a closed landfill as defined in 40 CFR Part 258.60. A closure report shall be submitted to the Director as provided in 40 CFR 60.757(d);

ii. the collection and control system shall have been in operation a minimum of 15 years from when the first well was installed and put into operation; and

iii. following the procedures specified in 40 CFR 60.754(b), the calculated NMOC gas produced by the landfill shall be less than 50 Mg/yr on three successive test dates. The test dates shall be no less than 90 days apart, and no more than 180 days

apart.

Preventative Maintenance Malfunction Abatement Plan (PMMAP) Requirements

2.p The permittee is subject to the requirements of OAC rule 3745-31-01(VV)(1)(a)(vi). Each preventive maintenance and malfunction abatement plan shall be in writing and specify the following:

i. A comprehensive preventive maintenance program, including a description of the items or conditions that will be inspected, the frequency of these inspections or repairs, and an identification of the types and quantities of the replacement parts which will be maintained in inventory for quick replacement;

ii. An identification of the source and the operating outlet variables of the air pollution control equipment that will be monitored in order to detect an equipment failure, the normal operating range of these variables, and a description of the monitoring or surveillance procedures and of the method of informing operating personnel of any equipment failure, including alarm systems, lights and/or other indicators; and

iii. A description of the corrective procedures that will be taken in the event of an equipment failure in order to achieve compliance with any applicable law as expeditiously as practicable.

National Emission Standards for Hazardous Air Pollutants (NESHAP) for Municipal Solid Waste (MSW) Landfills, 40 CFR 63 Subpart AAAA Requirements

2.q The permittee shall comply with the requirements of 40 CFR 63.1955(b) and 40 CFR 63.1960 through 63.1980, as applicable, within 30 months after the first annual report in which the NMOC emissions rate equals or exceeds 50 Mg/yr (by April 7, 2005), as specified in 40 CFR 63.1945(e).

i. Compliance is determined in the same way it is determined for NSPS, Subpart WWW, including performance testing, monitoring of the collection system, continuous parameter monitoring, and other credible evidence. In addition, continuous parameter monitoring data, collected under 40 CFR 60.756(b)(1), (c)(1), and (d) of subpart WWW, are used to demonstrate compliance with the operating conditions for control systems. If a deviation occurs, the permittee has failed to meet the control device operating conditions described in NESHAP, Subpart AAAA and has deviated from the requirements of the NESHAP, Subpart AAAA.

ii. A deviation, as defined in 40 CFR 63.1990, means any instance in which an emissions unit, subject to the NESHAP, Subpart AAAA, or permittee of such an emissions unit:

(1) Fails to meet any requirement or obligation established by the NESHAP, Subpart AAAA, including, but not limited to, any emissions limitation (including any operating limit) or work practice standard;

(2) Fails to meet any term or condition that is adopted to implement an applicable requirement in the NESHAP, Subpart AAAA and that is included in the operating permit for any affected emissions unit, required to obtain such a permit; or

(3) Fails to meet any emission limitation, (including any operating limit), or work practice standard in the NESHAP, Subpart AAAA during SSM, regardless of whether or not such failure is permitted by this subpart.

iii. For the purposes of the landfill monitoring and SSM plan requirements, deviations include the following items:

(1) A deviation occurs when the control device operating parameters boundaries described in 40 CFR 60.785(C)(1), regarding enclosed combustor temperature and collected gas stream inlet location at a boiler or process heater, are exceeded.

(2) A deviation occurs when 1 hour or more of the hours during the 3-hour block averaging period does not constitute a valid hour of data. A valid hour of data must have measured values for at least three 15-minute monitoring periods within the hour. Averages are calculated in the same way as they are calculated in NSPS, Subpart WWW, except that the data collected during the events listed below are not to be included in any average computed under the NESHAP, Subpart AAAA:

i. Monitoring system breakdowns, repairs, calibration checks, and zero (low-level) and high-level adjustments;
ii. Startups;
iii. Shutdowns; and
iv. Malfunctions.

(3) A deviation occurs when a SSM plan is not developed, implemented, or maintained on site.

2.r The permittee shall comply with the NESHAP general provisions specified in 40 CFR Parts 63.1(a), 63.1(b), 63.1(e), 63.2, 63.4, 63.5(b), 63.6(e) operations and maintenance requirements including requirements for a Startup, Shutdown and Malfunction SSM Plan, 63.6(f), 63.10(b)(2)(i) through 63.10(b)(2)(v), 63.10(d)(5) malfunction reporting, 63.12(a) and 63.15.

i. As defined in 40 CFR 63.2, a malfunction means any sudden, infrequent, and not reasonably preventable failure of air pollution control and monitoring equipment, process equipment, or a process to operate in a normal or usual manner which causes, or has the potential to cause, the emission limitations in an applicable standard to be exceeded. Failures that are caused in part by poor maintenance or careless operation are not

malfunctions.

ii. By the compliance deadline and thereafter, the permittee must operate and maintain this emissions unit, including associated air pollution control equipment and monitoring equipment, at all times, including periods of startup, shutdown, and malfunction, in a manner consistent with safety and good air pollution control practices for minimizing emissions. During a period of startup, shutdown, or malfunction, this general duty to minimize emissions requires that the permittee reduce emissions from this emissions unit to the greatest extent which is consistent with safety and good air pollution control practices. The general duty to minimize emissions during a period of startup, shutdown, or malfunction does not require the permittee to achieve emission levels that would be required by the applicable standard at other times if this is not consistent with safety and good air pollution control practices, nor does it require the owner or operator to make any further efforts to reduce emissions if levels required by the applicable standard have been achieved. Determination of whether such operation and maintenance procedures are being used will be based on information available to the Ohio EPA which may include, but is not limited to, monitoring results, review of operation and maintenance procedures, including the startup, shutdown, and malfunction (SSM) plan required by 40 CFR 63.6(e)(3), review of operation and maintenance records, and inspection of this emissions unit.

iii. Malfunctions must be corrected as soon as practicable after their occurrence in accordance with the SSM plan required in 40 CFR 63.6 (e)(3). To the extent that an unexpected event arises during a startup, shutdown, or malfunction, an owner or operator must comply by minimizing emissions during such a startup, shutdown, and malfunction event consistent with safety and good air pollution control practices.

iv. Operation and maintenance requirements established pursuant to section 112 of the Clean Air Act are enforceable independent of emissions limitations or other requirements in relevant standards.

2.s The permittee must develop and implement a written SSM plan that describes, in detail, procedures for operating and maintaining the source during periods of startup, shutdown, and malfunction, and a program of corrective action for malfunctioning process and air pollution control and monitoring equipment used to comply with the relevant standard, NESHAP Subpart AAAA. The purpose of the SSM plan is to:

i. Ensure that, at all times, the permittee operates and maintains this emissions unit, including associated air pollution control and monitoring equipment, in a manner which satisfies the general duty to minimize emissions established by 40 CFR 63.6(e)(1)(i);

ii. Ensure that the permittee is prepared to correct malfunctions as soon as practicable after their occurrence in order to minimize excess emissions of hazardous air pollutants; and

iii. Reduce the reporting burden associated with periods of startup, shutdown, and

malfunction (including corrective action taken to restore malfunctioning process and air pollution control equipment to its normal or usual manner of operation).

2.t To satisfy the requirements of 40 CFR 63.6(e) to develop a SSM plan, the permittee may use the emissions unit's standard operating procedures (SOP) manual, or an Occupational Safety and Health Administration (OSHA) or other plan, provided the alternative plans meet all the requirements of 40 CFR 63.6(e) and are made available for inspection or submitted when requested by the Ohio EPA.

2.u Based on the results of a determination made under 40 CFR 63.6(e)(1)(i), the Ohio EPA may require that a permittee make changes to the SSM plan. The Ohio EPA must require appropriate revisions to the SSM plan, if the Ohio EPA finds that the plan:

i. Does not address a startup, shutdown, or malfunction event that has occurred;

ii. Fails to provide for the operation of the source (including associated air pollution control and monitoring equipment) during a startup, shutdown, or malfunction event in a manner consistent with the general duty to minimize emissions established by paragraph 40 CFR 63.6(e)(1)(i);

iii. Does not provide adequate procedures for correcting malfunctioning process and/or air pollution control and monitoring equipment as quickly as practicable; or

iv. Includes an event that does not meet the definition of startup, shutdown, or malfunction listed in 40 CFR 63.2.

2.v The permittee may periodically revise the SSM plan for this emissions unit as necessary to satisfy the requirements of 40 CFR 63.6(e) or to reflect changes in equipment or procedures at this emissions unit. Unless Ohio EPA provides otherwise, the permittee may make such revisions to the SSM plan without prior approval by the Ohio EPA. However, each such revision to SSM plan must be reported in the semiannual report required by 40 CFR 63.10(d)(5). If the SSM plan fails to address or inadequately addresses an event that meets the characteristics of a malfunction but was not included in the SSM plan at the time the permittee developed the plan, the permittee must revise the SSM plan within 45 days after the event to include detailed procedures for operating and maintaining this emissions unit during similar malfunction events and a program of corrective action for similar malfunctions of process or air pollution control and monitoring equipment. In the event that the permittee makes any revision to the SSM plan which alters the scope of the activities at this emissions unit which are deemed to be a startup, shutdown, or malfunction, or otherwise modifies the applicability of any emission limit, work practice requirement, or other requirement in the NESHAP, Subpart AAAA, the revised plan shall not take effect until after the permittee has provided a written notice describing the revision to the Ohio EPA.

2.w The Title V Operating Permit for this emissions unit must require that the permittee adopt a SSM plan which conforms to the provisions of 40 CFR 63.6(e), and that the permittee

operate and maintain this emissions unit in accordance with the procedures specified in the current SSM plan. However, any revisions made to the SSM plan in accordance with the procedures established by 40 CFR 63.6(e) shall not be deemed to constitute permit revisions under part 70 or part 71 of this chapter. Moreover, none of the procedures specified by the SSM plan for this emissions unit shall be deemed to fall within the permit shield provision in section 504(f) of the Clean Air Act.

2.x The permittee is no longer required to comply with the requirements of NESHAP, Subpart AAAA, when the control system may be removed as specified in 40 CFR 60.752(b)(2)(v).

II. Operational Restrictions

Regulated Asbestos Containing Material (RACM) Restriction(s)

1. The permittee shall not accept for disposal any NESHAP Regulated Asbestos Containing Material (RACM) as defined in the NESHAP for Asbestos, 40 CFR Part 61, Subpart M, section 141 amended November 20, 1990 or any subsequent revisions or as defined in any Environmental Protection Agency Interpretive Rules concerning the NESHAP Regulation for Asbestos. 40 CFR 61.141 defines RACM as "(a) Friable asbestos material, (b) Category I nonfriable asbestos containing material that has become friable, (c) Category I nonfriable asbestos containing material that will be or has been subjected to sanding, grinding, cutting or abrading, or (d) Category II nonfriable asbestos containing material that has a high probability of becoming or has become crumbled, pulverized, or reduced to powder by the forces expected to act on the material in the course of demolition or renovation operations regulated by this subpart." In addition, the permittee shall not accept for disposal any Category II nonfriable asbestos containing material. The receipt or disposal of any RACM without proper approval of the Ohio EPA is a violation of the NESHAP for Asbestos (40 CFR 61, Subpart M) and OAC Chapter 3745-20.

Open Burning Restriction

2. There shall be no open burning in violation of OAC Chapter 3745-19 at this facility.

NSPS, Subpart WWW - GCCS Requirements

3. The permittee shall operate the collection system such that gas is collected from each area, cell, or group of cells in the MSW landfill in which solid waste has been in place for 5 years or more if active, or for 2 years or more if closed or at final grade.

4. The permittee shall operate the collection system with negative pressure at each wellhead except under the following conditions:

a. A fire or increased well temperature. The permittee shall record instances when positive pressure occurs in efforts to avoid a fire.

b. Use of a geomembrane or synthetic cover. The permittee shall develop acceptable pressure limits in the design plan.

c. A decommissioned well. (A well may experience a static positive pressure after shutdown to accommodate for declining flows.) All design changes shall be approved by the Director of Ohio EPA.

5. The permittee shall operate each interior wellhead in the collection system with a landfill gas temperature less than 55 degrees Celsius (131 degrees Fahrenheit) and with either a nitrogen level less than 20% or an oxygen level less than 5%. The permittee may establish a higher operating temperature, nitrogen level, or oxygen level at a particular well. A higher operating value demonstration shall show supporting data that the elevated parameter does not cause fires or significantly inhibit anaerobic decomposition by killing methanogens.

6. The permittee shall operate the collection system such that all collected gases are vented to a control system designed and operated in compliance with 40 CFR 60.752(b)(2)(iii). In the event, the collection or control system is inoperable, the gas mover system shall be shut down and all valves in the collection and control system contributing to venting of the gas to the atmosphere shall be closed within one hour.

7. The permittee shall operate the flare control and associated equipment and any gas treatment system at all times when the collected gas is routed to the system.

8. A flame shall be maintained in the flare's burner at all times when the collected gas is routed to the control system.

NSPS, Subpart WWW - Landfill Surface Requirement(s)

9. The permittee shall operate the collection system so that the methane concentration is less than 500 parts per million above background at the surface of the landfill.

III. Monitoring and/or Record keeping Requirements

Regulated Asbestos Containing Material (RACM) Restriction(s)

1. For each day when the permittee deposits regulated asbestos containing material in the landfill, the permittee shall maintain a record of the type of regulated asbestos containing material deposited and the quantity, in lbs per day.

Fugitive Dust Control Measures

2. Except as otherwise provided in this section, the permittee shall perform inspections of the landfill fugitive dust operations/sources in accordance with the following frequencies:

landfill fugitive dust operations - minimum inspection frequency
MSW load-out -once during each day of operation;
MSW grading -once during each day of operation;
MSW compacting - once during each day of operation;
Soil load-in - once during each day of operation;

Soil load-out - once during each day of operation;
Soil grading - once during each day of operation; and
Soil compacting - once during each day of operation.

3. The purpose of the inspections is to determine the need for implementing the above-mentioned control measures for particulate emissions. The inspections shall be performed during representative, normal operating conditions. No inspection shall be necessary for a landfill fugitive dust operation/source that is covered with snow and/or ice or if precipitation has occurred that is sufficient for that day to ensure compliance with the above-mentioned applicable requirements. Any required inspection that is not performed due to any of the above identified events shall be performed as soon as such event(s) has (have) ended, except if the next inspection is within one week.

4. Notwithstanding the frequencies of the inspections specified in section A.III.2., the permittee may reduce the frequency for some or all of the operations associated with this emissions unit from daily to three days per week if the following conditions are met:

a. for one full quarter the permittee's inspections indicate no visible emissions; and

b. the permittee continues to comply with all the record keeping and monitoring requirements specified in sections A.III.2., A.III.3. and A.III.5.

5. The permittee shall maintain records of the following information:

a. An identification of the landfill fugitive dust operation;

b. The date and reason any required inspection was not performed;

c. The date of each inspection where it was determined by the permittee that it was necessary to implement the control measure(s);

d. The dates the control measure(s) was (were) implemented; and

e. On a calendar quarter basis, the total number of days the control measure(s) was (were) implemented.

The information in Section A.III.5.d shall be kept separately for each landfill fugitive dust operation identified above, and shall be updated on a calendar quarter basis within 30 days after the end of each calendar quarter.

<u>Fugitive Dust Operations Records</u>

6. The permittee shall record the actual operating hours of vehicles employed in the application of a soil cover on the day's receipt of MSW, $HR_{SOIL\ COVER}$, on a monthly basis.

7. The permittee shall estimate the actual tons of soil, $ton_{SOIL\ LOAD\text{-}IN}$, that is loaded into vehicles for construction support, on a daily basis.

8. The permittee shall record the actual operating hours of vehicles employed in soil compacting operations, $HR_{SOIL_COMPACTING}$, on a daily basis.

NSPS, Subpart WWW - GCCS Requirements

9. For the active gas collection system, the permittee shall install a sampling port and a thermometer, or other temperature measuring device, or an access port for temperature measurements at each wellhead and record the following information on a monthly basis:

a. the gauge pressure in the gas collection header at each individual well;

b. the nitrogen or oxygen concentration in the landfill gas; and

c. the temperature of the landfill gas.

10. If the permittee seeks to install a collection system that does not meet the specifications for active collection systems in 40 CFR 60.759 or seeking to monitor alternative parameters to those required by 40 CFR 60.753 through 40 CFR 60.756 shall provide information satisfactory to the Ohio EPA as provided in 60.752(2)(i)(B) and (C) describing the design and operation of the collection system, the operating parameters that would indicate proper performance, and appropriate monitoring procedures. The Ohio EPA may specify additional appropriate monitoring procedures.

11. The permittee shall install, calibrate, maintain, and operate according to the manufacturer's specifications the following equipment:

a. a heat sensing device, such as an ultraviolet beam sensor or thermocouple, at the pilot light or the flame itself to indicate the continuous presence of a flame; and

b. a gas flow rate measuring device that shall record the flow to the flare at least every 15 minutes.

12. The pemittee shall properly install, operate, and maintain a device to continuously monitor the flare flame when the emissions unit is in operation. The monitoring device and any recorder shall be installed, calibrated, operated and maintained in accordance with the manufacturer's recommendations, instructions and operating manuals. The permittee shall record the following information each day:

a. all periods during which there was no flare flame;

b. the downtime for the flare and monitoring equipment when the collection and control

system is in operation.

NSPS, Subpart WWW - Landfill Surface Requirements

13. The permittee shall monitor and record, surface concentrations of methane on a quarterly basis as follows:

a. Monitor surface concentrations of methane along the entire perimeter of the collection area and along a serpentine pattern spaced 30 meters apart (or a site- specific established spacing that ensures equivalent coverage) for each collection area and where visual observations indicate elevated concentrations of landfill gas, such as distressed vegetation and cracks or seeps in the cover. Areas with steep slopes or other dangerous areas may be excluded from the surface monitoring.

b. The background concentration shall be determined by moving the probe inlet upwind and downwind outside the boundary of the landfill at a distance of at least 30 meters from the perimeter wells.

c. Surface emission monitoring shall be performed in accordance with section 4.3.1 of Method 21 of Appendix A of 40 CFR Part 60, except that the probe inlet shall be placed within 5 to 10 centimeters of the ground. Monitoring shall be performed during typical meteorological conditions. (An alternate monitoring procedure, per 40 CFR 60.752(b)(2)(i)(B), has been proposed to place the probe inlet as close as possible to 5 to 10 centimeters from the ground surface to the top of the vegetation to prevent flame out of the flame ionization detector.)

d. Any reading of 500 parts per million or more above background at any location shall be recorded as a monitored exceedance and the actions specified below shall be taken. As long as the specified actions are taken, the exceedance is not a violation of the operational requirements listed in 40 CFR 60.753(d) (see section A.II.9.):

i. The location of each monitored exceedance shall be marked and the location recorded.

ii. Cover maintenance or adjustments to the vacuum of the adjacent wells to increase the gas collection in the vicinity of each exceedance shall be made and the location shall be re-monitored within 10 calendar days of detecting the exceedance.

iii. If the re-monitoring of the location shows a second exceedance, additional corrective action shall be taken and the location shall be monitored again within 10 days of the second exceedance. If the re-monitoring shows a third exceedance for the same location, a new well or other collection device shall be installed within 120 calendar days of the initial exceedance. An alternative remedy to the exceedance, such as upgrading the blower, header pipes or control device , and a corresponding time line for installation may be submitted to the Ohio EPA for approval. No further monitoring of that location is required until the action specified has been taken.

iv. Any location that initially showed an exceedance but has a methane concentration less than 500 ppm methane above background at the 10-day re-monitoring specified above shall be re-monitored 1 month from the initial exceedance. If the 1-month re-monitoring shows a concentration less than 500 parts per million above background, no further monitoring of that location is required until the next quarterly monitoring period. If the 1- month re-monitoring shows an exceedance, the actions specified above shall be taken.

14. The permittee shall conduct landfill surface testing (monitoring) around the perimeter of the collection area along a pattern that traverses the landfill at 30-meter intervals and where visual observations indicate elevated concentrations of landfill gas, such as distressed vegetation and cracks or seeps in the cover.

15. Any closed landfill that has no monitored exceedances of the operational standard in three consecutive quarterly monitoring periods may skip to annual monitoring and record keeping. Any methane reading of 500 ppm or more above background detected during the annual monitoring returns the frequency for that landfill to quarterly monitoring and record keeping.

<u>NSPS, Subpart WWW - Other Record Keeping Requirements</u>

16. The permittee shall keep for at least 5 years, up-to-date, readily accessible, on-site records of the maximum design capacity of the landfill, the current amount of solid waste in-place, and the year-to-year waste acceptance rate. (The design capacity report, completed on November 7, 2002, triggers the requirements of 40 CFR 60.752(b).) Off-site records may be maintained if they are retrievable within 4 hours. Either paper copy or electronic formats are acceptable.

17. The permittee shall maintain information, as specified below for the life of the control equipment as measured during the initial performance test or compliance demonstration. Records of subsequent tests or monitoring shall be maintained for a minimum of 5 years. Records of the control device vendor specifications shall be maintained until removal.

a. the maximum expected gas generation flow rate as calculated in 40 CFR 60.755(a)(1) and as specified in section A.V.2.;

b. the density of wells, horizontal collectors, surface collectors, or other gas extraction devices determined using the procedures specified in 40 CFR Part 60.759(a)(1);

c. the open flare type (i.e., steam-assisted, air-assisted, or non-assisted), all visible emission readings, heat content determinations of the gas; flow rate or bypass flow rate measurements; and exit velocity determinations made during the performance test as specified in 40 CFR Part 60.18; and continuous records of the flare pilot flame or flare

flame monitoring and records of all periods of operations during which the flare pilot flame or flare flame is absent; and

d. Where the permittee may seek to demonstrate compliance with 40 CFR 60.752(b)(2)(iii)(B)(1) through the use of a boiler or process heater of any size: a description of the location at which the collected gas vent stream is introduced into the boiler or process heater over the same time period for the performance testing.

18. The permittee shall maintain, for the life of the collection system, an up-to-date, readily accessible plot map showing each existing and planned collector (extraction well) in the system and providing a unique identification location label for each collector.

Preventative Maintenance Malfunction Abatement Plan (PMMAP) Requirements

19. The PMMAP, submitted on April 10, 2003 and revised on August 13, 2003, requires that the permittee collect and record the following information:

i. a copy of the current PMMAP and previous revisions shall be kept on-site;

ii. a record of the inspections and maintenance work as specified in the maintenance checklist(s) for the GCCS operational systems: the gas collection (extraction) system, the condensate removal system, the landfill gas blowers (movers), the flare and associated equipment;

iii. a record of the following information for each malfunction/equipment breakdown incident of any GCCS component shall be maintained on a daily basis;

i. date and time of the incident;
ii. duration of the incident;
iii. identification of equipment and the malfunction/equipment breakdown cause(s);
iv. the corrective action(s) employed; and
v. a declaration of whether the malfunction resulted in excess air contaminant emissions to the atmosphere.

NESHAP, Subpart AAAA Requirements

20. When actions taken by the permittee during a startup, shutdown, or malfunction (including actions taken to correct a malfunction) are consistent with the procedures specified in the SSM plan, the permittee must keep records for that event which demonstrate that the procedures specified in the plan were followed. These records may take the form of a "checklist," or other effective form of record keeping that confirms conformance with the SSM plan for that event. In addition, the permittee must keep records of these events as specified in 40 CFR 63.10(b), including records of the occurrence and duration of each startup, shutdown, or malfunction of operation and each malfunction of the air pollution control and monitoring equipment. Furthermore, the permittee shall confirm that actions taken during the relevant reporting period during periods of startup, shutdown, and malfunction were consistent with the SSM plan in the semiannual SSM report required in 40 CFR 63.10(d)(5).

21. If an action taken by the permittee during a startup, shutdown, or malfunction (including an action taken to correct a malfunction) is not consistent with the procedures specified in the SSM plan, and the emissions unit exceeds any applicable emission limitation in the relevant emission standard, then the permittee must record the actions taken for that event and must report such actions within 2 working days after commencing actions inconsistent with the plan, followed by a letter within 7 working days after the end of the event, in accordance with 40 CFR 63.10(d)(5) (unless the permittee makes alternative reporting arrangements, in advance, with the Ohio EPA).

22. The permittee must maintain at the facility location a current SSM plan and must make the plan available upon request for inspection and copying by the Ohio EPA. In addition, if the SSM plan is subsequently revised as provided in 40 CFR 63.6(e)(3)(viii), the permittee must maintain at the facility location each previous (i.e., superseded) version of the SSM plan, and must make each such previous version available for inspection and copying by the Ohio EPA for a period of 5 years after revision of the plan. If at any time after adoption of a SSM plan this emissions unit ceases operation or is otherwise no longer subject to the provisions of this part, the permittee must retain a copy of the most recent plan for 5 years from the date the emissions unit ceases operation or is no longer subject to the NESHAP, Subpart AAAA and must make the plan available upon request for inspection and copying by the Ohio EPA. The Ohio EPA may at any time request in writing that the permittee submit a copy of any SSM plan (or a portion thereof) which is maintained at the facility or in the possession of the permittee. Upon receipt of such a request, the permittee must promptly submit a copy of the requested plan (or a portion thereof) to the Ohio EPA. The Ohio EPA must request that the permittee submit a particular SSM plan (or a portion thereof) whenever a member of the public submits a specific and reasonable request to examine or to receive a copy of that plan or portion of a plan. The permittee may elect to submit the required copy of any SSM plan to the Ohio EPA in an electronic format. If the permittee claims that any portion of such a SSM plan is confidential business information entitled to protection from disclosure under section 114(c) of the Clean Air Act or 40 CFR 2.301, the material which is claimed as confidential must be clearly designated in the submission.

IV. Reporting Requirements

Regulated Asbestos Containing Material (RACM) Restriction(s)

1. The permittee shall submit quarterly deviation reports that each instance in which regulated asbestos containing material was deposited in the landfill.

Fugitive Dust Control Measures & Estimated Emissions Rate Report

2. The permittee shall submit quarterly deviation (excursion) reports that identify all of the following occurrences:

a. each day during which an inspection was not performed by the required frequency, excluding an inspection which was not performed due to an exemption for snow and/or ice cover or precipitation; and

b. each instance when a control measure, that was to be implemented as a result of an inspection, was not implemented.

3. The permittee shall submit annual reports which specify the PE rate from this emissions unit for the previous calendar year, in tons/year. These reports shall be submitted by April 15 of each year. The fee emission report submittal, required by OAC rule 3745-77-07(A)(8) and OAC rule 3745-78, will fulfill the requirements of this permit term.

NSPS, Subpart WWW - GCCS & Landfill Surface Requirements

4. The permittee shall submit quarterly deviation (excursion) reports that identify the date, location (gas collection well number or landfill surface point) if applicable, the value, and duration, of all of the following occurrences:

a. any record which indicates that the nitrogen or oxygen concentration in any landfill gas collection well was greater than 20 percent or 5 percent, respectively; unless otherwise specified in a design plan approved by the Ohio EPA;

b. any record which indicates that the gauge pressure in any gas collection well was positive;

c. any record which indicates that indicates the temperature of the landfill gas in any gas collection well was greater than 55 degrees Celsius (131 degrees Fahrenheit);

d. any record which indicates that the landfill surface concentration of methane was greater than 500 parts per million above background; and

e. all periods during which the flare pilot flame or main flame was not operating for a period of time exceeding one hour.

The quarterly deviation reports shall be submitted in accordance with the reporting requirements of the General Terms and Conditions of this permit, except as otherwise specified.

5. The permittee shall submit annual reports which include the following:

a. a summary of all deviations (excursions) identified in section A.IV.4., as well as the following data for each excursion:

i. the probable cause of the deviation; and
ii. the date and description of any corrective actions or preventative measures taken.

b. all periods when the collection system was not operating in excess of 5 days;

c. any record indicating the date of installation and the location of each well or collection system expansion added pursuant to paragraphs (a)(3), (b), and (c)(4) of 40 CFR 60.755;

and

d. the descriptions and durations of all periods when the control device was not operating for a period exceeding one hour and the length of time the control device was not operating.

The initial report shall be submitted within 180 days of the GCCS startup. Thereafter these reports shall be submitted by January 31 of each year. However, by the compliance deadline for NESHAP, Subpart AAAA, these GCCS deviation reports shall be submitted by January 31 and July 31 of each year, for the previous six calendar months.

NSPS, Subpart WWW - GCCS & Landfill Information to be Submitted with Initial Performance Test

6. The permittee shall submit the following information with the initial performance test report required pursuant to 40 CFR 60.757(g):

a. a diagram of the collection system showing collection system positioning including all wells, horizontal collectors, surface collectors or other gas extraction devices, including the locations of any areas excluded from collection and the proposed sites for the future collection system expansion;

b. the data upon which the sufficient density of wells, horizontal collectors, surface collectors, or other gas extraction devices and the gas mover equipment sizing are based;

c. the documentation of the presence of asbestos or nondegradable material for each area from which collection wells have been excluded based on the presence of asbestos or nondegradable material;

d. the sum of the gas generation flow rates for all areas from which collection wells have been excluded based on non-productivity and the calculations of gas generation flow rate for each excluded area; and

e. the provisions for increasing gas mover equipment capacity with increased gas generation flow rate, if the present gas mover equipment is inadequate to move the maximum flow rate expected over the life of the landfill; and

f. the provisions for the control of off-site migration.

The initial performance test report and the information required in section A.IV.6. shall be submitted within 180 days of the GCCS startup.

NSPS, Subpart WWW - GCCS & Landfill Closure Requirements

7. The permittee shall submit a closure report to the Northeast District Office of the Ohio EPA within 30 days of waste acceptance cessation. The Ohio EPA may request additional information as may be necessary to verify that permanent closure has taken place in accordance with the requirements of 40 CFR Part 258.60. If a closure report has been submitted to the Ohio EPA, no additional wastes may be placed into the landfill without filing a notification of modification as

described in 40 CFR Part 60.7(a)(4).

8. The permittee shall submit an equipment removal report to the Northeast District Office of the Ohio EPA 30 days prior to removal or cessation of operation of the control equipment. The equipment removal report shall contain the information specified in 40 CFR Part 60.757(e)(1). The Ohio EPA may request additional information as may be necessary to verify that all of the conditions for removal in 40 CFR Part 60.752(b)(2)(v), specified in section A.I.2.o., have been met.

Preventative Maintenance Malfunction Abatement Plan (PMMAP) Requirements

9. Notification must be made to Northeast District Office within 24 hours after any of the following conditions occurs via telephone or telefax:

a. a malfunction/equipment breakdown incident such that process equipment, control equipment or related equipment breaks down or fails in such a manner to cause odors that may contribute to a nuisance, the allowable levels specified in section A.I.1. or the requirements in section A.I.2., if the malfunction/equipment breakdown lasts for five (5) or more hours;

b. a malfunction/equipment breakdown, that lasted five or more hours, has been corrected and the equipment is operational again; and

c. actions are taken during a malfunction/equipment breakdown that are not consistent with the current PMMAP.

10. The permittee shall submit quarterly deviation (excursion) reports to the Northeast District Office. If no malfunctions/equipment breakdowns occurred during a calendar quarter, the permittee shall submit a quarterly report, which states that no deviations occurred during that quarter. These reports shall contain the following information for each malfunction/equipment breakdown incident:

a. date;
b. commencement time, completion time and duration;
c. an identification of the process equipment and/or control equipment affected by the malfunction/equipment breakdown;
d. the corrective actions taken (if any);
e. whether the actions taken were consistent with the procedures specified in the PMMAP or not; and
f. If applicable, the reasons why the PMMAP procedures were not followed.

NESHAP, Subpart AAAA Requirements

11. By the compliance deadline for NESHAP, Subpart AAAA, the GCCS semi-annual deviation reports, as required in section A.IV.4., shall be submitted by January 31 and July 31 of each year, for the previous six calendar months.

12. PERIODIC (SEMI-ANNUAL) SSM REPORTS. If actions taken by an owner or operator during a startup, shutdown, or malfunction of an affected source (including actions taken to correct a malfunction) are consistent with the procedures specified in the source's startup, shutdown, and malfunction plan [see 40 CFR 63.6(e)(3)], the owner or operator shall state such information in a startup, shutdown, and malfunction report. Such a report shall identify any instance where any action taken by an owner or operator during a startup, shutdown, or malfunction (including actions taken to correct a malfunction) is not consistent with the affected source's startup, shutdown, and malfunction plan, but the source does not exceed any applicable emission limitation in the relevant emission standard. Such a report shall also include the number, duration, and a brief description for each type of malfunction which occurred during the reporting period and which caused or may have caused any applicable emission limitation to be exceeded. Reports shall only be required if a startup, shutdown, or malfunction occurred during the reporting period. The startup, shutdown, and malfunction report shall consist of a letter, containing the name, title, and signature of the owner or operator or other responsible official who is certifying its accuracy, that shall be submitted to Ohio EPA semiannually (or on a more frequent basis if specified otherwise in a relevant standard or as established otherwise by the Ohio EPA in the facility's title V permit). The SSM report shall be delivered or postmarked by the 30th day following the end of each calendar half (or other calendar reporting period, as appropriate). If the owner or operator is required to submit excess emissions and continuous monitoring system performance (or other periodic) reports under this part, the SSM reports required under this paragraph may be submitted simultaneously with the excess emissions and continuous monitoring system performance (or other) reports. If SSM reports are submitted with excess emissions and continuous monitoring system performance (or other periodic) reports, and the permittee receives approval to reduce the frequency of reporting for the latter under paragraph (e) of this section, the frequency of reporting for the SSM reports also may be reduced if the Ohio EPA does not object to the intended change. The procedures to implement the allowance in the preceding sentence shall be the same as the procedures specified in 40 CFR 63.6(e)(3).

13. IMMEDIATE SSM REPORTS. Notwithstanding the allowance to reduce the frequency of reporting for periodic SSM reports under 40 CFR 63.6(d)(5)(i) of this section, any time an action taken by the permittee during a startup, shutdown, or malfunction (including actions taken to correct a malfunction) is not consistent with the procedures specified in the SSM plan, and the emissions unit exceeds any applicable emission limitation in the relevant emission standard, the permittee shall report the actions taken for that event within 2 working days after commencing actions inconsistent with the plan followed by a letter within 7 working days after the end of the event. The immediate report required by 40 CFR 63.10(d)(5)(ii) shall consist of a telephone call (or facsimile (FAX) transmission) to the Ohio EPA within 2 working days after commencing actions inconsistent with the plan, and it shall be followed by a letter, delivered or postmarked within 7 working days after the end of the event, that contains the name, title, and signature of the permittee or other responsible official who is certifying its accuracy, explaining the circumstances of the event, the reasons for not following the SSM plan, and describing all excess emissions and/or parameter monitoring exceedances which are believed to have occurred. The permittee

may make alternative reporting arrangements, in advance, with the Ohio EPA. Procedures governing the arrangement of alternative reporting requirements in 40 CFR 63.10(d)(5)(ii) are specified in 40 CFR 63.9(i).

V. Testing Requirements

1. Compliance with the emissions limitation(s) in Section A.I.1. of these terms and conditions shall be determined in accordance with the following methods(s):

a. Emission Limitation: Visible fugitive PE shall not exceed 10% opacity, as a 6-minute average, from the MSW loadout, MSW grading, MSW compacting, soil cover over MSW, soil load-in, soil load-out, soil grading and soil compacting operations.

Applicable Compliance Method: If required, compliance shall be demonstrated through visible emission observations performed in accordance with 40 CFR Part 60, Appendix A, Method 9, as such Appendix existed on July 1, 2002, and the modifications listed in paragraphs (B)(3)(a) and (B)(3)(b) of OAC rule 3745-17-03.

b. Emission Limitation: No visible PE from the flare egress, except for periods not to exceed a total of 5 minutes during any 2 consecutive hours.

Applicable Compliance Method: Compliance shall be demonstrated through visible emission observations performed in accordance with 40 CFR Part 60, Appendix A, Method 22, and procedures specified in 40 CFR Part 60.18.

c. Emission Limitation: 85.1 TPY of fugitive PE, excluding stack PE from flare egress.

Applicable Compliance Method: Compliance may be based upon the following methods:

i. Determination of the potential PE rate from MSW load-out operations may be based on t he following equation(s):

$PE_{MSW_LOAD\text{-}OUT} = EF_{UNCTRL_PE}$ x ton_{MSW}/yr x ton PE/2000 lb PE x (100 - CE)/100.
$EF_{UNCTRL_PE} = k \times 0.0032 \times (U/5)^{1.3}/(M/2)^{1.4}$.
where:
$PE_{MSW_LOAD\text{-}OUT}$ = PE rate from MSW load-out operations when control measures are employed, which is 0.09 ton PE/yr.
EF_{UNCTRL_PE} = emissions factor for uncontrolled PE, (AP-42) Compilation of Air Pollutant Emission Factors, Vol. I, Fifth Ed., U.S. Environmental Protection Agency, Office of Air & Radiation, Office of Air Quality Planning and Standards, Research Triangle Park, NC. AP-42 Eq. 1, Chap. 13.2.4 (1/95), which is 0.0005 lbs PE_{UNCTRL}/ton_{MSW}.
k = particle size multiplier, usually 1 for total PE.
U = mean wind speed, which is 10 miles per hour.
M = material moisture content, which is 15 percent.
ton_{MSW}/yr = the maximum tons per year of MSW that is loaded out from haul

trucks, 468,000 ton_{MSW}/yr, which is derived from the Authorized Maximum Daily Waste Receipt (AMDWR) rate of 1,500 ton_{MSW}/day multiplied by a 312 day/year schedule to accept waste, as permitted by the operating licence.

CE = control (measure) efficiency, in percent, which is 25% for maintaining a low drop height, (Ohio RACM) Reasonably Available Control Measures for Fugitive Dust Sources, Ohio Environmental Protection Agency, Office of Air Pollution Control, Division of Engineering, Columbus, OH, September, 1980; Ohio RACM Table 2.1.2-8 (9/80).

ii. Determination of the potential PE rate from MSW grading operations may be based on the following equation(s):

$PE_{MSW_GRADING}$ = EF_{UNCTRL_PE} x $VMT_{MSW_GRADING}$ x $DAY_{MSW_GRADING}$/yr x ton PE/2000 lb PE .

EF_{UNCTRL_PE} = k x 0.040 x $S^{2.5}$ - CF.

where:

$PE_{MSW_GRADING}$ = PE rate from MSW grading operations, which is 0.06 ton PE/yr.

EF_{UNCTRL_PE} = emissions factor for uncontrolled PE, AP-42, Table 11.9-1, Chap. 11.9 (7/98), which is 0.040 lbs PE_{UNCTRL}/$VMT_{MSW_GRADING}$, maximum.

S = mean vehicle speed, which is 1 mile/hr, maximum.

CF = correction factor, EF adjustment rating as described in notes to AP-42, Table 13.2.3-1, Chap. 13.2.3 (1/95), which is 1 for a different equipment selection than noted in AP-42 Table 11.9-1.

$VMT_{MSW_GRADING}$ = vehicle miles traveled during MSW grading operations each day, which is 9.5 miles/day derived from the mean vehicle speed multiplied by the maximum operating hours of 9.5 hrs/day.

$DAY_{MSW_GRADING}$ = maximum operating days of vehicle employed in MSW grading operations, which is 312 days/year derived from the maximum operating schedule of 6 days/week multiplied by 52 weeks/year.

iii. Determination of the potential PE rate from MSW compacting operations may be based on the following equation(s):

$PE_{MSW_COMPACTING}$ = EF_{UNCTRL_PE} x $HR_{MSW_COMPACTING}$ x ton PE/2000 lbs PE .

EF_{UNCTRL_PE} = [k x (5.7 x $s^{1.2}$)/$M^{1.3}$] - CF.

where:

$PE_{MSW_COMPACTING}$ = PE rate from MSW compacting operations, which is 2.47 ton PE/yr.

EF_{UNCTRL_PE} = emissions factor for uncontrolled PE, AP-42, Table 11.9-1, Chap. 11.9 (7/98), which is 1.67 lbs $PE_{_UNCTRL}$/hr.
s = material silt content, which is 10 percent.
M = material moisture content, which is 15 percent.
CF = correction factor, EF adjustment rating as described in notes to AP-42, Table 13.2.3-1, Chap. 13.2.3 (1/95), which is 1 for a different equipment selection than noted in AP-42 Table 11.9-1.
$HR_{MSW_COMPACTING}$ = maximum operating hours per year of vehicle employed in MSW compacting operations, which 2,964 hrs/year derived from a 9.5 hours/day needed to compact 1500 ton_{MSW}/day multiplied by a 6 days/week x 52 weeks/schedule.

iv. Determination of the actual PE rate from soil cover handling operations may be based on the following equation(s):

$PE_{SOIL\ COVER} = EF_{UNCTRL_PE} \times HR_{SOIL\ COVER}$ x ton PE/2000 lbs PE.
$EF_{UNCTRL_PE} = [k \times (5.7 \times s^{1.2})/M^{1.3}] - CF$.
where:
$PE_{SOIL\ COVER}$ = the PE rate from soil cover operations, in ton PE/year.
EF_{UNCTRL_PE} = emissions factor for uncontrolled PE, AP-42, Table 11.9-1, Chap. 11.9 (7/98), in lbs PE/hr.
s = material silt content, which is 47 percent based on analysis of on-site samples.
M = material moisture content, which is 13 percent for on-site samples.
CF = correction factor, EF adjustment rating as described in notes to AP-42, Table 13.2.3-1, Chap. 13.2.3 (1/95), which is 2 for a different equipment selection than noted in AP-42 Table 11.9-1 and silt content is outside the range studied.
$HR_{SOIL\ COVER}$ = actual operating hours per year for vehicles employed in the application of a soil cover on the day's receipt of MSW, which is the sum of the monthly $HR_{SOIL\ COVER}$, as specified in the record keeping requirements of section A.III.6., for the calendar year.

v. Determination of the actual PE rate from soil load-in operations associated with construction support may be based on t he following equation(s):

$PE_{SOIL\ LOAD\text{-}IN} = EF_{UNCTRL_PE} \times ton_{SOIL\ LOAD\text{-}IN}$ x ton PE/2000 lbs PE x (1 - CE).
$EF_{UNCTRL_PE} = k \times 1.16/(M^{1.2})$.
where:
$PE_{SOIL\ LOAD\text{-}IN}$ = the PE rate from soil load-in operations associated with construction support, in ton PE/year.
EF_{UNCTRL_PE} = emissions factor for uncontrolled PE, AP-42, Table 11.9-1, Chap. 11.9 (7/98), which is 0.053 lbs $PE_{UNCTRL}/ton_{SOIL\ LOAD\text{-}IN}$.

k = particle size multiplier, usually 1 for total PE.

M = material moisture content, which is 13 percent for on-site samples.

$ton_{SOIL\ LOAD\text{-}IN}$ = actual tons of soil loaded into vehicles for cell construction activities each year, which is the sum of the daily $ton_{SOIL\ LOAD\text{-}IN}$, as specified in the record keeping requirements of section A.III.7., for the calendar year.

CE = control (measure) efficiency, which is 25 percent for maintaining a low drop height, Ohio RACM Table 2.1.2-8 (9/80).

vi. Determination of the potential PE rate from soil load-out operations associated with construction support may be based on t he following equation(s):

$PE_{SOIL\ LOAD\text{-}OUT} = EF_{UNCTRL_PE}$ x $ton_{SOIL\ LOAD\text{-}OUT}$ x ton PE/2000 lbs PE x (1 - CE).

$EF_{UNCTRL_PE} = k \times 0.0032 \times (U/5)^{1.3}/(M/2)^{1.4}$.

where:

$PE_{SOIL\ LOAD\text{-}IN}$ = the PE rate from soil load-in operations associated with construction support, which is 0.25 ton PE/year.

EF_{UNCTRL_PE} = emissions factor for uncontrolled PE, AP-42, Eq. 1, Chap. 13.2.4 (1/95), which is 0.0006 lbs $PE_{UNCTRL}/ton_{SOIL\ LOAD\text{-}OUT}$.

U = mean wind speed, which is 10 miles per hour.

M = material moisture content, which is 13 percent for on-site samples.

$ton_{SOIL\ LOAD\text{-}OUT}$ = maximum tons of soil loaded out of vehicles for cell construction activities each year, which is 1,095,000 $ton_{SOIL\ LOAD\text{-}OUT}$/year, derived from maximum of 2,000 cubic yards/day of soil loaded out multiplied by a soil density of 1.5 ton/cubic yard multiplied by a maximum operating schedule of 365 days/year.

CE = control (measure) efficiency, which is 25 percent for maintaining a low drop height, Ohio RACM Table 2.1.2-8 (9/80).

vii. Determination of the potential PE rate from soil grading operations associated with construction support may be based on t he following equation(s):

$PE_{SOIL_GRADING} = EF_{UNCTRL_PE}$ x $VMT_{SOIL_GRADING}$ x $DAY_{SOIL_GRADING}$/year

x ton PE/2000 lb PE x (1 - CE) .

EF_{UNCTRL_PE} = k x 0.040 x $S^{2.5}$ - CF.

where:

$PE_{SOIL_GRADING}$ = PE rate from soil grading operations associated with construction support, which is 0.26 ton PE/yr.

EF_{UNCTRL_PE} = emissions factor for uncontrolled PE, AP-42, Table 11.9-1, Chap. 11.9 (7/98), which is 0.040 lbs $PE_{UNCTRL}/VMT_{SOIL_GRADING}$, maximum.

S = mean vehicle speed, which is 1 mile/hr, maximum.

CF = correction factor, EF adjustment rating as described in notes to AP-42, Table 13.2.3-1, Chap. 13.2.3 (1/95), which is 1 for a different equipment selection than noted in AP-42 Table 11.9-1.

$VMT_{SOIL_GRADING}$ = vehicle miles traveled during soil grading operations each day, which is 36 miles/day, as a maximum derived from the mean vehicle speed multiplied by the maximum operating hours of 12 hrs/day multiplied by 3 vehicles per day.

$DAY_{SOIL_GRADING}$ = maximum operating days of vehicle employed in soil grading operations, which is 365 days/year.

viii. Determination of the actual PE rate from soil compacting operations associated with construction support may be based on the following equation(s):

$PE_{SOIL_COMPACTING}$ = EF_{UNCTRL_PE} x $HR_{SOIL_COMPACTING}$/year x ton PE/2000 lb PE x (1 - CE).

EF_{UNCTRL_PE} = [k x (5.7 x $s^{1.2}$)/$M^{1.3}$] - CF.

where:

$PE_{SOIL_COMPACTING}$ = PE rate from soil compacting operations associated with construction support, AP-42, Table 11.9-1, Chap. 11.9 (7/98), in ton PE/yr.

EF_{UNCTRL_PE} = emissions factor for uncontrolled PE, in lbs $PE_{_UNCTRL}$/hr.

s = material silt content, which is 47 percent based on analysis of on-site samples.

M = material moisture content, which is 13 percent for on-site samples.

CF = correction factor, EF adjustment rating as described in notes to AP-42, Table 13.2.3-1, Chap. 13.2.3 (1/95), which is 1 for a different equipment selection than noted in AP-42 Table 11.9-1.

$HR_{SOIL_COMPACTING}$ = actual operating hours of vehicle employed in soil compacting operations associated with construction support, which is the sum of the daily $HR_{SOIL_COMPACTING}$, as specified in the record keeping requirements of section A.III.8., for the calendar year.

CE = control (measure) efficiency, which is 50 percent for water spray application, Ohio RACM Table 2.1.3-3 (9/80).

ix. Determination of the total PE rate may be based on the following equation(s):

$$PE_{TOTAL} = PE_{MSW_LOAD\text{-}OUT} + PE_{MSW_GRADING} + PE_{MSW_COMPACTING} + PE_{SOIL_COVER} + PE_{SOIL\ LOAD\text{-}IN} + PE_{SOIL\ LOAD\text{-}OUT} + PE_{SOIL_GRADING} + PE_{SOIL_COMPACTING}.$$

NSPS, Subpart WWW - Maximum Gas Generation Flow Rate

2. The maximum expected gas generation flow rate, in cubic meters per year, shall be estimated using equation in 40 CFR 60.755(a)(1)(i) for sites with unknown year to year solid waste acceptance rates or the equation in 40 CFR 60.755(a)(1)(ii) for sites with known year to year solid waste acceptance rates.

   a. The GCCS design plan, prepared in August, 2003, states that the maximum gas generation flow rate was estimated to be 4.676×10^7 cubic meters/year, per the equation in 40 CFR 60.755(a)(1)(ii).

   b. Any revisions to the estimated maximum gas generation flow rate, as required by 40 CFR 60.757(g), after a GCCS has been installed, actual flow data may be used to project the maximum expected generation flow rate instead of, or in conjunction with, the equations in 40 CFR 60.755(a)(1). If the landfill is still accepting waste, the actual measured flow data will not equal the maximum expected gas generation rate, so calculations using the equations in 40 CFR 60.755(a)(1) or other methods shall be used to predict the maximum expected gas generation rate over the intended period of use of the gas control system equipment.

NSPS, Subpart WWW - GCCS Requirements

3. The composition of each gas collection well shall be determined as follows:

   a. The nitrogen level shall be determined using Method 3C of 40 CFR Part 60, Appendix A, unless an alternative test method is established as allowed by 40 CFR Part 60.752(b)(2)(i); or

   b. The oxygen level shall be determined by an oxygen meter using Method 3A of 40 CFR Part 60, Appendix A, unless an alternative test method is established as allowed by 40 CFR Part 60.752(b)(2)(i), except that:

      i. the span shall be set so that the regulatory limit is between 20% and 50% of the span;

      ii. a data recorder is not required;

iii. only two calibration gases are required, a zero and span, and ambient air may be used as the span;

iv. a calibration error check is not required; and

v. the allowable sample bias, zero drift, and calibration drift are plus or minus 10%.

NSPS, Subpart WWW - GCCS Requirements - Initial Flare Performance Test

4. The permittee shall conduct or have conducted, control device performance testing in accordance with the following requirements:

a. The initial performance testing shall be conducted within 150 days after the startup of the GCCS. For any subsequent flare replacements the performance testing shall be conducted within 90 days of installation.

b. A performance test shall be conducted to demonstrate compliance with the flare control requirements specified in 40 CFR 60.18.

c. The following test method(s) shall be employed to demonstrate compliance with the requirement(s):

i. No visible PE, except no more than 5 minutes during any 2 consecutive hours - Method 22 of 40 CFR Part 60, Appendix A.

ii. The presence of a flare pilot flame shall be monitored using a thermocouple or any other equivalent device to detect the presence of a flame.

iii. The net heating value of the gas being combusted in the non-assisted flare shall be 7.45 MJ/scm (200 Btu/scf) or greater, using methods specified in 40 CFR Part 60.18.(f)(3). An alternate procedure, per 40 CFR 60.752(b)(2)(i)(B), has been proposed to determine the concentration of sample components of the flare control inlet stream using U.S EPA Method 3C of 40 CFR 60, Appendix A, instead of U.S. EPA Method 18 and ASTM D946-77 or ASTM D946-90.

iv. The exit velocity of a non-assisted flare must comply with the requirements in 40 CFR 60.18(c)(4).

(1) The actual exit velocity shall be determined by the volumetric flow rate, as determined by U.S. EPA Method 2, 2A, 2C or 2D, as appropriate, and divided by the unobstructed (free) cross sectional area of the flare tip.

(2) The maximum permitted velocity for a non-assisted flare, that complies with 40 CFR 60.18(c)(4)(iii) shall be determined by the equation in 40 CFR 60.18(f)(5).

Alternative U.S. EPA approved test methods may be used with prior approval from the Ohio EPA.

d. The test(s) shall be conducted while the emissions unit is operating at or near its maximum capacity, unless otherwise specified or approved by the Ohio EPA Northeast District Office.

e. Not later than 30 days prior to the proposed test date(s), the permittee shall submit an "Intent to Test" notification to the Ohio EPA Northeast District Office. The "Intent to Test" notification shall describe in detail the proposed test methods and procedures, the emissions unit operating parameters, the time(s) and date(s) of the test(s), and the person(s) who will be conducting the test(s). Failure to submit such notification for review and approval prior to the test(s) may result in the Ohio EPA District Office's refusal to accept the results of the emission test(s).

f. Personnel from the Ohio EPA Northeast District Office shall be permitted to witness the test(s), examine the testing equipment, and acquire data and information necessary to ensure that the operation of the emissions unit and the testing procedures provide a valid characterization of the emissions from the emissions unit and/or the performance of the control equipment.

g. A comprehensive written report on the results of the emissions test(s) shall be signed by the person or persons responsible for the tests and submitted to the Ohio EPA Northeast District Office within 30 days following completion of the test(s). The permittee may request additional time for the submittal of the written report, where warranted, with prior approval from the Ohio EPA Northeast District Office.

<u>NSPS, Subpart WWW - GCCS & Landfill Closure Requirements</u>

5. After the installation of a collection and control system in compliance with 40 CFR Part 60.755, the permittee shall calculate the NMOC emission rate for the purposes of determining when the system can be removed as provided in 40 CFR Part 60.752(b)(2)(v) in accordance with the equation and procedures specified in 40 CFR Part 60.754(b), (b)(1), and (b)(2). The permittee may use another method to determine landfill gas flow rate and NMOC concentration if the method has been approved by the Ohio EPA as provided in 40 CFR Part 60.752(b)(2)(i)(B).

VI. Miscellaneous Requirements

1. Pursuant to the authority in OAC rule 3745-77-07(C)(2) or ORC section 3704.03(L), any representative of the Director may, upon presentation of proper identification, enter at any reasonable time upon any portion of the property where this landfill is located, including

any improvements thereon, to make inspections, take samples, conduct tests and examine records or reports pertaining to any emissions of air contaminants and any monitoring equipment, emissions control equipment or methods. No operator or agent of this landfill shall act in any manner to refuse, hinder, or thwart this legal right of entry.

2. No physical change or in method of operation is proposed. The application for PTI 02-18646 is a request to increase the particulate emissions (PE) rate for the landfill operations (F002) at the potential, controlled rates so that the project is an administrative modification of PTI 02-12039. A review of the recommendation for PTI 02-12039 indicates that only emissions from aggregate materials handling and wind erosion were considered. The application for PTI 02-18646 considers the air pollutant emissions from all landfill operations and requests a higher PE limit.

On March 26, 2001 a PTI exemption for an environmentally beneficial project, as defined in OAC rule 3745-31-01(VV)(1)(a)(vi), was given for the installation of a landfill gas collection and control system (GCCS) along the eastern portion of the landfill to alleviate odors, caused by non-methane organic compounds (NMOC). Expansion and operation of the GCCS to all gas producing parts of the landfill is required by the applicable federal rules, NSPS rule - Subpart WWW and MACT rule - Subpart AAAA.

B. State Only Enforceable Section

I. Applicable Emissions Limitations and/or Control Requirements

1. The specific operations(s), property, and/or equipment which constitute this emissions unit are listed in the following table along with the applicable rules and/or requirements and with the applicable emissions limitations and/or control measures. Emissions from this unit shall not exceed the listed limitations, and the listed control measures shall be specified in narrative form following the table.

Operations, Property, and/or Equipment	Applicable Rules/Requirements	Applicable Emissions Limitations/Control Measures
F002 - Municipal solid waste landfill with an active gas collection system and an open, non-assisted flare to control methane and non-methane organic compound (NMOC) emissions and odors - administrative modification of PTI 02-12039 issued on March 24, 1999.		Compliance with the Air Toxic Policy as specified in Section B.III.

2. Additional Terms and Conditions

2.a None.

II. Operational Restrictions

None.

III. Monitoring and/or Record keeping Requirements

1. Modeling to demonstrate compliance with the Ohio EPA's "Air Toxic Policy" was not necessary because the emissions unit's increase in maximum annual emissions for each toxic compound will be less than 1.0 ton. Modeling fugitive emissions from minor non-process sources is generally not necessary unless an there is a potential impact due to specific factors (i.e. source size, tons of emissions, particle size, pre-existing concerns, proximity to other sources or citizen populations). OAC Chapter 3745-31 requires a permittee to apply for and obtain a new or modified permit to

install prior to making a "modification" as defined by OAC rule 3745-31-01. The permittee is hereby advised that changes in the composition of the materials, or use of new materials, that would cause the emissions of any pollutant that has a listed threshold limit value (TLV) to increase to above 1.0 ton per year may require the permittee to apply for and obtain a new permit to install.

IV. Reporting Requirements

None.

V. Testing Requirements

None.

VI. Miscellaneous Requirements

None.