



MISSOURI DEPARTMENT OF NATURAL RESOURCES
FIELD SHEET AND CHAIN-OF-CUSTODY RECORD



Tape sealed and initialed

Shipped

Hand Delivered

Description of Delivery

Total No. Of Containers: 2

Carrier: _____

By: _____

Collector's Name:

(Please Print)

Joe Twellman

LAB USE ONLY!

Laboratory ID:

Location:

Affiliation: KCRO NERO SERO SLRO SWRO WPP DGLS HWP ESP MoDOT

(circle one) MDC DHSS Other:

Sample Number	Sample Collected	Analyses Requested	Disinfect. Type	Field Parameters (include units)	Matrix (circle one)	Container Type	Preservative Type	Number of Containers
134555 (Sample A)	Date: 12/12/13	BOD; TSS/WFR	(circle one) None	D.O. Flow pH Cond. Temp. Other:	Water	1L CN 500 CN	4C 4C	1
For Lab Use Only	Time: 1445		Cl ₂ UV Ozone Other:		Soil Organic Sludge Other:			
(Sample B)	Date:		None	D.O. Flow pH Cond. Temp. Other:	Water			
For Lab Use Only	Time:		Cl ₂ UV Ozone Other:		Soil Organic Sludge Other:			
(Sample C)	Date:		None	D.O. Flow pH Cond. Temp. Other:	Water			
For Lab Use Only	Time:		Cl ₂ UV Ozone Other:		Soil Organic Sludge Other:			
(Sample D)	Date:		None	D.O. Flow pH Cond. Temp. Other:	Water			
For Lab Use Only	Time:		Cl ₂ UV Ozone Other:		Soil Organic Sludge Other:			

Relinquished By:

[Signature]

Received By:

[Signature]

Date:

12-12-13

Time:

1520 HES

Relinquished By:

[Signature]

Received By:

[Signature]

Date:

12-12-13

Time:

1607

Relinquished By:

[Signature]

Received By:

[Signature]

Date:

12-12-13

Time:

1805

[Signature]

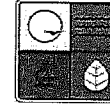
[Signature]

12-13-13

0845



MISSOURI DEPARTMENT OF NATURAL RESOURCES
FIELD SHEET AND CHAIN-OF-CUSTODY RECORD



Sample A		LDPR:	Job Code: W513 BRM N		Sample Reference ID:	
Facility ID: MO 0112771		Site/Study Name: Bridgeton Landfill		County: St. Louis		Sample Event Type: (circle one)
Sample Comment (where and how the sample was collected): Grab Composite Modified Other: 2 X grab sample @ Outfall # 003						Sample Type: (circle one)
GPS Coordinates (UTM Zone 15 NAD83 Only)		X Easting	Y Northing	Accuracy (circle one)	EPE (meters)	PDOP
		721773.4	4293664.2	± 68 ft.		

Sample B		LDPR:	Job Code:		Sample Reference ID:	
Facility ID:		Site/Study Name:		County:		Sample Event Type: (circle one)
Sample Comment (where and how the sample was collected): Grab Composite Modified Other:						Sample Type: (circle one)
GPS Coordinates (UTM Zone 15 NAD83 Only)		X Easting	Y Northing	Accuracy (circle one)	EPE (meters)	PDOP

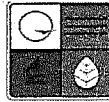
Sample C		LDPR:	Job Code:		Sample Reference ID:	
Facility ID:		Site/Study Name:		County:		Sample Event Type: (circle one)
Sample Comment (where and how the sample was collected): Grab Composite Modified Other:						Sample Type: (circle one)
GPS Coordinates (UTM Zone 15 NAD83 Only)		X Easting	Y Northing	Accuracy (circle one)	EPE (meters)	PDOP

Sample D		LDPR:	Job Code:		Sample Reference ID:	
Facility ID:		Site/Study Name:		County:		Sample Event Type: (circle one)
Sample Comment (where and how the sample was collected): Grab Composite Modified Other:						Sample Type: (circle one)
GPS Coordinates (UTM Zone 15 NAD83 Only)		X Easting	Y Northing	Accuracy (circle one)	EPE (meters)	PDOP

Remarks:
3.8°C



MISSOURI DEPARTMENT OF NATURAL RESOURCES
FIELD SHEET AND CHAIN-OF-CUSTODY RECORD



Description of Delivery
Tape sealed and initialed _____
Shipped _____
 Hand Delivered _____
Total No. Of Containers: 4
Carrier: _____
By: _____

Collector's Name: ADAM VRABEC
(Please Print)
Affiliation: KCRO NERO SERO SLRO SWRO WPP DGLS HWP ESP MoDOT
(circle one)
MDC DHSS Other: RT: 66

LAB USE ONLY!

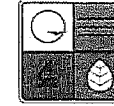
Laboratory ID: _____ Location: _____

Sample Number	Sample Collected	Analyses Requested	Disinfect. Type	Field Parameters (include units)	Matrix (circle one)	Container Type	Preservative Type	Number of Containers
134556 (Sample A)	Date: 12/12/13	BNA's, VOA	(circle one) None Cl ₂ UV Ozone Other:	D.O. Flow pH Cond. Temp. Other:	<u>Water</u> Soil Organic Sludge Other:	1L AG 40 AG	HC HCL	2 2
For Lab Use Only	Time: 1420 HRS							
(Sample B)	Date:		None Cl ₂ UV Ozone Other:	D.O. Flow pH Cond. Temp. Other:	Water Soil Organic Sludge Other:			
For Lab Use Only	Time:							
(Sample C)	Date:		None Cl ₂ UV Ozone Other:	D.O. Flow pH Cond. Temp. Other:	Water Soil Organic Sludge Other:			
For Lab Use Only	Time:							
(Sample D)	Date:		None Cl ₂ UV Ozone Other:	D.O. Flow pH Cond. Temp. Other:	Water Soil Organic Sludge Other:			
For Lab Use Only	Time:							

Relinquished By: <u>[Signature]</u>	Received By: <u>[Signature]</u>	Date: 12-12-13	Time: 1607
Relinquished By: <u>[Signature]</u>	Received By: <u>[Signature]</u>	Date: 12-12-13	Time: 1804
Relinquished By: <u>[Signature]</u>	Received By: <u>[Signature]</u>	Date: 12-13-13	Time: 0845



MISSOURI DEPARTMENT OF NATURAL RESOURCES
FIELD SHEET AND CHAIN-OF-CUSTODY RECORD



Sample A		LDPR: FEEJE	Job Code: NJ13 BRWN		Sample Reference ID:								
Facility ID:	118912	Site/Study Name:	BRIDGETON SANITARY LANDFILL		County:	ST. LOUIS							
Sample Comment (where and how the sample was collected): SOUTH OF OUTFALL #003 BETWEEN FENCELINE AND CULVERT PIPE													
<table border="0"> <tr> <td colspan="3"> <input checked="" type="checkbox"/> Grab <input type="checkbox"/> Composite <input type="checkbox"/> Modified <input type="checkbox"/> Other: </td> <td colspan="2"> Sample Event Type: (circle one) Bypass/SSO Complaint Emergency Response Inspection Investigation Monitoring <input checked="" type="checkbox"/> Special Project </td> <td colspan="2"> Sample Type: (circle one) Air Soil Container Spill <input checked="" type="checkbox"/> Discharge Storm Water Groundwater Surface Water Organic Wipes Sediment Sludge Drinking Water Supply </td> </tr> </table>							<input checked="" type="checkbox"/> Grab <input type="checkbox"/> Composite <input type="checkbox"/> Modified <input type="checkbox"/> Other:			Sample Event Type: (circle one) Bypass/SSO Complaint Emergency Response Inspection Investigation Monitoring <input checked="" type="checkbox"/> Special Project		Sample Type: (circle one) Air Soil Container Spill <input checked="" type="checkbox"/> Discharge Storm Water Groundwater Surface Water Organic Wipes Sediment Sludge Drinking Water Supply	
<input checked="" type="checkbox"/> Grab <input type="checkbox"/> Composite <input type="checkbox"/> Modified <input type="checkbox"/> Other:			Sample Event Type: (circle one) Bypass/SSO Complaint Emergency Response Inspection Investigation Monitoring <input checked="" type="checkbox"/> Special Project		Sample Type: (circle one) Air Soil Container Spill <input checked="" type="checkbox"/> Discharge Storm Water Groundwater Surface Water Organic Wipes Sediment Sludge Drinking Water Supply								
GPS Coordinates (UTM Zone 15 NAD83 Only)	X Easting	Y Northing	Accuracy	(circle one)									
	721773.4	4293664.2	± 68 ft.	EPE (meters)	PDOP								

Sample B		LDPR:	Job Code:		Sample Reference ID:								
Facility ID:		Site/Study Name:			County:								
Sample Comment (where and how the sample was collected): Grab Composite Modified Other:													
<table border="0"> <tr> <td colspan="3"> <input type="checkbox"/> Grab <input type="checkbox"/> Composite <input type="checkbox"/> Modified <input type="checkbox"/> Other: </td> <td colspan="2"> Sample Event Type: (circle one) Bypass/SSO Complaint Emergency Response Inspection Investigation Monitoring Special Project </td> <td colspan="2"> Sample Type: (circle one) Air Soil Container Spill Discharge Storm Water Groundwater Surface Water Organic Wipes Sediment Sludge Drinking Water Supply </td> </tr> </table>							<input type="checkbox"/> Grab <input type="checkbox"/> Composite <input type="checkbox"/> Modified <input type="checkbox"/> Other:			Sample Event Type: (circle one) Bypass/SSO Complaint Emergency Response Inspection Investigation Monitoring Special Project		Sample Type: (circle one) Air Soil Container Spill Discharge Storm Water Groundwater Surface Water Organic Wipes Sediment Sludge Drinking Water Supply	
<input type="checkbox"/> Grab <input type="checkbox"/> Composite <input type="checkbox"/> Modified <input type="checkbox"/> Other:			Sample Event Type: (circle one) Bypass/SSO Complaint Emergency Response Inspection Investigation Monitoring Special Project		Sample Type: (circle one) Air Soil Container Spill Discharge Storm Water Groundwater Surface Water Organic Wipes Sediment Sludge Drinking Water Supply								
GPS Coordinates (UTM Zone 15 NAD83 Only)	X Easting	Y Northing	Accuracy	(circle one)									
				EPE (meters)	PDOP								

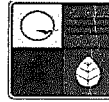
Sample C		LDPR:	Job Code:		Sample Reference ID:								
Facility ID:		Site/Study Name:			County:								
Sample Comment (where and how the sample was collected): Grab Composite Modified Other:													
<table border="0"> <tr> <td colspan="3"> <input type="checkbox"/> Grab <input type="checkbox"/> Composite <input type="checkbox"/> Modified <input type="checkbox"/> Other: </td> <td colspan="2"> Sample Event Type: (circle one) Bypass/SSO Complaint Emergency Response Inspection Investigation Monitoring Special Project </td> <td colspan="2"> Sample Type: (circle one) Air Soil Container Spill Discharge Storm Water Groundwater Surface Water Organic Wipes Sediment Sludge Drinking Water Supply </td> </tr> </table>							<input type="checkbox"/> Grab <input type="checkbox"/> Composite <input type="checkbox"/> Modified <input type="checkbox"/> Other:			Sample Event Type: (circle one) Bypass/SSO Complaint Emergency Response Inspection Investigation Monitoring Special Project		Sample Type: (circle one) Air Soil Container Spill Discharge Storm Water Groundwater Surface Water Organic Wipes Sediment Sludge Drinking Water Supply	
<input type="checkbox"/> Grab <input type="checkbox"/> Composite <input type="checkbox"/> Modified <input type="checkbox"/> Other:			Sample Event Type: (circle one) Bypass/SSO Complaint Emergency Response Inspection Investigation Monitoring Special Project		Sample Type: (circle one) Air Soil Container Spill Discharge Storm Water Groundwater Surface Water Organic Wipes Sediment Sludge Drinking Water Supply								
GPS Coordinates (UTM Zone 15 NAD83 Only)	X Easting	Y Northing	Accuracy	(circle one)									
				EPE (meters)	PDOP								

Sample D		LDPR:	Job Code:		Sample Reference ID:								
Facility ID:		Site/Study Name:			County:								
Sample Comment (where and how the sample was collected): Grab Composite Modified Other:													
<table border="0"> <tr> <td colspan="3"> <input type="checkbox"/> Grab <input type="checkbox"/> Composite <input type="checkbox"/> Modified <input type="checkbox"/> Other: </td> <td colspan="2"> Sample Event Type: (circle one) Bypass/SSO Complaint Emergency Response Inspection Investigation Monitoring Special Project </td> <td colspan="2"> Sample Type: (circle one) Air Soil Container Spill Discharge Storm Water Groundwater Surface Water Organic Wipes Sediment Sludge Drinking Water Supply </td> </tr> </table>							<input type="checkbox"/> Grab <input type="checkbox"/> Composite <input type="checkbox"/> Modified <input type="checkbox"/> Other:			Sample Event Type: (circle one) Bypass/SSO Complaint Emergency Response Inspection Investigation Monitoring Special Project		Sample Type: (circle one) Air Soil Container Spill Discharge Storm Water Groundwater Surface Water Organic Wipes Sediment Sludge Drinking Water Supply	
<input type="checkbox"/> Grab <input type="checkbox"/> Composite <input type="checkbox"/> Modified <input type="checkbox"/> Other:			Sample Event Type: (circle one) Bypass/SSO Complaint Emergency Response Inspection Investigation Monitoring Special Project		Sample Type: (circle one) Air Soil Container Spill Discharge Storm Water Groundwater Surface Water Organic Wipes Sediment Sludge Drinking Water Supply								
GPS Coordinates (UTM Zone 15 NAD83 Only)	X Easting	Y Northing	Accuracy	(circle one)									
				EPE (meters)	PDOP								

Remarks:
3.8°C



MISSOURI DEPARTMENT OF NATURAL RESOURCES
FIELD SHEET AND CHAIN-OF-CUSTODY RECORD



Tape sealed and initialed

Shipped

Hand Delivered

Description of Delivery

Total No. Of Containers: 5

Carrier: _____

By: _____

Collector's Name:

(Please Print)

ADAM VRABEC

Affiliation: KCRO NERO SERO SLRO SWRO WPP DGLS HWP ESP MoDOT
(circle one) MDC DHSS Other: RT. 46

LAB USE ONLY!

Laboratory ID:

Location:

Sample Number	Sample Collected	Analyses Requested	Disinfect. Type	Field Parameters (include units)	Matrix (circle one)	Container Type	Preservative Type	Number of Containers
134558 (Sample A)	Date: 12-12-13	OIL AND GREASE TOTAL RECOVERABLE IRON CHLORIDES AND SULFATES	(circle one) None Cl ₂ UV Ozone Other:	D.O. Flow pH Cond. Temp. Other:	Water	500 CN 500 CN 8oz CG 1L AG	4C H ₂ SO ₄ HNO ₃ H ₂ SO ₄	1 2 1 1
For Lab Use Only	Time: 1730	AMMONIA COD						
(Sample B)	Date:		None Cl ₂ UV Ozone Other:	D.O. Flow pH Cond. Temp. Other:	Water Soil Organic Sludge Other:			
For Lab Use Only	Time:							
(Sample C)	Date:		None Cl ₂ UV Ozone Other:	D.O. Flow pH Cond. Temp. Other:	Water Soil Organic Sludge Other:			
For Lab Use Only	Time:							
(Sample D)	Date:		None Cl ₂ UV Ozone Other:	D.O. Flow pH Cond. Temp. Other:	Water Soil Organic Sludge Other:			
For Lab Use Only	Time:							

Relinquished By: Adam Vrabe	Received By: Adam Vrabe	Date: 12/13/13	Time: 1033
Relinquished By: Adam Vrabe	Received By: Dan Norris	Date: 12/13/13	Time: 1227
Relinquished By: Dan Norris	Received By: Dan Norris	Date: 12/13/13	Time: 1316



MISSOURI DEPARTMENT OF NATURAL RESOURCES
FIELD SHEET AND CHAIN-OF-CUSTODY RECORD



Sample A		LDPR: <u>FSLWZ</u>	Job Code: <u>NJ13BRMN</u>		Sample Reference ID:	
Facility ID:	<u>118912</u>	Site/Study Name:	<u>BRIDGETON SANITARY LANDFILL</u>		County:	<u>ST. LOUIS</u>
Sample Comment (where and how the sample was collected): <u>Grab</u> Composite Modified Other:						
<u>SAMPLE WAS COLLECTED DOWNSTREAM OF OUTFALL #003 BETWEEN FENCELINE AND THE CULVERT PIPE GOING UNDER OLD ST. CHARLES ROCK ROAD.</u>						
GPS Coordinates (UTM Zone 15 NAD83 Only)	X Easting	Y Northing	Accuracy	(circle one)		
	<u>721773.4</u>	<u>4293664.2</u>	<u>± 68ft</u>	EPE (meters)	PDOP	Special Project
				Sample Event Type: (circle one)	Sample Type: (circle one)	
				Bypass/SSO	Air	Soil
				Complaint	Container	Spill
				Emergency Response	<u>Discharge</u>	Storm Water
				Inspection	Groundwater	Surface Water
				Investigation	Organic	Wipes
				Monitoring	Sediment	
				<u>Special Project</u>	Sludge	
					Drinking Water Supply	

Sample B		LDPR:	Job Code:		Sample Reference ID:	
Facility ID:		Site/Study Name:			County:	
Sample Comment (where and how the sample was collected): <u>Grab</u> Composite Modified Other:						
GPS Coordinates (UTM Zone 15 NAD83 Only)	X Easting	Y Northing	Accuracy	(circle one)		
				EPE (meters)	PDOP	Special Project
				Sample Event Type: (circle one)	Sample Type: (circle one)	
				Bypass/SSO	Air	Soil
				Complaint	Container	Spill
				Emergency Response	Discharge	Storm Water
				Inspection	Groundwater	Surface Water
				Investigation	Organic	Wipes
				Monitoring	Sediment	
				Special Project	Sludge	
					Drinking Water Supply	

Sample C		LDPR:	Job Code:		Sample Reference ID:	
Facility ID:		Site/Study Name:			County:	
Sample Comment (where and how the sample was collected): <u>Grab</u> Composite Modified Other:						
GPS Coordinates (UTM Zone 15 NAD83 Only)	X Easting	Y Northing	Accuracy	(circle one)		
				EPE (meters)	PDOP	Special Project
				Sample Event Type: (circle one)	Sample Type: (circle one)	
				Bypass/SSO	Air	Soil
				Complaint	Container	Spill
				Emergency Response	Discharge	Storm Water
				Inspection	Groundwater	Surface Water
				Investigation	Organic	Wipes
				Monitoring	Sediment	
				Special Project	Sludge	
					Drinking Water Supply	

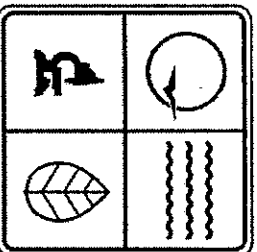
Sample D		LDPR:	Job Code:		Sample Reference ID:	
Facility ID:		Site/Study Name:			County:	
Sample Comment (where and how the sample was collected): <u>Grab</u> Composite Modified Other:						
GPS Coordinates (UTM Zone 15 NAD83 Only)	X Easting	Y Northing	Accuracy	(circle one)		
				EPE (meters)	PDOP	Special Project
				Sample Event Type: (circle one)	Sample Type: (circle one)	
				Bypass/SSO	Air	Soil
				Complaint	Container	Spill
				Emergency Response	Discharge	Storm Water
				Inspection	Groundwater	Surface Water
				Investigation	Organic	Wipes
				Monitoring	Sediment	
				Special Project	Sludge	
					Drinking Water Supply	

Remarks:
<u>3.2 °C</u>

**Missouri Department of Natural Resources
Environmental Services Program**



Order ID: 131213002 Program, Contact: SWMP Larry Lehman
Report Date: 12/19/2013 LDPR/JobCode: SWMP-BRMN / NJ13BRMN



Sample: AC16423



Customer #: 134555

Facility ID: MO0112771
County: St. Louis

Collector: JOE TWELLMAN

Site: Bridgeton Landfill
Sample Reference ID:

Affiliation: SLRO Collect Date: 12/12/2013 2:45:00PM

Entry Point:
Sample Comment: 2 x grab sample @ outfall #003.

UTM-Easting Northing
721773.4E 4293664.2N

Test	Parameter	Result	Qualifier	Units	Method
Biochemical Oxygen Demand	Biochemical Oxygen Demand	8950	13	mg/L	SM 5210-B
Total Suspended Solids (TSS) / NFR	Total Suspended Solids (TSS) / NFR	3060		mg/L	SM 2540-D

The analysis of this sample was performed in accordance with procedures approved or recognized by the U.S. Environmental Protection Agency.

Qualifier Descriptions

- 01 Improper collection method
- 02 Improper preservation
- 03 Exceeded holding time
- 04 Analyzed by Contract Laboratory
- 05 Estimated value, detected below PQL
- 06 Estimated value, QC data outside limits
- 07 Estimated value, analyte outside calibration range
- 08 Analyte present in blank at > 1/2 reported value
- 09 Sample was diluted during analysis
- 10 Laboratory error
- 11 Estimated value, matrix interference
- 11 Insufficient quantity
- 12 Estimated value, non-homogeneous sample
- 13 Estimated value, true result is >= reported value
- 14 Estimated value, non-homogeneous sample
- 15 No Result - Failed Quality Controls Requirements
- 16 Not analyzed - related analyte not detected
- 17 Results in dry weight
- 18 Sample pH is outside the acceptable range
- 19 Estimated value
- 20 Not analyzed - Instrument failure
- 21 No result - spectral interference
- 22 pH was performed at the Laboratory
- 23 Contract Lab specific qualifier - see sample comments
- 24 No result - matrix interference
- 25 No Result: Excessive Chlorination
- 26 No Result: Excessive Dechlorination
- ND Not detected at reported value

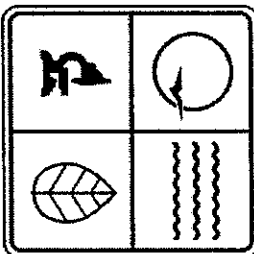
Chris Boldt

Chris Boldt, Laboratory Manager
Environmental Services Program
Division of Environmental Quality



Missouri Department of Natural Resources
Environmental Services Program

Order ID: 131213001 Program, Contact: SWMP Larry Lehman
 Report Date: 12/19/2013 LDPR/JobCode: SWMP-BRMN / NJ13BRMN



Sample: AC16422



Customer #: 134556

UTM-Easting Northing
 721773.4E 4293664.2N

Facility ID: 118912 Site: Bridgeton Sanitary Landfill
 County: St. Louis Sample Reference ID:
 Collector: ADAM VRABEC Affiliation: ESP/RT. 66
 Entry Point: Collect Date: 12/12/2013 2:20:00PM
 Sample Comment: Grab: South of outfall #003 between fence line and culvert pipe
 Precision +/- 68 ft.

Test	Parameter	Result	Qualifier	Units	Method
BNAS	1,2,4-Trichlorobenzene	<125	09, ND	µg/L	8270C
BNAS	1,2-Dichlorobenzene	<125	09, ND	µg/L	8270C
BNAS	1,3-Dichlorobenzene	<125	09, ND	µg/L	8270C
BNAS	1,4-Dichlorobenzene	<125	09, ND	µg/L	8270C
BNAS	2,4,5-Trichlorophenol	<250	09, ND	µg/L	8270C
BNAS	2,4,6-Trichlorophenol	<250	09, ND	µg/L	8270C
BNAS	2,4-Dichlorophenol	<125	09, ND	µg/L	8270C
BNAS	2,4-Dimethylphenol	162	09, 05	µg/L	8270C
BNAS	2,4-Dinitrophenol	<1250	09, ND	µg/L	8270C
BNAS	2,4-Dinitrotoluene	<500	09, ND	µg/L	8270C
BNAS	2,6-Dinitrotoluene	<125	09, ND	µg/L	8270C
BNAS	2-Chloronaphthalene	<250	09, ND	µg/L	8270C
BNAS	2-Chlorophenol	<125	09, ND	µg/L	8270C
BNAS	2-Methyl-4,6-dinitrophenol	<500	09, ND	µg/L	8270C
BNAS	2-Methylnaphthalene	<125	09, ND	µg/L	8270C
BNAS	2-Methylphenol	<125	09, ND	µg/L	8270C
BNAS	2-Nitroaniline	<125	09, ND	µg/L	8270C
BNAS	2-Nitrophenol	<125	09, ND	µg/L	8270C
BNAS	3,3-Dichlorobenzidine	<125	09, ND	µg/L	8270C
BNAS	3-Nitroaniline	<125	09, ND	µg/L	8270C
BNAS	4-Bromophenyl phenyl ether	<125	09, ND	µg/L	8270C
BNAS	4-Chloro-3-methylphenol	<125	09, ND	µg/L	8270C
BNAS	4-Chloroaniline	<125	09, ND	µg/L	8270C
BNAS	4-Chlorophenyl phenyl ether	<250	09, ND	µg/L	8270C
BNAS	4-Methylphenol	7250	09	µg/L	8270C
BNAS	4-Nitroaniline	<125	09, ND	µg/L	8270C

Sample: AC16422



Customer #: 134556

Facility ID: 118912

County: St Louis

Collector: ADAM VRABEC

Entry Point:

Sample Comment:

Precision

UTM-Easting 721773.4E

Northing 4293664.2N

Grab; South of outfall #003 between fence line and culvert pipe

Site: Bridgeton Sanitary Landfill

Sample Reference ID:

Affiliation: ESP/RT. 66

Collect Date: 12/12/2013 2:20:00PM

Test	Parameter	Result	Qualifier	Units	Method
BNAs	4-Nitrophenol	<1250	09, ND	µg/L	8270C
BNAs	Acenaphthene	<125	09, ND	µg/L	8270C
BNAs	Acenaphthylene	176	09, 05	µg/L	8270C
BNAs	Anthracene	211	09, 05	µg/L	8270C
BNAs	azobenzene	<125	09, ND	µg/L	8270C
BNAs	Benzo(a)anthracene	<125	09, ND	µg/L	8270C
BNAs	Benzo(a)pyrene	<125	09, ND	µg/L	8270C
BNAs	Benzo(b)fluoranthene	<125	09, ND	µg/L	8270C
BNAs	Benzo(g)h)perylene	<125	09, ND	µg/L	8270C
BNAs	Benzo(k)fluoranthene	<125	09, ND	µg/L	8270C
BNAs	Benzoic Acid	21500	09	µg/L	8270C
BNAs	bis(2-Chloroethoxy)methane	<500	09, ND	µg/L	8270C
BNAs	bis(2-Chloroethyl)ether	<125	09, ND	µg/L	8270C
BNAs	bis(2-chloroisopropyl)ether	<125	09, ND	µg/L	8270C
BNAs	bis(2-Ethylhexyl) phthalate	<250	09, ND	µg/L	8270C
BNAs	Butyl benzyl phthalate	<250	09, ND	µg/L	8270C
BNAs	Chrysene	<125	09, ND	µg/L	8270C
BNAs	Dibenzo(a,h)anthracene	<125	09, ND	µg/L	8270C
BNAs	Dibenzofuran	<125	09, ND	µg/L	8270C
BNAs	Diethyl phthalate	<500	09, ND	µg/L	8270C
BNAs	Dimethyl phthalate	<125	09, ND	µg/L	8270C
BNAs	Di-n-butyl phthalate	<125	09, ND	µg/L	8270C
BNAs	Di-n-octyl phthalate	<125	09, ND	µg/L	8270C
BNAs	Fluoranthene	<125	09, ND	µg/L	8270C
BNAs	Fluorene	<125	09, ND	µg/L	8270C
BNAs	Hexachlorobenzene	<125	09, ND	µg/L	8270C
BNAs	Hexachlorobutadiene	<125	09, ND	µg/L	8270C
BNAs	Hexachlorocyclopentadiene	<250	09, ND	µg/L	8270C
BNAs	Hexachloroethane	<125	09, ND	µg/L	8270C
BNAs	Indeno(1,2,3-cd)pyrene	<125	09, ND	µg/L	8270C
BNAs	Isophorone	<125	09, ND	µg/L	8270C
BNAs	Naphthalene	<125	09, ND	µg/L	8270C
BNAs	Nitrobenzene	<125	09, ND	µg/L	8270C
BNAs	n-Nitroso-di-n-propylamine	<125	09, ND	µg/L	8270C
BNAs	n-Nitrosodiphenylamine	<1250	09, ND	µg/L	8270C

Sample: AC16422
 Customer #: 134556

Facility ID: 118912
 County: St. Louis
 Collector: ADAM VRABEC

Site: Bridgeton Sanitary Landfill
 Sample Reference ID:
 Affiliation: ESP/RT. 66

Collect Date: 12/12/2013 2:20:00PM

UTM-Easting 721773.4E
 Northing 4293664.2N

Entry Point:
 Sample Comment: Grab: South of outfall #003 between fence line and culvert pipe
 Precision +/- 68 ft.

Test	Parameter	Result	Qualifier	Units	Method
BNAS	Pentachlorophenol	<125	09, ND	µg/L	8270C
BNAS	Phenanthrene	<125	09, ND	µg/L	8270C
BNAS	Phenol	7520	09	µg/L	8270C
BNAS	Pyrene	<125	09, ND	µg/L	8270C
VOAS	1,1,1,2-Tetrachloroethane	<50.0	09, ND	µg/L	8260B
VOAS	1,1,1-Trichloroethane	<50.0	09, ND	µg/L	8260B
VOAS	1,1,2,2-Tetrachloroethane	<50.0	09, ND	µg/L	8260B
VOAS	1,1,2-Trichloroethane	<50.0	09, ND	µg/L	8260B
VOAS	1,1-Dichloroethane	<50.0	09, ND	µg/L	8260B
VOAS	1,1-Dichloroethene	<50.0	09, ND	µg/L	8260B
VOAS	1,1-Dichloropropane	<50.0	09, ND	µg/L	8260B
VOAS	1,2,3-Trichlorobenzene	<250	09, ND	µg/L	8260B
VOAS	1,2,3-Trichloropropane	<100	09, ND	µg/L	8260B
VOAS	1,2,4-Trichlorobenzene	<250	09, ND	µg/L	8260B
VOAS	1,2,4-Trimethylbenzene	125	09	µg/L	8260B
VOAS	1,2-Dibromo-3-chloropropane	<50.0	09, ND	µg/L	8260B
VOAS	1,2-Dibromoethane (EDB)	<50.0	09, ND	µg/L	8260B
VOAS	1,2-Dichlorobenzene	<50.0	09, ND	µg/L	8260B
VOAS	1,2-Dichloroethane	<50.0	09, ND	µg/L	8260B
VOAS	1,2-Dichloropropane	<50.0	09, ND	µg/L	8260B
VOAS	1,3,5-Trimethylbenzene	<50.0	09, ND	µg/L	8260B
VOAS	1,3-Dichlorobenzene	<50.0	09, ND	µg/L	8260B
VOAS	1,3-Dichloropropane	<50.0	09, ND	µg/L	8260B
VOAS	1,4-Dichlorobenzene	117	09	µg/L	8260B
VOAS	1-Chlorobutane	53.7	09, 05	µg/L	8260B
VOAS	2,2-Dichloropropane	<50.0	09, ND	µg/L	8260B
VOAS	2-Butanone (MEK)	41600	06, 09	µg/L	8260B
VOAS	2-Chlorotoluene	<50.0	09, ND	µg/L	8260B
VOAS	2-Hexanone	795	09	µg/L	8260B
VOAS	2-Nitropropane	<50.0	09, ND	µg/L	8260B
VOAS	4-Chlorotoluene	<50.0	09, ND	µg/L	8260B
VOAS	4-Methyl-2-pentanone(MIBK)	2510	09	µg/L	8260B
VOAS	acetone	28800	09	µg/L	8260B
VOAS	Acrylonitrile	<100	09, ND	µg/L	8260B
VOAS	Allyl Chloride	<50.0	09, ND	µg/L	8260B

Sample: AC16422



Customer #: 134556

Facility ID: 118912
County: St. Louis
Collector: ADAM VRABEC
Entry Point:

Site: Bridgeton Sanitary Landfill
Sample Reference ID:
Affiliation: ESP/RT. 66

Collect Date: 12/12/2013 2:20:00PM

Sample Comment: Grab; South of outfall #003 between fence line and culvert pipe

UTM-Easting
721773.4E
Northing
4293664.2N
Precision
+/- 68 ft.

Test	Parameter	Result	Qualifier	Units	Method
VOAs	Benzene	4590	09	µg/L	8260B
VOAs	Bromobenzene	<50.0	09, ND	µg/L	8260B
VOAs	Bromochloromethane	<50.0	09, ND	µg/L	8260B
VOAs	Bromodichloromethane	<50.0	09, ND	µg/L	8260B
VOAs	Bromoform	<50.0	09, ND	µg/L	8260B
VOAs	Bromomethane	<250	09, ND	µg/L	8260B
VOAs	carbon disulfide	<50.0	09, ND	µg/L	8260B
VOAs	Carbon Tetrachloride	<50.0	09, ND	µg/L	8260B
VOAs	Chloroacetonitrile	<1250	09, ND	µg/L	8260B
VOAs	Chlorobenzene	<50.0	09, ND	µg/L	8260B
VOAs	Chloroethane	<250	09, ND	µg/L	8260B
VOAs	Chloroform	<50.0	09, ND	µg/L	8260B
VOAs	Chloromethane	<1250	09, ND	µg/L	8260B
VOAs	cis-1,2-dichloroethene	<50.0	09, ND	µg/L	8260B
VOAs	cis-1,3-Dichloropropene	<50.0	09, ND	µg/L	8260B
VOAs	Dibromochloromethane	<50.0	09, ND	µg/L	8260B
VOAs	Dibromomethane	<50.0	09, ND	µg/L	8260B
VOAs	Dichlorodifluoromethane	<50.0	09, ND	µg/L	8260B
VOAs	Diethyl ether	<1000	09, ND	µg/L	8260B
VOAs	Ethylbenzene	192	09	µg/L	8260B
VOAs	Ethylmethacrylate	<50.0	09, ND	µg/L	8260B
VOAs	Hexachlorobutadiene	<100	09, ND	µg/L	8260B
VOAs	Hexachloroethane	<50.0	09, ND	µg/L	8260B
VOAs	Iodomethane	<250	09, ND	µg/L	8260B
VOAs	Isopropylbenzene	<50.0	09, ND	µg/L	8260B
VOAs	m&p-Xylenes	213	09	µg/L	8260B
VOAs	Methacrylonitrile	<50.0	09, ND	µg/L	8260B
VOAs	Methyl Acrylate	<500	09, ND	µg/L	8260B
VOAs	Methylene chloride	<1000	09, ND	µg/L	8260B
VOAs	Methylmethacrylate	<50.0	09, ND	µg/L	8260B
VOAs	Methyl-t-butyl ether	<50.0	09, ND	µg/L	8260B
VOAs	Naphthalene	<250	09, ND	µg/L	8260B
VOAs	n-Butylbenzene	<50.0	09, ND	µg/L	8260B
VOAs	Nitrobenzene	<500	09, ND	µg/L	8260B
VOAs	n-Propylbenzene	<50.0	09, ND	µg/L	8260B

Sample: AC16422
 Customer #: 134556

Facility ID: 118912
 County: St. Louis
 Collector: ADAM VRABEC

Site: Bridgeton Sanitary Landfill
 Sample Reference ID:
 Affiliation: ESP/RT. 66

Collect Date: 12/12/2013 2:20:00PM

UTM-Easting 721773.4E
 Northing 4293664.2N

Entry Point:
 Sample Comment: Grab, South of outfall #003 between fence line and culvert pipe
 Precision +/- 68 ft.

Test	Parameter	Result	Qualifier	Units	Method
VOAS	o-Xylene	209	09	µg/L	8260B
VOAS	Pentachloroethane	<50.0	09, ND	µg/L	8260B
VOAS	p-isopropyltoluene	374	09	µg/L	8260B
VOAS	Propionitrile	<1000	09, ND	µg/L	8260B
VOAS	sec-Butylbenzene	<50.0	09, ND	µg/L	8260B
VOAS	Styrene	<50.0	09, ND	µg/L	8260B
VOAS	tert-Butylbenzene	<100	09, ND	µg/L	8260B
VOAS	Tetrachloroethene	<50.0	09, ND	µg/L	8260B
VOAS	Tetrahydrofuran	19700	09	µg/L	8260B
VOAS	Toluene	530	09	µg/L	8260B
VOAS	Total Xylenes	422	09, ND	µg/L	8260B
VOAS	trans-1,2-Dichloroethene	<50.0	09, ND	µg/L	8260B
VOAS	trans-1,3-Dichloropropene	<50.0	09, ND	µg/L	8260B
VOAS	trans-1,4-Dichloro-2-butene	<50.0	09, ND	µg/L	8260B
VOAS	Trichloroethene	<50.0	09, ND	µg/L	8260B
VOAS	Trichlorofluoromethane	<250	09, ND	µg/L	8260B
VOAS	Vinyl Chloride	<50.0	09, ND	µg/L	8260B

The analysis of this sample was performed in accordance with procedures approved or recognized by the U.S. Environmental Protection Agency.

Chris Boldt

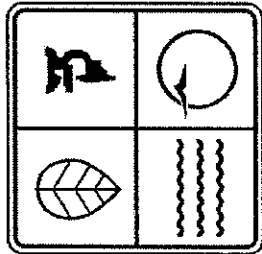
- Qualifier Descriptions**
- 01 Improper collection method
 - 03 Exceeded holding time
 - 05 Estimated value, detected below PQL
 - 07 Estimated value, analyte outside calibration range
 - 09 Sample was diluted during analysis
 - 11 Estimated value, matrix interference
 - 13 Estimated value, true result is >= reported value
 - 15 No Result - Failed Quality Controls Requirements
 - 17 Results in dry weight
 - 19 Estimated value
 - 21 No result - spectral interference
 - 23 Contract Lab specific qualifier - see sample comments
 - 25 No Result: Excessive Chlorination
 - ND Not detected at reported value
 - 02 Improper preservation
 - 04 Analyzed by Contract Laboratory
 - 06 Estimated value, QC data outside limits
 - 08 Analyte present in blank at > 1/2 reported value
 - 10 Laboratory error
 - 12 Insufficient quantity
 - 14 Estimated value, non-homogeneous sample
 - 16 Not analyzed - related analyte not detected
 - 18 Sample pH is outside the acceptable range
 - 20 Not analyzed - Instrument failure
 - 22 pH was performed at the Laboratory
 - 24 No result - matrix interference
 - 26 No Result: Excessive Dechlorination

Chris Boldt, Laboratory Manager
 Environmental Services Program
 Division of Environmental Quality



Missouri Department of Natural Resources
Environmental Services Program

Order ID: 131213005 **Program, Contact:** SWMP Larry Lehman
Report Date: 12/19/2013 **LDPR/JobCode:** SWMP-BRMN / NJ13BRMN



Sample: AC16427



Customer #: 134558

Facility ID: 118912
County: St. Louis

Site: Bridgeton Sanitary Landfill
Sample Reference ID:

Collector: ADAM VRABEC

Affiliation: ESP/Rt 66

Collect Date: 12/12/2013 5:30:00PM

UTM-Easting **Northing**
 721773.4E 4293664.2N

Entry Point:
Sample Comment:
Precision
 +/-68 ft

Grab sample was collected downstream of outfall #003 between Fenceline and the culvert pipe going under Old St Charles Rock Road. Due to the nature of the colorimetric analysis of Chloride and Sulfate, the sample was qualified for these analyses based on the possible color interference of the sample.

Test	Parameter	Result	Qualifier	Units	Method
6010B Metals-Total Recoverable	Iron	424000	09	µg/L	SW 846 6010B
Ammonia as N	Ammonia as N	396	09, 11, 14	mg/L	L 10-107-06-1-J
Chemical Oxygen Demand	Chemical Oxygen Demand	27700	09, 14	mg/L	SM 5220-D
Chloride	Chloride	2330	09, 11	mg/L	L 10-117-07-1-A
Oil And Grease	Oil And Grease	81.9		mg/L	1664
Sulfate	Sulfate	651	09	mg/L	L 10-116-10-2-A

The analysis of this sample was performed in accordance with procedures approved or recognized by the U.S Environmental Protection Agency.

Chris Boldt

Chris Boldt, Laboratory Manager
Environmental Services Program
Division of Environmental Quality

- Qualifier Descriptions**
- 01 Improper collection method
 - 02 Improper preservation
 - 03 Exceeded holding time
 - 04 Analyzed by Contract Laboratory
 - 05 Estimated value, detected below PQL
 - 06 Estimated value, QC data outside limits
 - 07 Estimated value, analyte outside calibration range
 - 08 Analyte present in blank at > 1/2 reported value
 - 09 Sample was diluted during analysis
 - 10 Laboratory error
 - 11 Estimated value, matrix interference
 - 12 Insufficient quantity
 - 13 Estimated value, true result is >= reported value
 - 14 Estimated value, non-homogeneous sample
 - 15 No Result - Failed Quality Controls Requirements
 - 16 Not analyzed - related analyte not detected
 - 17 Results in dry weight
 - 18 Sample pH is outside the acceptable range
 - 19 Estimated value
 - 20 Not analyzed - Instrument failure
 - 21 No result - spectral interference
 - 22 pH was performed at the Laboratory
 - 23 Contract Lab specific qualifier - see sample comments
 - 24 No result - matrix interference
 - 25 No Result: Excessive Chlorination
 - 26 No Result: Excessive Dechlorination
 - ND Not detected at reported value