

QUARTERLY DATA SUMMARY REPORT FIRST QUARTER 2017

NIAGARA COUNTY REFUSE DISTRICT SITE

Wheatfield, Niagara County, New York

(NYSDEC Site No. 9-32-026)

SUBMITTED TO:



UNITED STATES
ENVIRONMENTAL PROTECTION
AGENCY



NEW YORK STATE
DEPARTMENT OF
ENVIRONMENTAL CONSERVATION

SUBMITTED FOR:

**NIAGARA COUNTY REFUSE DISTRICT
AND PRP GROUP**

PREPARED BY:

PARSONS

40 La Riviere Drive, Suite 350
Buffalo, New York 14202
(716) 541-0730 Fax (716) 541-0760

April 2017

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TABLE OF CONTENTS

Page No.

SECTION 1 INTRODUCTION.....	1-1
1.1 Procedures	1-1
1.1.1 Effluent Sampling.....	1-1
1.1.2 Groundwater Sampling.....	1-1
1.1.3 Water Level Measurements.....	1-1
1.1.4 Site Inspections.....	1-1
SECTION 2 RESULTS	2-1
2.1 Effluent Samples	2-1
2.2 Groundwater Analytical Results	2-1
2.3 Water Levels.....	2-1
2.4 Site Inspections.....	2-1
2.5 Maintenance	2-2
2.6 OM&M Oversight	2-2
SECTION 3 SUMMARY AND CONCLUSIONS	3-1
SECTION 4 REFERENCES.....	4-1
APPENDIX A CITY OF NORTH TONAWANDA INDUSTRIAL WASTEWATER DISCHARGE PERMIT	
APPENDIX B WATER LEVEL RECORDS	
APPENDIX C MONTHLY INSPECTION LOGS	
APPENDIX D MAINTENANCE RECORD LOGS	
APPENDIX E COMPACT DISK CONTAINING REPORT	

TABLE OF CONTENTS

Page No.

LIST OF TABLES

Table 2.1 Quarterly Site Inspection Results Summary	2-3
---	-----

LIST OF FIGURES

Figure 1.1 Site Plan.....	1-3
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SECTION 1

INTRODUCTION

The Niagara County Refuse Site Potentially Responsible Parties (PRP) Group completed a remedial action at the Niagara County Refuse Site (Site), Wheatfield, New York in 2000. The remedial action was conducted in accordance with the United States Environmental Protection Agency (USEPA) Record of Decision (USEPA, 1993) and the United States District Court Consent Decree (USEPA, 1995). The PRP Group is currently performing operations, maintenance, and monitoring (OM&M) in accordance with the USEPA-approved OM&M Manual (CRA, 2000). This data report summarizes the third quarter monitoring activities conducted from January through March 2017.

1.1 PROCEDURES

1.1.1 Effluent Sampling

The current Industrial Wastewater Discharge Permit (Appendix A) was issued by the City of North Tonawanda, and is effective through April 1, 2019. The current permit has a reduced analytical chemical parameter list compared to the original permit, and a semi-annual sampling frequency. Prior to March 2007, samples were collected monthly. In the current reporting period (January through March 2017), an effluent sample was not collected. The next effluent sample is scheduled to be collected in April 2017. Effluent samples are collected from Wet Well A, which receives water from the leachate collection system surrounding the landfill. Composite 24-hour samples are collected from Wet Well A using an automated sampler.

1.1.2 Groundwater Sampling

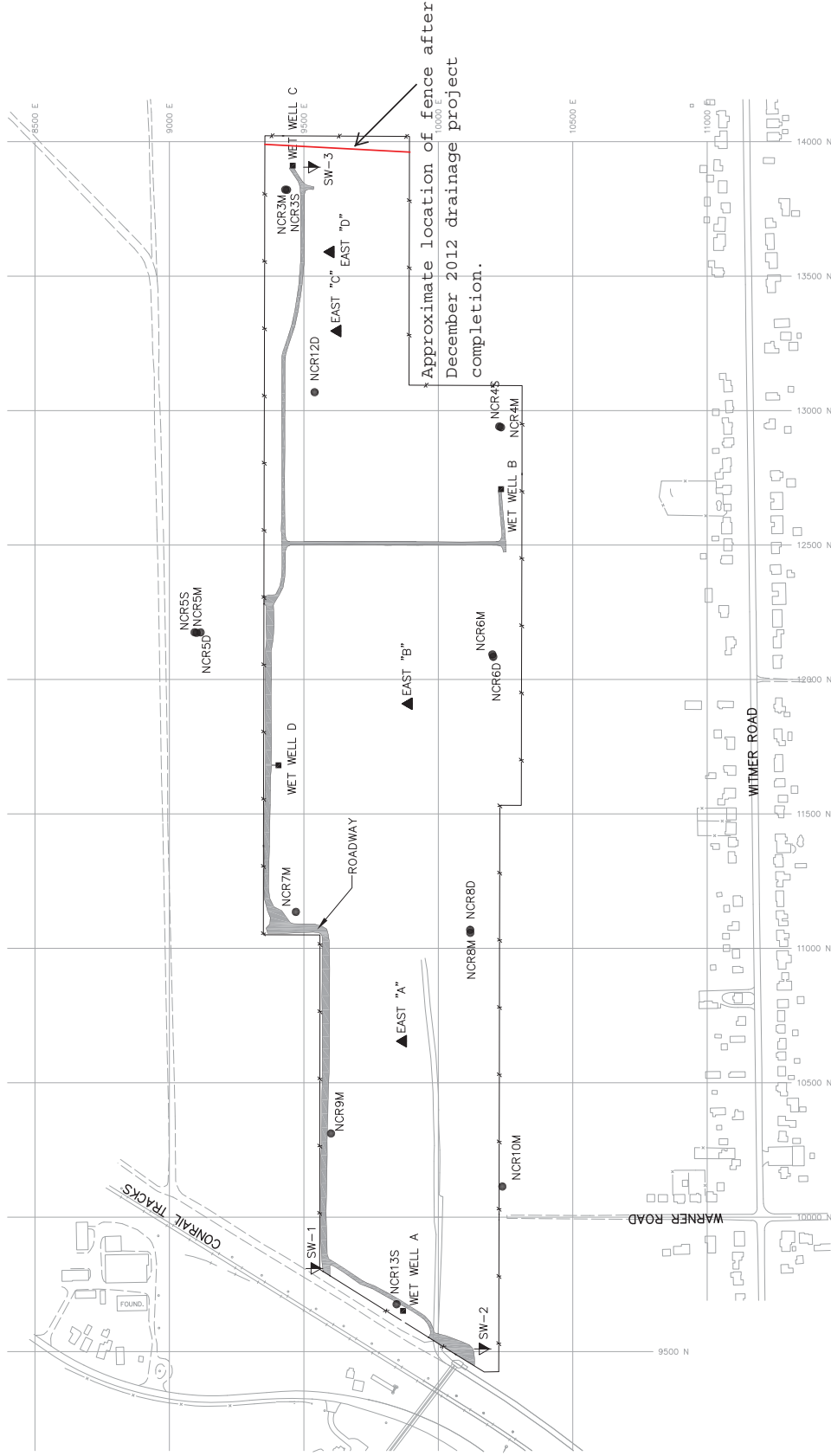
Groundwater samples were not collected during this reporting period. In accordance with the approved OM&M Plan (CRA, 2000), the groundwater sampling frequency was decreased from a quarterly to a semi-annual basis in 2003, and from a semi-annual to an annual basis beginning in 2006. The next round of groundwater samples is scheduled to be collected in April 2017.

1.1.3 Water Level Measurements

Water levels were measured in January, February, and March 2017 at four observation well locations (Piezometers East A, East B, East C, and East D), four effluent monitoring locations (Wet Wells A, B, C, and D), and four monitoring well locations (NCR-3S, NCR-4S, NCR-5S, and NCR-13S). The water levels were measured with an electronic water level indicator, and reported as an elevation above mean sea level. Figure 1.1 shows the locations of the water level monitoring points.

1.1.4 Site Inspections

Monthly Site inspections were conducted on January 19, February 16, and March 13, 2017. During the Site inspections, the manholes, wet wells, landfill cap, wetlands, perimeter fence, drainage ditches, swale outlets, culverts, gas vents, and monitoring wells were each visually inspected.



LEGEND

- ▲ EAST "A" WATER LEVEL MONITORING WELL LOCATION
- ▼ SW-2 SURFACE WATER MONITORING LOCATION
- WET WELL A EFFLUENT MONITORING LOCATION
- NCR13S GROUNDWATER QUALITY MONITORING LOCATION

FIGURE 1.1

NIAGARA COUNTY REFUSE SITE
WHEATFIELD, NEW YORK
SITE PLAN

PARSONS

180 LAWRENCE BELL DRIVE, SUITE 104, WILLAMSVILLE, N.Y. 14221, PHONE: 716-633-7074

SECTION 2

RESULTS

This section describes the results of the first quarter OM&M activities conducted in January, February, and March 2017. Activities during this quarter included repairs to wet well A, troubleshooting the autodialer, replacement of the float switches in Wet Well B, water level measurements from observation wells and wet wells, and monthly Site inspections.

2.1 EFFLUENT SAMPLES

No effluent samples were required to be collected under the discharge permit during the reporting period. The next effluent sampling is scheduled to be collected in April 2017. The current City of North Tonawanda Industrial Wastewater Discharge Permit (March 31, 2016 through April 1, 2019) is included in Appendix A.

2.2 GROUNDWATER ANALYTICAL RESULTS

Monitoring wells NCR-3S, NCR-4S, NCR-5S, and NCR-13S were not sampled during this reporting quarter, based on the current annual groundwater sampling schedule specified in the OM&M Manual (CRA, 2000). Groundwater sample collection for the above-listed wells is planned for April 2017, assuming groundwater levels are adequate, and sufficient water is available for sampling within the wells. The locations of the monitoring wells are provided in Figure 1.1.

2.3 WATER LEVELS

Results of water level measurements collected during this reporting period are presented in Appendix B. Water levels were collected from the monitoring locations on January 4, February 6, and March 6, 2017. Water levels generally increased over the reporting period. Measured water levels were consistent with the levels observed in previous years between January and March.

2.4 SITE INSPECTIONS

A summary of the Site inspection findings is included in Table 2.1. Copies of the Site Inspection Logs have been included in Appendix C.

Each of the inspections found the manholes and wet wells to be in good condition. Water levels were measured in the wet wells during the inspections and recorded on the water level records.

Examination of the landfill cap vegetative cover included checking for erosion, bare areas, wash-outs, leachate seeps, height of vegetation, and assessing the condition of the vegetation. No surface erosion or leachate seeps were noted. The grass covering on the landfill was noted as normal for winter conditions during the January and February inspections, with no action required, during each of the inspections during the reporting period. No dead or dying vegetation was noted on the landfill cap.

Additionally, the access roads were examined for erosion, potholes/puddles, and obstructions. All aspects of the access roads that were examined were deemed acceptable during each of the inspections during the reporting period.

The wetlands were visually examined to assess the condition of the vegetation, change in water levels, and to observe general conditions. No issues were noted with the wetland vegetation during the inspections. The water level in the wetland was noted to be within the range expected during each of the inspections. No dead or dying wetland vegetation was noted during the site inspections. The general condition of the wetlands was noted as good during the January and February inspections, with no action required, during each of the inspections during the reporting period.

No dead or dying vegetation was noted in the drainage ditches and swale outlets during the January through March Site inspections. No erosion or flow obstruction was observed and the condition of the erosion protection devices were in good condition.

All other parts of the landfill system which were examined, including the culverts and gas vents, were found to be in acceptable condition during the reporting period.

2.5 MAINTENANCE

No scheduled maintenance was required during the reporting period. Unscheduled maintenance during the reporting period included two Site visits to address high water in Wet Well A and a third visit to replacing a broken float switch in Wet Well B. The first site visit to address a high-water level in Wet Well A occurred January 20 and required replacement of the discharge hose to the wet well. The second occurred February 15 and required reattaching the discharge hose as well as troubleshooting the autodialer. A broken float switch was replaced in Wet Well B on March 22.

A copy of the Maintenance Record Logs have been included in Appendix D.

No major repairs were required during the reporting quarter.

2.6 OM&M OVERSIGHT

Parsons' Quality Assurance (QA) work included periodic oversight of OM&M activities by GHD, review of monthly inspection and monitoring data, and periodic communications with GHD. Upon completion of work performed by GHD, routine activity report forms were completed. Parsons reviewed the report forms for completeness, and recorded problems, if any, on the forms (Appendices B, C, and D).

Table 2.1
Quarterly Site Inspection Results Summary

Inspection Item	Acceptable	Requires Action	Comments
Manholes	X		No issues were identified.
Wet Wells	X		Water levels were measured monthly. Repairs to the discharge hose in Wet Well A and replacement of a float switch in Wet Well B were completed during the quarter.
Wetlands	X		Water levels were within the historical range. No dead or dying vegetation in the wetlands was noted during the monthly inspections.
Perimeter Fence	X		No damage was observed during the quarter.
Condition of Roads	X		No potholes were observed.
Integrity of the Cap	X		No erosion was observed. Vegetation was in conditions typical for winter in January and February. No dead or dying vegetation was noted during the inspections.
Drainage Ditches/Swales	X		No dead or dying vegetation was noted in the ditches and swales during the site inspections.
Gas Venting System	X		No issues were identified.
Wells	X		Water levels were measured monthly. However, each of the monitoring wells was dry during the reporting period.
Culverts	X		No issues were identified.
Other	X		No issues were identified with any other aspects of the site.

SECTION 3

SUMMARY AND CONCLUSIONS

The following summary and conclusions were developed based on the data collected during this reporting period:

- The landfill was inspected monthly and was appropriately maintained. No major repairs were required during the reporting period.
- As specified in the OM&M Manual, annual groundwater monitoring commenced in 2006. Groundwater samples are currently scheduled to be collected in April 2017, assuming sufficient groundwater is available in the wells.
- Water levels were measured in the wet wells, monitoring wells, and the observation wells on the landfill on a monthly basis. Water levels generally increased over the reporting period. Measured water levels were consistent with the levels observed in previous years between January and March.
- Wetlands vegetation was in a condition typical for the time of year during each of the monthly inspections. The wetlands vegetation will continue to be visually assessed during the monthly site inspections.

SECTION 4

REFERENCES

Record of Decision, Niagara County Refuse Site, Wheatfield, Niagara County, New York; United States Environmental Protection Agency, September 1993.

Consent Decree, Docket 946-849; United States Environmental Protection Agency, February 3, 1995.

Operations, Maintenance and Monitoring Manual for Niagara County Refuse District Site Remedial Construction, Wheatfield, Niagara County, New York; Conestoga-Rovers & Associates, December 2000.

APPENDIX A

CITY OF NORTH TONAWANDA INDUSTRIAL WASTEWATER DISCHARGE PERMIT

CITY OF NORTH TONAWANDA
INDUSTRIAL WASTEWATER DISCHARGE PERMIT

Permit Number: 2628010

In accordance with the provisions of the Clean Water Act as amended, all terms and conditions set forth in this permit, the City of North Tonawanda Local Sewer Use Ordinance and any applicable Federal, State or local laws or regulations, authorization is hereby granted to:

Niagara County Department of Public Works
Engineering Department
59 Park Avenue
Lockport, NY 14094

Site: **Niagara County Refuse Site**

Witmer Road
Town of Wheatfield, NY 14120

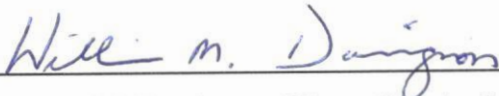
Classified by S.I.C. Number(s): N/A

for the discharge of ground water and other wastes generated during Remedial Action construction and implementation into the City of North Tonawanda Sewerage System.

This permit is granted in accordance with an application filed in the offices of the Water/Wastewater Superintendent located at 830 River Road, and in conformity with specifications and other required data submitted in support of the above named application, all of which are filed with and considered part of this permit. This permit is also granted in accordance with discharge limitations and requirements, monitoring and reporting requirements, and all other conditions set forth in Parts I and II hereof.

Effective this 31st day of March, 2016

To expire the 1st day of April, 2019



William M. Davignon, Water Works Superintendent

Signed this 11th day of March, 2016

PART I. SPECIFIC CONDITIONS**A. DISCHARGE LIMITATIONS AND MONITORING REQUIREMENTS**

During the period beginning the effective date of this permit and lasting until the expiration date, discharge from the permitted facility outfall(s) shall be limited and monitored by the permittee as specified below (Refer to attached map for sampling and monitoring sites).

Sample Point	Parameter	Discharge Limitations mg/l except pH Daily Max.	Sampling Period	Sampling Type
001	Total Flow		1 Sampling Day Monthly	continuous
	pH	Monitor Only	1 Sampling Day Monthly	grab
	Aluminum	2.0	1 Sampling Day semi-annual	24 hr comp.
	Lead	4.6	1 Sampling Day semi-annual	24 hr comp.
	Iron	10	1 Sampling Day semi-annual	24 hr comp.
	Magnesium	Monitor Only	1 Sampling Day semi-annual	24 hr comp.
	Sodium	Monitor Only	1 Sampling Day semi-annual	24 hr comp.
	BOD	Monitor Only	1 Sampling Day semi-annual	24 hr comp.
	Total Suspended Solids	Monitor Only	1 Sampling Day semi-annual	24 hr comp.

PART I. SPECIFIC CONDITIONS**B. DISCHARGE MONITORING AND REPORTING REQUIREMENTS**

During the period beginning the effective date of this permit and lasting until the expiration date, discharge monitoring results shall be summarized and reported by the permittee no later than the days specified below.

Sample Point	Parameter	Initial Monitoring Report	Subsequent Monitoring Reports
001	Total Flow	January 31, 2007	Semi-annual
	Lead	January 31, 2007	Semi-annual
	Iron	January 31, 2007	Semi-annual
	Magnesium	January 31, 2007	Semi-annual
	Sodium	January 31, 2007	Semi-annual
	pH	January 31, 2007	Semi-annual
	BOD	January 31, 2007	Semi-annual
	Total Suspended Solids	January 31, 2007	Semi-annual

PART I. SPECIFIC CONDITIONS

C. SPECIAL REQUIREMENTS

- 1) This permit is written for a duration of three (3) years. Upon renewal of this permit, all parameters will be re-evaluated to develop a parameter list based on chemical concentrations present in the extracted groundwater.
- 2) Frequency of monitoring is to be re-evaluated yearly.
- 3) All monitoring reports (initial and subsequent), are to be received by the Superintendent, no later than thirty (30) days after receipt of validated data.
- 4) It is required that the Permittee have a Site Operations Manual available at all times. All emergency phone numbers must be listed in an appropriate place for easy access by operations personnel. The Permittee shall not discharge into the City of North Tonawanda sewerage treatment works during WWTP overflow conditions. The Permittee is required to cease all pumping operations upon verbal request of the North Tonawanda Water/Wastewater Superintendent or his designee. Pumping operations shall not recommence until approval by the North Tonawanda Water/Wastewater Superintendent or his designee.
- 5) Analysts are required to use GC/MS method detection limits for most organics (if GC/MS is appropriate); GC/ECD for PCB's/Pesticides and GF method detection limits for metals (where GF is appropriate), as contained in attachment 5 of the NYSDEC TOGs 1.3.8 – New Discharges to Publicly Owned Treatment Works – dated 10/26/94.

APPENDIX B

WATER LEVEL RECORDS

WATER LEVEL RECORD

PROJECT NAME: *NIAGARA COUNTY
REFUSE SITE*

LOCATION: Wheatfield, New York

DATE: 01/04/17
(MM DD YY)

CREW MEMBERS: Tony Manns

Observation Well	Time of Measurement	Top of Casing Elevation A	Depth to Water B	Water Level Elevation A-B
		feet	feet	feet
EAST "A"	1048	598.93	27.01	571.92
EAST "B"	1044	596.23	Dry	596.23
EAST "C"	1029	598.69	20.57	578.12
EAST "D"	1100	593.20	15.24	577.96
NCR-3S	1013	579.60	3.93	579.60
NCR-4S	1039	577.88	3.50	577.88
NCR-5S	1004	579.34	Dry	579.34
NCR-13S	0944	577.15	Dry	577.15

WET WELLS

Wet Well	Time of Measurement	Total Flow	Depth of Water
WW A	0930		3'4"
WW B	1034		3'2"
WW C	1020		2'1"
WW D	0950		2'11"

Total System Flow	Time of Measurement
9964000	0935

Water Level Meter: NF07581

FP-3D

WATER LEVEL RECORD

PROJECT NAME: *NIAGARA COUNTY
REFUSE SITE*

LOCATION: Wheatfield, New York

DATE: 02/06/17
(MM DD YY)

CREW MEMBERS: Tony Manns

Observation Well	Time of Measurement	Top of Casing Elevation A	Depth to Water B	Water Level Elevation A-B
		feet	feet	feet
EAST "A"	1154	598.93	26.31	572.62
EAST "B"	1149	596.23	Dry	596.23
EAST "C"	1135	598.69	17.55	581.14
EAST "D"	1203	593.20	15.78	577.42
NCR-3S	1128	579.60	4.24	579.60
NCR-4S	1140	577.88	3.32	577.88
NCR-5S	1121	579.34	Dry	579.34
NCR-13S	1103	577.15	5.23	577.15

WET WELLS

Wet Well	Time of Measurement	Total Flow	Depth of Water
WW A	1100		2' 3"
WW B	1144		2' 1"
WW C	1131		2' 8"
WW D	1111		2' 1"

Total System Flow	Time of Measurement
10683000	1055

Water Level Meter: NF08289

WATER LEVEL RECORD

PROJECT NAME: *NIAGARA COUNTY
REFUSE SITE*

LOCATION: Wheatfield, New York

DATE: 03/06/17
(MM DD YY)

CREW MEMBERS: Tony Manns

Observation Well	Time of Measurement	Top of Casing Elevation A	Depth to Water B	Water Level Elevation A-B
		feet	feet	feet
EAST "A"	1523	598.93	26.49	572.44
EAST "B"	1516	596.23	Dry	596.23
EAST "C"	1451	598.69	17.80	580.89
EAST "D"	1443	593.20	16.11	577.09
NCR-3S	1436	579.60	4.43	579.60
NCR-4S	1504	577.88	3.43	577.88
NCR-5S	1427	579.34	6.79	579.34
NCR-13S	1415	577.15	4.89	577.15

WET WELLS

Wet Well	Time of Measurement	Total Flow	Depth of Water
WW A	1100		2' 8"
WW B	1144		1' 4"
WW C	1131		2' 11"
WW D	1111		3' 5"

Total System Flow	Time of Measurement
11345000	1411

Water Level Meter: NF08289

FP-3D

APPENDIX C
MONTHLY INSPECTION LOGS

MONTHLY INSPECTION LOG

PROJECT NAME: Niagara County Refuse Site

LOCATION: Wheatfield, NY

DATE: 1/19/2017
(MM DD YY)INSPECTOR(S): Tony Manns

<i>Item</i>	<i>Inspect For</i>	<i>Action Required</i>	<i>Comments</i>
1 Perimeter collection System/Off-Site Forcemain			
<input checked="" type="checkbox"/> Manholes	- cover on securely	<u>None</u>	<u>Good</u>
<input checked="" type="checkbox"/>	- condition of cover	<u>None</u>	<u>Good</u>
<input checked="" type="checkbox"/>	- condition of inside of manhole	<u>None</u>	<u>Good</u>
<input checked="" type="checkbox"/>	- flow conditions	<u>None</u>	<u>Good</u>
<input checked="" type="checkbox"/> Wet Wells	- cover on securely	<u>None</u>	<u>Good</u>
<input checked="" type="checkbox"/>	- condition of cover	<u>None</u>	<u>Good</u>
<input checked="" type="checkbox"/>	- condition of inside of wet well	<u>None</u>	<u>Good</u>
2 Landfill Cap			
<input checked="" type="checkbox"/> Vegetated Soil Cover	- erosion	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- bare areas	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- washouts	<u>None</u>	<u>none</u>
<input checked="" type="checkbox"/>	- leachate seeps	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- length of vegetation	<u>None</u>	<u>Normal for winter conditions.</u>
<input checked="" type="checkbox"/>	- dead/dying vegetation	<u>None</u>	<u>Normal for winter conditions.</u>

MONTHLY INSPECTION LOG

PROJECT NAME: Niagara County Refuse Site

LOCATION: Wheatfield, NY

DATE: 1/19/2017
(MM DD YY)INSPECTOR(S): Tony Manns

<i>Item</i>	<i>Inspect For</i>	<i>Action Required</i>	<i>Comments</i>
2 Landfill Cap (continued)			
<input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/>	Access Roads	- bare areas, dead/dying veg.	None
		- erosion	None
		- potholes or puddles	None
		- obstruction	None
3 Wetlands (Area "F")			
<input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/>		- dead/dying vegetation	None
		- change in water budget	None
		- general conditions of wetlands	Good
4 Other Site Systems			
<input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/>	Perimeter Fence	- integrity of fence	Good
		- integrity of gates	Good
		- integrity of locks	Good
		- placement and condition of signs	Good

MONTHLY INSPECTION LOG

PROJECT NAME: Niagara County Refuse Site

LOCATION: Wheatfield, NY

DATE: 1/19/2017
(MM DD YY)INSPECTOR(S): Tony Manns

<i>Item</i>	<i>Inspect For</i>	<i>Action Required</i>	<i>Comments</i>
4 Other Site Systems (continued)			
<input checked="" type="checkbox"/> Drainage Ditches/	- sediment buildup	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/> Swale Outlets	- erosion	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- condition of erosion protection	<u>None</u>	<u>Good</u>
<input checked="" type="checkbox"/>	- flow obstructions	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- dead/dying vegetation	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- cable concrete/gabion mats and riprap	<u>None</u>	<u>Good</u>
<input checked="" type="checkbox"/> Culverts	- sediment build-up	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- erosion	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- condition of erosion protection	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- flow obstructions	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/> Gas Vents	- intact/damage	<u>None</u>	<u>Intact</u>
<input checked="" type="checkbox"/> Wells	- locks secure	<u>None</u>	<u>Yes</u>

MONTHLY INSPECTION LOG

PROJECT NAME: Niagara County Refuse Site

LOCATION: Wheatfield, NY

DATE: 2/16/2017
(MM DD YY)INSPECTOR(S): Tony Manns

<i>Item</i>	<i>Inspect For</i>	<i>Action Required</i>	<i>Comments</i>
1 Perimeter collection System/Off-Site Forcemain			
<input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/>	Manholes	- cover on securely	None
		- condition of cover	None
		- condition of inside of manhole	None
		- flow conditions	None
<input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/>	Wet Wells	- cover on securely	None
		- condition of cover	None
		- condition of inside of wet well	None
2 Landfill Cap			
<input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/>	Vegetated Soil Cover	- erosion	None
		- bare areas	None
		- washouts	None
		- leachate seeps	None
		- length of vegetation	None
		- dead/dying vegetation	None
			None
			None
			none
			None
			Normal for winter conditions.
			Normal for winter conditions.

MONTHLY INSPECTION LOG

PROJECT NAME: Niagara County Refuse Site

LOCATION: Wheatfield, NY

DATE: 2/16/2017
(MM DD YY)INSPECTOR(S): Tony Manns

<i>Item</i>	<i>Inspect For</i>	<i>Action Required</i>	<i>Comments</i>
2 Landfill Cap (continued)			
<input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/>	Access Roads	- bare areas, dead/dying veg.	None
		- erosion	None
		- potholes or puddles	None
		- obstruction	None
3 Wetlands (Area "F")			
<input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/>		- dead/dying vegetation	None
		- change in water budget	None
		- general conditions of wetlands	Good
4 Other Site Systems			
<input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/>	Perimeter Fence	- integrity of fence	Good
		- integrity of gates	Good
		- integrity of locks	Good
		- placement and condition of signs	Good

MONTHLY INSPECTION LOG

PROJECT NAME: Niagara County Refuse Site

LOCATION: Wheatfield, NY

DATE: 2/16/2017
(MM DD YY)INSPECTOR(S): Tony Manns

<i>Item</i>	<i>Inspect For</i>	<i>Action Required</i>	<i>Comments</i>
4 Other Site Systems (continued)			
<input checked="" type="checkbox"/> Drainage Ditches/	- sediment buildup	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/> Swale Outlets	- erosion	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- condition of erosion protection	<u>None</u>	<u>Good</u>
<input checked="" type="checkbox"/>	- flow obstructions	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- dead/dying vegetation	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- cable concrete/gabion mats and riprap	<u>None</u>	<u>Good</u>
<input checked="" type="checkbox"/> Culverts	- sediment build-up	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- erosion	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- condition of erosion protection	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/>	- flow obstructions	<u>None</u>	<u>None</u>
<input checked="" type="checkbox"/> Gas Vents	- intact/damage	<u>None</u>	<u>Intact</u>
<input checked="" type="checkbox"/> Wells	- locks secure	<u>None</u>	<u>Yes</u>

MONTHLY INSPECTION LOG

PROJECT NAME: Niagara County Refuse Site

LOCATION: Wheatfield, NY

DATE: 3/13/2017
(MM DD YY)INSPECTOR(S): Tony Manns

<i>Item</i>	<i>Inspect For</i>	<i>Action Required</i>	<i>Comments</i>
1 Perimeter collection System/Off-Site Forcemain			
<input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/>	Manholes	- cover on securely	None
		- condition of cover	None
		- condition of inside of manhole	None
		- flow conditions	None
<input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/>	Wet Wells	- cover on securely	None
		- condition of cover	None
		- condition of inside of wet well	None
2 Landfill Cap			
<input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/> <input checked="" type="checkbox"/>	Vegetated Soil Cover	- erosion	None
		- bare areas	None
		- washouts	None
		- leachate seeps	None
		- length of vegetation	None
		- dead/dying vegetation	None

MONTHLY INSPECTION LOG

PROJECT NAME: Niagara County Refuse Site

LOCATION: Wheatfield, NY

DATE: 3/13/2017
(MM DD YY)INSPECTOR(S): Tony Manns

<i>Item</i>	<i>Inspect For</i>	<i>Action Required</i>	<i>Comments</i>
2 Landfill Cap (continued)			
<input checked="" type="checkbox"/>	Access Roads	- bare areas, dead/dying veg.	None
		- erosion	None
		- potholes or puddles	None
		- obstruction	None
3 Wetlands (Area "F")			
<input checked="" type="checkbox"/>		- dead/dying vegetation	None
		- change in water budget	None
		- general conditions of wetlands	None
4 Other Site Systems			
<input checked="" type="checkbox"/>	Perimeter Fence	- integrity of fence	None
		- integrity of gates	None
		- integrity of locks	None
		- placement and condition of signs	None

MONTHLY INSPECTION LOG

PROJECT NAME: Niagara County Refuse Site

LOCATION: Wheatfield, NY

DATE: 3/13/2017
(MM DD YY)INSPECTOR(S): Tony Manns

<i>Item</i>	<i>Inspect For</i>	<i>Action Required</i>	<i>Comments</i>
4 Other Site Systems (continued)			
<input checked="" type="checkbox"/> Drainage Ditches/	- sediment buildup	None	None
<input checked="" type="checkbox"/> Swale Outlets	- erosion	None	None
<input checked="" type="checkbox"/>	- condition of erosion protection	None	None
<input checked="" type="checkbox"/>	- flow obstructions	None	None
<input checked="" type="checkbox"/>	- dead/dying vegetation	None	None
<input checked="" type="checkbox"/>	- cable concrete/gabion mats and riprap	None	None
<input checked="" type="checkbox"/> Culverts	- sediment build-up	None	None
<input checked="" type="checkbox"/>	- erosion	None	None
<input checked="" type="checkbox"/>	- condition of erosion protection	None	None
<input checked="" type="checkbox"/>	- flow obstructions	None	None
<input checked="" type="checkbox"/> Gas Vents	- intact/damage	None	None
<input checked="" type="checkbox"/> Wells	- locks secure	None	None

APPENDIX D
MAINTENANCE RECORD LOGS

MAINTENANCE RECORD LOG

PROJECT NAME: Niagara County Refuse Site

LOCATION: Wheatfield, New York

CREW MEMBERS: Tony Manns

1. Date 1/20/2017

Time 2345

Scheduled/Unscheduled: Unscheduled

Type of Maintenance Performed: Discharge hose on main WWA pump replacement.

2. Company Performing Maintenance GHD

Name: Tony Manns / Britt Gebhardt

Address: 2055 Niagara Falls blvd

Niagara Falls, NY 14304

Contact Name: (716) 818-6241

3. Methods Used: Replaced broken hose.

Description of Material Removed:

N/A

Problems/Comments: I received a WWA high alarm alert on my phone.

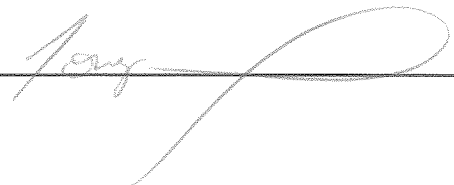
DATE 1/20/2017

INSPECTOR

INSPECTOR'S SIGNATURE

FORM 2

Tony Manns



MAINTENANCE RECORD LOG

PROJECT NAME: Niagara County Refuse Site

LOCATION: Wheatfield, New York

CREW MEMBERS: Tony Manns

1. Date 2/15/2017

Time 0935

Scheduled/Unscheduled: Unscheduled

Type of Maintenance Performed: Discharge hose reattached

2. Company Performing Maintenance GHD

Name: Tony Manns / Britt Gebhardt

Address: 2055 Niagara Falls blvd

Niagara Falls, NY 14304

Contact Name: (716) 818-6241

3. Methods Used: Replaced hose on WWA main pump. Pressure from dispelling so much water must have jarred it loose.

I replaced the C clamps on the unit as well.

Description of Material Removed:

N/A

Problems/Comments: Trouble shot auto dialer to find out why I wasn't notified of the high level.

System is back to normal.

DATE 2/16/2017

INSPECTOR

INSPECTOR'S SIGNATURE

FORM 2

Tony Manns



MAINTENANCE RECORD LOG

PROJECT NAME: Niagara County Refuse Site

LOCATION: Wheatfield, New York

CREW MEMBERS: Tony Manns

1. Date 3/22/2017

Time 1100

Scheduled/Unscheduled: Unscheduled

Type of Maintenance Performed: Replaced broken float switch

2. Company Performing Maintenance GHD

Name: Tony Manns

Address: 2055 Niagara Falls blvd

Niagara Falls, NY 14304

Contact Name: (716) 818-6241

3. Methods Used: Removed broken float switch and replaced with new float switch in Wet Well B.

Description of Material Removed:

Broken float switch

Problems/Comments: Old float switch wasn't working properly. Unit wasn't turning pump off when water level was low.

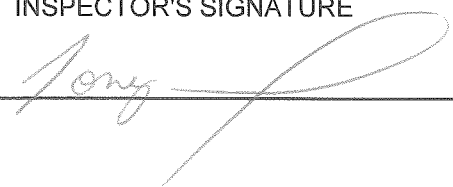
DATE 3/22/2017

INSPECTOR

INSPECTOR'S SIGNATURE

FORM 2

Tony Manns



APPENDIX E

COMPACT DISK CONTAINING REPORT