Operation, Maintenance and Monitoring Report October 2009

NOW Corporation Site 3-14-008

Work Assignment No. D004445-4.1

Prepared for:

SUPERFUND STANDBY PROGRAM
New York State
Department of Environmental Conservation
625 Broadway
Albany, New York 12233

Prepared by:

AECOM Technical Services Northeast, Inc. 40 British American Boulevard Latham, New York 12110

December 2009



December 10, 2009

Mr. Carl Hoffman, P.E. NYSDEC Division of Environmental Remediation 625 Broadway, 12th Floor Albany, New York 12233-7013

Re: NOW Corporation - Site #3-14-008

O&M Summary Report: "October" 2009

Dear Mr. Hoffman:

This monthly summary report describes the operation, monitoring and maintenance (OM&M) of the remedial system at the NOW Corporation site in the Town of Clinton, New York, for a 24-day period (**September 28 to October 22, 2009**).

With the exceptions noted below, if any, the P&T system was online and operational throughout the reporting period. Approximately 319,100 gallons of water were treated during the period. Discharge from the treatment system averaged approximately 13,300 gallons per day (gpd). During the prior reporting period, the average discharge was 14,200 gpd.

As of the last day of the reporting period, a total of 73,339,800 gallons of groundwater had been recovered and treated by the system since it became operational in February 1998.

Table 1 summarizes influent and effluent analytical data for water samples collected on October 22, 2009. **There were no exceedances** of effluent limitations. A copy of the analytical laboratory report is attached. Table 2 summarizes selected operational data recorded on the sampling date. Table 3 presents the water level measurements taken on October 22, 2009.

AECOM made two site visits during the period to conduct the required system inspection, perform scheduled and/or unscheduled maintenance, and to collect water samples. The September 28 service visit was described in the previous report. Details for the current period follow:

October 7 – Remote monitoring on October 4th showed elevated water levels in wells TW-1 and TW-2A. Techs increased discharge rate on TW-1 submersible pump. Determined that TW-2A submersible pump motor had failed. Replaced the pump motor with onsite spare, and restarted pump. Also replaced float switch controlling effluent sump pump in response to recent erratic cycling. After finding that on/off times remained erratic, inspected and found that pump had been overheating. Replaced with rebuilt spare onsite and took overheating pump to the shop.

October 22 - Monthly system inspection and water sampling. Took quarterly water levels.

Page 2 Mr. Carl Hoffman NYSDEC

Please feel free to contact me at (518) 951-2262 if you have any questions regarding this report or the operation of the treatment system.

Sincerely,

AECOM Technical Services Northeast, Inc.

Stephen R. Choiniere

Project Manager

Table 1
Summary of Influent and Effluent Data
Sampling Date: October 22, 2009
NOW Corporation Site
Town of Clinton, New York

Analytes/	Total			Recovery Well	s	Ef	fluent
Parameters	Influent	Effluent	TW-1	TW-2A	TW-3	Lim	itations
							(units)
Quantity treated, per day		13,296				Monitor	gpd
рН	6.9	7.0				6.5 to 8.5	standard units
Oil and Grease	< 5.0	< 5.0	NA	NA	NA	15	mg/L
Total Cyanide	<10	<10	NA	NA	NA	10	ug/L
TDS	330	300	NA	NA	NA	1000	mg/L
TSS	<10	<10	NA	NA	NA	50	mg/L
Aluminum, Total	<200	<200	NA	NA	NA	2000	ug/L
Arsenic, Total	4.0 J	< 20	NA	NA	NA	50	ug/L
Barium, Total	110 J	96 J	NA	NA	NA	2000	ug/L
Chromium	2.3 J	0.74 J	NA	NA	NA	100	ug/L
Copper	6.2 J	<25	NA	NA	NA	24	ug/L
Iron	1000	< 200	NA	NA	NA	600	ug/L
Mercury	< 0.20	< 0.20	NA	NA	NA	0.8	ug/L
Manganese	1100 B	78 B	NA	NA	NA	600	ug/L
Nickel	3.3 J	1.9 J	NA	NA	NA	200	ug/L
Zinc	19 J	14 J	NA	NA	NA	150	ug/L
1,1,1-Trichloroethane	1400	< 0.50	2.3 J	3000	19	5	ug/L
1,1,2-Trichloroethane	< 20	< 0.50	< 2.5	<40	<1.0	1.2	ug/L
1,1-Dichloroethane	410	< 0.50	72	810	27	5	ug/L
1,1-Dichloroethene	39	< 0.50	23	81	3.3	0.5	ug/L
1,2-Dichloroethane	< 20	< 0.50	< 2.5	<40	<1.0	1.6	ug/L
Benzene	< 20	< 0.50	< 2.5	<40	<1.0	0.8	ug/L
Chlorobenzene	< 20	< 0.50	< 2.5	<40	<1.0	5	ug/L
Chloroethane	< 20	< 0.50	< 2.5	<40	<1.0	5	ug/L
cis-1,2-Dichloroethene	17 J	< 0.50	3.1	27 J	<1.0	5	ug/L
Ethylbenzene	< 20	< 0.50	< 2.5	<40	<1.0	5	ug/L
Methyl tert-butyl ether	<20	< 0.50	< 2.5	<40	<1.0	5	ug/L
o-Xylene	<20	< 0.50	< 2.5	<40	<1.0	5	ug/L
p&m-Xylene	< 20	< 0.50	< 2.5	<40	<1.0	10	ug/L
Tetrachloroethene	< 20	< 0.50	< 2.5	<40	<1.0	1.4	ug/L
Toluene	<20	< 0.50	< 2.5	<40	<1.0	5	ug/L
trans-1,2-Dichloroethene	<20	< 0.50	< 2.5	<40	<1.0	5	ug/L
Trichloroethene	590	< 0.50	56	1200	10	5	ug/L
Vinyl Chloride	<20	< 0.50	<2.5	<40	<1.0	0.6	ug/L

Notes.

- 1) Detected concentrations are presented in **bold** typeface, and are expressed in the units shown in far right column.
- 2) Effluent concentration boxed in **bold** denotes exceedance of effluent limitations.
- 3) NA indicates not analyzed.
- 4) "J" indicates an estimated concentration below the reporting limit (RL).
- 5) "D" denotes analytical result for a diluted sample.
- 6) "B" denotes metal detected in method blank at concentration below the RL, but above the method detection limit.

10-09 Tables.xls 12/10/2009

Table 2 Summary of October 2009 O&M Data

NOW Corporation Site Town of Clinton, New York

Instrume	ntation/Readings:	10/22/09	Units
TW-1			
	Pumping Rate	3	GPM
	Water Level Above Transducer	42.58	feet
	Flow Meter Reading	5,109,700	gallons
	Pump Pressure	24	psi
TW-2A			
	Pumping Rate	14	GPM
	Water Level Above Transducer	23.13	feet
	Flow Meter Reading	12,986,100	gallons
	Pump Pressure	35	psi
TW-3			
	Pumping Rate	1	GPM
	Water Level Above Transducer	12.38	feet
	Flow Meter Reading	7,282,800	gallons
	Pump Pressure	59	psi
Air Stripp	er		
	Stripper Blower Pressure	18	inches H ₂ O
	Air Temperature in Stripper	60	°F
	Pressure Gauge - Left Leg	0.8	inches H ₂ O
	Pressure Gauge - Right Leg	0.3	inches H ₂ O
Effluent I	Flow		
	Effluent Flow this period (calculated)	319,100	gallons
	Total Effluent Flow (calculated)	73,339,800	gallons

10-09 Tables.xls 12/10/2009

Table 3
October 2009 Groundwater Levels

NOW Corporation Site Town of Clinton, New York

	MP	10/2	22/09
Well ID	Elevation	Depth to Water	GW Elevation
		(Ft below MP)	
MW-1	289.50	17.55	271.95
MW-2	332.51	34.92	297.59
MW-3	312.83	34.65	278.18
MW-3S	312.51	29.33	283.18
MW-4	298.29	26.03	272.26
MW-4D	298.16	25.90	272.26
MW-5	285.48	20.19	265.29
MW-6S	287.90	24.52	263.38
MW-6D	287.25	15.23	272.02
MW-7S	292.12	31.59	260.53
MW-7D	292.54	76.45	216.09
OW-1	307.75	58.17	249.58
OW-2	305.96	71.74	234.22
OW-6	294.81	11.08	283.73
IW-1	312.46	40.75	271.71
IW-2	306.56	43.45	263.11

Note: N/A indicates data are not available.

MP denotes measuring point.

10-09 Tables.xls 12/10/2009



A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

November 19, 2009

Earth Tech - AECOM 40 British American Boulevard Latham, NY 12110 Attn: Mr. Stephen Choiniere

RE: Client Project: NOW Corp. Site, 94017.02, 10/09

Lab Project #: H2113

Dear Mr. Choiniere:

Enclosed please find the data report for the analyses of samples associated with the above referenced project.

If you have any questions, please do not hesitate to call me.

We appreciate your business.

Edward A. Lawler

Laboratory Operations Manager

Report of Laboratory Analyses for AECOM Technical Services

Client Project: NOW Corp. 94017.02, 10/09

Mitkem Work Order ID: H2113

November 19, 2009

Prepared For:

AECOM Technical Services 40 British American Boulevard

Latham, NY 12110

Attn: Mr. Stephen Choiniere

Prepared By:

Mitkem Laboratories

175 Metro Center Boulevard

Warwick, RI 02886

(401) 732-3400

Client: AECOM Technical Services

Client Project: NOW Corp, 94017.02, 10/09

Lab Work Order: H2113

Date samples received: 10/23/09

Project Narrative

This data report includes the analysis results for six (6) aqueous samples that were received from AECOM Technical Services on October 23, 2009. Analyses were performed per specification in the Chain of Custody form. For reference, a copy of the Mitkem Sample Log-In form is included for cross-referencing the client sample ID and laboratory sample ID.

Surrogate recoveries were within the QC limits for volatile organic analyses. Percent recoveries in laboratory control samples were within the QC limits. The following samples were analyzed at dilution: INF102209 (40X), TW-1 (5X), TW-2A (80X), and TW-3 (2X).

Spike recoveries were within the QC limits in the laboratory control samples for metals, total dissolved solids, total suspended solids, cyanide and oil & grease analyses. Manganese was detected in method blank MB-47039. Where manganese is also detected in a sample, its concentration is qualified with a "B" on data sheets. Please note that the manganese concentration in sample EFF102209 is similar to the concentration in the method blank. Matrix spike, duplicate and serial dilution analyses were performed on sample EFF102209 for ICP metals. Percent recoveries and RPDs were within the QC limits.

No other unusual occurrences were noted during sample analysis.

All pages in this report have been numbered consecutively, starting with the title page and ending with a page saying only "Last Page of Data Report".

This data report has been reviewed and is authorized for release as evidenced by the signature

Mount

below.

Edward A. Lawler

Laboratory Operations Manager

Date: 04-Nov-09

Client: AECOM Technical Services, Inc.

Client Sample ID: EFF102209

Lab ID: H2113-01

Project: NOW Corp. Site **Collection Date:** 10/22/09 11:00

Analyses	Result Qual	RL Units	DF Date Analyzed	Batch ID
SW846 8260 VOC by GC-MS (25 mL Purge)			sw	8260_25_W
Vinyl chloride	ND	0.50 μg/L	1 11/02/2009 16:58	47106
Chloroethane	ND	0.50 μg/L	1 11/02/2009 16:58	47106
1,1-Dichloroethene	ND	0.50 μg/L	1 11/02/2009 16:58	47106
trans-1,2-Dichloroethene	ND	0.50 μg/L	1 11/02/2009 16:58	47106
Methyl tert-butyl ether	ND ND	0.50 μg/L	1 11/02/2009 16:58	47106
1,1-Dichloroethane	, ND	0.50 μg/L	1 11/02/2009 16:58	47106
cis-1,2-Dichloroethene	ND	0.50 μg/L	1 11/02/2009 16:58	47106
1,1,1-Trichloroethane	ND	0.50 µg/L	1 11/02/2009 16:58	47106
1,2-Dichloroethane	ND	0.50 μg/L	1 11/02/2009 16:58	47106
Benzene	ND	0.50 μg/L	1 11/02/2009 16:58	47106
Trichloroethene	ND	0.50 μg/L	1 11/02/2009 16:58	47106
Toluene	ND	0.50 μg/L	1 11/02/2009 16:58	47106
1,1,2-Trichloroethane	ND	0.50 μg/L	1 11/02/2009 16:58	47106
Tetrachloroethene	ND	0.50 µg/L	1 11/02/2009 16:58	47106
Chlorobenzene	ND	0.50 µg/L	1 11/02/2009 16:58	47106
Ethylbenzene	ND	0.50 µg/L	1 11/02/2009 16:58	47106
m,p-Xylene	ND	0.50 µg/L	1 11/02/2009 16:58	47106
o-Xylene	ND	0.50 μg/L	1 11/02/2009 16:58	47106
Surrogate: Dibromofluoromethane	98.4	88-124 %REC	1 11/02/2009 16:58	47106
Surrogate: 1,2-Dichloroethane-d4	96.9	79-115 %REC	1 11/02/2009 16:58	47106
Surrogate: Toluene-d8	99.5	80-114 %REC	1 11/02/2009 16:58	47106
Surrogate: Bromofluorobenzene	101	60-123 %REC	1 11/02/2009 16:58	47106

Qualifiers:

ND - Not Detected at the Reporting Limit

J - Analyte detected below quanititation limits

B - Analyte detected in the associated Method Blank

DF - Dilution Factor

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

E - Value above quantitation range

Date: 04-Nov-09

Client: AECOM Technical Services, Inc.

Client Sample ID: INF102209

Lab ID: H2113-02

Project: NOW Corp. Site

Collection Date: 10/22/09 11:30

Analyses	Result Qua	l RL	Units	DF Date Analyzed	Batch ID
SW846 8260 VOC by GC-MS (25 mL Purge)				SW	/8260_25_W
Vinyl chloride	ND	20	μg/L	40 11/02/2009 17:56	47106
Chloroethane	ND	20	μg/L	40 11/02/2009 17:56	47106
1,1-Dichloroethene	39	20	µg/L	40 11/02/2009 17:56	47106
trans-1,2-Dichloroethene	· ND	20	μg/L	40 11/02/2009 17:56	47106
Methyl tert-butyl ether	ND	20	μg/L	40 11/02/2009 17:56	47106
1,1-Dichloroethane	410	20	μg/L	40 11/02/2009 17:56	47106
cis-1,2-Dichloroethene	17 J	20	μg/L	40 11/02/2009 17:56	47106
1,1,1-Trichloroethane	1400	20	μg/L	40 11/02/2009 17:56	47106
1,2-Dichloroethane	ND	20	μg/L	40 11/02/2009 17:56	47106
Benzene	ND	20	μg/L	40 11/02/2009 17:56	47106
Trichloroethene	590	20	μg/L	40 11/02/2009 17:56	47106
Toluene	ND	20	μg/L	40 11/02/2009 17:56	47106
1,1,2-Trichloroethane	ND	20	μg/L	40 11/02/2009 17:56	47106
Tetrachloroethene	ND	20	μg/L	40 11/02/2009 17:56	47106
Chlorobenzene	ND	20	μg/L	40 11/02/2009 17:56	47106
Ethylbenzene	ND	20	μg/L	40 11/02/2009 17:56	47106
m,p-Xylene	ND	20	μg/L	40 11/02/2009 17:56	47106
o-Xylene	ND	20	μg/L	40 11/02/2009 17:56	47106
Surrogate: Dibromofluoromethane	99.0	88-124	%REC	40 11/02/2009 17:56	47106
Surrogate: 1,2-Dichloroethane-d4	96.3	79-115	%REC	40 11/02/2009 17:56	47106
Surrogate: Toluene-d8	99.1	80-114	%REC	40 11/02/2009 17:56	47106
Surrogate: Bromofluorobenzene	99.6	60-123	%REC	40 11/02/2009 17:56	47106

Qualifiers:

ND - Not Detected at the Reporting Limit

J - Analyte detected below quanititation limits

B - Analyte detected in the associated Method Blank

DF - Dilution Factor

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

E - Value above quantitation range

Date: 04-Nov-09

Client: AECOM Technical Services, Inc.

Client Sample ID: TW-1

Lab ID: H2113-03

Project: NOW Corp. Site

Collection Date: 10/22/09 11:40

Analyses	Result Qual	RL Units	DF Date Analyzed	Batch ID
SW846 8260 VOC by GC-MS (25 mL Purge)			SW	/8260_25_W
Vinyl chloride	ND	2.5 μg/L	5 11/02/2009 18:26	47106
Chloroethane	ND	2.5 µg/L	5 11/02/2009 18:26	47106
1,1-Dichloroethene	23	2.5 µg/L	5 11/02/2009 18:26	47106
trans-1,2-Dichloroethene	ND	2.5 µg/L	5 11/02/2009 18:26	47106
Methyl tert-butyl ether	ND	2.5 µg/L	5 11/02/2009 18:26	47106
1,1-Dichloroethane	72	2.5 µg/L	5 11/02/2009 18:26	47106
cis-1,2-Dichloroethene	3.1	2.5 μg/L	5 11/02/2009 18:26	47106
1,1,1-Trichloroethane	2.3 J	2.5 μg/L	5 11/02/2009 18:26	47106
1,2-Dichloroethane	ND	2.5 μg/L	5 11/02/2009 18:26	47106
Benzene	ND	2.5 μg/L	5 11/02/2009 18:26	47106
Trichloroethene	56	2.5 μg/L	5 11/02/2009 18:26	47106
Toluene	ND	2.5 μg/L	5 11/02/2009 18:26	47106
1,1,2-Trichloroethane	ND	2.5 μg/L	5 11/02/2009 18:26	47106
Tetrachloroethene	ND	2.5 µg/L	5 11/02/2009 18:26	47106
Chlorobenzene	ND .	2:5 μg/L	5 11/02/2009 18:26	47106
Ethylbenzene	ND	2.5 μg/L	5 11/02/2009 18:26	47106
m,p-Xylene	ND	2.5 μg/L	5 11/02/2009 18:26	47106
o-Xylene	ND	2.5 μg/L	5 11/02/2009 18:26	47106
Surrogate: Dibromofluoromethane	99.4	88-124 %REC	5 11/02/2009 18:26	47106
Surrogate: 1,2-Dichloroethane-d4	95.4	79-115 %REC	5 11/02/2009 18:26	47106
Surrogate: Toluene-d8	101	80-114 %REC	5 11/02/2009 18:26	47106
Surrogate: Bromofluorobenzene	97.8	60-123 %REC	5 11/02/2009 18:26	47106

Qualifiers:

ND - Not Detected at the Reporting Limit

J - Analyte detected below quanititation limits

B - Analyte detected in the associated Method Blank

DF - Dilution Factor

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

E - Value above quantitation range

Date: 04-Nov-09

Client: AECOM Technical Services, Inc.

Client Sample ID: TW-2A

Lab ID: H2113-04

Project: NOW Corp. Site

Collection Date: 10/22/09 11:50

Analyses	Result Qual	RL Units	DF Date Analyzed	Batch ID
SW846 8260 VOC by GC-MS (25 mL Purge)			SW	8260_25_W
Vinyl chloride	ND	40 μg/L	80 11/02/2009 18:55	47106
Chloroethane	ND	40 μg/L	80 11/02/2009 18:55	47106
1,1-Dichloroethene	81	40 μg/L	80 11/02/2009 18:55	47106
trans-1,2-Dichloroethene	ND	40 μg/L	80 11/02/2009 18:55	47106
Methyl tert-butyl ether	ND	40 μg/L	80 11/02/2009 18:55	47106
1,1-Dichloroethane	810	40 μg/L	80 11/02/2009 18:55	47106
cis-1,2-Dichloroethene	. 27 J	40 μg/L	80 11/02/2009 18:55	47106
1,1,1-Trichloroethane	3000	40 μg/L	80 11/02/2009 18:55	47106
1,2-Dichloroethane	ND	40 μg/L	80 11/02/2009 18:55	47106
Benzene	ND ·	40 μg/L	80 11/02/2009 18:55	47106
Trichloroethene	1200	40 μg/L	80 11/02/2009 18:55	47106
Toluene	ND	40 μg/L	80 11/02/2009 18:55	47106
1,1,2-Trichloroethane	ND	40 μg/L	80 11/02/2009 18:55	47106
Tetrachloroethene	ND	40 μg/L	80 11/02/2009 18:55	47106
Chlorobenzene	ND	40 μg/L	80 11/02/2009 18:55	47106
Ethylbenzene	ND	40 μg/L	80 11/02/2009 18:55	47106
m,p-Xylene	ND	40 μg/L	80 11/02/2009 18:55	47106
o-Xylene	ND	40 μg/L	80 11/02/2009 18:55	47106
Surrogate: Dibromofluoromethane	99.3	88-124 %REC	80 11/02/2009 18:55	47106
Surrogate: 1,2-Dichloroethane-d4	96.4	79-115 %REC	80 11/02/2009 18:55	47106
Surrogate: Toluene-d8	100	80-114 %REC	80 11/02/2009 18:55	47106
Surrogate: Bromofluorobenzene	98.9	60-123 %REC	80 11/02/2009 18:55	47106

Qualifiers:

ND - Not Detected at the Reporting Limit

J - Analyte detected below quanititation limits

B - Analyte detected in the associated Method Blank

DF - Dilution Factor

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

E - Value above quantitation range

Date: 04-Nov-09

Client: AECOM Technical Services, Inc.

Client Sample ID: TW-3

Lab ID: H2113-05

Project: NOW Corp. Site

Collection Date: 10/22/09 12:00

Analyses	Result Qual	RL	Units	DF Date Analyzed	l Batch ID
SW846 8260 VOC by GC-MS (25 mL Purge)					SW8260_25_W
Vinyl chloride	ND ·	1.0	μg/L	2 11/02/2009 19:24	47106
Chloroethane	ND	1.0	μg/L	2 11/02/2009 19:24	47106
1,1-Dichloroethene	3.3	1.0	μg/L	2 11/02/2009 19:24	47106
trans-1,2-Dichloroethene	ND	1.0	μg/L	2 11/02/2009 19:24	47106
Methyl tert-butyl ether	ND	1.0	μg/L	2 11/02/2009 19:24	47106
1,1-Dichloroethane	27	1.0	μg/L	2 11/02/2009 19:24	47106
cis-1,2-Dichloroethene	ND	1.0	μg/L	2 11/02/2009 19:24	47106
1,1,1-Trichloroethane	. 19	1.0	μg/L	2 11/02/2009 19:24	47106
1,2-Dichloroethane	ND	1.0	μg/L	2 11/02/2009 19:24	47106
Benzene	ND	1.0	μg/L	2 11/02/2009 19:24	47106
Trichloroethene	10	1.0	μg/L	2 11/02/2009 19:24	47106
Toluene	ND	1.0	μg/L	2 11/02/2009 19:24	47106
1,1,2-Trichloroethane	ND	1.0	μg/L	2 11/02/2009 19:24	47106
Tetrachloroethene	ND	1.0	μg/L	2 11/02/2009 19:24	47106
Chlorobenzene	ND	1.0	μg/L	2 11/02/2009 19:24	47106
Ethylbenzene	ND	1.0	μg/L	2 11/02/2009 19:24	47106
m,p-Xylene	ND	1.0	μg/L	2 11/02/2009 19:24	47106
o-Xylene	ND	1.0	μg/L	2 11/02/2009 19:24	47106
Surrogate: Dibromofluoromethane	99.2	88-124	%REC	2 11/02/2009 19:24	47106
Surrogate: 1,2-Dichloroethane-d4	99.2	79-115	%REC	2 11/02/2009 19:24	47106
Surrogate: Toluene-d8	100	80-114	%REC	2 11/02/2009 19:24	47106
Surrogate: Bromofluorobenzene	99.8	60-123	%REC	2 11/02/2009 19:24	47106

Qualifiers:

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

B - Analyte detected in the associated Method Blank

DF - Dilution Factor

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

E - Value above quantitation range

Date: 04-Nov-09

Client: AECOM Technical Services, Inc.

Client Sample ID: TRIP BLANK

Lab ID: H2113-06

Project: NOW Corp. Site

Collection Date: 10/22/09 00:00

Analyses	Result Qual	RL Units	DF Date Analyzed	Batch ID
SW846 8260 VOC by GC-MS (25 mL Purge)			SI	N8260_25_W
Vinyl chloride	ND	0.50 μg/L	1 11/02/2009 17:27	47106
Chloroethane	ND	0.50 µg/L	1 11/02/2009 17:27	47106
1,1-Dichloroethene	ND	0.50 μg/L	1 11/02/2009 17:27	47106
trans-1,2-Dichloroethene	ND	0.50 µg/L	1 11/02/2009 17:27	47106
Methyl tert-butyl ether	ND	0.50 µg/L	1 11/02/2009 17:27	47106
1,1-Dichloroethane	ND	0.50 µg/L	1 11/02/2009 17:27	47106
cis-1,2-Dichloroethene	ND	0.50 µg/L	1 11/02/2009 17:27	47106
1,1,1-Trichloroethane	ND	0.50 µg/L	1 11/02/2009 17:27	47106
1,2-Dichloroethane	. ND	0.50 µg/L	1 11/02/2009 17:27	47106
Benzene	ND	0.50 µg/L	1 11/02/2009 17:27	47106
Trichloroethene	ND	0.50 µg/L	1 11/02/2009 17:27	47106
Toluene	ND	0.50 µg/L	1 11/02/2009 17:27	47106
1,1,2-Trichloroethane	ND .	0.50 µg/L	1 11/02/2009 17:27	47106
Tetrachloroethene	ND	0.50 μg/L	1 11/02/2009 17:27	47106
Chlorobenzene	ND	0.50 µg/L	1 11/02/2009 17:27	47106
Ethylbenzene	ND .	0.50 μg/L	1 11/02/2009 17:27	47106
m,p-Xylene	ND	0.50 µg/L	1 11/02/2009 17:27	47106
o-Xylene	ND	0.50 µg/L	1 11/02/2009 17:27	47106
Surrogate: Dibromofluoromethane	98.7	88-124 %REC	1 11/02/2009 17:27	47106
Surrogate: 1,2-Dichloroethane-d4	91.3	79-115 %REC	1 11/02/2009 17:27	47106
Surrogate: Toluene-d8	100	80-114 %REC	1 11/02/2009 17:27	47106
Surrogate: Bromofluorobenzene	101	60-123 %REC	1 11/02/2009 17:27	47106

Qualifiers:

ND - Not Detected at the Reporting Limit

J - Analyte detected below quanititation limits

B - Analyte detected in the associated Method Blank

DF - Dilution Factor

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

E - Value above quantitation range

S	
(D)	
.≓	
Ξ	
0	
¥	
ಡ	
\$ (
0	
Ō	
ਬ	
. ```	
La	
ļ	
ļ	
. ```	
ļ	
ļ	
ļ	
ļ	
ļ	

	- Charles - Serve										
CLIENT:	AECOM Technic	AECOM Technical Services, Inc.			ANALY	TICAL Q	CSUMIN	ANALYTICAL QC SUMMARY REPORT	ORT		
Work Order:	H2113			SWS	SW8260_25_W						
Project:	NOW Corp. Site		-	SWS	SW846 8260 VOC by GC-MS (25 mL Purge)	C by GC-MS	3 (25 mL P	urge)			
Sample ID: MB-47106		SampType: MBLK	TestCode	TestCode: SW8260_25_W		Prep Date:	11/02/2009		Run ID: V5_091102A		
Client ID: MB-47106		Batch ID: 47106	Units	Units: µg/L		Analysis Date: 11/02/2009	11/02/2009		SeqNo: 1144948		
Analyte			Result	PQL	SPK value	SPK Ref Val	%REC Low	%REC LowLimit HighLimit	RPD Ref Val	%RPD RPDLimit	Qual
Vinyl chloride			ND	0.50					-		
Chloroethane			ND	0.50	-				٠		
1,1-Dichloroethene			ND	0.50							
trans-1,2-Dichloroethene	thene		UND	0.50							
Methyl tert-butyl ether	her		ND	0.50							
1,1-Dichloroethane			ND	0.50							
cis-1,2-Dichloroethene	ene		QN	0.50							
1,1,1-Trichloroethane	ne		ND	0.50							
1,2-Dichloroethane			QN	0.50							
Benzene			QN	0.50							
Trichloroethene			QN .	0.50							
Toluene			ND	0.50							
1,1,2-Trichloroethane	ne		ND	0.50							
Tetrachloroethene			ND	0.50							
Chlorobenzene		:	QN	0.50							
Ethylbenzene			ND	0.50							
m,p-Xylene			ND	0.50							
o-Xylene			QN	0.50							
Surrogate: Dibror	Surrogate: Dibromofluoromethane		10.19	0.50	10.00	0	102	88 124	0		
Surrogate: 1,2-Dichloroethane-d4	chloroethane-d4		9.391	0.50	10.00	0	. 6.56	79 115	0		
Surrogate: Toluene-d8	ne-d8		10.02	0.50	10.00	0	100	80 114	0		
Surrogate: Bromofluorobenzene	ofluorobenzene	•	9.814	0.50	10.00	0	98.1	60 123	0		



B - Analyte detected in the associated Method Blank

J - Analyte detected below quantitation limits ND - Not Detected at the Reporting Limit

Qualifiers: mLIMS-001

CLIENT:	AECOM Tec	AECOM Technical Services. Inc.		SON CATALOGUE BOOK	ANALY	ANALYTICAL OC SUMMARY REPORT		MAR	/ REP	DRT		
Work Order:	H2113			SWS	SW8260_25_W		 		- 	i ; ;		
Project:	NOW Corp. Site	Site		SWS	SW846 8260 VOC by GC-MS (25 mL Purge)	C by GC-MS	(25 mL	Purge)				
Sample ID: LCS-47106	47106	SampType: LCS	TestCod	TestCode: SW8260_25_W		Prep Date	11/02/2009	60	Run ID:	D: V5_091102A		
Client ID: LCS-	LCS-47106	Batch ID: 47106	Unite	Units: pg/L		Analysis Date:	11/02/2009	6	SedN	SeqNo: 1144949		
Analyte			Result	PQL	SPK value	SPK Ref Val	%REC LO	%REC LowLimit HighLimit	hLimit	RPD Ref Val	%RPD RPDLimit	Qual
Vinyl chloride			088.6		10.00	0	98.86	77	120	0		
Chloroethane			6.907	0.50	10.00	0	99.1	75	135	0		
1,1-Dichloroethene			9.177		10.00	0	91.8	81	125	0		
trans-1,2-Dichloroethene	sthene		9.677	0.50	10.00	0	8.96	09	137	0		
Methyl tert-butyl ether	her		9.114		10.00	0	91.1	61	134	0		
1,1-Dichloroethane	<i>a</i> .		10.38	0.50	10.00	0	104	82	120	0		
cis-1,2-Dichloroethene	ene		10.14	•	10.00	0 6	101	84	116	0 (
1,1,1-Irichloroethane	ine		10.55	0.00	10.00	, ,	T00	0 × 0	124	D (
1,z-Dicholoemant			10.21	•	10.00	o c	100	ο α -	121			
Trichloroethene			10.05		10.00) C	101	74	123	o c		
Tolliene			10.44		10.00	. 0	104	. 00	117	0 0		
1.1.2-Trichloroethane	eu.		9.429		10.00	0	94.3	83	121			
Tetrachloroethene)		10.60		10.00	0	106	74	115	0		
Chlorobenzene			10.34	0.50	10.00	0	103	83	112	0		
Ethylbenzene			10.49	0.50	10.00	0	105	87	110	0		
m,p-Xylene			21.07	0.50	20.00	0	105	87	114	0		
o-Xylene			10.43	0.50	10.00	0	104	84	114	0		
Surrogate: Dibro	Surrogate: Dibromofluoromethane	0	10.09	0.50	10.00	0	101	88	124	0		
Surrogate: 1,2-D	Surrogate: 1,2-Dichloroethane-d4		9.694		10.00	0	6.96	79	115	0		
Surrogate: Toluene-d8	ne-d8		10.17		10.00	0	102	80	114	0		
Surrogate: Bromofluorobenzene	ofluorobenzene		9.571	0.50	10.00	0	95.7	09	123	0		
									,			
September 1												
				Add to the state of		* * * * * * * * * * * * * * * * * * *	-		ļ			
Qualifiers:	ND - Not Detector	ND - Not Detected at the Reporting Limit		dS - S	S - Spike Recovery outside accepted recovery limits	e accepted recovery	limits		B - A	snalvte detected in	B - Analyte detected in the associated Method Blank	Blank
mLIMS-001	I. Analyta datast	I. Analyte detected below wantitation limits	C+po	IA - A	RPD outside accented recovery limits					,	-	i
	J - Allanyin union	icu bolow quantinanou mi	SIIIS	747 - 447	D vatistian annepera	ICCOVCLY IMMES						

CLIENT:	AECOM Te	AECOM Technical Services, Inc.			ANALY	ANALYTICAL OC SUMMARY REPORT	SUM	MAR	V REP	DRT			
Work Order:	H2113			SWS	SW8260_25_W	.				- - - 			
Project:	NOW Corp. Site	. Site		SWS	SW846 8260 VC	VOC by GC-MS (25 mL Purge)	(25 mL	Purge)					
Sample ID: LCSD-47106	47106	SampType: LCSD	TestCode	TestCode: SW8260_25_W		Prep Date:	11/02/2009	60	Run ID:	D: V5_091102A			
Client ID: LCSD-47106	47106	Batch ID: 47106	Units	Units: µg/L		Analysis Date:	11/02/2009	60	SedN	SeqNo: 1144950			
Analyte			Result	PQL	SPK value	SPK Ref Val	%REC LC	%REC LowLimit HighLimit	ghLimit	RPD Ref Val	%RPD R	%RPD RPDLimit	Qual
Vinyl chloride	No. 4		9.380	0.50	10.00	0	93.8	77	120	088.6	5.19	40	
Chloroethane			9.271	0.50	10.00	0	92.7	7.5	135	9.907	6.63	40	
1,1-Dichloroethene			9.352	0.50	10.00	0	93.5	81	125	9.177	1.89	40	
trans-1,2-Dichloroethene	hene		9.536		10.00	0	95.4	09	137	9.677	1.47	40	
Methyl tert-butyl ether	_6		8.787	0.50	10.00	0 (87.9	61	134	9.114	3.65	40	
1,1-Dichloroethane			9,995	0.50	10.00	0 (100	82	120	10.38	3.77	40	
cis-1,2-Dichloroethene	e a		10.28	0.50	10.00	D C	98.4 103	8 8 7 0	124	10.14	2.01	40	
1,2-Dichloroethane			9.452	0.50	10.00	0	94.5	98	117	9.672	2.2	40	
Benzene			666.6	0.50	10.00	0	100	81	121	10.21	2.14	40	
Trichloroethene			10.24	0.50	10.00	0	102	74	123	10.05	1.8	40	
Toluene			10.41	0.50	10.00	0	104	88	117	10.44	0.335	40	
1,1,2-Trichloroethane	Ð		9.264	•	10.00	0	95.6	83	121	9.429	1.77	40	
Tetrachloroethene			10.57		10.00	0	106	74	115	10.60	0.303	40	
Chlorobenzene			9.826		10.00	0	98.3	83	112	10.34	5.14	40	
Ethylbenzene			10.33		10.00	0	103	87	110	10.49	1.47	40	
m,p-Xylene			21.01		20.00	0	105	87	114	21.07	0.264	40	
o-Xylene			10.10		10.00	0	101	84	114	10.43	3.19	40	
Surrogate: Dibromofluoromethane	ofluoromethan	<u>е</u>	10.05		10.00	. 0 (100	8 8	124	0			
Surrogate: 1,2-Dichloroethane-d4	:hloroethane-d	4	9.559		10.00	0 (95.6	79	115	0 1			
Surrogate: Toluene-d8	e-d8		10.05		10.00	o (08	114	0.			
Surrogate: Bromofluorobenzene	fluorobenzene		9.743	0.50	10.00)	97.4	0.9	123	0			
	•												
													. 3
OF THE STATE OF TH													
The state of the s													
						The second secon					74.00		
Qualifiers:	ND - Not Detect	ND - Not Detected at the Reporting Limit		S - Spi	ike Recovery outside	- Spike Recovery outside accepted recovery limits	limits		B-A	B - Analyte detected in the associated Method Blank	the associat	ed Metho	d Blank
mLIMS-001	J - Analyte detec	J - Analyte detected below quantitation limits	nits	R - RF	R - RPD outside accepted recovery limits	recovery limits							

Date: 10-Nov-09

Client: AECOM Technical Services, Inc.

Client Sample ID: EFF102209

Lab ID: H2113-01

Project: NOW Corp. Site

Collection Date: 10/22/09 11:00

Analyses	Result	Qual	RL	Units	DF Date Analyzed	Batch ID
SW846 6010 Metals by ICP	22.1					SW6010_W
Aluminum	ND		200	μg/L	1 10/29/2009 13:10	47039
Arsenic	ND		20	µg/L	1 10/29/2009 13:10	47039
Barium	96	J	200	μg/L	1 10/29/2009 13:10	47039
Chromium	0.74	j	20	μg/L	1 10/29/2009 13:10	47039
Copper	ND		25	μg/L	1 10/29/2009 13:10	47039
Iron	ND		200	μg/L	1 10/29/2009 13:10	47039
Manganese	78	В	50	μg/L	1 10/29/2009 13:10	47039
Nickel	1.9	J	50	μg/L	1 10/29/2009 13:10	47039
Zinc	14	J	50	μg/L	1 10/29/2009 13:10	47039
SW846 7470 Mercury by FIA						SW7470
Mercury	ND		0.20	μg/L	1 10/29/2009 8:03	47033

Qualifiers:

ND - Not Detected at the Reporting Limit

J - Analyte detected below quanititation limits

B - Analyte detected in the associated Method Blank

DF - Dilution Factor

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

E - Value above quantitation range

Client: AECOM Technical Services, Inc.

Client Sample ID: INF102209

Lab ID: H2113-02

Date: 10-Nov-09

Project: NOW Corp. Site

Collection Date: 10/22/09 11:30

Analyses	Result	Qual	RL	Units	DF Date Analyzed	Batch ID
SW846 6010 Metals by ICP						SW6010_W
Aluminum	ND		200	μg/L	1 10/29/2009 13:25	47039
Arsenic	4.0	J	20	µg/L	1 10/29/2009 13:25	47039
Barium	110	J	200	µg/L	1 10/29/2009 13:25	47039
Chromium	2.3	J	20	μg/L	1 10/29/2009 13:25	47039
Copper	6.2	J	25	μg/L	1 10/29/2009 13:25	47039
Iron	1000		200	μg/L	1 10/29/2009 13:25	47039
Manganese	1100	В	50	μg/L	1 10/29/2009 13:25	47039
Nickel	3.3	J	50	μg/L	1 10/29/2009 13:25	47039
Zinc	19	J	50	µg/L	1 10/29/2009 13:25	47039
SW846 7470 Mercury by FIA						SW7470
Mercury	ND		0.20	µg/L	1 10/29/2009 8:04	47033

Qualifiers:

ND - Not Detected at the Reporting Limit

J - Analyte detected below quanititation limits

B - Analyte detected in the associated Method Blank

DF - Dilution Factor

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

E - Value above quantitation range

Date: 11/10/2009 17:13

boratories	
Labora	
Mitkem	

CLIENT: AECC	AECOM Technical Services, Inc.	ં	ANALY	ANALYTICAL QC SUMMARY REPORT	SUMMA	RY REPC)RT		
Work Order: H2113	3		SW6010 W						
Project: NOW	NOW Corp. Site		SW846 6010 Metals by ICP	etals by ICP	1.0				
Sample ID: MB-47039	SampType: MBLK	TestCode: SW6010_	M_	Prep Date:	10/28/2009	Run ID	Run ID: OPTIMA3_091029C	029C	
Client ID: MB-47039	Batch ID: 47039	Units: µg/L		Analysis Date:	10/29/2009	SeqNo	SeqNo: 1143079		
Analyte		Result PQL	SPK value	SPK Ref Val	%REC LowLimit HighLimit	HighLimit	RPD Ref Val	%RPD RPDLimit	Qual
Aluminum		ND 200			-				
Arsenic		a ND 20							
Barium		ND 200							
Chromium		ND 20							
Copper		ND 30							
Iron		ND 200							
Manganese		13.68 50							ט
Nickel		ND 50							
Zinc		ND 50							
Sample ID: LCS-47039	SampType: LCS	TestCode: SW6010_	M_	Prep Date:	Prep Date: 10/28/2009	Run ID	Run ID: OPTIMA3_091029C	029C	
Client ID: LCS-47039	Batch ID: 47039	Units: µg/L		Analysis Date:	10/29/2009	SeqNo	SeqNo: 1143081		
Analyte		Result PQL	SPK value	SPK Ref Val	%REC LowLimit HighLimit	HighLimit	RPD Ref Val	%RPD RPDLimit	Qual
Aluminum		8601 200	9100	0	94.5 80	120	0		
Arsenic		455.1 20	455.0	0	100 80	120	0		
Barium		8754 200	9100	0	96.2 80	120	0		
Chromium	4	876.0 20	910.0	0	96.3 80	120	0		
Copper		1046 30	1130	0	92.6 80	120	0		
Iron		4558 200	4550	0	100 80	120	0		
Manganese		2360 50	2270	0	104 80	120	0		В
Nickel		2257 50	2270	0	99.4 80	120	0		v
Zinc		2340 50	2270	0	103 80	120	0		

B - Analyte detected in the associated Method Blank

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

ND - Not Detected at the Reporting Limit J - Analyte detected below quantitation limits

CLIENT: AECOI	AECOM Technical Services, Inc.	Ċ		ANALY	ANALYTICAL QC SUMMARY REPORT	CSUN	IMAR	Y REP	ORT			
Work Order: H2113 Project: NOW 0	H2113 NOW Corp. Site			SW6010_W SW846 6010 M	Metals by ICP							
Sample ID: H2113-01BDUP	SampType: DUP	TestCode: SW6010 W	6010 W		Prep Date:	10/28/2009	600	Run ID:	D: OPTIMA3 091029C	91029C		
Client ID: EFF102209		Units: µg/L	! 		Analysis Date:		600	Seq	SeqNo: 1143086			
Analyte		Result PQL	占	SPK value	SPK Ref Val	%REC 1	LowLimit HighLimit	ighLimit	RPD Ref Vai	%RPD F	%RPD RPDLimit	Qual
Aluminum		ND 2	200	0	0	0	0	0	0	0	20	
Arsenic			20	0	0	0	0	0	0	200	20	þ
Barium			200	0	0	0	0	0	95.66	1.13	20	þ
Chromium		0.5308	20	0	0	0	0	0	0.7391	32.8	20	Ţ
Copper			25	0	0	0	0	0	0	0	20	
Iron		QN	200	0	0	0	0	0	0	0	20	
Manganese			50	0 (0 (0 (0 (0 (78.33	6.38	20	М
Nickel		12.91	50	> 0	00	0	o o		13.64	5.52	20 20	ט כ
Sample ID: H2413_01BMS	SampType: MS	TestCode: SM6010 W	6040 W		Dren Date:	40/20/2000	90	0	S S WILL	0000		
Official of the second of the	Callip Type: Mis		* -		riep Date.		8 9	ווחצי אמו	Rull ID. OP IIIMAS_USTUZSC	787016		
Client ID: EFF102209	Batch ID: 47039	Units: µg/L			Analysis Date:	10/29/2009	600	Sed	SeqNo: 1143087			
Analyte		Result PQL	J.	SPK value	SPK Ref Val	%REC I	%REC LowLimit HighLimit	ighLimit	RPD Ref Val	%RPD R	%RPD RPDLimit	Qual
Aluminum		8964	200	9100	0	98.5	80	120	0			
Arsenic		466.0	20	455.5	0	102	80	120	0			
Barium		8938 2	200	9100	95.66	97.2	80	120	0			
Chromium		.2	20	910.0	0.7391	98.1	80	120	0			
Copper			25	1130	0	94.6	80	120	0			
Iron			200	4550	0	103	80	120	0			
Manganese			50	2270	78.33	106	80	120	0			В
Nickel		2258	50	2270	1.935	99.4	80	120	0			
ZINC		Z348	20	7270	13.64	103	08	120	0			
Sample ID: H2113-01BSD	SampType: SD	TestCode: SW6010_W	6010_W		Prep Date:	10/28/2009	600	Run	Run ID: OPTIMA3_091029C	31029C		
Client ID: EFF102209	Batch ID: 47039	Units: µg/L	_		Analysis Date:	10/29/2009	600	Seq	SeqNo: 1143088			
Analyte		Result PQL	75	SPK value	SPK Ref Val	%REC I	LowLimit HighLimit	ighLimit	RPD Ref Val	%RPD R	%RPD RPDLimit	Qual
Aluminum		ND 10	1000	0	0	0	0	0	0	0	10	
Arsenic		ND 1	100	0	0	0	0	0	0	0	10	
Barium		104.8 10	1000	0	0	0	0	0	95.66	9.1	10	p
Chromium		ND 1	100	0	0	0	0	0	0.7391	0	10	
Copper		ND 1	130	0	0	0	0	0	0	0	10	
ron		₫D	1000	0	0	0	0	0	0	0	10	
Manganese			250	0	0	0	0	0	78.33	7.69	10	ВJ
Nickel			250	0	0	0	0	0	1.935	62.1	10	b
inc		ND 2	250	0.	0	0	0	0	13.64	0	10	
Oualifiers: ND - Not	ND - Not Detected at the Reporting Limit	1		S - Spike Recovery outside accepted recovery limits	e accented recovery	limits		g.	B. Analyte detected in the associated Method Blank	the associat	led Method	Blank
•	Leccord at the responding runn			o - apine isecorei y outain	e accepted tocovery	cammi		Ω	analyte detected in	ine associa	rea Mennoa	Blank
mLIMS-001 J - Analyte	J - Analyte detected below quantitation limits	imits		R - RPD outside accepted recovery limits	recovery limits							

CLIENT:	AECOM Te	AECOM Technical Services, Inc.			ANALY	TICAL QC	ANALYTICAL QC SUMMARY REPORT	REPOI	RT		
Work Order:	H2113			SW	SW7470						
Project:	NOW Corp. Site	Site		NS	SW846 7470 Mercury by FIA	ercury by FIA					
Sample ID: MB-47033	033	SampType: MBLK	TestCode	TestCode: SW7470		Prep Date:	Prep Date: 10/28/2009	Run ID:	Run ID: FIMS1_091029A	9A	
Client ID: MB-47033	.033	Batch ID: 47033	Units	Units: µg/L		Analysis Date: 10/29/2009	10/29/2009	SeqNo:	SeqNo: 1142295		
Analyte			Result	Pal	SPK value	SPK Ref Val	SPK Ref Val %REC LowLimit HighLimit		RPD Ref Val	RPD Ref Val %RPD RPDLimit Qual	Qual
Mercury			QN	0.20							
Sample ID: LCS-47033	7033	SampType: LCS	TestCode	TestCode: SW7470		Prep Date:	Prep Date: 10/28/2009	Run ID:	Run ID: FIMS1_091029A	9 6	
Client ID: LCS-47033	7033	Batch ID: 47033	Units	Units: µg/L		Analysis Date: 10/29/2009	10/29/2009	SeqNo:	SeqNo: 1142296		
Analyte			Result	Pal	SPK value	SPK Ref Val	SPK Ref Val %REC LowLimit HighLimit		RPD Ref Vai	RPD Ref Val %RPD RPDLimit Qual	Qual
Mercury			4.638	0.20	4.550	0	102 80	120	0		

Date: 28-Oct-09

Client: AECOM Technical Services, Inc.

Client Sample ID: EFF102209

Lab ID: H2113-01

Project: NOW Corp. Site

Collection Date: 10/22/09 11:00

Analyses	Result Qual	RL Units	DF Date Analyzed	Batch ID
EPA 1664 Oil & Grease, HEM				E1664
Oil & Grease, Total Recoverable	ND	5.0 mg/L	1 10/28/2009 0:00	46990

Qualifiers:

ND - Not Detected at the Reporting Limit

J - Analyte detected below quanititation limits

B - Analyte detected in the associated Method Blank

DF - Dilution Factor

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

E - Value above quantitation range

Date: 28-Oct-09

Client: AECOM Technical Services, Inc.

Client Sample ID: INF102209

Lab ID: H2113-02

Project: NOW Corp. Site

Collection Date: 10/22/09 11:30

Analyses	Result Qual	RL Units	DF Date Analyzed	Batch ID
EPA 1664 Oil & Grease, HEM				E1664
Oil & Grease, Total Recoverable	ND	5.0 mg/L	1 10/28/2009 0:00	46990

Qualifiers: ND - Not Detected at the Reporting Limit

J - Analyte detected below quanititation limits

B - Analyte detected in the associated Method Blank

DF - Dilution Factor

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

E - Value above quantitation range

	U	2
	ď	õ
	ĭ	4
	٤	÷
	6	١.
	⋍	Š
	₹	ì
	ï	•
	=	7
	~	•
_	ػ)
•	σ	÷
	ci	,
,	r,	i
۲	-	
۰	_	
٠	_	
٠	- EB	
+	_	
+	_	
<u> </u>	_	TITO TITO
+	_	
+ + ' + '	_	

CLIENT:	AECOM Te	AECOM Technical Services, Inc.			TICAL QC	ANALYTICAL QC SUMMARY REPORT	PORT		
Work Order: Project:	H2113 NOW Corp. Site	. Site		E1664 EPA 1664 Oil & Grease, HEM	c Grease, HEM				
Sample ID: MB-46990 Client ID: MB-46990	9990	SampType: MBLK Batch ID: 46990	TestCode: E1664 Units: mg/L		Prep Date: 10/27/2009 Analysis Date: 10/28/2009		Run ID: MANUAL_091028A SeqNo: 1141242	1028A	
Analyte Oil & Grease, Total Recoverable	Recoverable		Result PQL ND 5	SPK value	SPK Ref Val	%REC LowLimit HighLimit	RPD Ref Val	%RPD RPDLimit Qual	Qual
Sample ID: LCS-46990 Client ID: LCS-46990	0669	SampType: LCS Batch ID: 46990	TestCode: E1664 Units: mg/L		Prep Date: 10/27/2009 Analysis Date: 10/28/2009		Run ID: MANUAL_091028A SeqNo: 1141240	1028A	
Analyte Oil & Grease, Total Recoverable	Recoverable		Result PQL 37.20 5	SPK value 5.0 40.00	SPK Ref Val	%REC LowLimit HighLimit 93.0 78 114	RPD Ref Vai	%RPD RPDLimit	Qual
Sample ID: LCSD-46990 Client ID: LCSD-46990	-46990 -46990	SampType: LCSD Batch ID: 46990	TestCode: E1664 Units: mg/L		Prep Date: 10/27/2009 Analysis Date: 10/28/2009		Run ID: MANUAL_091028A SeqNo: 1141241	1028A	
Analyte			Result PQL	SPK value	SPK Ref Val	%REC LowLimit HighLimit	RPD Ref Val	%RPD RPDLimit Qual	Qual
Oil & Grease, Total Recoverable	Recoverable		38.50	5.0 40.00	0	96.3 78 114	37.20	3.43 18	

J - Analyte detected below quantitation limits ND - Not Detected at the Reporting Limit

Qualifiers: mLIMS-001

Date: 06-Nov-09

Client: AECOM Technical Services, Inc.

Client Sample ID: EFF102209

Lab ID: H2113-01

Project: NOW Corp. Site

Collection Date: 10/22/09 11:00

Analyses	Result Qual	RL Units	DF Date Analyzed	Batch ID
SM 2540C TOTAL DISSOLVED SOLIDS				SM2540_TDS
Total Dissolved Solids	300	10 mg/L	1 10/29/2009 9:06	47026
SM 2540D TOTAL SUSPENDED SOLIDS				SM2540_TSS
Total Suspended Solids	ND	10 mg/L	1 10/26/2009 16:52	46977
SW846 9012 Total Cyanide				SW9012_W
Cyanide	ND	10 μg/L	1 11/04/2009 13:31	47136

J - Analyte detected below quanititation limits

B - Analyte detected in the associated Method Blank

DF - Dilution Factor

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

E - Value above quantitation range

Date: 06-Nov-09

Client: AECOM Technical Services, Inc.

Client Sample ID: INF102209

Lab ID: H2113-02

Project: NOW Corp. Site

Collection Date: 10/22/09 11:30

Analyses	Result Qual	RL Units	DF Date Analyzed	Batch ID
SM 2540C TOTAL DISSOLVED SOLIDS				SM2540_TDS
Total Dissolved Solids	330	10 mg/L	1 10/29/2009 9:18	47026
SM 2540D TOTAL SUSPENDED SOLIDS				SM2540_TSS
Total Suspended Solids	ND	10 mg/L	1 10/26/2009 16:56	46977
SW846 9012 Total Cyanide				SW9012_W
Cyanide	ND	10 µg/L	1 11/04/2009 13:33	47136

Qualifiers: ND - Not Detected at the Reporting Limit

J - Analyte detected below quanititation limits

B - Analyte detected in the associated Method Blank

DF - Dilution Factor

S - Spike Recovery outside accepted recovery limits

R - RPD outside accepted recovery limits

E - Value above quantitation range

atories	
Labor	
Aitkem	

											-
CLIENT:	AECOM Te	AECOM Technical Services, Inc.			ANALY	TICAL QC	ANALYTICAL QC SUMMARY REPORT	Y REPOF	\$T		
Work Order:	H2113			SME	SM2540_TDS						
Project:	NOW Corp. Site	. Site		SM	SM 2540C TOTAL DISSOLVED SOLIDS	AL DISSOLV	ED SOLIDS		·		
Sample ID: MB-47026	7026	SampType: MBLK	TestCod	TestCode: SM2540_TDS		Prep Date:	Prep Date: 10/28/2009	Run ID:	Run ID: MANUAL_091028B	128B	
Client ID: MB-47026	7026	Batch ID: 47026	Unit	Units: mg/L		Analysis Date: 10/29/2009	10/29/2009	SeqNo: 1142739	1142739		
Analyte			Result	PQL	SPK value	SPK Ref Val	%REC LowLimit HighLimit		RPD Ref Val	%RPD RPDLimit	Qual
Total Dissolved Solids	lids		QN	10							
Sample ID: LCS-47026	47026	SampType: LCS	TestCod	TestCode: SM2540_TDS		Prep Date:	Prep Date: 10/28/2009	Run ID:	Run ID: MANUAL_091028B	128B	
Client ID: LCS-47026	47026	Batch ID: 47026	Unit	Units: mg/L		Analysis Date: 10/29/2009	10/29/2009	SeqNo: 1142740	1142740		
Analyte			Result	PQL	SPK value	SPK Ref Val	%REC LowLimit HighLimit		RPD Ref Val	%RPD RPDLimit Qual	Qual
Total Dissolved Solids	lids		585.0	10	565.0	0	104 80	120	0		
Sample ID: LCSD-47026	7-47026	SampType: LCSD	TestCod	TestCode: SM2540_TDS		Prep Date:	Prep Date: 10/28/2009	Run ID:	Run ID: MANUAL_091028B)28B	
Client ID: LCSD-47026	0-47026	Batch ID: 47026	Unit	Units: mg/L		Analysis Date:	10/29/2009	SeqNo: 1142741	1142741		
Analyte			Result	POL	SPK value	SPK Ref Val	%REC LowLimit HighLimit		RPD Ref Val	%RPD RPDLimit Qual	Qual
Total Dissolved Solids	lids		643.0	10	565.0	0	114 80	120	585.0	9.45 20	

ND - Not Detected at the Reporting Limit J - Analyte detected below quantitation limits

CLIENT:	AECOM Technical Services, Inc.			ANALY	TICAL QC	ANALYTICAL QC SUMMARY REPORT	XY REPO	ıRT		
Work Order:	H2113		SMZ	SM2540_TSS						
Project:	NOW Corp. Site		SM	SM 2540D TOTAL SUSPENDED SOLIDS	AL SUSPEND	ED SOLIDS				
Sample ID: MB-46977	6977 SampType: MBLK	TestCode	TestCode: SM2540_TSS		Prep Date:	Prep Date: 10/26/2009	Run ID	Run ID: MANUAL_091026A	026A	
Client ID: MB-46977	6977 Batch ID: 46977	Units:	Units: mg/L		Analysis Date: 10/26/2009	10/26/2009	SeqNo	SeqNo: 1141314		
Analyte		Result	PaL	SPK value	SPK Ref Val	SPK Ref Val %REC LowLimit HighLimit	HighLimit	RPD Ref Val	RPD Ref Val %RPD RPDLimit Qual	Qual
Total Suspended Solids	olids	ND	10							
Sample ID: LCS-46977	46977 SampType: LCS	TestCode	TestCode: SM2540_TSS		Prep Date:	Prep Date: 10/26/2009	Run ID	Run ID: MANUAL_091026A	026A	
Client ID: LCS-46977	46977 Batch ID: 46977	Units:	Units: mg/L		Analysis Date: 10/26/2009	10/26/2009	SeqNo	SeqNo: 1141315		
Analyte		Result	PQL	SPK value	SPK Ref Val	%REC LowLimit HighLimit	HighLimit	RPD Ref Val	RPD Ref Val %RPD RPDLimit Qual	Qual
Total Suspended Solids	olids	44.00	10	52.00	0	84.6 80	120	0		

ND - Not Detected at the Reporting Limit J - Analyte detected below quantitation limits

CLIENT:	AECOM Technical Services, Inc.			ANALY	TICAL QC	ANALYTICAL QC SUMMARY REPORT	Y REPOR	L		
Work Order:	H2113		SW	$SW9012_W$						
Project:	NOW Corp. Site		SW	SW846 9012 Total Cyanide	tal Cyanide					
Sample ID: MB-47136	136 SampType: MBLK	TestCode.	TestCode: SW9012_W		Prep Date: 11/3/2009	11/3/2009	Run ID: L	Run ID: LACHAT1_091105A	105A	
Client ID: MB-47136	7136 Batch ID: 47136	Units:	Units: µg/L		Analysis Date: 11/4/2009	11/4/2009	SeqNo: 1146532	146532		
Analyte		Result	PQL	SPK value	SPK Ref Val	SPK Ref Val %REC LowLimit HighLimit		PD Ref Val	RPD Ref Val %RPD RPDLimit Qual	Quai
Cyanide		ND	20		1,000					
Sample ID: LCS-47136	.7136 SampType: LCS	TestCode	TestCode: SW9012_W		Prep Date: 11/3/2009	11/3/2009	Run ID: L	Run ID: LACHAT1_091105A	105A	
Client ID: LCS-47136	.7136 Batch ID: 47136	Units:	Units: µg/L		Analysis Date:	11/4/2009	SeqNo: 1146533	146533		
Analyte		Result	PQL	SPK value	SPK Ref Val	%REC LowLimit HighLimit		PD Ref Val	RPD Ref Val %RPD RPDLimit Qual	Qual
Cyanide		96.56	20	100.0	0	96.6 80	120	0		

mit
recovery
accepted
outside
Recovery
pike
S

ND - Not Detected at the Reporting Limit J - Analyte detected below quantitation limits

10/23/2009 12:01

Project: NOW Corp. Site Client ID: EARTH_NY

WorkOrder: H2113

Location: NOW_CORP,

Comments: N/A

PO: 94017.02 Case: SDG:

Report Level: LEVEL 2 HC Due: 11/10/09

Fax Due:

EDD:

Lab Samp ID	Lab Samp ID Client Sample ID	Collection Date	Date Recv'd	Matrix	Test Code	Samp / Lab Test Comments	HF HT MS SEL Storage
H2113-01A	EFF102209	10/22/2009 11:00	10/23/2009	Aqueous	SW8260_25_W	/ use for VOCs,	Y VOA
H2113-01B H2113-01B	EFF102209 EFF102209	10/22/2009 11:00	10/23/2009	Aqueous	SW6010_W SW7470	/ See SEL list / See SEL list	Y J2
H2113-01C H2113-01C	EFF102209 EFF102209	10/22/2009 11:00	10/23/2009	Aqueous	SM2540_TDS SM2540_TSS		27 27
H2113-01D	EFF102209	10/22/2009 11:00	10/23/2009	Aqueous	E1664		J2
H2113-01E	EFF102209	10/22/2009 11:00	10/23/2009	Aqueous	SW9012_W	1	γ J2
H2113-02A	INF102209	10/22/2009 11:30	10/23/2009	Aqueous	SW8260_25_W	/ use for VOCs,	Y VOA
H2113-02B H2113-02B	INF102209 INF102209	10/22/2009 11:30	10/23/2009	Aqueous	SW6010_W SW7470	/ See SEL list / See SEL list	20 Y
H2113-02C H2113-02C	INF102209 INF102209	10/22/2009 11:30	10/23/2009	Aqueous	SM2540_TDS SM2540_TSS		J2 J2
H2113-02D	INF102209	10/22/2009 11:30	10/23/2009	Aqueous	E1664	1	25
H2113-02E	INF102209	10/22/2009 11:30	10/23/2009	Aqueous	SW9012_W	1	γ ,32
H2113-03A	TW-1	10/22/2009 11:40	10/23/2009	Aqueous	SW8260_25_W	/ use for VOCs,	Y VOA
H2113-04A	TW-2A	10/22/2009 11:50	10/23/2009	Aqueous	SW8260_25_W	/ use for VOCs,	Y VOA
H2113-05A	TW-3	10/22/2009 12:00	10/23/2009	Aqueous	SW8260_25_W	/ use for VOCs,	Y VOA
H2113-06A	TRIP BLANK	10/22/2009 00:00 10/23/2009	10/23/2009	Aqueous	SW8260_25_W	/ use for VOCs,	Y VOA

WHF = Fraction logged in but all tests have been placed on hold

Lab Client Rep: Edward A Lawler

HT = Test logged in but has been placed on hold

ays I. these.			<u>ا</u> څ			Solicio		M Report	ivel	.	ındards:		74	•								Time:	2	۲
Special Handling: C Standard TAT - 7 to 10 business days Rush TAT - Date Needed: All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes. Samples disposed of after 60 days unless otherwise instructed			Ctoto.	State.		(check as needed)		☐ Provide MA DEP MCP CAM Report☐ Provide CT DPH RCP Report☐	QA/QC Reporting Level	- 1	State specific reporting standards:	AS, 13A,	I, F.E.	N. N	•							Tiı	0051	
Special Handling: Caracteristics Standard TAT - 7 to 10 busin Bush TAT - Date Needed: All TATs subject to laboratory ap Min. 24-hour notification needed: Samples disposed of after 60 days otherwise instructed	, d					check		ovide MA D	QA/QC Rep	her	e specific r	* AL. A		176, ZN								Date:	39/2/01	7
Special Standard TAT - 7 I Rush TAT - Date All TATs subject to Min. 24-hour notifice Samples disposed of	94017,02	2	, j	SRG		у 		- H		□ Other	Stat	*	0	1							_		Ş	<u>;</u>
Standa Standa All TAT Min. 24- Samples	1017	Now Corp	Stattshive	RKV+	helow.																			
			1 2	KK	Tist meservative code helow	25	Analyses:	•	201	24	ر ک	×	×									Received by:		1
OF CUSTODY RECORD Page / of /	Project No.	Lityber 190 Site Name	Location:	Sampler(s):	preserva	6	An	5	54	15	8 01 0	×	×									Rece	}	
C	Droid	110J		Sam	Tist r	7		*	2/1	42	W	×	×											¢
\square						4			()	<i></i>	8	×	×	×	×	×	×							$\frac{1}{1}$
J C						<u> </u>	ers:		oj	lasti	d Jo #	W	m											
				RON			Containers:				A 10 # O 10 #	7	7									ed by:		
LSI /	Sung			~	.)				Λ Jo #	7					\					Refinquished by:	1	
CC	$ \mathcal{N} $				bio A ci	11=				X	kintsM	N.	-			4	1					Red	ン	
OF	To:	•	:		Lio A control						Type	P				1	1						1	*
_	Invoice To			P O No.			nter	A=Air	-		Je:	O	0	Q	0	00	1							
CHAIN	l In	 		<u>ا م</u> ا	HONN-S	U-Iva	W.W=Wastewater	wasicw Ige A=			Time:	1100	1130	04 11	1150	1200	}							
CI		135		0	4-UNO	10=	W/W/=	SL=Sludge	5	4)		601					1							
	ع بر	7 6	0 2 5 5 7 9	512VC Chainiers 518-951-2200			wotor		-	C=Composite	Date:	10/22/09				\rightarrow								
N.C.	Oini	2770	011-11 XX	512VC Chamiers 518-951-22		5-112504 5~C	- Pullous	SO=Soil		C=C0			ļ		4		7							
YTICAL, II	L C	2 2 5	\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	2-8	֟֞֟֝֟֟֝֟֝֟֟֝֟֟֝֟֝֟֟֝֟֟֝֟֝֟֟֝֟֝֟֝֟֝֟֝֟֝֟	~~	GW=(Vater	\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\	G=Grab	Sample Id:	220,	022	1-1	TW-2A	ا ا	Trip Blank							
SPECTRUM ANALYTICAL, INC.	Steve Choiniere	AFCOM FNUTONMENT	5 5	512			Votor	SW= Surface Water		₽	Sam	FFF 102209	INF102209	TW-1	7	TW-	12.0	-						
SPECTR	HAN	100 N	cthem,	//gr.:	1-No 620	$1-1\sqrt{a_2}52\sqrt{3}$ $8= \text{NaHSO}_4$	- Indiana	SW=S					7.7.2	(۲3	ريم	ોડ	20						rmat 	to
	Report To:	AE	2 3	Project Mgr.: Telenhone #	1-N	8= }	DW=Drinking Water GW=Gramduzater	Dw	_IV		Lab Id:	H2113-01			7		,			-			EDD Format	☐ E-mail to
	R	- 1		П	'		\mathbb{L}^{c}	102	۲			Ŧ					<u> </u>	<u> </u>	L_		<u> </u>	\Box		Ц

11 Almoren Drive . Apawam. MA 01001 . 413-789-9018 . FAX 413-789-4076 . www.snectrum-analytical com

0026

9:00

10/23/01

MITKEM LABORATORIES Sample Condition Form

Page <u>/</u> of <u>/</u>

Received By: AED	Reviewed By	Sir	······································	Date:	10/23/	Тмітк	EM Wor	korder	#: H211	/ 3
	CORP			Client			TECH	Nordo.	". 16271	Soil Headspace
					Pres	ervatio	n (pH)		VOA	or Air Bubbles
		Lab Sam	ole ID	HNO ₃	H ₂ SO ₄	HCI		H ₃ PO ₄	Matrix	<u>≥</u> 1/4"
1) Cooler Sealed Yes) No	Hati3	Oj	42		<2	42		Н	
		i	02	42		42	L2		1	
2) Custody Seal(s)	Present Absent		03							
	Coolers / Bottles		04							
	Intact / Broken	V	05						V	
	4	42113	06						Н	
3) Custody Seal Number(s	W/A									
	1									

	V									
									$\overline{}$	1
4) Chain-of-Custody	Present / Absent	· · · · · · · · · · · · · · · · · · ·							-/-	
(/	
5) Cooler Temperature	4°C									
Coolant Condition	4°C ICE									
6) Airbill(s)	Present Absent					<u>\(\)</u>	. CA			
Airbill Number(s)					"		121			
.,	FEDEX 8690 79239460				*	7	گ ۱			
						4				
					/			1		
7) Sample Bottles	Intact/Broken/Leaking									
, ,					<u></u>					
8) Date Received	9:00									
•										
9) Time Received	9:00					VOA	Matrix k	 (ev:		
							Jnprese	•	oil	A = Air
Preservative Name/Lot No.	:						Jnprese			H = HCI
		_/				M= Me	•		-1	E = Encore
		/					aHSO₄			F = Freeze
				_	!	L				
			1	 <	S					
See Sample Con-	dition Notification/Correc	tive Action F	orm	yes (n	9)	D04 0	V vant	no		
· · · · · · · · · · · · · · · · · · ·						rau U	K yes/	HU		

Last Page of Data Report