



**PERMIT**  
**Under the Environmental Conservation Law (ECL)**

**IDENTIFICATION INFORMATION**

Permit Type: Solid Waste Management  
Permit ID: 9-0438-00004/00004  
Effective Date: 01/09/2008                      Expiration Date: No expiration date

Permit Type: Air State Facility  
Permit ID: 9-0438-00004/00013  
Effective Date: 01/09/2008                      Expiration Date: No expiration date

Permit Issued To: INTEGRATED WASTE SYSTEMS INC  
7815 BUFFALO AVE  
NIAGARA FALLS, NY 14304

Contact: WILLIAM L HEITZENRATER  
INTEGRATED WASTE SYSTEMS INC  
7815 BUFFALO AVE  
NIAGARA FALLS, NY 14304  
(716) 283-7645

Facility: SOUTHERN TIER SOLID WASTE MANAGEMENT  
ST RTE 98  
FARMERSVILLE, NY 14060

Contact: WILLIAM L HEITZENRATER  
INTEGRATED WASTE SYSTEMS INC  
7815 BUFFALO AVE  
NIAGARA FALLS, NY 14304  
(716) 283-7645

Description:  
Construct and operate a solid waste management facility consisting of a 133.7 acre landfill for mixed municipal solid wastes, a drop-off center for waste and source-separated recyclables, a yard waste composting area, support and ancillary facilities, on approximately 217.54 acres of a 430 acre site. The landfill portion of the facility is authorized to have a waste receipt capacity of 3,000 tons per day (TPD), a design life of approximately 21.2 years and to serve a waste-shed within a 300 mile radius of Buffalo NY. The requested variances from regulatory standards at §360-2.13(d), Groundwater Separation, by substituting a pore water collection system; from §360-1.2(b)(66), Final Cover System, by placing an "interim" cover consisting of 12 inches of low permeability soil, and topsoil with a vegetative cover over those areas that reach final elevation when capping is not scheduled nor will waste be placed within 12 months, and from §360-13(q)(2)(iii) for the thickness of the barrier protection layer to be less than the required 24 inches in some locations (under downchutes and sideslope swales) are hereby granted with conditions (Solid Waste Management Permit Conditions Nos. 10 through 12).

**New York State Department of Environmental Conservation**  
**Facility DEC ID: 9043800004**



The discharge of fill into approximately 1.43 acres of Federally jurisdictional wetlands and 0.53 acres of pond habitat; creation of approximately 2.9 acres of new wetland and enhancement of existing wetland adjacent to the created wetland, for compensatory mitigation.

By acceptance of this permit, the permittee agrees that the permit is contingent upon strict compliance with the ECL, all applicable regulations, the General Conditions specified and any Special Conditions included as part of this permit.

Permit Administrator: STEVEN J DOLESKI  
DIVISION OF ENVIRONMENTAL PERMITS  
270 MICHIGAN AVE  
BUFFALO, NY 14203-2999

Authorized Signature: \_\_\_\_\_ Date: \_\_\_ / \_\_\_ / \_\_\_  
\_\_\_\_\_



**Notification of Other State Permittee Obligations**

**Item A: Permittee Accepts Legal Responsibility and Agrees to Indemnification**

The permittee expressly agrees to indemnify and hold harmless the Department of Environmental Conservation of the State of New York, its representatives, employees and agents ("DEC") for all claims, suits, actions, and damages, to the extent attributable to the permittee's acts or omissions in connection with the compliance permittee's undertaking of activities in connection with, or operation and maintenance of, the facility or facilities authorized by the permit whether in compliance or not in any compliance with the terms and conditions of the permit. This indemnification does not extend to any claims, suits, actions, or damages to the extent attributable to DEC's own negligent or intentional acts or omissions, or to any claims, suits, or actions naming the DEC and arising under article 78 of the New York Civil Practice Laws and Rules or any citizen suit or civil rights provision under federal or state laws.

**Item B: Permittee's Contractors to Comply with Permit**

The permittee is responsible for informing its independent contractors, employees, agents and assigns of their responsibility to comply with this permit, including all special conditions while acting as the permittee's agent with respect to the permitted activities, and such persons shall be subject to the same sanctions for violations of the Environmental Conservation Law as those prescribed for the permittee.

**Item C: Permittee Responsible for Obtaining Other Required Permits**

The permittee is responsible for obtaining any other permits, approvals, lands, easements and rights-of-way that may be required to carry out the activities that are authorized by this permit.

**Item D: No Right to Trespass or Interfere with Riparian Rights**

This permit does not convey to the permittee any right to trespass upon the lands or interfere with the riparian rights of others in order to perform the permitted work nor does it authorize the impairment of any rights, title, or interest in real or personal property held or vested in a person not a party to the permit.



**LIST OF CONDITIONS**

**DEC GENERAL CONDITIONS**

**General Provisions**

- Facility Inspection by the Department
- Relationship of this Permit to Other Department Orders and Determinations
  - Applications for permit renewals, modifications and transfers
  - Permit modifications, suspensions or revocations by the Department
  - Permit modifications, suspensions or revocations by the Department



**DEC GENERAL CONDITIONS**  
**\*\*\*\* General Provisions \*\*\*\***  
**GENERAL CONDITIONS - Apply to ALL Authorized Permits.**

**Condition 1: Facility Inspection by the Department**

**Applicable State Requirement: ECL 19-0305**

**Item 1.1:**

The permitted site or facility, including relevant records, is subject to inspection at reasonable hours and intervals by an authorized representative of the Department of Environmental Conservation (the Department) to determine whether the permittee is complying with this permit and the ECL. Such representative may order the work suspended pursuant to ECL 71-0301 and SAPA 401(3).

**Item 1.2:**

The permittee shall provide a person to accompany the Department's representative during an inspection to the permit area when requested by the Department.

**Item 1.3:**

A copy of this permit, including all referenced maps, drawings and special conditions, must be available for inspection by the Department at all times at the project site or facility. Failure to produce a copy of the permit upon request by a Department representative is a violation of this permit.

**Condition 2: Relationship of this Permit to Other Department Orders and Determinations**

**Applicable State Requirement: ECL 3-0301 (2) (m)**

**Item 2.1:**

Unless expressly provided for by the Department, issuance of this permit does not modify, supersede or rescind any order or determination previously issued by the Department or any of the terms, conditions or requirements contained in such order or determination.

**Condition 3: Applications for permit renewals, modifications and transfers**

**Applicable State Requirement: 6 NYCRR 621.11**

**Item 3.1:**

The permittee must submit a separate written application to the Department for renewal, modification or transfer of this permit. Such application must include any forms or supplemental information the Department requires. Any renewal, modification or transfer granted by the Department must be in writing.

**Item 3.2:**

The permittee must submit a renewal application at least 180 days before expiration of permits for Title V Facility Permits, or at least 30 days before expiration of permits for State Facility Permits.

**Item 3.3:**

Permits are transferrable with the approval of the department unless specifically prohibited by the statute, regulation or another permit condition. Applications for permit transfer should be submitted prior to actual transfer of ownership.



**Condition 4: Permit modifications, suspensions or revocations by the Department**  
**Applicable State Requirement: 6 NYCRR 621.13**

**Item 4.1:**

The Department reserves the right to modify, suspend, or revoke this permit in accordance with 6NYCRR Part 621. The grounds for modification, suspension or revocation include:

- a) materially false or inaccurate statements in the permit application or supporting papers;
- b) failure by the permittee to comply with any terms or conditions of the permit;
- c) exceeding the scope of the project as described in the permit application;
- d) newly discovered material information or a material change in environmental conditions, relevant technology or applicable law or regulations since the issuance of the existing permit;
- e) noncompliance with previously issued permit conditions, orders of the commissioner, any provisions of the Environmental Conservation Law or regulations of the Department related to the permitted activity.

**Condition 5: Permit modifications, suspensions or revocations by the Department**  
**Applicable State Requirement: 6 NYCRR 621.13**

**Item 5.1:**

The Department reserves the right to modify, suspend, or revoke this permit in accordance with 6NYCRR Part 621. The grounds for modification, suspension or revocation include:

- a) materially false or inaccurate statements in the permit application or supporting papers;
- b) failure by the permittee to comply with any terms or conditions of the permit;
- c) exceeding the scope of the project as described in the permit application;
- d) newly discovered material information or a material change in environmental conditions, relevant technology or applicable law or regulations since the issuance of the existing permit;
- e) noncompliance with previously issued permit conditions, orders of the commissioner, any provisions of the Environmental Conservation Law or regulations of the Department related to the permitted activity.

**New York State Department of Environmental Conservation**

Permit ID: 9-0438-00004/00013

Facility DEC ID: 9043800004



**Permit Under the Environmental Conservation Law (ECL)**

**ARTICLE 19: AIR POLLUTION CONTROL - AIR STATE FACILITY  
PERMIT**

**IDENTIFICATION INFORMATION**

Permit Issued To: INTEGRATED WASTE SYSTEMS INC  
7815 BUFFALO AVE  
NIAGARA FALLS, NY 14304

Facility: SOUTHERN TIER SOLID WASTE MANAGEMENT  
ST RTE 98  
FARMERSVILLE, NY 14060

Authorized Activity By Standard Industrial Classification Code:  
4953 - REFUSE SYSTEMS

Permit Effective Date: 01/09/2008  
date.

Permit Expiration Date: No expiration  
date.



## LIST OF CONDITIONS

### FEDERALLY ENFORCEABLE CONDITIONS

#### Facility Level

- 1 6 NYCRR 201-7.2: Facility Permissible Emissions
- 2 6 NYCRR 202-2.1: Compliance Demonstration
- 3 6 NYCRR 202-2.5: Recordkeeping requirements
- 4 6 NYCRR Subpart 231-2: Collection and Control System Installation Schedule
- 5 40CFR 63, Subpart A: General Provisions
- 6 40CFR 63.1955(b), Subpart AAAA: Compliance Demonstration
- 7 40CFR 63.1980(a), Subpart AAAA: Compliance Demonstration

#### Emission Unit Level

- 8 6 NYCRR 201-7.2: Emission Unit Permissible Emissions
- 9 6 NYCRR 201-7.2: Process Permissible Emissions

#### EU=U-000CU

- 10 6 NYCRR 201-7.2: Capping Monitoring Condition
- \*26 6 NYCRR 201-7.2: Capping Monitoring Condition
- 27 6 NYCRR 201-7.2: Capping Monitoring Condition
- \*28 6 NYCRR 201-7.2: Capping Monitoring Condition
- \*11 6 NYCRR 201-7.2: Compliance Demonstration
- \*12 6 NYCRR 201-7.2: Compliance Demonstration
- 13 40CFR 60.4, NSPS Subpart A: EPA Region 2 address.
- 14 40CFR 60.7(c), NSPS Subpart A: Compliance Demonstration
- 15 40CFR 60.8(a), NSPS Subpart A: Performance testing timeline.
- 16 40CFR 60.13(a), NSPS Subpart A: Compliance Demonstration
- 17 40CFR 60.13(b), NSPS Subpart A: Compliance Demonstration
- 18 40CFR 60.752, NSPS Subpart WWW: Compliance Demonstration
- 19 40CFR 60.753, NSPS Subpart WWW: Compliance Demonstration
- 20 40CFR 60.754, NSPS Subpart WWW: Compliance Demonstration
- 21 40CFR 60.755, NSPS Subpart WWW: Compliance Demonstration
- 22 40CFR 60.756, NSPS Subpart WWW: Compliance Demonstration
- 23 40CFR 60.757, NSPS Subpart WWW: Compliance Demonstration
- 24 40CFR 60.758, NSPS Subpart WWW: Compliance Demonstration
- 25 40CFR 60.759, NSPS Subpart WWW: Compliance Demonstration

### STATE ONLY ENFORCEABLE CONDITIONS

#### Facility Level

- 29 ECL 19-0301: Contaminant List
- 30 6 NYCRR 201-1.4: Unavoidable noncompliance and violations
- 31 6 NYCRR Subpart 201-5: Emission Unit Definition
- 32 6 NYCRR 211.2: Air pollution prohibited

#### Emission Unit Level

- 33 6 NYCRR Subpart 201-5: Emission Point Definition By Emission Unit
- 34 6 NYCRR Subpart 201-5: Process Definition By Emission Unit

NOTE: \* preceding the condition number indicates capping.



**FEDERALLY ENFORCEABLE CONDITIONS**  
**\*\*\*\* Facility Level \*\*\*\***

**NOTIFICATION OF GENERAL PERMITTEE OBLIGATIONS**

**This section contains terms and conditions which are federally enforceable. Permittees may also have other obligations under regulations of general applicability**

**Item A: Sealing - 6 NYCRR 200.5**

The Commissioner may seal an air contamination source to prevent its operation if compliance with 6 NYCRR Chapter III is not met within the time provided by an order of the Commissioner issued in the case of the violation.

Sealing means labeling or tagging a source to notify any person that operation of the source is prohibited, and also includes physical means of preventing the operation of an air contamination source without resulting in destruction of any equipment associated with such source, and includes, but is not limited to, bolting, chaining or wiring shut control panels, apertures or conduits associated with such source.

No person shall operate any air contamination source sealed by the Commissioner in accordance with this section unless a modification has been made which enables such source to comply with all requirements applicable to such modification.

Unless authorized by the Commissioner, no person shall remove or alter any seal affixed to any contamination source in accordance with this section.

**Item B: Acceptable Ambient Air Quality - 6 NYCRR 200.6**

Notwithstanding the provisions of 6 NYCRR Chapter III, Subchapter A, no person shall allow or permit any air contamination source to emit air contaminants in quantities which alone or in combination with emissions from other air contamination sources would contravene any applicable ambient air quality standard and/or cause air pollution. In such cases where contravention occurs or may occur, the Commissioner shall specify the degree and/or method of emission control required.

**Item C: Maintenance of Equipment - 6 NYCRR 200.7**

Any person who owns or operates an air contamination source which is equipped with an emission control device shall operate such device and keep it in a satisfactory state of maintenance and repair in accordance with ordinary and necessary practices, standards and procedures, inclusive of manufacturer's specifications,



required to operate such device effectively.

**Item D: Unpermitted Emission Sources - 6 NYCRR 201-1.2**

If an existing emission source was subject to the permitting requirements of 6 NYCRR Part 201 at the time of construction or modification, and the owner and/or operator failed to apply for a permit for such emission source then the following provisions apply:

- (a) The owner and/or operator must apply for a permit for such emission source or register the facility in accordance with the provisions of Part 201.
- (b) The emission source or facility is subject to all regulations that were applicable to it at the time of construction or modification and any subsequent requirements applicable to existing sources or facilities.

**Item E: Emergency Defense - 6 NYCRR 201-1.5**

An emergency constitutes an affirmative defense to an action brought for noncompliance with emissions limitations or permit conditions for all facilities in New York State.

(a) The affirmative defense of emergency shall be demonstrated through properly signed, contemporaneous operating logs, or other relevant evidence that:

- (1) An emergency occurred and that the facility owner and/or operator can identify the cause(s) of the emergency;
- (2) The equipment at the permitted facility causing the emergency was at the time being properly operated;
- (3) During the period of the emergency the facility owner and/or operator took all reasonable steps to minimize levels of emissions that exceeded the emission standards, or other requirements in the permit; and
- (4) The facility owner and/or operator notified the Department within two working days after the event occurred. This notice must contain a description of the emergency, any steps taken to mitigate emissions, and corrective actions taken.

(b) In any enforcement proceeding, the facility owner and/or operator seeking to establish the occurrence of an emergency has the burden of proof.



(c) This provision is in addition to any emergency or upset provision contained in any applicable requirement.

**Item F: Recycling and Salvage - 6 NYCRR 201-1.7**

Where practical, any person who owns or operates an air contamination source shall recycle or salvage air contaminants collected in an air cleaning device according to the requirements of 6 NYCRR.

**Item G: Prohibition of Reintroduction of Collected Contaminants to the Air - 6 NYCRR 201-1.8**

No person shall unnecessarily remove, handle, or cause to be handled, collected air contaminants from an air cleaning device for recycling, salvage or disposal in a manner that would reintroduce them to the outdoor atmosphere.

**Item H: Proof of Eligibility for Sources Defined as Exempt Activities - 6 NYCRR 201-3.2 (a)**

The owner and/or operator of an emission source or unit that is eligible to be exempt, may be required to certify that it operates within the specific criteria described in 6 NYCRR Subpart 201-3. The owner or operator of any such emission source must maintain all required records on-site for a period of five years and make them available to representatives of the Department upon request. Department representatives must be granted access to any facility which contains emission sources or units subject to 6 NYCRR Subpart 201-3, during normal operating hours, for the purpose of determining compliance with this and any other state and federal air pollution control requirements, regulations, or law.

**Item I: Proof of Eligibility for Sources Defined as Trivial Activities - 6 NYCRR 201-3.3 (a)**

The owner and/or operator of an emission source or unit that is listed as being trivial in 6 NYCRR Part 201 may be required to certify that it operates within the specific criteria described in 6 NYCRR Subpart 201-3. The owner or operator of any such emission source must maintain all required records on-site for a period of five years and make them available to representatives of the Department upon request. Department representatives must be granted access to any facility which contains emission sources or units subject to 6 NYCRR Subpart 201-3, during normal operating hours, for the purpose of determining compliance with this and any other state and federal air pollution control requirements, regulations, or law.

**Item J: Required Emission Tests - 6 NYCRR 202-1.1**



An acceptable report of measured emissions shall be submitted, as may be required by the Commissioner, to ascertain compliance or noncompliance with any air pollution code, rule, or regulation. Failure to submit a report acceptable to the Commissioner within the time stated shall be sufficient reason for the Commissioner to suspend or deny an operating permit. Notification and acceptable procedures are specified in 6 NYCRR Subpart 202-1.

**Item K: Visible Emissions Limited - 6 NYCRR 211.3**

Except as permitted by a specific part of this Subchapter and for open fires for which a restricted burning permit has been issued, no person shall cause or allow any air contamination source to emit any material having an opacity equal to or greater than 20 percent (six minute average) except for one continuous six-minute period per hour of not more than 57 percent opacity.

**Item L: Open Fires Prohibitions - 6 NYCRR 215.2**

Except as allowed by section 215.3 of 6 NYCRR Part 215, no person shall burn, cause, suffer, allow or permit the burning of any materials in an open fire.

**Item M: Permit Exclusion - ECL 19-0305**

The issuance of this permit by the Department and the receipt thereof by the Applicant does not and shall not be construed as barring, diminishing, adjudicating or in any way affecting any legal, administrative or equitable rights or claims, actions, suits, causes of action or demands whatsoever that the Department may have against the Applicant for violations based on facts and circumstances alleged to have occurred or existed prior to the effective date of this permit, including, but not limited to, any enforcement action authorized pursuant to the provisions of applicable federal law, the Environmental Conservation Law of the State of New York (ECL) and Chapter III of the Official Compilation of the Codes, Rules and Regulations of the State of New York (NYCRR). The issuance of this permit also shall not in any way affect pending or future enforcement actions under the Clean Air Act brought by the United States or any person.

**Item N: Federally Enforceable Requirements - 40 CFR 70.6 (b)**

All terms and conditions in this permit required by the Act or any applicable requirement, including any provisions designed to limit a facility's potential to emit, are enforceable by the Administrator and citizens under the Act. The Department has, in this permit, specifically designated any terms and conditions that are not required under the Act or under any of its applicable requirements as being enforceable under only state



regulations.

**FEDERAL APPLICABLE REQUIREMENTS**  
**The following conditions are federally enforceable.**

**Condition 1: Facility Permissible Emissions**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:6 NYCRR 201-7.2**

**Item 1.1:**

The sum of emissions from the emission units specified in this permit shall not equal or exceed the following

Potential To Emit (PTE) rate for each regulated contaminant:

CAS No: 0NY998-00-0

PTE: 78,000 pounds per year

Name: VOC

**Condition 2: Compliance Demonstration**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:6 NYCRR 202-2.1**

**Item 2.1:**

The Compliance Demonstration activity will be performed for the Facility.

**Item 2.2:**

Compliance Demonstration shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES

Monitoring Description:

Emission statements shall be submitted on or before April 15th each year for emissions of the previous calendar year.

Monitoring Frequency: ANNUALLY

Reporting Requirements: ANNUALLY (CALENDAR)

Reports due by April 15th for previous calendar year

**Condition 3: Recordkeeping requirements**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:6 NYCRR 202-2.5**

**Item 3.1:**

(a) The following records shall be maintained for at least five years:

- (1) a copy of each emission statement submitted to the department; and



(2) records indicating how the information submitted in the emission statement was determined, including any calculations, data, measurements, and estimates used.

(b) These records shall be made available at the facility to the representatives of the department upon request during normal business hours.

**Condition 4: Collection and Control System Installation Schedule  
Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement: 6 NYCRR Subpart 231-2**

**Item 4.1:**

In order to maintain its status as a minor source relative to New Source Review (NSR), the landfill will collect and control landfill gas emissions by the schedule outlined below. In some cases, the schedule contained in this permit is more stringent than the regulatory requirements of 40 CFR 60 Subpart WWW. This table is intended as a summary of requirements only and not an applicable requirement. The specific requirements of each step are detailed in the appropriate regulatory citations of this permit.

Requirement	Permit Schedule
Initial design capacity report due, as per 40 CFR 60.757(a)(1)(ii)	90 days after commencement of landfill construction
Initial NMOC Emission Rate Report, as per 40 CFR 60.757(b)(1)(i)(B)	90 days after commencement of landfill construction
Submit Title V permit application, as per 40 CFR 60.752(c)(2)	Within 15 months after commencement of landfill construction
Gas Collection & Control System (GCCS) design plan, as per 40 CFR 60.757(c)	Within 15 months after commencement of landfill construction
Installation of GCCS, as per 40 CFR 60.752(b)(2)(ii)	Within 42 months of initial solid waste placement in the landfill
Operation of GCCS as cells in the per 40 CFR 60.753 waste has been in place for 5 years The system will be initiated as soon as there is sufficient gas being generated to utilize the flare	When gas is collected from each area, cell or group of landfill in which solid waste is placed or more.
Certification of GCCS manufacturer performance requirements	Within 60 days of initial startup of GCCS
Initial performance	Within 180 days of initial startup of GCCS

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testing of GCCS as per  
40 CFR 60.752(b)(2)(iii)(B)

Initial Annual Report  
as per 40 CFR 60.757(f)

Within 180 days of initial startup of GCCS

Develop and implement  
Startup, Shut down and  
Malfunction (SSM) Plan  
as per 40 CFR 63.6(e)

When GCCS commences operation

Semi Annual Report  
GCCS  
as per 40 CFR 63.10(d)(5)

Semiannually after commencement of operation of

Periodic SSM Reports  
with the SSM as per 40 CFR 63.10(d)(5)  
applicable emission  
followed by a letter within 7 working days after the  
end of the event.

Within 2 working days after an event inconsistent  
plan and when the source exceeds any  
limitation;

**Condition 5: General Provisions**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:40CFR 63, Subpart A**

**Item 5.1:**

This emission source is subject to the applicable provisions of 40 CFR 63 Subpart A. The facility owner is responsible for complying with all applicable technical, administrative and reporting requirements.

**Condition 6: Compliance Demonstration**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:40CFR 63.1955(b), Subpart AAAA**

**Item 6.1:**

The Compliance Demonstration activity will be performed for the Facility.

Regulated Contaminant(s):  
CAS No: 0NY100-00-0 HAP

**Item 6.2:**

Compliance Demonstration shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES  
Monitoring Description:

If you are required by 40CFR60.752(b)(2) of subpart WWW, the Federal plan, or an EPA approved and effective State or tribal plan to install a collection and control system, you must comply with the requirements in §§63.1960 through 63.1985 and with the general provisions of part 63 as



specified in table 1 of Subpart AAAA.

The facility shall develop and implement a written startup, shutdown, and malfunction (SSM) plan that describes, in detail, procedures for operating and maintaining the source during periods of startup, shutdown, and malfunction; a program of corrective action for malfunctioning process; and air pollution control and monitoring equipment used to comply with this standard.

This plan must be developed by the facility by the compliance date of 40CFR63, subpart AAAA (the landfill NESHAP) and must comply with all of the provisions as listed in §63.6(e)(3)(ii)-(ix) which includes the following provisions:

- During periods of startup, shutdown, and malfunction, the facility must operate and maintain the affected source in accordance with the procedures specified in the SSM plan.
- When actions taken by the owner/operator during a startup, shutdown, or malfunction are consistent with the procedures specified in the affected source's SSM plan, the owner/operator must keep records for that event which demonstrate that the procedures specified in the plan were followed. In addition, the owner/operator must keep records of these events as specified in §63.10(b), including records of operation and each malfunction of the air pollution control and monitoring equipment. Furthermore, the owner/operator shall confirm that actions taken during the startup, shutdown, and malfunction were consistent with the SSM plan in the semiannual report as required in §63.10(d)(5).
- If an action taken by the facility is not consistent with the SSM plan, and the affected source exceeds the relevant emission standard, then the owner/operator must record the actions taken for that event and must report such actions within 2 working days after commencing actions inconsistent with the SSM plan, followed by a letter within 7 working days after the end of the event.
- EPA or NYSDEC may at any time request in writing that the facility submit a copy of the SSM plan (or a portion thereof) which is maintained at the affected source. Upon receipt of such a request, the facility must promptly submit a copy of the requested plan to EPA or NYSDEC. EPA or NYSDEC must request that the facility submit a SSM plan 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. If the facility claims that any portion of such a SSM plan is confidential business information entitled to protection from disclosure under section 114(c) of the Act or 40CFR2.301, the material which is claimed as confidential must be clearly designated in the submission.

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING

DESCRIPTION

Reporting Requirements: SEMI-ANNUALLY (CALENDAR)

Reports due 30 days after the reporting period.

The initial report is due 7/30/2008.

Subsequent reports are due every 6 calendar month(s).

**Condition 7: Compliance Demonstration**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:40CFR 63.1980(a), Subpart AAAA**

**Item 7.1:**

The Compliance Demonstration activity will be performed for the Facility.

**Item 7.2:**

Compliance Demonstration shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES

Monitoring Description:

Each owner or operator of a landfill seeking to comply with 40 CFR Part 60.752(b)(2) using an active collection system designed in accordance with 40 CFR Part 60.752(b)(2)(ii) shall submit to the Administrator semiannual reports of the recorded information in paragraphs (1) through (6) below. The initial semiannual report shall be submitted within 180 days of installation and start-up of the collection and control system, and shall include the initial performance test report required under 40 CFR Part 60.8. For enclosed combustion devices and flares, reportable exceedances are defined under 40 CFR Part 60.758(c).

(1) Value and length of time for exceedance of applicable parameters monitored under 40 CFR Part 60.756(a), (b), (c), and (d).

(2) Description and duration of all periods when the gas stream is diverted from the control device through a bypass line or the indication of bypass flow as specified under 40 CFR Part 60.756.

(3) Description and duration of all periods when the control device was not operating for a period exceeding 1



hour and length of time the control device was not operating.

(4) All periods when the collection system was not operating in excess of 5 days.

(5) The location of each exceedance of the 500 parts per million methane concentration as provided in 40 CFR Part 60.753(d) and the concentration recorded at each location for which an exceedance was recorded in the previous month.

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

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING DESCRIPTION

Reporting Requirements: SEMI-ANNUALLY (CALENDAR)

Reports due 30 days after the reporting period.

The initial report is due 7/30/2008.

Subsequent reports are due every 6 calendar month(s).

**\*\*\*\* Emission Unit Level \*\*\*\***

**Condition 8: Emission Unit Permissible Emissions**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:6 NYCRR 201-7.2**

**Item 8.1:**

The sum of emissions from all regulated processes specified in this permit for the emission unit cited

shall not exceed the following Potential to Emit (PTE) rates for each regulated contaminant:

Emission Unit: U-000CU

CAS No: 0NY998-00-0

Name: VOC

PTE(s): 8.9 pounds per hour

78,000 pounds per year

**Condition 9: Process Permissible Emissions**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:6 NYCRR 201-7.2**

**Item 9.1:**

The sum of emissions from the regulated process cited shall not exceed the following Potential to Emit (PTE) rates for each regulated contaminant:



Emission Unit: U-000CU Process: SWL  
CAS No: 0NY998-00-0  
Name: VOC  
PTE(s): 4.31 pounds per hour  
37,700 pounds per year  
18.9 tons per year

**Condition 10: Capping Monitoring Condition**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:6 NYCRR 201-7.2**

**Item 10.1:**

Under the authority of 6 NYCRR Part 201-7, this condition contains an emission cap for the purpose of limiting emissions from the facility, emission unit or process to avoid being subject to the following applicable requirement(s) that the facility, emission unit or process would otherwise be subject to:

**Item 10.2:**

Operation of this facility shall take place in accordance with the approved criteria, emission limits, terms, conditions and standards in this permit.

**Item 10.3:**

The owner or operator of the permitted facility must maintain all required records on-site for a period of five years and make them available to representatives of the Department upon request. Department representatives must be granted access to any facility regulated by this Subpart, during normal operating hours, for the purpose of determining compliance with this and any other state and federal air pollution control requirements, regulations or law.

**Item 10.4:**

On an annual basis, unless otherwise specified below, beginning one year after the granting of an emissions cap, the responsible official shall provide a certification to the Department that the facility has operated all emission units within the limits imposed by the emission cap. This certification shall include a brief summary of the emissions subject to the cap for that time period and a comparison to the threshold levels that would require compliance with an applicable requirement.

**Item 10.5:**

The emission of pollutants that exceed the applicability thresholds for an applicable requirement, for which the facility has obtained an emissions cap, constitutes a violation of Part 201 and of the Act.

**Item 10.6:**

The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

Regulated Contaminant(s):



CAS No: 0NY210-00-0 OXIDES OF NITROGEN

**Item 10.7:**

Compliance Demonstration shall include the following monitoring:

Monitoring Type: INTERMITTENT EMISSION TESTING

Monitoring Description:

This permit condition is used to demonstrate the proposed nitrogen oxides (NO<sub>x</sub>) emission rate and to verify the applicability thresholds of 6NYCRR Part 231-2, New Source Review (NSR) are not exceeded.

a.) According to the AP-42 emission factor for an enclosed combustor, maximum emissions of NO<sub>x</sub> from the control device (which occurs in year 22) would not exceed the NSR applicability threshold of 100 tons per year. The John Zinc Company guarantees the Landfill Gas Ultra Low Emission Flare System will have a maximum emission rate of 0.025 pounds of NO<sub>x</sub> per million BTU fired. Average landfill gas has a heat content of approximately 520 BTU per cubic foot. Therefore, assuming collection system flow of 6000 cfm, the maximum emission from the combustor is estimated to be 4.68 lb/hr or 20.5 tons/yr.

b.) Therefore, emission of NO<sub>x</sub> from the enclosed combustor shall not exceed 0.025 pounds of NO<sub>x</sub> per million BTU of landfill gas fired.

c.) The owner or operator shall conduct a stack test for establishing compliance with the NO<sub>x</sub> limit within 180 days of startup of the gas collection and control system. The stack test shall be conducted according to EPA Method 7 or alternative method approved by the Department.

d.) The owner or operator shall prepare and submit a stack test protocol to the Department for review and approval at least 45 days prior to scheduled testing. The stack test protocol shall also address QA/QC, reportables, data usability and corrective action. Corrective action shall include provisions for retesting where necessary.

e.) A stack test report shall be submitted to the Department for review and approval within 60 days of completion of the field testing.

Parameter Monitored: OXIDES OF NITROGEN  
Upper Permit Limit: 0.025 pounds per million Btus  
Reference Test Method: EPA Method 7  
Monitoring Frequency: SINGLE OCCURRENCE  
Averaging Method: 1-HOUR AVERAGE



Reporting Requirements: ONCE / BATCH OR MONITORING OCCURRENCE

**Condition 26: Capping Monitoring Condition**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement: 6 NYCRR 201-7.2**

**Item 26.1:**

Under the authority of 6 NYCRR Part 201-7, this condition contains an emission cap for the purpose of limiting emissions from the facility, emission unit or process to avoid being subject to the following applicable requirement(s) that the facility, emission unit or process would otherwise be subject to:

**Item 26.2:**

Operation of this facility shall take place in accordance with the approved criteria, emission limits, terms, conditions and standards in this permit.

**Item 26.3:**

The owner or operator of the permitted facility must maintain all required records on-site for a period of five years and make them available to representatives of the Department upon request. Department representatives must be granted access to any facility regulated by this Subpart, during normal operating hours, for the purpose of determining compliance with this and any other state and federal air pollution control requirements, regulations or law.

**Item 26.4:**

On an annual basis, unless otherwise specified below, beginning one year after the granting of an emissions cap, the responsible official shall provide a certification to the Department that the facility has operated all emission units within the limits imposed by the emission cap. This certification shall include a brief summary of the emissions subject to the cap for that time period and a comparison to the threshold levels that would require compliance with an applicable requirement.

**Item 26.5:**

The emission of pollutants that exceed the applicability thresholds for an applicable requirement, for which the facility has obtained an emissions cap, constitutes a violation of Part 201 and of the Act.

**Item 26.6:**

The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

Regulated Contaminant(s):  
CAS No: 0NY998-00-0 VOC

**Item 26.7:**

Compliance Demonstration shall include the following monitoring:

Capping: Yes

Monitoring Type: MONITORING OF PROCESS OR CONTROL  
DEVICE PARAMETERS AS SURROGATE



Monitoring Description:

This permit condition is used to verify Volatile Organic Compound (VOC) emissions do not exceed the applicability thresholds of 6NYCRR Part 231-2, New Source Review (NSR).

a.) The owner or operator shall conduct a stack test on the John Zinc Company Landfill Gas Ultra Low Emission Flare System establishing compliance with the 98% VOC destruction requirement within 180 days of startup of the gas collection and control system. The stack test shall be conducted according to EPA Method 25A. Results from testing required by Subpart WWW conditions for NMOC in this permit, may be used for this requirement with the understanding that the VOC emission rate is equal to 39% of the NMOC emission rate.

b.) The owner or operator shall prepare and submit a stack test protocol to the Department for review and approval at least 45 days prior to scheduled testing. The stack test protocol shall also address QA/QC, reportables, data usability and corrective action. Corrective action shall include provisions for retesting where necessary.

c.) A stack test report shall be submitted to the Department for review and approval within 60 days of completion of the field testing.

d.) The owner or operator shall calibrate, maintain, and operate according to the manufacturer's specifications, a temperature monitoring device equipped with a continuous recorder and having a minimum accuracy of  $\pm 1$  percent of the temperature being measured expressed in degrees Celsius or  $\pm 0.5$  degrees Celsius, whichever is greater.

e.) In order to monitor ongoing compliance with the 98% destruction efficiency requirement, temperature of the combustor shall be used as a surrogate. All 3-hour periods of operation during which the average combustion temperature was more than 28 degrees C below the average combustion temperature during the most recent performance test at which compliance with §§ 60.752(b)(2)(iii) was determined shall be promptly reported to the Department - in any case no later than 72 hours after the event. The report shall describe the problem, the cause and what steps are being undertaken to address the problem.

Parameter Monitored: TEMPERATURE  
Lower Permit Limit: 28 degrees Centigrade (or Celsius)  
Monitoring Frequency: CONTINUOUS

**New York State Department of Environmental Conservation**

Permit ID: 9-0438-00004/00013

Facility DEC ID: 9043800004



Averaging Method: MINIMUM - NOT TO FALL LOWER THAN  
STATED VALUE BELOW AVERAGE STACK TEST  
TEMP

Reporting Requirements: AS REQUIRED - SEE MONITORING DESCRIPTION

**Condition 27: Capping Monitoring Condition**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:6 NYCRR 201-7.2**

**Item 27.1:**

Under the authority of 6 NYCRR Part 201-7, this condition contains an emission cap for the purpose of limiting emissions from the facility, emission unit or process to avoid being subject to the following applicable requirement(s) that the facility, emission unit or process would otherwise be subject to:

**Item 27.2:**

Operation of this facility shall take place in accordance with the approved criteria, emission limits, terms, conditions and standards in this permit.

**Item 27.3:**

The owner or operator of the permitted facility must maintain all required records on-site for a period of five years and make them available to representatives of the Department upon request. Department representatives must be granted access to any facility regulated by this Subpart, during normal operating hours, for the purpose of determining compliance with this and any other state and federal air pollution control requirements, regulations or law.

**Item 27.4:**

On an annual basis, unless otherwise specified below, beginning one year after the granting of an emissions cap, the responsible official shall provide a certification to the Department that the facility has operated all emission units within the limits imposed by the emission cap. This certification shall include a brief summary of the emissions subject to the cap for that time period and a comparison to the threshold levels that would require compliance with an applicable requirement.

**Item 27.5:**

The emission of pollutants that exceed the applicability thresholds for an applicable requirement, for which the facility has obtained an emissions cap, constitutes a violation of Part 201 and of the Act.

**Item 27.6:**

The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

Regulated Contaminant(s):

CAS No: 000630-08-0 CARBON MONOXIDE

**Item 27.7:**

Compliance Demonstration shall include the following monitoring:



Monitoring Type: INTERMITTENT EMISSION TESTING

Monitoring Description:

This permit condition is used to ensure and verify carbon monoxide (CO) emissions do not exceed the applicability thresholds of 40CFR52.21, Prevention of Significant Deterioration (PSD).

a.) According to the AP-42 emission factor for an enclosed combustor, maximum emissions of CO from the control device which occurs in year 22 would exceed the PSD applicability threshold of 250 tons per year. However, the John Zinc Company guarantees the Landfill Gas Ultra Low Emission Flare System will have a maximum emission rate of 0.06 pounds of CO per million BTU of landfill gas fired. Average landfill gas has a heat content of approximately 520 BTU per cubic foot. Therefore, assuming collection system flow of 6000 cfm, the maximum emission from the combustor is estimated to be 11.2 lb/hr or 49.2 tons per year CO.

b.) Therefore, emission of CO from the enclosed combustor shall not exceed 0.06 pounds of CO per million BTU of landfill gas fired.

c.) The owner or operator shall conduct a stack test for establishing compliance with the CO limit within 180 days of startup of the gas collection and control system. The stack test shall be conducted according to EPA Method 10 or alternative method approved by the Department.

3.) The owner or operator shall prepare and submit a stack test protocol to the Department for review and approval at least 45 days prior to scheduled testing. The stack test protocol also shall address QA/QC, reportables, data usability and corrective action. Corrective action shall include provisions for retesting where necessary.

4.) A stack test report shall be submitted to the Department for review and approval within 60 days of completion of the field testing.

Parameter Monitored: CARBON MONOXIDE

Upper Permit Limit: 0.06 pounds per million Btus

Reference Test Method: EPA Method 10

Monitoring Frequency: SINGLE OCCURRENCE

Averaging Method: 1-HOUR AVERAGE

Reporting Requirements: AS REQUIRED - SEE MONITORING DESCRIPTION

**Condition 28: Capping Monitoring Condition**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**





a.) The owner or operator shall conduct a stack test on the John Zinc Company Landfill Gas Ultra Low Emission Flare System for establishing compliance with the 98% VOC destruction requirement within 180 days of startup of the gas collection and control system. The stack test shall be conducted according to EPA Method 25A. Results from testing required by Subpart WWW conditions for NMOC in this permit, may be used for this requirement with the understanding that the VOC emission rate is equal to 39% of the NMOC emission rate.

b.) The owner or operator shall prepare and submit a stack test protocol to the Department for review and approval at least 45 days prior to scheduled testing. The stack test protocol shall also address QA/QC, reportables, data usability and corrective action. Corrective action shall include provisions for retesting where necessary.

c.) A stack test report shall be submitted to the Department for review and approval within 60 days of completion of the field testing.

d.) The owner or operator shall calibrate, maintain, and operate according to the manufacturer's specifications, a temperature monitoring device equipped with a continuous recorder and having a minimum accuracy of  $\pm 1$  percent of the temperature being measured expressed in degrees Celsius or  $\pm 0.5$  degrees Celsius, whichever is greater.

e.) In order to monitor ongoing compliance with the 98% destruction efficiency requirement, temperature of the combustor shall be used as a surrogate. All 3-hour periods of operation during which the average combustion temperature was more than 28 degrees C below the average combustion temperature during the most recent performance test at which compliance with §§ 60.752(b)(2)(iii) was determined shall be promptly reported to the Department - in any case no later than 72 hours after the event. The report shall describe the problem, the cause and what steps are being undertaken to address the problem.

Parameter Monitored: DESTRUCTION EFFICIENCY

Lower Permit Limit: 98 percent

Reference Test Method: EPA 25A

Monitoring Frequency: SINGLE OCCURRENCE

Averaging Method: MINIMUM - NOT TO FALL BELOW STATED  
VALUE AT ANY TIME

Reporting Requirements: ONCE / BATCH OR MONITORING OCCURRENCE

**Condition 11: Compliance Demonstration**



Effective between the dates of 01/09/2008 and Permit Expiration Date

Applicable Federal Requirement:6 NYCRR 201-7.2

**Item 11.1:**

Under the authority of 6 NYCRR Part 201-7, this condition contains an emission cap for the purpose of limiting emissions from the facility, emission unit or process to avoid being subject to the following applicable requirement(s) that the facility, emission unit or process would otherwise be subject to:

**Item 11.2:**

Operation of this facility shall take place in accordance with the approved criteria, emission limits, terms, conditions and standards in this permit.

**Item 11.3:**

The owner or operator of the permitted facility must maintain all required records on-site for a period of five years and make them available to representatives of the Department upon request. Department representatives must be granted access to any facility regulated by this Subpart, during normal operating hours, for the purpose of determining compliance with this and any other state and federal air pollution control requirements, regulations or law.

**Item 11.4:**

On an annual basis, unless otherwise specified below, beginning one year after the granting of an emissions cap, the responsible official shall provide a certification to the Department that the facility has operated all emission units within the limits imposed by the emission cap. This certification shall include a brief summary of the emissions subject to the cap for that time period and a comparison to the threshold levels that would require compliance with an applicable requirement.

**Item 11.5:**

The emission of pollutants that exceed the applicability thresholds for an applicable requirement, for which the facility has obtained an emissions cap, constitutes a violation of Part 201 and of the Act.

**Item 11.6:**

The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

Regulated Contaminant(s):

CAS No: 0NY998-00-0 VOC

**Item 11.7:**

Compliance Demonstration shall include the following monitoring:

Capping: Yes

Monitoring Type: MONITORING OF PROCESS OR CONTROL  
DEVICE PARAMETERS AS SURROGATE

Monitoring Description:

This permit condition is used to verify Volatile Organic  
Compound (VOC) emissions do not exceed the applicability



thresholds of 6NYCRR Part 231-2, New Source Review (NSR).

a.) The landfill gas collection system required by this permit shall include a fan and John Zinc Company Landfill Gas Ultra Low Emission Flare System which will meet the following performance requirements and the requirements of Subpart WWW contained in this permit:

1. The flare shall sustain stable combustion with 10% to 50% methane concentrations at the maximum flow rate, while maintaining the operating temperature, without requiring any burner adjustment.

2. Considering a 50% methane concentration, the flare must achieve a 5:1 instantaneous heat release turndown minimum. Achieving the specified turndown must not require any burner adjustment or flare modification.

3. During initial operation of the landfill, Integrated Waste Systems, Inc. may be required to operate the flare below the 5:1 turndown ratio. This will be accomplished by making adjustments to the flare in accordance with manufacturer recommendations. If this becomes necessary, the facility shall document the manufacturer's procedure were followed. This documentation shall be submitted within 30 days of initial construction of the fan and flare system. The required 98% VOC destruction efficiency shall also be accomplished in this range.

4. The flare shall sustain stable combustion with methane concentrations of at least 10% without any burner adjustments or flare modification.

5. The pressure loss through the flare, from the inlet flange through the flare enclosure, shall be less than 15" H<sub>2</sub>O.

6. The flare shall operate free of pulsation and vibration with at most 5% oxygen concentration in the landfill gas stream.

7. The flare system shall achieve maximum destruction efficiency VOC throughout the entire flare operating range, without any burner adjustments or flare modification.

8. The fan and flare shall handle gas flow rates up to and including 6,000 cfm. The maximum predicted landfill gas generation rate is 5,981 cfm.

b.) The owner or operator shall certify meeting the above requirements within 60 days of startup of the collection and control system.

c.) In order to assure adequate landfill gas capture efficiency, the landfill shall be constructed with a geomembrane cover at the final closure of each cell as approved by EPA and the department under Subpart WWW



design requirements. Scheduling of construction of the geomembrane cover shall be included in the proposed design plan.

Parameter Monitored: LANDFILL GAS

Lower Permit Limit: 0 cubic feet per minute

Upper Permit Limit: 6000 cubic feet per minute

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING DESCRIPTION

Averaging Method: RANGE - NOT TO FALL OUTSIDE OF STATED RANGE AT ANY TIME

Reporting Requirements: AS REQUIRED - SEE MONITORING DESCRIPTION

**Condition 12: Compliance Demonstration**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement: 6 NYCRR 201-7.2**

**Item 12.1:**

Under the authority of 6 NYCRR Part 201-7, this condition contains an emission cap for the purpose of limiting emissions from the facility, emission unit or process to avoid being subject to the following applicable requirement(s) that the facility, emission unit or process would otherwise be subject to:

**Item 12.2:**

Operation of this facility shall take place in accordance with the approved criteria, emission limits, terms, conditions and standards in this permit.

**Item 12.3:**

The owner or operator of the permitted facility must maintain all required records on-site for a period of five years and make them available to representatives of the Department upon request. Department representatives must be granted access to any facility regulated by this Subpart, during normal operating hours, for the purpose of determining compliance with this and any other state and federal air pollution control requirements, regulations or law.

**Item 12.4:**

On an annual basis, unless otherwise specified below, beginning one year after the granting of an emissions cap, the responsible official shall provide a certification to the Department that the facility has operated all emission units within the limits imposed by the emission cap. This certification shall include a brief summary of the emissions subject to the cap for that time period and a comparison to the threshold levels that would require compliance with an applicable requirement.

**Item 12.5:**

The emission of pollutants that exceed the applicability thresholds for an applicable requirement, for which the facility has obtained an emissions cap, constitutes a violation of Part 201 and of the Act.

**Item 12.6:**

The Compliance Demonstration activity will be performed for:



Emission Unit: U-000CU

Regulated Contaminant(s):  
CAS No: 0NY998-00-0 VOC

**Item 12.7:**

Compliance Demonstration shall include the following monitoring:

Capping: Yes

Monitoring Type: WORK PRACTICE INVOLVING SPECIFIC  
OPERATIONS

Monitoring Description:

This permit condition is used to ensure Volatile Organic Compound (VOC) emissions do not exceed the applicability thresholds of 6NYCRR Part 231-2, New Source Review (NSR).

- a.) The facility shall limit the amount of municipal solid waste (MSW) disposed in this landfill to 837,00 tons per year for every 12 month period until it reaches its design capacity of 23.68 million cubic yards or 1776 million tons. This is projected to occur after 21.2 years of operation.
- b.) The facility shall track all such MSW received by recording the amount received daily in a log maintained on site during each day of operation. The total monthly MSW received by the landfill and 12 month total shall be computed by the 15 day of each month.
- c.) The owner or operator must maintain all required records on-site for a period of five years and make them available to representatives of the Department upon request. Department representatives must be granted access to the facility during normal operating hours, for the purpose of determining compliance with this and any other state and federal air pollution control requirements, regulations or law.
- d.) On an annual basis, beginning one year after the granting of an emissions cap, the responsible official shall provide a certification to the Department that the facility has operated all emission units within the limits imposed by the emission cap. This certification shall include a brief summary of the MSW disposed in this landfill and a comparison with the 837,000 ton per year limit established by this cap.

Work Practice Type: PROCESS MATERIAL THRUPUT  
Process Material: MUNICIPAL SOLID WASTE  
Upper Permit Limit: 837000 tons per year  
Monitoring Frequency: DAILY

**New York State Department of Environmental Conservation**

Permit ID: 9-0438-00004/00013

Facility DEC ID: 9043800004



Averaging Method: ANNUAL MAXIMUM ROLLED MONTHLY

Reporting Requirements: ANNUALLY (ANNIVERSARY)

Initial Report Due: 02/07/2009 for the period 01/09/2008 through 01/08/2009

**Condition 13: EPA Region 2 address.**

**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:40CFR 60.4, NSPS Subpart A**

**Item 13.1:**

This Condition applies to Emission Unit: U-000CU

**Item 13.2:**

All requests, reports, applications, submittals, and other communications to the Administrator pursuant to this part shall be submitted in duplicate to the following address:

Director, Division of Enforcement and Compliance Assistance  
USEPA Region 2  
290 Broadway, 21st Floor  
New York, NY 10007-1886

Copies of all correspondence to the administrator pursuant to this part shall also be submitted to the NYSDEC Regional Office issuing this permit (see address at the beginning of this permit) and to the following address:

NYSDEC  
Bureau of Quality Assurance  
625 Broadway  
Albany, NY 12233-3258

**Condition 14: Compliance Demonstration**

**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:40CFR 60.7(c), NSPS Subpart A**

**Item 14.1:**

The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

**Item 14.2:**

Compliance Demonstration shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES

Monitoring Description:

Affected owners or operators shall submit an excess emissions report semi-annually based on the calendar year



(or more frequently as required by the applicable Subpart or the Administrator), to the Administrator. These reports shall be postmarked no later than 30 calendar days following the end of the reporting period, and shall contain the following information:

- 1) the magnitude of excess emissions computed, any conversion factors used, the date and time of each occurrence, and the process operating time during the reporting period;
- 2) specific identification of each period of excess emissions that occur during startup, shutdown, or malfunction, where the nature, cause, and corrective action are provided for a malfunction;
- 3) the date and time identifying each period during which the continuous monitoring system was inoperative except for zero span checks and the nature of the system repairs or adjustments; and
- 4) when no excess emissions have occurred or when the continuous monitoring system(s) have not been inoperative, repaired, or adjusted, such information shall be provided in the report.

Monitoring Frequency: CONTINUOUS

Reporting Requirements: SEMI-ANNUALLY (CALENDAR)

Reports due 30 days after the reporting period.

The initial report is due 7/30/2008.

Subsequent reports are due every 6 calendar month(s).

**Condition 15: Performance testing timeline.**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:40CFR 60.8(a), NSPS Subpart A**

**Item 15.1:**

This Condition applies to Emission Unit: U-000CU

**Item 15.2:**

Within 60 days after achieving the maximum production rate, but not later than 180 days after initial startup of the facility, the owner or operator of the facility shall conduct performance testing and provide the results of such tests, in a written report, to the Administrator.

**Condition 16: Compliance Demonstration**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:40CFR 60.13(a), NSPS Subpart A**

**New York State Department of Environmental Conservation**

Permit ID: 9-0438-00004/00013

Facility DEC ID: 9043800004



**Item 16.1:**

The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

**Item 16.2:**

Compliance Demonstration shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES

Monitoring Description:

For the purposes of this section, all continuous monitoring systems required under applicable subparts shall be subject to the provisions of this section upon promulgation of performance specifications for continuous monitoring systems under appendix B to this part and, if the continuous monitoring system is used to demonstrate compliance with emission limits on a continuous basis, appendix F to this part, unless otherwise specified in an applicable subpart or by the Administrator. Appendix F is applicable December 4, 1987.

Reporting Requirements: SEMI-ANNUALLY (CALENDAR)

Reports due 30 days after the reporting period.

The initial report is due 7/30/2008.

Subsequent reports are due every 6 calendar month(s).

**Condition 17: Compliance Demonstration**

**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:40CFR 60.13(b), NSPS Subpart A**

**Item 17.1:**

The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

**Item 17.2:**

Compliance Demonstration shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES

Monitoring Description:

All continuous monitoring systems and monitoring devices shall be installed and operational prior to conducting performance tests under §60.8. Verification of operational status shall, as a minimum, include completion of the manufacturer's written requirements or recommendations for installation, operation, and calibration of the device.

Reporting Requirements: SEMI-ANNUALLY (CALENDAR)

Reports due 30 days after the reporting period.

The initial report is due 7/30/2008.

Subsequent reports are due every 6 calendar month(s).



**Condition 18: Compliance Demonstration**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement: 40CFR 60.752, NSPS Subpart WWW**

**Item 18.1:**

The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

Regulated Contaminant(s):

CAS No: 0NY998-20-0 NMOC - LANDFILL USE ONLY

**Item 18.2:**

Compliance Demonstration shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES

Monitoring Description:

Standards for air emissions from municipal solid waste landfills.

(a) N/A

(b) The owner or operator shall comply with paragraph (b)(2) of this section.

(1) N/A

(2) The owner or operator of this MSW landfill shall:

(i) Submit a collection and control system design plan prepared by a professional engineer to the Administrator within 15 months after commencement of landfill construction:

(A) The collection and control system as described in the plan shall meet the design requirements of paragraph (b)(2)(ii) of this section.

(B) N/A

(C) N/A

(D) N/A

(ii) Install an active collection system and a control system that captures the gas generated within the landfill within 42 months of initial solid waste placement in the landfill.

(A) An active collection system shall:

(1) 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;

(2) Collect gas from each area, cell, or group of cells in the landfill in which the initial solid waste has been placed for a period of:

(i) 5 years or more if active; or



(ii) 2 years or more if closed or at final grade.

(3) Collect gas at a sufficient extraction rate;

(4) Be designed to minimize off-site migration of subsurface gas.

(B) N/A

(iii) Route all the collected gas to a control system that complies with the requirements in paragraph (b)(2)(iii)(B) of this section.

(A) N/A

(B) A control system designed and operated to reduce NMOC by 98 weight-percent, or, when an enclosed combustion device is used for control, to either reduce NMOC by 98 weight percent or reduce the outlet NMOC concentration to less than 20 parts per million by volume, dry basis as hexane at 3 percent oxygen. The reduction efficiency or parts per million by volume shall be established by an initial performance test to be completed no later than 180 days after the initial startup of the approved control system using the test methods specified in section §§ 60.754(d).

(1) N/A

(2) The control device shall be operated within the parameter ranges established during the initial or most recent performance test. The operating parameters to be monitored are specified in section §§ 60.756;

(C) N/A

(iv) Operate the collection and control device in accordance with the provisions of sections §§ 60.753, 60.755 and 60.756.

(v) The collection and control system may be capped or removed provided that all the conditions of paragraphs (b)(2)(v) (A), (B), and (C) of this section are met:

(A) The landfill shall be a closed landfill as defined in section §§ 60.751. A closure report shall be submitted to the Administrator as provided in section §§ 60.757(d);

(B) The collection and control system shall have been in operation a minimum of 15 years; and

(C) Following the procedures specified in section §§ 60.754(b), the calculated NMOC gas produced by the landfill shall be less than 50 megagrams per year on three successive test dates. The test dates shall be no less than 90 days apart, and no more than 180 days apart.

(c) For purposes of submitting a timely application for a Title V operating permit, the owner or operator shall submit an application within 15 months after the date of commenced construction. This is regardless of when the design capacity report is actually submitted.



(d) N/A

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING DESCRIPTION

Reporting Requirements: AS REQUIRED - SEE MONITORING DESCRIPTION

**Condition 19: Compliance Demonstration**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:40CFR 60.753, NSPS Subpart WWW**

**Item 19.1:**

The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

Regulated Contaminant(s):

CAS No: 0NY998-20-0 NMOC - LANDFILL USE ONLY

**Item 19.2:**

Compliance Demonstration shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES

Monitoring Description:

Operational standards for collection and control systems.

The owner or operator shall:

(a) Operate the gas 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:

- (1) 5 years or more if active; or
- (2) 2 years or more if closed or at final grade;

(b) Operate the collection system with negative pressure at each wellhead except under the following conditions:

- (1) A fire or increased well temperature. The owner or operator shall record instances when positive pressure occurs in efforts to avoid a fire. These records shall be submitted with the annual reports as provided in section §§ 60.757(f)(1);
- (2) Use of a geomembrane or synthetic cover. The owner or operator shall develop acceptable pressure limits in the design plan;
- (3) A decommissioned well. A well may experience a static positive pressure after shut down to accommodate for declining flows. All design changes shall be approved by the Administrator;

(c) Operate each interior wellhead in the collection



system with a landfill gas temperature less than 55 degrees C and with either a nitrogen level less than 20 percent or an oxygen level less than 5 percent. The owner or operator may establish a higher operating temperature, nitrogen, or oxygen value 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.

(1) The nitrogen level shall be determined using Method 3C.

(2) The oxygen level shall be determined by an oxygen meter using Method 3A or 3C except that:

- (i) The span shall be set so that the regulatory limit is between 20 and 50 percent 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;
- (v) The allowable sample bias, zero drift, and calibration drift are  $\pm 10$  percent.

(d) Operate the collection system so that the methane concentration is less than 500 parts per million above background at the surface of the landfill. To determine if this level is exceeded, the owner or operator shall conduct surface testing around the perimeter of the collection area and 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. The owner or operator may establish an alternative traversing pattern that ensures equivalent coverage. A surface monitoring design plan shall be developed that includes a topographical map with the monitoring route and the rationale for any site-specific deviations from the 30 meter intervals. Areas with steep slopes or other dangerous areas may be excluded from the surface testing.

(e) Operate the system such that all collected gases are vented to a control system designed and operated in compliance with section §§ 60.752(b)(2)(iii) and approved under this permit. 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 1 hour; and

(f) Operate the control or treatment system at all times when the collected gas is routed to the system.



(g) If monitoring demonstrates that the operational requirements in paragraphs (b), (c), or (d) of this section are not met, corrective action shall be taken as specified in sections §§ 60.755(a)(3) through (5) or §§ 60.755(c). If corrective actions are taken as specified in section §§ 60.755, the monitored exceedance is not a violation of the operational requirements in this section.

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING DESCRIPTION

Reporting Requirements: AS REQUIRED - SEE MONITORING DESCRIPTION

**Condition 20: Compliance Demonstration**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement: 40CFR 60.754, NSPS Subpart WWW**

**Item 20.1:**

The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

Regulated Contaminant(s):

CAS No: 0NY998-20-0 NMOC - LANDFILL USE ONLY

**Item 20.2:**

Compliance Demonstration shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES

Monitoring Description:

Test methods and procedures.

(a) For the purposes of calculating emissions under this Subpart, the permittee shall use the appropriate formulas and procedures specified in Subpart WWW 754(a).

(b) After the installation of a collection and control system in compliance with section §§ 60.755, the owner or operator shall calculate the NMOC emission rate for purposes of determining when the system can be removed as provided in §§ 60.752(b)(2)(v), using the equation and procedures specified in §§ 60.754(b).

(c) When calculating emissions for PSD purposes, the owner or operator shall estimate the NMOC emission rate for comparison to the PSD major source and significance levels in §§§§ 51.166 or 52.21 of this chapter using AP-42 or other approved measurement procedures.

(d) For the performance test required in section §§ 60.752(b)(2)(iii)(B), Method 25, 25C, or Method 18 of



Appendix A of Part 60 must be used to determine compliance with the 98 weight-percent efficiency or the 20 ppmv outlet concentration level. Method 3 or 3A shall be used to determine oxygen for correcting the NMOC concentration as hexane to 3 percent. In cases where the outlet concentration is less than 50 ppm NMOC as carbon (8 ppm NMOC as hexane), Method 25A should be used in place of Method 25. If using Method 18 of appendix A of this part, the minimum list of compounds to be tested shall be those published in the most recent Compilation of Air Pollutant Emission Factors (AP-42). The following equation shall be used to calculate efficiency:

$$\text{Control Efficiency} = (\text{NMOC}_{\text{in}} - \text{NMOC}_{\text{out}}) / (\text{NMOC}_{\text{in}})$$

where,  
NMOC<sub>in</sub> = mass of NMOC entering control device  
NMOC<sub>out</sub> = mass of NMOC exiting control device

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING DESCRIPTION

Reporting Requirements: AS REQUIRED - SEE MONITORING DESCRIPTION

**Condition 21: Compliance Demonstration**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**  
**Applicable Federal Requirement: 40CFR 60.755, NSPS Subpart WWW**

**Item 21.1:**  
The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

Regulated Contaminant(s):  
CAS No: 0NY998-20-0 NMOC - LANDFILL USE ONLY

**Item 21.2:**  
Compliance Demonstration shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES  
Monitoring Description:  
Compliance provisions.

(a) The specified methods in paragraphs (a)(1) through (a)(6) of this section shall be used to determine whether the gas collection system is in compliance with section §§ 60.752(b)(2)(ii).

(1) For the purposes of calculating the maximum expected gas generation flow rate from the landfill to determine compliance with §§ 60.752(b)(2)(ii)(A)(1), the equations and procedures in §§ 60.755(a)(1)(i), (ii) & (iii) shall be used. They are not repeated in this permit. The k and Lo kinetic factors should be those



published in the most recent Compilation of Air Pollutant Emission Factors (AP-42). If  $k$  has been determined as specified in §§ 60.754(a)(4), the value of  $k$  determined from the test shall be used. A value of no more than 15 years shall be used for the intended use period of the gas mover equipment. The active life of the landfill is the age of the landfill plus the estimated number of years until closure.

(i), (ii) & (iii) - See §§ 60.755(a)(1) for equations and procedures.

(2) For the purposes of determining sufficient density of gas collectors for compliance with §§ 60.752(b)(2)(ii)(A)(2), the owner or operator shall design a system of vertical wells, horizontal collectors, or other collection devices, satisfactory to the Administrator and the Department, capable of controlling and extracting gas from all portions of the landfill sufficient to meet all operational and performance standards.

(3) For the purpose of demonstrating whether the gas collection system flow rate is sufficient to determine compliance with §§ 60.752(b)(2)(ii)(A)(3), the owner or operator shall measure gauge pressure in the gas collection header at each individual well, monthly. If a positive pressure exists, action shall be initiated to correct the exceedance within 5 calendar days, except for the three conditions allowed under §§ 60.753(b). If negative pressure cannot be achieved without excess air infiltration within 15 calendar days of the first measurement, the gas collection system shall be expanded to correct the exceedance within 120 days of the initial measurement of positive pressure. Any attempted corrective measure shall not cause exceedances of other operational or performance standards. An alternative timeline for correcting the exceedance may be submitted to the Administrator and the Department for approval.

(4) Owners or operators are not required to expand the system as required in paragraph (a)(3) of this section during the first 180 days after gas collection system startup.

(5) For the purpose of identifying whether excess air infiltration into the landfill is occurring, the owner or operator shall monitor each well monthly for temperature and nitrogen or oxygen as provided in section §§ 60.753(c). If a well exceeds one of these operating parameters, action shall be initiated to correct the exceedance within 5 calendar days. If correction of the exceedance cannot be achieved within 15 calendar days of the first measurement, the gas collection system shall be expanded to correct the exceedance within 120 days of the initial exceedance. Any attempted corrective measure shall not cause exceedances of other operational or performance



standards. An alternative timeline for correcting the exceedance may be submitted to the Administrator and the Department for approval.

(6) N/A

(b) For purposes of compliance with §§ 60.753(a), each owner or operator of a controlled landfill shall place each well or design component as specified in the approved design plan as provided in section §§ 60.752(b)(2)(i). Each well shall be installed no later than 60 days after the date on which the initial solid waste has been in place for a period of:

- (1) 5 years or more if active; or
- (2) 2 years or more if closed or at final grade.

(c) The following procedures shall be used for compliance with the surface methane operational standard as provided in section §§ 60.753(d).

(1) After installation of the collection system, the owner or operator shall monitor surface concentrations of methane along the entire perimeter of the collection area and along a pattern that traverses the landfill at 30 meter intervals (or a site-specific established spacing) for each collection area on a quarterly basis using an organic vapor analyzer, flame ionization detector, or other portable monitor meeting the specifications provided in paragraph (d) of this section.

(2) 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.

(3) Surface emission monitoring shall be performed in accordance with section 4.3.1 of Method 21 of appendix A of 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.

(4) 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 in paragraphs (c)(4) (i) through (v) of this section shall be taken. As long as the specified actions are taken, the exceedance is not a violation of the operational requirements of §§ 60.753(d).

(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, the action specified in paragraph (c)(4)(v) of this section shall be taken, and no further monitoring of that location is required until the action specified in paragraph (c)(4)(v) 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 in paragraph (c)(4) (ii) or (iii) of this section 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 in paragraph (c)(4) (iii) or (v) shall be taken.

(v) For any location where monitored methane concentration equals or exceeds 500 parts per million above background three times within a quarterly period, 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 timeline for installation may be submitted to the Administrator for approval.

(5) The owner or operator shall implement a program to monitor for cover integrity and implement cover repairs as necessary on a monthly basis.

(d) Each owner or operator seeking to comply with the provisions in paragraph (c) of this section shall comply with the following instrumentation specifications and procedures for surface emission monitoring devices:

(1) The portable analyzer shall meet the instrument specifications provided in section 3 of Method 21 of appendix A of this part, except that "methane" shall replace all references to VOC.

(2) The calibration gas shall be methane, diluted to a nominal concentration of 500 parts per million in air.

(3) To meet the performance evaluation requirements in section 3.1.3 of Method 21 of appendix A of this part, the instrument evaluation procedures of section 4.4 of Method 21 of appendix A of Part 60 shall be used.

(4) The calibration procedures provided in section 4.2 of Method 21 of appendix A of this part shall be followed immediately before commencing a surface monitoring survey.

(e) The provisions of this subpart apply at all times,



except during periods of start-up, shutdown, or malfunction, provided that the duration of start-up, shutdown, or malfunction shall not exceed 5 days for collection systems and shall not exceed 1 hour for treatment or control devices.

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING DESCRIPTION

Reporting Requirements: AS REQUIRED - SEE MONITORING DESCRIPTION

**Condition 22: Compliance Demonstration**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:40CFR 60.756, NSPS Subpart WWW**

**Item 22.1:**

The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

Regulated Contaminant(s):

CAS No: 0NY998-20-0 NMOC - LANDFILL USE ONLY

**Item 22.2:**

Compliance Demonstration shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES

Monitoring Description:

Monitoring of operations.

(a) For an active gas collection system, the owner or operator shall install a sampling port and a thermometer, other temperature measuring device, or an access port for temperature measurements at each wellhead and:

(1) Measure the gauge pressure in the gas collection header on a monthly basis as provided in section §§ 60.755(a)(3); and

(2) Monitor nitrogen or oxygen concentration in the landfill gas on a monthly basis as provided in section §§ 60.755(a)(5); and

(3) Monitor temperature of the landfill gas on a monthly basis as provided in section §§ 60.755(a)(5).

(b) For an enclosed combustor, the owner or operator shall calibrate, maintain, and operate according to the manufacturer's specifications, the following equipment:

(1) A temperature monitoring device equipped with a continuous recorder and having a minimum accuracy of  $\pm 1$  percent of the temperature being measured expressed in degrees Celsius or  $\pm 0.5$  degrees Celsius, whichever is greater.



(2) A device that records flow to or bypass of the control device. The owner or operator shall either:  
(i) Install, calibrate, and maintain a gas flow rate measuring device that shall record the flow to the control device at least every 15 minutes; or  
(ii) Secure the bypass line valve in the closed position with a car-seal or a lock-and-key type configuration. A visual inspection of the seal or closure mechanism shall be performed at least once every month to ensure that the valve is maintained in the closed position and that the gas flow is not diverted through the bypass line.

(c) N/A

(d) N/A.

(e) N/A

(f) The owner or operator shall monitor surface concentrations of methane according to the instrument specifications and procedures provided in section §§ 60.755(d). Any closed landfill that has no monitored exceedances of the operational standard in three consecutive quarterly monitoring periods may skip to annual monitoring. Any methane reading of 500 ppm or more above background detected during the annual monitoring returns the frequency for that landfill to quarterly monitoring.

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING DESCRIPTION

Reporting Requirements: AS REQUIRED - SEE MONITORING DESCRIPTION

**Condition 23: Compliance Demonstration**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:40CFR 60.757, NSPS Subpart WWW**

**Item 23.1:**

The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

Regulated Contaminant(s):

CAS No: 0NY998-20-0 NMOC - LANDFILL USE ONLY

**Item 23.2:**

Compliance Demonstration shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES

Monitoring Description:



Reporting requirements.

(a) The owner or operator shall submit an initial design capacity report to the Administrator and the Department.

(1) The initial design capacity report shall fulfill the requirements of the notification of the date construction is commenced as required by §§ 60.7(a)(1) and shall be submitted no later than ninety days after the date of commenced construction.

(2) The initial design capacity report shall contain the following information:

(i) A map or plot of the landfill, providing the size and location of the landfill, and identifying all areas where solid waste may be landfilled according to the permit issued by the Department;

(ii) The maximum design capacity of the landfill. A copy of this permit specifying the maximum design capacity may be submitted as part of the report.

(3) N/A

(b) The owner or operator shall submit an NMOC emission rate report to the Administrator and the Department initially and annually thereafter, except as provided for in paragraphs (b)(1)(ii) or (b)(3) of this section. The Administrator or the Department may request such additional information as may be necessary to verify the reported NMOC emission rate.

(1) The NMOC emission rate report shall contain an annual or 5-year estimate of the NMOC emission rate calculated using the formula and procedures provided in §§ 60.754(a) or (b), as applicable.

(i) The initial NMOC emission rate report may be combined with the initial design capacity report required in paragraph (a) of this section and shall be submitted no later than ninety days after the date of commenced construction. Subsequent NMOC emission rate reports shall be submitted annually thereafter, except as provided for in paragraphs (b)(1)(ii) and (b)(3) of this section.

(ii) N/A

(2) The NMOC emission rate report shall include all the data, calculations, sample reports and measurements used to estimate the annual or 5-year emissions.

(3) The owner or operator is exempted from the requirements of paragraphs (b)(1) and (2) of this section after the installation of a collection and control system in compliance with §§ 60.752(b)(2), during such time as the collection and control system is in operation and in compliance with §§ 60.753 and 60.755.

(c) The owner or operator shall submit a collection and control system design plan to the Administrator within 15 months after commencement of landfill construction.



- (1) N/A
- (2) N/A

(d) The owner or operator shall submit a closure report to the Administrator and Department within 30 days of waste acceptance cessation. The Administrator or the Department may request additional information as may be necessary to verify that permanent closure has taken place in accordance with the requirements of 40 CFR 258.60. If a closure report has been submitted to the Administrator, no additional wastes may be placed into the landfill without filing a notification of modification as described under §§ 60.7(a)(4).

(e) Each owner or operator of a controlled landfill shall submit an equipment removal report to the Administrator 30 days prior to removal or cessation of operation of the control equipment.

(1) The equipment removal report shall contain all of the following items:

- (i) A copy of the closure report submitted in accordance with paragraph (d) of this section;
- (ii) A copy of the initial performance test report demonstrating that the 15 year minimum control period has expired; and
- (iii) Dated copies of three successive NMOC emission rate reports demonstrating that the landfill is no longer producing 50 megagrams or greater of NMOC per year.

(2) The Administrator or the Department may request such additional information as may be necessary to verify that all of the conditions for removal in section §§ 60.752(b)(2)(v) have been met.

(f) The owner or operator of a landfill using an active collection system shall submit to the Administrator and the Department an annual reports of the recorded information in (f)(1) through (f)(6) of this paragraph. The initial annual report shall be submitted within 180 days of installation and start-up of the collection and control system, and shall include the initial performance test report required under §§ 60.8. For enclosed combustion devices and flares, reportable exceedances are defined under section §§ 60.758(c).

(1) Value and length of time for exceedance of applicable parameters monitored under §§ 60.756(a), (b), (c), and (d).

(2) Description and duration of all periods when the gas stream is diverted from the control device through a bypass line or the indication of bypass flow as specified under §§ 60.756.

(3) Description and duration of all periods when the



control device was not operating for a period exceeding 1 hour and length of time the control device was not operating.

(4) All periods when the collection system was not operating in excess of 5 days.

(5) The location of each exceedance of the 500 parts per million methane concentration as provided in §§ 60.753(d) and the concentration recorded at each location for which an exceedance was recorded in the previous month.

(6) 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 §§ 60.755.

(g) The owner or operator shall include the following information with the initial performance test report required under §§ 60.8:

(1) 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;

(2) 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;

(3) 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;

(4) The sum of the gas generation flow rates for all areas from which collection wells have been excluded based on nonproductivity and the calculations of gas generation flow rate for each excluded area; and

(5) 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

(6) The provisions for the control of off-site migration.

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING DESCRIPTION

Reporting Requirements: AS REQUIRED - SEE MONITORING DESCRIPTION

**Condition 24: Compliance Demonstration**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:40CFR 60.758, NSPS Subpart WWW**



**Item 24.1:**

The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

Regulated Contaminant(s):

CAS No: 0NY998-20-0 NMOC - LANDFILL USE ONLY

**Item 24.2:**

Compliance Demonstration shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES

Monitoring Description:

Recordkeeping requirements.

(a) The owner or operator shall keep for at least 5 years up-to-date, readily accessible, on-site records of the design capacity report which triggered section §§ 60.752(b), the current amount of solid waste in-place, and the year-by-year waste acceptance rate. Off-site records may be maintained if they are retrievable within 4 hours. Either paper copy or electronic formats are acceptable.

(b) The owner or operator of a controlled landfill shall keep up-to-date, readily accessible records for the life of the control equipment of the data listed in paragraphs (b)(1) through (b)(4) of this section as measured during the initial performance test or compliance determination. 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.

(1) The owner or operator shall keep the following records:

(i) The maximum expected gas generation flow rate as calculated in §§ 60.755(a)(1). The owner or operator may use another method to determine the maximum gas generation flow rate, if the method has been approved by the Administrator.

(ii) The density of wells, horizontal collectors, surface collectors, or other gas extraction devices determined using the procedures specified in §§ 60.759(a)(1).

(2) Where an enclosed combustion device is used:

(i) The average combustion temperature measured at least every 15 minutes and averaged over the same time period of the performance test.

(ii) The percent reduction of NMOC determined as specified in §§ 60.752(b)(2)(iii)(B) achieved by the control device.

(3) N/A.

(4) N/A



(c) The owner or operator of a controlled landfill shall keep for 5 years up-to-date, readily accessible continuous records of the equipment operating parameters specified to be monitored in section §§ 60.756 as well as up-to-date, readily accessible records for periods of operation during which the parameter boundaries established during the most recent performance test are exceeded.

(1) The following constitute exceedances that shall be recorded and reported under section §§ 60.757(f):

(i) For enclosed combustors, all 3-hour periods of operation during which the average combustion temperature was more than 28 degrees C below the average combustion temperature during the most recent performance test at which compliance with §§ 60.752(b)(2)(iii) was determined.

(ii) N/A

(2) The owner or operator shall keep up-to-date, readily accessible continuous records of the indication of flow to the control device or the indication of bypass flow or records of monthly inspections of car-seals or lock-and-key configurations used to seal bypass lines, specified under section §§ 60.756.

(3) N/A

(4) N/A

(d) The owner or operator shall keep for the life of the collection system an up-to-date, readily accessible plot map showing each existing and planned collector in the system and providing a unique identification location label for each collector.

(1) The owner or operator shall keep up-to-date, readily accessible records of the installation date and location of all newly installed collectors as specified under §§ 60.755(b).

(2) The owner or operator shall shall keep readily accessible documentation of the nature, date of deposition, amount, and location of asbestos-containing or nondegradable waste excluded from collection as provided in §§ 60.759(a)(3)(i) as well as any nonproductive areas excluded from collection as provided in §§ 60.759(a)(3)(ii).

(e) The owner or operator shall keep for at least 5 years up-to-date, readily accessible records of all collection and control system exceedances of the operational standards in section §§ 60.753, the reading in the subsequent month whether or not the second reading is an exceedance, and the location of each exceedance.

(f) N/A



Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING DESCRIPTION

Reporting Requirements: AS REQUIRED - SEE MONITORING DESCRIPTION

**Condition 25: Compliance Demonstration**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable Federal Requirement:40CFR 60.759, NSPS Subpart WWW**

**Item 25.1:**

The Compliance Demonstration activity will be performed for:

Emission Unit: U-000CU

Regulated Contaminant(s):

CAS No: 0NY998-20-0 NMOC - LANDFILL USE ONLY

**Item 25.2:**

Compliance Demonstration shall include the following monitoring:

Monitoring Type: RECORD KEEPING/MAINTENANCE PROCEDURES

Monitoring Description:

Specifications for active collection systems.

(a) The owner or operator shall site active collection wells, horizontal collectors, surface collectors, or other extraction devices at a sufficient density throughout all gas producing areas using the following procedures:

(1) The collection devices within the interior and along the perimeter areas shall be certified to achieve comprehensive control of surface gas emissions by a professional engineer. The following issues shall be addressed in the design: depths of refuse, refuse gas generation rates and flow characteristics, cover properties, gas system expandibility, leachate and condensate management, accessibility, compatibility with filling operations, integration with closure end use, air intrusion control, corrosion resistance, fill settlement, and resistance to the refuse decomposition heat.

(2) The sufficient density of gas collection devices determined in paragraph (a)(1) of this section shall address landfill gas migration issues and augmentation of the collection system through the use of active systems at the landfill perimeter or exterior.

(3) The placement of gas collection devices determined in paragraph (a)(1) of this section shall control all gas producing areas, except as provided by paragraphs (a)(3)(i) and (a)(3)(ii) of this section.

(i) Any segregated area of asbestos or nondegradable material may be excluded from collection if documented as provided under §§ 60.758(d). The documentation shall provide the nature, date of



deposition, location and amount of asbestos or nondegradable material deposited in the area, and shall be provided to the Administrator upon request.

(ii) Any nonproductive area of the landfill may be excluded from control, provided that the total of all excluded areas can be shown to contribute less than 1 percent of the total amount of NMOC emissions from the landfill. The amount, location, and age of the material shall be documented and provided to the Administrator upon request. A separate NMOC emissions estimate shall be made for each section proposed for exclusion, and the sum of all such sections shall be compared to the NMOC emissions estimate for the entire landfill. Emissions from each section shall be computed using the equation in §§ 60.759(a)(3)(ii).

(iii) The values for  $k$  and CNMOC determined in field testing shall be used if field testing has been performed in determining the NMOC emission rate or the radii of influence (this distance from the well center to a point in the landfill where the pressure gradient applied by the blower or compressor approaches zero). If field testing has not been performed, the default values for  $k$ , LO and CNMOC provided in §§ 60.754(a)(1) or the alternative values from §§ 60.754(a)(5) shall be used. The mass of nondegradable solid waste contained within the given section may be subtracted from the total mass of the section when estimating emissions provided the nature, location, age, and amount of the nondegradable material is documented as provided in paragraph (a)(3)(i) of this section.

(b) The owner or operator shall construct the gas collection devices using the following equipment or procedures:

(1) The landfill gas extraction components shall be constructed of polyvinyl chloride (PVC), high density polyethylene (HDPE) pipe, fiberglass, stainless steel, or other nonporous corrosion resistant material of suitable dimensions to: convey projected amounts of gases; withstand installation, static, and settlement forces; and withstand planned overburden or traffic loads. The collection system shall extend as necessary to comply with emission and migration standards. Collection devices such as wells and horizontal collectors shall be perforated to allow gas entry without head loss sufficient to impair performance across the intended extent of control. Perforations shall be situated with regard to the need to prevent excessive air infiltration.

(2) Vertical wells shall be placed so as not to endanger underlying liners and shall address the occurrence of water within the landfill. Holes and trenches constructed for piped wells and horizontal



collectors shall be of sufficient cross-section so as to allow for their proper construction and completion including, for example, centering of pipes and placement of gravel backfill. Collection devices shall be designed so as not to allow indirect short circuiting of air into the cover or refuse into the collection system or gas into the air. Any gravel used around pipe perforations should be of a dimension so as not to penetrate or block perforations.

(3) Collection devices may be connected to the collection header pipes below or above the landfill surface. The connector assembly shall include a positive closing throttle valve, any necessary seals and couplings, access couplings and at least one sampling port. The collection devices shall be constructed of PVC, HDPE, fiberglass, stainless steel, or other nonporous material of suitable thickness.

(c) The owner or operator shall convey the landfill gas to a control system in compliance with section §§ 60.752(b)(2)(iii) through the collection header pipe(s). The gas mover equipment shall be sized to handle the maximum gas generation flow rate expected over the intended use period of the gas moving equipment using the following procedures:

(1) N/A

(2) For new collection systems, the maximum flow rate shall be in accordance with section §§ 60.755(a)(1).

Monitoring Frequency: AS REQUIRED - SEE PERMIT MONITORING DESCRIPTION

Reporting Requirements: AS REQUIRED - SEE MONITORING DESCRIPTION



**STATE ONLY ENFORCEABLE CONDITIONS**  
**\*\*\*\* Facility Level \*\*\*\***

**NOTIFICATION OF GENERAL PERMITTEE OBLIGATIONS**  
**This section contains terms and conditions which are not federally enforceable. Permittees may also have other obligations under regulations of general applicability**

**Item A: Public Access to Recordkeeping for Facilities With State Facility Permits - 6 NYCRR 201-1.10 (a)**

Where emission source owners and/or operators keep records pursuant to compliance with the operational flexibility requirements of 6 NYCRR Subpart 201-5.4(b)(1) , and/or the emission capping requirements of 6 NYCRR Subparts 201-7.2(d), 201-7.3(f), 201-7.3(g), 201-7.3(h)(5), 201-7.3(i) and 201-7.3(j), the Department will make such records available to the public upon request in accordance with 6 NYCRR Part 616 - Public Access to Records. Emission source owners and/or operators must submit the records required to comply with the request within sixty working days of written notification by the Department of receipt of the request.

**Item B: General Provisions for State Enforceable Permit Terms and Condition - 6 NYCRR Part 201-5**

Any person who owns and/or operates stationary sources shall operate and maintain all emission units and any required emission control devices in compliance with all applicable Parts of this Chapter and existing laws, and shall operate the facility in accordance with all criteria, emission limits, terms, conditions, and standards in this permit. Failure of such person to properly operate and maintain the effectiveness of such emission units and emission control devices may be sufficient reason for the Department to revoke or deny a permit.

The owner or operator of the permitted facility must maintain all required records on-site for a period of five years and make them available to representatives of the Department upon request. Department representatives must be granted access to any facility regulated by this Subpart, during normal operating hours, for the purpose of determining compliance with this and any other state and federal air pollution control requirements, regulations or law.

**STATE ONLY APPLICABLE REQUIREMENTS**

**The following conditions are state only enforceable.**



**Condition 29: Contaminant List**

**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable State Requirement:ECL 19-0301**

**Item 29.1:**

Emissions of the following contaminants are subject to contaminant specific requirements in this permit(emission limits, control requirements or compliance monitoring conditions).

CAS No: 000630-08-0  
Name: CARBON MONOXIDE

CAS No: 0NY100-00-0  
Name: HAP

CAS No: 0NY210-00-0  
Name: OXIDES OF NITROGEN

CAS No: 0NY998-00-0  
Name: VOC

CAS No: 0NY998-20-0  
Name: NMOC - LANDFILL USE ONLY

**Condition 30: Unavoidable noncompliance and violations**

**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable State Requirement:6 NYCRR 201-1.4**

**Item 30.1:**

At the discretion of the commissioner a violation of any applicable emission standard for necessary scheduled equipment maintenance, start-up/shutdown conditions and malfunctions or upsets may be excused if such violations are unavoidable. The following actions and recordkeeping and reporting requirements must be adhered to in such circumstances.

(a) The facility owner and/or operator shall compile and maintain records of all equipment maintenance or start-up/shutdown activities when they can be expected to result in an exceedance of any applicable emission standard, and shall submit a report of such activities to the commissioner's representative when requested to do so in writing or when so required by a condition of a permit issued for the corresponding air contamination source except where conditions elsewhere in this permit which contain more stringent reporting and notification provisions for an applicable requirement, in which case they supercede those stated here. Such reports shall describe why the violation was unavoidable and shall include the time, frequency and duration of the maintenance and/or start-up/shutdown activities and the identification of air contaminants, and the estimated emission rates. If a facility owner and/or operator is subject to continuous stack monitoring and quarterly reporting requirements, he need not submit reports for equipment maintenance or start-up/shutdown for the facility to the commissioner's representative.

(b) In the event that emissions of air contaminants in excess of any emission standard



in 6 NYCRR Chapter III Subchapter A occur due to a malfunction, the facility owner and/or operator shall report such malfunction by telephone to the commissioner's representative as soon as possible during normal working hours, but in any event not later than two working days after becoming aware that the malfunction occurred. Within 30 days thereafter, when requested in writing by the commissioner's representative, the facility owner and/or operator shall submit a written report to the commissioner's representative describing the malfunction, the corrective action taken, identification of air contaminants, and an estimate of the emission rates. These reporting requirements are superseded by conditions elsewhere in this permit which contain reporting and notification provisions for applicable requirements more stringent than those above.

(c) The Department may also require the owner and/or operator to include in reports described under (a) and (b) above an estimate of the maximum ground level concentration of each air contaminant emitted and the effect of such emissions depending on the deviation of the malfunction and the air contaminants emitted.

(d) In the event of maintenance, start-up/shutdown or malfunction conditions which result in emissions exceeding any applicable emission standard, the facility owner and/or operator shall take appropriate action to prevent emissions which will result in contravention of any applicable ambient air quality standard. Reasonably available control technology, as determined by the commissioner, shall be applied during any maintenance, start-up/shutdown or malfunction condition subject to this paragraph.

(e) In order to have a violation of a federal regulation (such as a new source performance standard or national emissions standard for hazardous air pollutants) excused, the specific federal regulation must provide for an affirmative defense during start-up, shutdowns, malfunctions or upsets.

**Condition 31: Emission Unit Definition**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable State Requirement:6 NYCRR Subpart 201-5**

**Item 31.1:**

The facility is authorized to perform regulated processes under this permit for:

Emission Unit: U-000CU

Emission Unit Description:

Emission unit U-000CU comprises the entire municipal solid waste landfill. It is a combination of all gas extraction/collection devices with the associated control devices (i.e., enclosed flare) to combust the landfill gas. The active gas collection system covers all landfill cells where waste is placed.

Building(s): OPRT

**Condition 32: Air pollution prohibited**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable State Requirement:6 NYCRR 211.2**

**Item 32.1:**

**New York State Department of Environmental Conservation**

Permit ID: 9-0438-00004/00013

Facility DEC ID: 9043800004



No person shall cause or allow emissions of air contaminants to the outdoor atmosphere of such quantity, characteristic or duration which are injurious to human, plant or animal life or to property, or which unreasonably interfere with the comfortable enjoyment of life or property. Notwithstanding the existence of specific air quality standards or emission limits, this prohibition applies, but is not limited to, any particulate, fume, gas, mist, odor, smoke, vapor, pollen, toxic or deleterious emission, either alone or in combination with others.

**\*\*\*\* Emission Unit Level \*\*\*\***

**Condition 33: Emission Point Definition By Emission Unit**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable State Requirement:6 NYCRR Subpart 201-5**

**Item 33.1:**

The following emission points are included in this permit for the cited Emission Unit:

Emission Unit: U-000CU

Emission Point: 000F1

Height (ft.): 50

Diameter (in.): 132

NYTMN (km.): 4696.9

NYTME (km.): 218.4

Building: OPRT

**Condition 34: Process Definition By Emission Unit**  
**Effective between the dates of 01/09/2008 and Permit Expiration Date**

**Applicable State Requirement:6 NYCRR Subpart 201-5**

**Item 34.1:**

This permit authorizes the following regulated processes for the cited Emission Unit:

Emission Unit: U-000CU

Process: SWL

Source Classification Code: 5-03-006-01

Process Description:

Emission unit U-000CU, Process SWL is a municipal solid waste landfill which will only accept municipal solid waste and not co-dispose of any non-residential wastes. An active gas collection and control system consisting of a John Zinc Company Landfill Gas Ultra Low Emission Flare System will be installed during construction and/or operation of Stage I. System operation will be initiated as soon as there is sufficient gas being generated to utilize the flare. The emissions are NMOCs, criteria pollutants, and hazardous air pollutants. A NMOC default value of 595 ppmv was used to determine the estimated emissions from the landfill. This is the AP-42 default value for landfills that accept only municipal solid waste and are not a co-disposal facility. To determine when an active gas collection and control system would require installation, a NMOC default concentration of 4000 ppmv



was used in accordance with 40 CFR 60 Subpart WWW and it was determined that an active gas collection and control system would be required after the first year of operation. Therefore, the active gas collection and control system will be installed during construction of the landfill as previously mentioned. In addition, a landfill gas ultra low emission flare will be used resulting in significantly less CO emissions than indicated by the published emission factors.

Emission Source/Control: 000FL - Control  
Control Type: FLARING

Emission Source/Control: LFGCS - Process

Emission Source/Control: LNDFL - Process

