Technical Report for Port Jersey Contract Area 2A
Upland Sampling and Testing

Prepared for

Army Corps of Engineers, New York District
26 Federal Plaza
New York, NY 10278

June 19, 2003

ASI JOB No. 23-037

Table of Contents

Page

Table of Contents 2
Information Page 4
Signature Page 5
Work Plan 6

II. Introduction 11

III. Test Administration 11
A. Sponsor 11
B. Testing Facility 11
C. Dates of Experimentation 11
D. Study Participants 11

IV. Materials and Methods 12
A. Sampling 12
B. Homogenizing and Compositing 12
C. Grain Size Distribution, Percent Moisture and TOC 13
D. Chemical Analysis 13

V. Physical Analysis Results 13

Figures and Tables

Figure 1 Site Map 15
Figure 2 Graph of Grain Size Distribution of Individual Cores & Unamended Composites 20

Table 1 DGPS Coordinates 14
Table 2 Sample Identification and Compositing Scheme 16
Table 3 Grain Size Distribution, Percent Moisture and TOC of the Individual Cores 17
Table 4 Grain Size Distribution, Percent Moisture and TOC of Unamended Composites 19
Table 5 Chemical Analysis of Composite A – Amended & Unamended & MEPs 23
Table 6 Chemical Analysis of Composite B – Amended & Unamended & MEPs 28
Table 7 Chemical Analysis of Composite C – Amended & Unamended & MEPs 33
Table 8 Chemical Analysis of Composite D – Amended & Unamended & MEPs 38
Table 9 Chemical Analysis of Composite E – Amended & Unamended & MEPs 43
Table 10 Chemical Analysis of Composite F – Amended & Unamended & MEPs 48
Table 11 Chemical Analysis of Composite G – Amended & Unamended & MEPs 53

Table 12 Chemical Analysis of Composite H – Amended & Unamended & MEPs 58
Table 13 Chemical Analysis of Composite I – Amended & Unamended & MEPs.....63
Table 14 Chemical Analysis of Composite J – Amended & Unamended & MEPs 68
Table 15 Chemical Analysis of Composite K – Amended & Unamended & MEPs.....73
Table 16 Chemical Analysis of Composite L – Amended & Unamended & MEPs.....78
Table 17 Chemical Analysis of Composite M – Amended & Unamended & MEPs 83
Table 18 Chemical Analysis of Field Blank 88

Appendices

Sediment Core Logs..... A-1
Photographs B-1
Chains of Custody.....C-1
Sample Use Forms D-1
Grain Size Distribution and Percent Moisture Raw Data E-1
TOC Raw Data.....F-1

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Upland Sampling and Testing

for

Army Corps of Engineers, New York District
26 Federal Plaza
New York, NY 10278

STUDY INITIATION DATE

March 28, 2003

PERFORMING LABORATORY

Aqua Survey, Inc.
469 Point Breeze Road
Flemington, New Jersey 08822

SPONSOR

Army Corps of Engineers, New York District
26 Federal Plaza
New York, NY 10278

LABORATORY PROJECT ID

ASI STUDY # 23-037

Signature Page

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Army Corps of Engineers, New York District
26 Federal Plaza
New York, NY 10278

This report, as well as all records and raw data were audited and found to be an accurate reflection of the study. Copies of raw data will be maintained by Aqua Survey, Inc, 469 Point Breeze Road, Flemington, New Jersey, 08822.

Robert M. Fristrom — 6/19/03

Robert M. Fristrom — Date
Quality Assurance Officer

Thomas J. Dolce — 6/19/03

Thomas J. Dolce — Date
Laboratory Manager

Jon Doi — 6-19-03

Jon Doi, Ph.D. — Date
Executive Vice President

I. Work Plan

Site Remediation Program
Office of Dredging and Sediment Technology
P.O. Box 028
Trenton, NJ 08625
(609) 292-1250
FAX (609) 777-1914

Mr. John Tavolaro
Chief, Operations Support Branch
Department of the Army
New York District, Corps of Engineers
Jacob K. Javits Federal Building
New York, NY 10278-0090

February 21, 2003

RE: Dredged Material Sampling Plan
Origin: Port Jersey Contract Area 2A
Disposal: Upland Beneficial Use in New Jersey

Dear Mr. Tavolaro:

This letter is forwarded in reply to your January 2, 2003 request for a sediment sampling and testing plan for Contract Port Jersey 2A deepening project.

Contract Port Jersey 2A involves dredging approximately 420,000 cubic yards of dredged material to a depth of –44 ½ feet below MLW. For a depth of –53 ½ feet the volume of material is projected at 553,000 cubic yards. This sampling and testing plan only addresses the dredged material that is expected to be placed upland. The suitability of the underlying material for use as remediation material at the HARS is a determination made by the U.S. Environmental Protection Agency and the U.S. Army Corps of Engineers. Therefore, sampling and testing of the underlying material must be coordinated with those agencies.

Sampling

The attached sampling plan identifies 38 sampling locations for the dredged material from the Contract that is anticipated to be placed upland. Based on the geographic reach of the project and the depth of the sediment to be dredged, the number and distribution of samples, as reflected on the attached sheets, will adequately characterize the sediments to be dredged for upland placement in New Jersey.

It is my understanding that the authorized project construction depth for this project is –44 ½ feet, and that the depth of Holocene sediments varies within the project area. It is further noted in the January 30, 2003 letter that the New Jersey Maritime Resources/NJDOT and the Port Authority are evaluating the possibility of advancing the dredging of the channel to –53 ½ feet.

As a result, this sampling plan has been developed with the assumption that each core sample shall be taken to the depth of the Holocene sediments within the project area versus to project depth (–44 ½ ft or -53 ½ ft) as is routinely required in most sampling plans. To distinguish this, the ACOE has identified four areas, or steps, above which depths Holocene sediments are expected to occur, below which anticipated HARS suitable material is to expected to occur. **Therefore, it is critical that each sample core reach the depth of the Holocene sediments that is anticipated to be placed upland.** Each core shall be described and inspected for obvious stratification. The Office of Dredging and Sediment Technology shall be notified of any cores that exhibit grain size stratification at different elevations or of different apparent grain size prior to homogenizing (609) 292-1250), other than as anticipated by this plan. If such stratification exists, it may be necessary for the Department to modify the compositing scheme outlined below.

Field logs shall be kept of each core. It should be noted that any additional information concerning the physical character of the material gathered during sampling, such as the existence of large rocks, may be useful in future bid solicitation documents. These logs must be submitted to the Department together with the analytical data. If stratified layers are evident, the stratified layers shall be separated and each separate layer shall be homogenized. After homogenization as outlined above, each sample core or individual strata shall be tested for grain size, percent moisture and total organic carbon.

Analytical Testing

Analytical testing may be performed on composites of the core samples only if the grain size among the identified sample cores is uniform. If stratification appears uniform and occurs at roughly the same elevation throughout the cores, the stratified layers may be composited in accordance with the compositing scheme outlined below without further guidance from this Office. Composites must be made up of equal amounts of the homogenized core sample strata as follows:

Holocene Sediments (420,000 cy (project depth to -44 ½ ft) or 553,000 cy (project depth to –53 ½ ft))

Material to be placed upland in PJ2 Contract area

-34 ft
Composite A = sample cores 1, 2 and 3
Composite B = sample cores 4, 5 and 6
Composite C = sample cores 7, 8 and 9

-38 ft
Composite D = sample cores 10, 11 and 12

-44.5 ft
Composite E = sample cores 13, 14 and 15
Composite F = sample cores 16, 17 and 18
Composite G = sample cores 19, 20 (samples shall be taken to the depth of the silt material within this deep depression).
Composite H = sample cores 21, 22 and 23
Composite I = sample cores 24, 25 and 26
Composite J = sample cores 27, 28 and 29
Composite K = sample cores 30, 31 and 32

-49 ft

Composite L = sample cores 33, 34 and 35
Composite M = sample cores 36, 37 and 38

NOTE: *For the NJMR/Port Authority advance of the contract to –53 ½ ft, the sample core locations in the step area identified above should be used for the sampling on non-HARS suitable material from a depth of –44 ½ ft to –49 ft.*

Each composite shall be analyzed for grain size, percent moisture and total organic carbon. In addition, each composite shall be tested for bulk sediment chemistry. The specific analytes which must be tested are found in appendix B Attachment 1 of the technical manual titled *"The Management and Regulation of Dredging Activities and Dredged Material in New Jersey's Tidal Waters* (NJ DEP, October

Port Jersey Contract Area 2A - Upland

Location No.	Water Depth (ft)	Core Length (ft)	Latitude			Longitude			Northing	Easting
			Degree	Min	Sec	Degree	Min	Sec		
1	30.8	3.2	40	39	52.298	74	3	57.951	667,280	612,490
2	25.9	8.1	40	39	49.620	74	3	55.243	667,010	612,700
3	14.8	19.2	40	39	49.017	74	3	52.651	666,950	612,900
4	13.0	21.0	40	39	47.675	74	3	50.584	666,815	613,060
5	27.5	6.5	40	39	45.701	74	3	50.986	666,615	613,030
6	13.1	20.9	40	39	44.944	74	3	46.903	666,540	613,345
7	23.6	10.4	40	39	43.953	74	3	46.196	666,440	613,400
8	31.5	2.5	40	39	41.132	74	3	45.046	666,155	613,490
9	30.9	3.1	40	39	40.322	74	3	39.861	666,075	613,890
10	32.7	5.3	40	39	39.336	74	3	40.516	665,975	613,840
11	30.9	7.1	40	39	39.030	74	3	37.793	665,945	614,050
12	33.9	4.1	40	39	37.442	74	3	35.987	665,785	614,190
13	33.5	11.0	40	39	54.970	74	4	12.079	667,545	611,400
14	32.0	12.5	40	39	52.138	74	4	7.880	667,260	611,725
15	37.5	7.0	40	39	50.148	74	4	4.324	667,060	612,000
16	36.8	7.7	40	39	54.785	74	4	2.088	667,530	612,170
17	38.4	6.1	40	39	52.612	74	4	2.491	667,310	612,140
18	34.4	10.1	40	39	48.511	74	4	2.517	666,895	612,140
19	36.2	8.3	40	39	48.043	74	3	56.421	666,850	612,610
20	36.0	8.5	40	39	47.794	74	3	55.904	666,825	612,650
21	35.6	8.9	40	39	51.264	74	3	58.801	667,175	612,425
22	36.0	8.5	40	39	46.276	74	3	59.417	666,670	612,380
23	33.5	11.0	40	39	47.293	74	3	54.090	666,775	612,790
24	33.5	11.0	40	39	48.377	74	3	53.175	666,885	612,860
25	38.4	6.1	40	39	42.548	74	3	53.472	666,295	612,840
26	37.2	7.3	40	39	41.889	74	3	49.064	666,230	613,180
27	36.8	7.7	40	39	41.285	74	3	46.343	666,170	613,390
28	37.7	6.8	40	39	38.871	74	3	48.175	665,925	613,250
29	36.2	8.3	40	39	38.904	74	3	43.763	665,930	613,590
30	39.7	4.8	40	39	35.789	74	3	43.264	665,615	613,630
31	35.8	8.7	40	39	36.746	74	3	34.953	665,715	614,270
32	38.2	6.3	40	39	34.918	74	3	35.095	665,530	614,260
33	41.9	7.1	40	39	32.950	74	3	37.379	665,330	614,085
34	44.3	4.7	40	39	29.919	74	3	32.727	665,025	614,445
35	41.8	7.2	40	39	33.428	74	3	33.158	665,380	614,410
36	39.5	9.5	40	39	35.092	74	3	28.995	665,550	614,730
37	42.7	6.3	40	39	32.869	74	3	28.880	665,325	614,740
38	44.0	5.0	40	39	34.490	74	3	26.403	665,490	614,930

II. Introduction

The objective of this project was to collect and analyze sediment, for the Port Jersey Contract Area 2A for Upland Beneficial Use. This work was conducted in accordance with appendix B, Attachment 1 of the technical manual entitled "The Management and Regulation of Dredging Activities and Dredged Material in New Jersey 's Tidal Waters" (Dredging Manual), October 1997, along with a letter dated February 21, 2003.

ASI performed all sampling and physical analyses (grain size distribution, percent moisture & TOC).

III. Test Administration

A. Sponsor

Army Corps of Engineers, New York District
26 Federal Plaza
New York, NY 10278

B. Testing Facility

Aqua Survey, Inc.
469 Point Breeze Road
Flemington, New Jersey 08822

C. Dates of Experimentation

Date of Study Initiation:	March 28, 2003
Date of Study Completion:	June 19, 2003

D. Study Participants

Michael Beaston	Marine Operations Technician
Jon Doi, Ph.D.	Executive Vice-President
Thomas J. Dolce	Laboratory Manager
G. Stephen Hornberger	Project Manager
Catherine Kosmas	Laboratory Technician
James Nickels	Vice President Marine Operations
Eric Thayer	Marine Operations Specialist
Michelle Thomas	Senior Scientist

IV. Material and Methods

All sampling and testing were performed in accordance with appendix B, Attachment 1 of the technical manual entitled "The Management and Regulation of Dredging Activities and Dredged Material in New Jersey 's Tidal Waters (NJ DEP, October 1997)," and a letter dated February 21, 2003.

A. Sampling

Test sediment from thirty-eight locations and two field-blanks, were collected from Port Jersey, Contract Area 2A, New Jersey, by Aqua Survey personnel on March 28 through April 2, 2003. A site map is shown on page 8 (Figure 1).

The vessel used for sampling was positioned using a Trimble NT200D Differential Global Positioning System (DGPS) and collected using a Rossfelder P-3 vibracore with flexible plastic core liners. Water depth and actual tide elevation were determined from a tide chart and the required core length was determined by subtracting the tide from the measured depth, and then subtracting that value from the project depth. Every core sample taken was inspected and its characteristics were recorded on a Sediment Core Log Sheet.

All core samples were assigned a unique ASI sample number. Samples were received in good condition at ASI in Flemington, NJ on the same day as collected and stored in the dark at 4° C.

Sampling core coordinates are listed in Table 1. All supporting documentation, including chains-of-custody, sediment core logs, photographs and sample use forms can be found in the Appendix.

B. Homogenizing and Compositing

Each of the thirty-seven core samples (core location 34 was omitted) were carefully homogenized using a stainless steel mixer following specific guidelines found in pages 9-11 and Appendix A of the Dredging Manual and according to SOP/GEN/401. Samples were mixed until uniform in color and texture.

Thirteen composites were created from the thirty-seven core locations, see Table 2.

Since it is proposed that some of the dredged material will be treated with stabilizing materials which will alter its chemical and physical composition, an aliquot of each composite sample was treated in a manner to simulate this stabilization process.

A standard commercial brand of Portland cement was used in creating the amended composite samples. An aliquot of each composite sample, A-M, was

blended with Portland cement (8% by weight) for two minutes using the power drill and mixing paddle.

Sub samples of each of the composites both amended, and unamended samples, and the individual cores were reserved for the appropriate chemical and physical analyses.

The composite samples were logged in and assigned unique sample numbers.

C. Grain Size Distribution, Percent Moisture and TOC

Sub-samples of each homogenized core, and the composites (unamended) were analyzed by ASI for grain size distribution and percent moisture in accordance with the Standard Guide for Selection of Methods of Grain size Analysis of Fluvial Sediments (Manual Methods)[1]. Designation: D4822 (Re-approved 1994).

Total Organic Carbon (TOC) was also determined at ASI based on the guidance from EPA Office of Solids Waste and Emergency Response SW-846 Method No. 9060 (Volume IC, Chapter 5, Revision 0, 9/86). The instrument for this analysis is the Dohrmann TOC Boat Sampler, Model 183 (Serial number 98202003) connected to the Dohrmann DC-80 TOC Analyzer.

D. Chemical Analyses

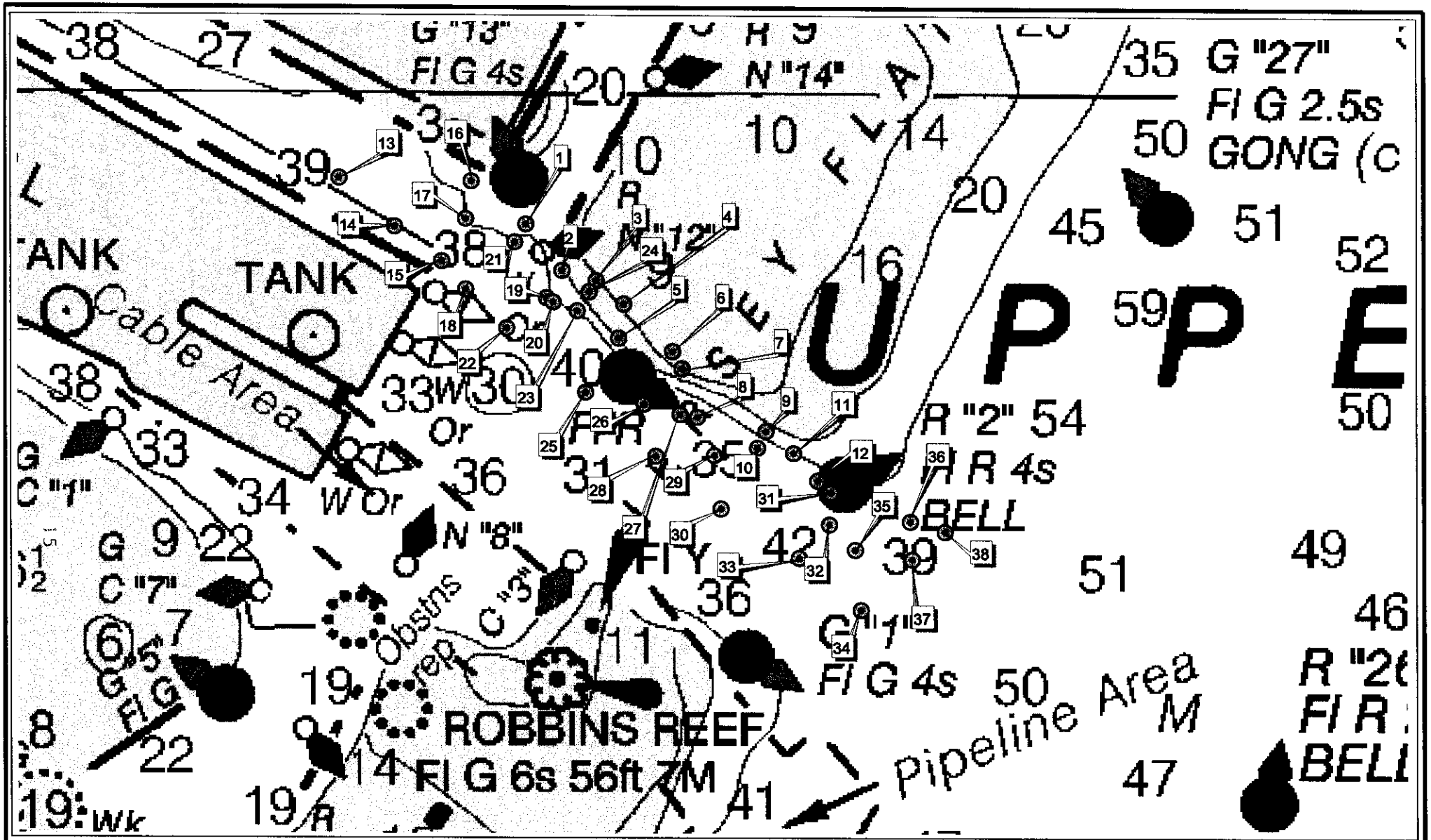
The amended and unamended composites were prepared at Aqua Survey and a sub sample of each and the field-blanks were delivered to Battelle Duxbury Operations by courier. The samples were shipped in glass jars in coolers with blue ice packs, following chain-of-custody procedures. Battelle was responsible for the chemical analyses, except for the multiple extraction procedure, which was performed by Paradigm Analytical Laboratory, who also performed the chemical analyses. Each of the composite samples was analyzed for all of the parameters listed in Appendix B of the NJDEP guidance manual.

V. Physical Analysis Results

The grain size distribution, percent moisture content and TOC for each core and the composite samples are shown in Tables 3 and 4.

Table 1

	DGPS Coordinates	
Location	**Eastings**	**Northings**
PJ2AU-1	612505	667280
PJ2AU-2	612689	667011
PJ2AU-3	612894	666951
PJ2AU-4	613059	666825
PJ2AU-5	613017	666606
PJ2AU-6	613334	666545
PJ2AU-7	613401	666436
PJ2AU-8	613474	666158
PJ2AU-9	613878	666076
PJ2AU-10	613830	665961
PJ2AU-11	614031	665957
PJ2AU-12	614179	665780
PK2AU-13	611400	667529
PJ2AU-14	611737	667263
PJ2AU-15	612010	667053
PJ2AU-16	612177	667533
PJ2AU-17	612145	667301
PJ2AU-18	612145	666891
PJ2AU-19	612615	666841
PJ2AU-20	612650	666807
PJ2AU-21	612420	667163
PJ2AU-22	612364	666667
PJ2AU-23	612780	666778
PJ2AU-24	612840	666886
PJ2AU-25	612878	666297
PJ2AU-26	613187	666239
PJ2AU-27	613368	666186
PJ2AU-28	613232	665927
PJ2AU-29	613602	665932
PJ-2AU-30	613611	665617
PJ2AU-31	614255	665712
PJ2AU-32	614247	665540
PJ2AU-33	614073	665330
PJ2AU-34	614424	665034
PJ2AU-35	614391	665381
PJ2AU-36	614730	665541
PJ2AU-37	614719	665319
PJ2AU-38	614886	665459



LEGEND:

Deployment Location

N
W E
S

500 0 500 1000

Scale in Feet

Army Corp of Engineers
Port Jersey

FIGURE 1

CONTRACT AREA 2A- UPLAND SAMPLE LOCATIONS

upland.pdf

NOAA Chart 12327_1

Table 2 Sample Identification and Compositing Scheme

Location	ASI ID #	Composite ID #	
PJ2AU-1	20030352	Composite A 20030387	Amended Composite A 20030394
PJ2AU-2	20030353		
PJ2AU-3	20030382		
PJ2AU-4	20030383	Composite B 20030388	Amended Composite B 20030395
PJ2AU-5	20030354		
PJ2AU-6	20030384		
PJ2AU-7	20030379	Composite C 20030389	Amended Composite C 20030396
PJ2AU-8	20030358		
PJ2AU-9	20030361		
PJ2AU-10	20030360	Composite D 20030390	Amended Composite D 20030397
PJ2AU-11	20030378		
PJ2AU-12	20030377		
PK2AU-13	20030345	Composite E 20030364	Amended Composite E 20030370
PJ2AU-14	20030346		
PJ2AU-15	20030347		
PJ2AU-16	20030342	Composite F 20030365	Amended Composite F 20030371
PJ2AU-17	20030351		
PJ2AU-18	20030348		
PJ2AU-19	20030343	Composite G 20030366	Amended Composite G 20030372
PJ2AU-20	20030344		
PJ2AU-21	20030350	Composite H 20030391	Amended Composite H 20030398
PJ2AU-22	20030349		
PJ2AU-23	20030380		
PJ2AU-24	20030381	Composite I 20030392	Amended Composite I 20030399
PJ2AU-25	20030355		
PJ2AU-26	20030356		
PJ2AU-27	20030357	Composite J 20030367	Amended Composite J 20030373
PJ2AU-28	20030359		
PJ2AU-29	20030341		
PJ-2AU-30	20030339	Composite K 20030368	Amended Composite K 20030374
PJ2AU-31	20030340		
PJ2AU-32	20030338		
PJ2AU-33	20030335	Composite L 20030393	Amended Composite L 20030400
PJ2AU-35	20030334		
PJ2AU-36	20030333	Composite M 20030369	Amended Composite M 20030375
PJ2AU-37	20030336		
PJ2AU-38	20030337		

Table 3 **Percent Moisture, Grain Size Distribution and TOC of the Individual Cores**

Sample ID	ASI #	% Gravel	% Clay	% Silt	% Sand	% Moisture	%TOC of Dry weight
PJ2AU-1	20030352	0	27.7	72.3	0	60.5	2.82
PJ2AU-2	20030353	0	29.0	71.0	0	58.2	3.01
PJ2AU-3	20030382	0.18	20.8	28.2	50.8	38.9	1.23
PJ2AU-4	20030383	0.0	20.4	29.2	50.4	35.7	1.23
PJ2AU-5	20030354	0	33.5	66.5	0	54.6	3.02
PJ2AU-6	20030384	0.12	25.5	36.1	38.3	38.2	1.46
PJ2AU-6 Duplicate	20030384-Dup	0.0	25.5	36.1	38.4		
PJ2AU-6 Triplicate	20030384-Trip	0.0	25.5	36.1	38.4		
PJ2AU-7	20030379	0.0	29.8	60.4	9.79	53.6	2.95
PJ2AU-8	20030358	0	30.4	64.0	5.67	56.4	2.72
PJ2AU-8 Duplicate	20030358	0	30.8	63.5	5.70	56.3	
PJ2AU-8 Triplicate	20030358	0	30.4	64.6	5.03	56.2	
PJ2AU-9	20030361	0.0	28.1	63.4	8.47	53.9	2.62
PJ2AU-10	20030360	0.0	27.7	62.1	10.3	52.3	2.77
PJ2AU-11	20030378	0.16	27.6	58.3	14.0	52.9	3.18
PJ2AU-12	20030377	0.0	24.5	50.8	24.7	49.4	2.23
PJ2AU-13	20030345	0.0	24.8	49.0	26.2	42.4	2.69
PJ2AU-13 Duplicate	20030345-Dup.	0.0	26.4	49.8	23.7	42.8	
PJ2AU-13 Triplicate	20030345-Trip	0.0	25.1	50.3	24.6	42.2	
PJ2AU-14	20030346	0.20	28.3	71.5	0	57.8	3.20
PJ2AU-15	20030347	0.25	31.3	54.3	14.1	42.1	1.89
PJ2AU-16	20030342	0.0	29.9	70.1	0.0	57.2	2.98
PJ2AU-17	20030351	2.89	17.8	34.4	44.9	46.6	2.65
PJ2AU-18	20030348	0.37	28.1	53.1	18.4	48.7	2.23
PJ2AU-19	20030343	0.04	29.2	70.2	0.52	55.7	3.86
PJ2AU-20	20030344	0.0	25.1	50.3	24.6	53.6	3.14
PJ2AU-21	20030350	0.0	28.0	72.0	0.0	57.6	3.01

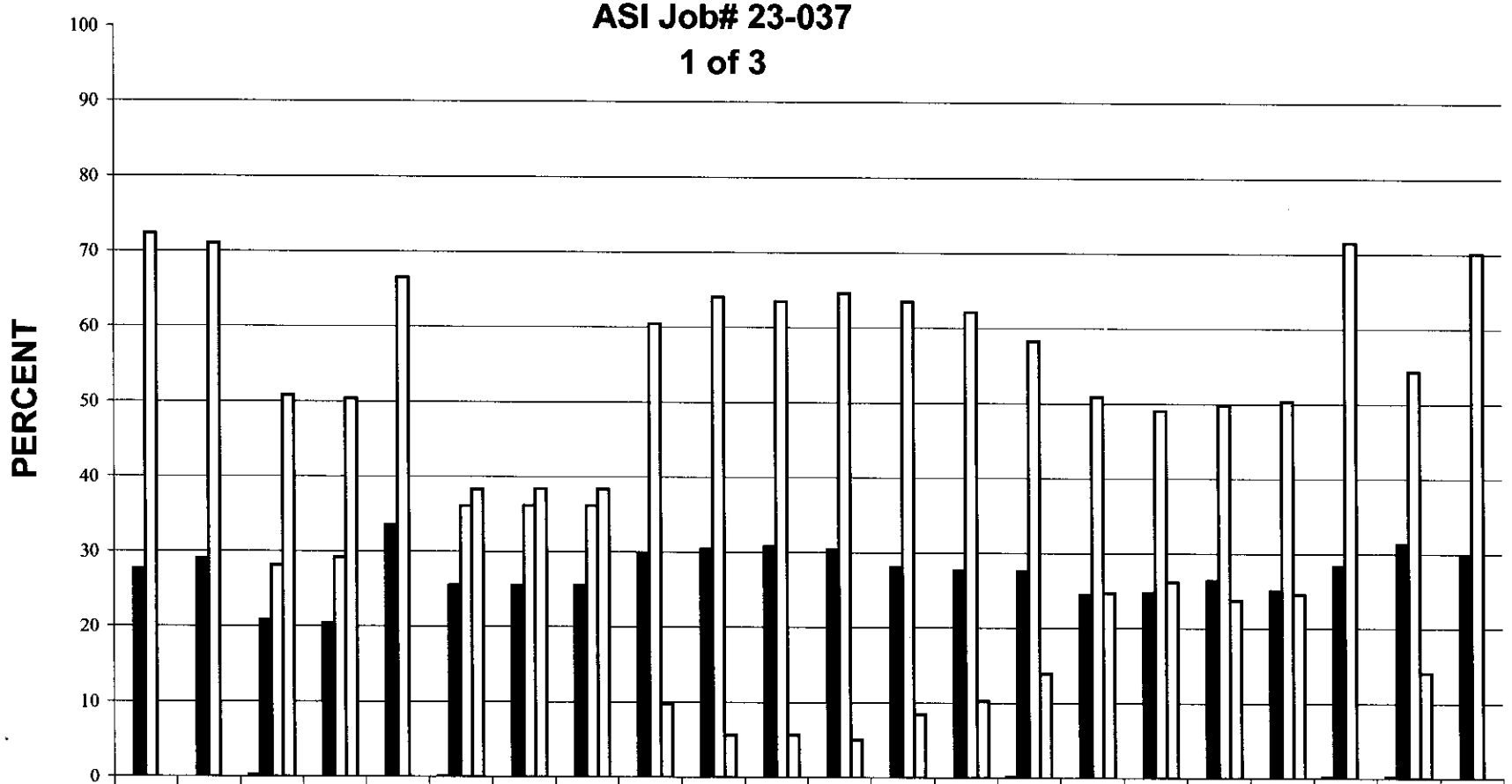
Table 3 continued

Sample ID	ASI #	% Gravel	% Clay	% Silt	% Sand	% Moisture	%TOC of Dry weight
PJ2AU-22	20030349	0.0	31.3	64.0	4.66	50.9	2.87
PJ2AU-23	20030380	0.0	29.1	70.9	0.0	55.2	3.84
PJ2AU-24	20030381	0.0	34.2	65.8	0.0	57.8	3.04
PJ2AU-25	20030355	0.45	22.6	40.9	36.1	42.9	2.70
PJ2AU-26	20030356	0.23	26.2	73.5	0.0	50.5	2.61
PJ2AU-27	20030357	0	26.9	67.1	6.00	54.4	3.84
PJ2AU-28	20030359	0.0	29.3	69.5	1.25	53.8	3.82
PJ2AU-29	20030341	0.39	26.2	61.6	11.9	53.6	3.65
PJ2AU-30	20030339	0.05	29.1	53.6	17.3	50.2	3.24
PJ2AU-31	20030340	0.0	21.1	44.8	34.1	50.3	3.28
PJ2AU-32	20030338	0.0	20.7	39.3	40.0	45.8	2.43
PJ2AU-33	20030335	2.35	17.7	29.3	50.7	36.8	2.31
PJ2AU-34	20030362	6.93	4.26	6.13	82.7	20.0	0.29
PJ2AU-35	20030334	6.45	6.53	9.21	77.8	23.5	0.74
PJ2AU-36	20030333	0.0	25.7	46.0	28.4	49.5	3.04
PJ2AU-37	20030336	0.16	21.6	36.5	41.8	44.1	2.85
PJ2AU-38	20030337	0.0	22.2	40.3	37.6	48.3	2.87

Table 4 **Percent Moisture, Grain Size Distribution and TOC of the Unamended Composites**

Sample ID	ASI #	% Gravel	% Clay	% Silt	% Sand	% Moisture	%TOC of Dry weight
Composite A	20020387	0.2	29.1	49.8	21.0	51.3	2.13
Composite B	20030388	0.18	26.3	43.3	30.18	42.7	1.84
Composite C	20030389	0.0	30.6	58.5	11.0	54.0	2.91
Composite D	20030390	0.0	28.2	53.5	18.4	51.7	2.93
Composite E	20030364	0.2	32.2	57.8	9.80	48.4	2.53
Composite F	20030365	0.17	26.6	54.5	18.8	49.6	2.53
Composite G	20030366	0.0	30.8	69.2	0.0	54.5	3.48
Composite H	20030391	0.0	31.8	68.2	0.0	54.5	3.18
Composite I	20030392	0.15	30.0	55.4	14.4	52.1	3.16
Composite J	20030367	0.29	29.3	69.9	0.44	54.1	3.62
Composite K	20030368	0.0	27.5	48.8	23.8	49.3	3.03
Composite L	20030393	4.11	11.8	16.6	67.5	28.7	1.22
Composite M	20030369	0.0	22.1	41.2	36.8	48.0	2.58
Composite M Duplicate	20030369-Dup	0.0	22.3	41.3	36.4	48.0	
Composite M Triplicate	20030369-Trip	0.0	22.3	39.2	38.5	48.0	

Figure 2 Individual Core Locations Gravel, Clay, Silt and Sand Percentages
(Port Jersey, Contract 2A Upland)
ASI Job# 23-037
1 of 3



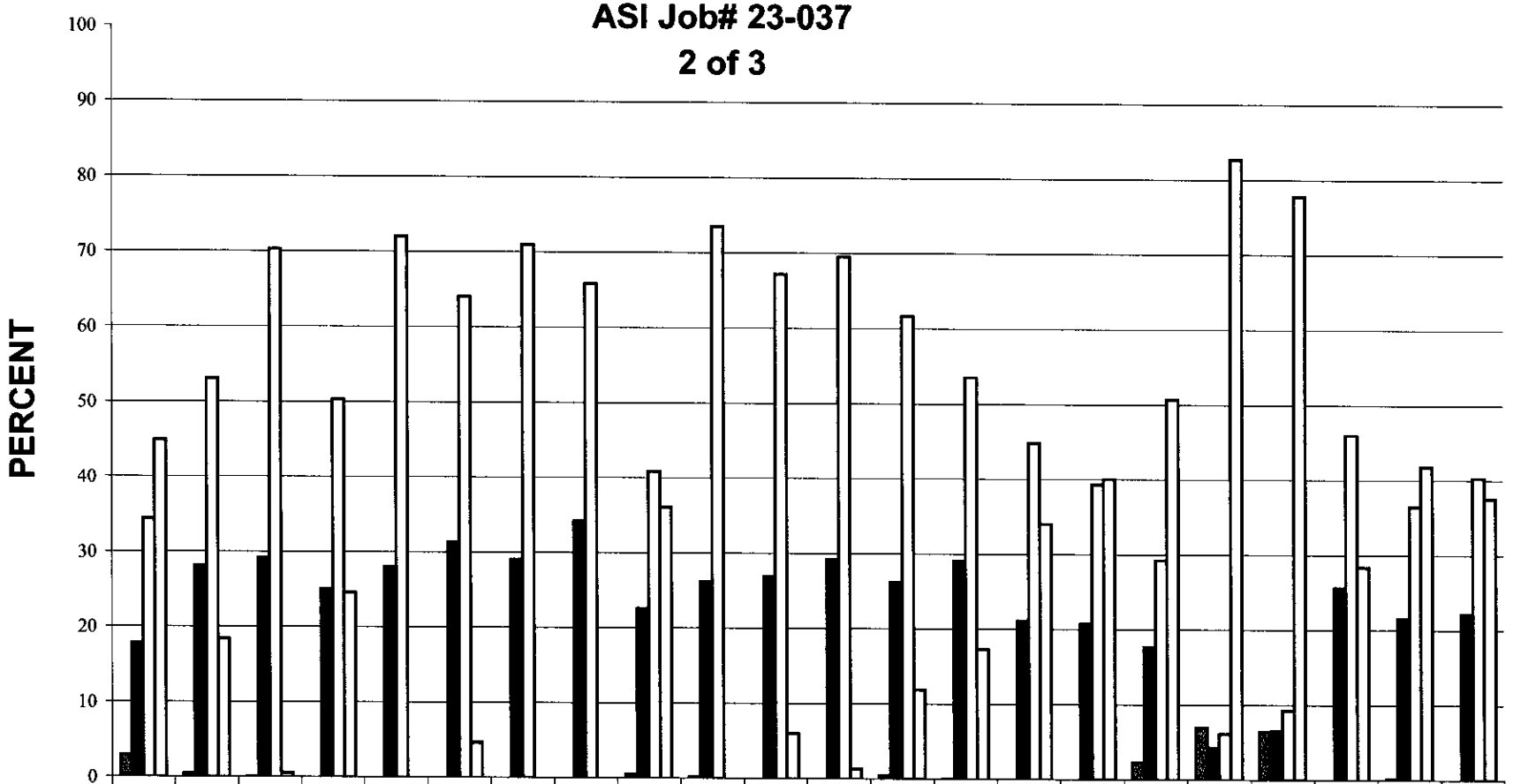
	PJ2AU-1	PJ2AU-2	PJ2AU-3	PJ2AU-4	PJ2AU-5	PJ2AU-6	PJ2AU-6 Dup	PJ2AU-6 Trip	PJ2AU-7	PJ2AU-8	PJ2AU-8 Dup	PJ2AU-8 Trip	PJ2AU-9	PJ2AU-10	PJ2AU-11	PJ2AU-12	PJ2AU-13	PJ2AU-13 Dup	PJ2AU-13 Trip	PJ2AU-14	PJ2AU-15	PJ2AU-16
% Gravel	0	0	0.18	0	0	0.12	0	0	0	0	0	0	0	0	0.16	0	0	0	0	0.2	0.25	0
% Clay	27.7	29	20.84	20.38	33.5	25.48	25.51	25.51	29.8	30.4	30.8	30.4	28.12	27.68	27.59	24.46	24.79	26.43	25.08	28.3	31.3	29.93
% Silt	72.3	71	28.18	29.23	66.5	36.07	36.11	36.11	60.41	64	63.5	64.6	63.41	62.07	58.29	50.84	49.03	49.84	50.33	71.5	54.3	70.07
% Sand	0	0	50.8	50.38	0	38.33	38.38	38.38	9.79	5.67	5.7	5.03	8.47	10.25	13.96	24.7	26.19	23.72	24.59	0	14.1	0

Graph 1 Chart 1 Graph 1 Chart 1

Figure 2 Individual Core Locations Gravel, Clay, Silt and Sand Percentages (Port Jersey, Contract 2A) Upland

ASI Job# 23-037

2 of 3



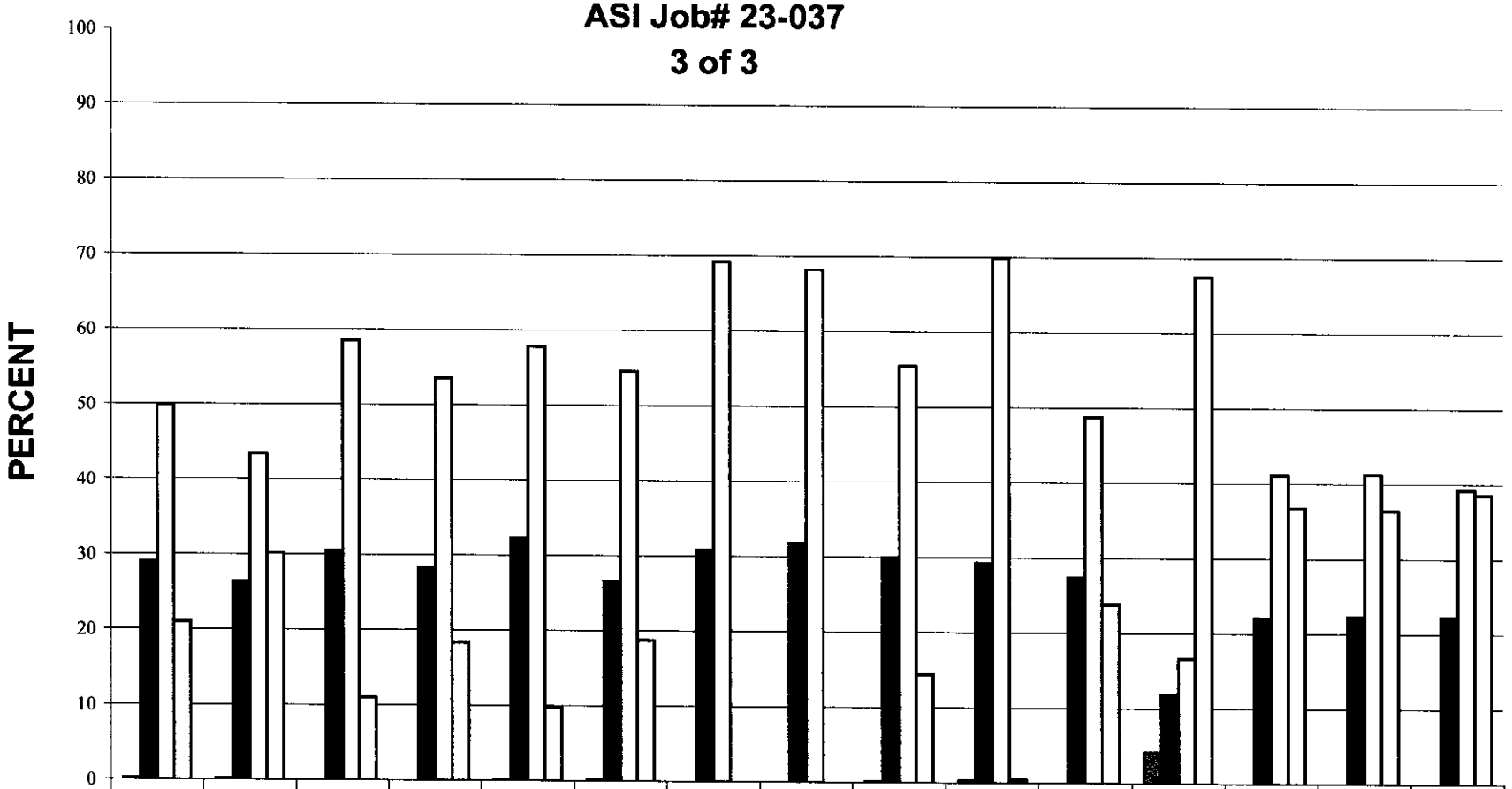
	PJ2AU-17	PJ2AU-18	PJ2AU-19	PJ2AU-20	PJ2AU-21	PJ2AU-22	PJ2AU-23	PJ2AU-24	PJ2AU-25	PJ2AU-26	PJ2AU-27	PJ2AU-28	PJ2AU-29	PJ2AU-30	PJ2AU-31	PJ2AU-32	PJ2AU-33	PJ2AU-34	PJ2AU-35	PJ2AU-36	PJ2AU-37	PJ2AU-38
% Gravel	2.89	0.37	0.04	0	0	0	0	0	0.45	0.23	0	0	0.39	0.05	0	0	2.35	6.93	6.45	0	0.16	0
% Clay	17.8	28.1	29.21	25.08	28	31.3	29.06	34.21	22.6	26.2	26.9	29.25	26.19	29.1	21.12	20.72	17.7	4.26	6.53	25.65	21.56	22.17
% Silt	34.4	53.1	70.23	50.33	72	64	70.94	65.79	40.9	73.5	67.1	69.49	61.56	53.56	44.82	39.28	29.3	6.13	9.21	45.98	36.46	40.29
% Sand	44.9	18.4	0.52	24.59	0	4.66	0	0	36.1	0	6	1.25	11.86	17.3	34.06	40	50.65	82.68	77.81	28.37	41.82	37.55

Graph 2 Chart 1 Graph 2 Chart 1

Figure 2 Unamended Composites Gravel, Clay, Silt and Sand Percentages (Port Jersey, Contract 2A) Upland

ASI Job# 23-037

3 of 3



	Composite A	Composite B	Composite C	Composite D	Composite E	Composite F	Composite G	Composite H	Composite I	Composite J	Composite K	Composite L	Composite M	Composite M Duplicate	Composite M Triplicate
% Gravel	0.2	0.18	0	0	0.2	0.17	0	0	0.15	0.29	0	4.11	0	0	0
% Clay	29.01	26.34	30.57	28.19	32.19	26.61	30.83	31.82	29.98	29.34	27.45	11.8	22.06	22.34	22.25
% Silt	49.82	43.3	58.46	53.45	57.81	54.47	69.17	68.18	55.43	69.93	48.77	16.64	41.16	41.25	39.23
% Sand	20.96	30.18	10.97	18.36	9.8	18.75	0	0	14.44	0.44	23.79	67.45	36.78	36.41	38.52

Graph 3 Chart 1 Graph 3 Chart 1

Table 5 Semivolatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030387		20030394		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp A	Q	A Comp A	Q	1 Comp A	Q	2 Comp A	Q	3 Comp A	Q	4 Comp A	Q	5 Comp A	Q	6 Comp A	Q	7 Comp A	Q
Phenol	10,000,000	660	4,000	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethyl)ether	660	660	10	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2-Chlorophenol	2000	660	5	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
1,3-Dichlorobenzene	5100000	660	600	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
1,4-Dichlorobenzene	570000	660	75	10	29.82		35.58	B	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
1,2-Dichlorobenzene	5100000	660	600	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2-Methylphenol	2800000	660	NA	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
1-Chloropropane-2,2'-oxybis	2300000	660	300	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
4-Methylphenol	2800000	660	NA	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
N-Nitroso-Di-N-Propylamine	660	660	20	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Hexachloroethane	6000	660	10	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Nitrobenzene	28000	660	10	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Isophorone	1100000	660	100	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2-Nitrophenol	NA	660	NA	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2,4-Dimethylphenol	1100000	660	100	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethoxy)methane	NA	660	NA	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2,4-Dichlorophenol	170000	660	20	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
1,2,4-Trichlorobenzene	68000	660	9	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Naphthalene	230000	660	300	10	79.89	B	85.21	B	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
4-Chloroaniline	230000	1300	NA	20	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Hexachloro-1,3-butadiene	NA	660	NA	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
4-Chloro-3-methylphenol	10,000,000	1300	NA	20	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2-Methylnaphthalene	NA	660	NA	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Hexachlorocyclopentadiene	400000	660	50	10	3300	ND	3100	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
2,4,6-Trichlorophenol	62000	660	20	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2,4,5-Trichlorophenol	5600000	660	700	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2-Chloronaphthalene	NA	660	NA	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2-Nitroaniline	NA	3,300	NA	50	8100	ND	7500	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Dimethylphthalate	10,000,000	660	NA	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Acenaphthylene	NA	660	NA	10	43.72		46.07		0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2,6-Dinitrotoluene	1000	660	10	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
3-Nitroaniline	NA	3300	NA	50	8100	ND	7500	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND

Table 5 Semivolatiles continued	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030387		20030394		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp A	Q	A Comp A	Q	1 Comp A	Q	2 Comp A	Q	3 Comp A	Q	4 Comp A	Q	5 Comp A	Q	6 Comp A	Q	7 Comp A	Q
Acenaphthene	3400000	660	400	10	25.65	B	29.03		0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2,4-Dinitrophenol	110000	3300	40	50	8100	ND	7500	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
4-Nitrophenol	NA	3300	NA	50	8100	ND	7500	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Dibenzofuran	NA	660	NA	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2,4-Dinitrotoluene	1000	660	10	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Diethylphthalate	10,000,000	660	5,000	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
4-Chlorophenyl-phenylether	NA	660	NA	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Fluorene	2300000	660	300	10	49.95		53.32		0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
4-Nitroaniline	NA	830	NA	20	4200	ND	3900	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
4,6-Dinitro-2-methylphenol	NA	3300	NA	50	8100	ND	7500	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
N-Nitrosodiphenylamine	140000	660	20	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
4-Bromophenyl-phenylether	NA	660	NA	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Hexachlorobenzene	660	660	10	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Pentachlorophenol	6000	3300	1	50	8100	ND	7500	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Phenanthrene	NA	6600	NA	10	210.2		226.45	B	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Anthracene	10000000	6600	2000	10	100.89		124.26		0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Carbazole	NA	330	NA	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Di-n-butylphthalate	5700000	330	900	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Fluoranthene	2300000	660	300	10	147.57		446.28		0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Pyrene	1700000	660	200	10	466.64		510.03		0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Butylbenzylphthalate	1100000	660	100	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
3,3'-Dichlorobenzidine	2000	1300	60	20	6600	ND	6100	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
Benzo(a)anthracene	900	660	NA	10	262.59		311.18		0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Chrysene	9000	660	NA	10	297.71		327.66		0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
bis(2-Ethylhexyl)phthalate	49000	660	30	10	1800		1300	J	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Di-n-octylphthalate	1100000	660	100	10	1700	ND	1500	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Benzo(b)fluoranthene	900	660	NA	10	262.8		343.72		0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Benzo(k)fluoranthene	900	660	NA	10	242.27		272.69		0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Benzo(a)pyrene	660	660	NA	10	314.68		387.97		0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Indeno(1,2,3-cd)pyrene	900	660	NA	10	225.15		291.24		0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Dibenzo(a,h)anthracene	660	660	NA	10	51.94		83.19		0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Benzo(ghi)perylene	NA	660	NA	10	180.23		231.42		0.0096	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND

Table 5 Pesticides/Arochlors	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030387		20030394		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp A	Q	A Comp A	Q	1 Comp A	Q	2 Comp A	Q	3 Comp A	Q	4 Comp A	Q	5 Comp A	Q	6 Comp A	Q	7 Comp A	Q
alpha-BHC	NA	1.9	0.02	0.05	3.4	ND	3.2	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
beta-BHC	NA	3.3	0.2	0.05	3.4	ND	3.2	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
delta-BHC	NA	1.7	NA	0.05	3.4	ND	3.2	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
gamma-BHC (Lindane)	520	2	0.2	0.05	3.4	ND	3.2	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Heptachlor	150	2.1	0.4	0.05	0.13	ND	0.12	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Aldrin	40	2	0.04	0.05	0.10	ND	0.09	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	0.12	ND	0.11	ND	0.0043	J PG	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Endosulfan I		2.1	0.4	0.05	0.16	ND	0.15	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Dieldrin	42	3.3	0.03	0.10	0.62		0.65		0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
4,4'-DDE	2000	4.2	0.1	0.10	5.59	D	5.96		0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.014	J	0.05	ND
Endrin	17000	3.6	2	0.10	3.4	ND	1.1	J PG	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Endosulfan II		3.3	0.4	0.10	0.15	ND	0.15	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
4,4'-DDD	381000	4.2	0.1	0.10	3.54		3.17		0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.16	ND	0.15	ND	0.006	J	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
4,4'-DDT	2000	3.6	0.1	0.10	0.57		0.63		0.035	J	0.0086	J PG	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Methoxychlor	280000	17	40	0.50	6.7	ND	6.2	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND
Endrin ketone	NA	3.3	NA	0.10	3.4	ND	3.2	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Endrin aldehyde	NA	3.3	NA	0.10	3.4	ND	3.2	ND	0.009	J PG	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
alpha-Chlordane	500	1.7	NA	0.05	0.91		0.99		0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
gamma-Chlordane	NA	1.7	0.5	0.05	0.35	J PG	0.4	J PG	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Toxaphene	100	170	3	5.00	140	ND	130	ND	2	ND	2	ND	2	ND	2.1	ND	2	ND	2	ND	2	ND
Arochlor-1016 *		33		1.00	33	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1221 *		67		2.00	33	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1232 *		33		1.00	33	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1242 *		33		1.00	33	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1248 *		33		1.00	100		80		1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1254 *		33		1.00	56		44		1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1260 *		33		1.00	54		45		1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Total Arochlor(SUM)	490		0.5																			
Combined endosulfans(SUM) Endosulfan I + II + sulfate	340000		NA		0.237264943	ND	0.224436631	ND														

* Reported as units = ppm

Table 5 Metals	Action Level		Action Level		Unamended Sediment (Units: ppm)		Amended Sediment (Units: ppm)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030387		20030394		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp A	Q	A Comp A	Q	1 Comp A	Q	2 Comp A	Q	3 Comp A	Q	4 Comp A	Q	5 Comp A	Q	6 Comp A	Q	7 Comp A	Q
Aluminum	NA	40	200	200	12400	E	10800	E	1170		1410		1290		890		683		599		438	
Antimony	14000	12	20	60	1	ND	0.93	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Arsenic	20000	2	8	10	13.4		12.5		2.9	B	3.2	B	3.9	B	6.8	B	6.1	B	5.4	B	5.5	B
Barium	700000	40	2,000	200	50.8	E	48.9		26.3	B J	9.7	B	6.6	B	11.7	B	10.9	B	11.2	B	6	B J
Beryllium	1000	1	20	5	0.76		0.7		4	ND	4	ND	4	ND	0.66	B J	1.1	B J	1.6	B J	0.33	B
Cadmium	1000	1	4	5	1.25		0.969		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Calcium	NA	1000	NA	5000	4650	E	33800	E	177000	J	90300		70400	J	52300		37600		29500		24600	J
Chromium	NA	2	100	10	106	B	81.4		9.5		13.2		13.9		12.3		9.4		6.7		6.8	
Cobalt	NA	10	NA	50	8.8	E	7	E	3.5	B	0.82	B	50	ND	50	ND	50	ND	50	ND	50	ND
Copper	600000	5	1000	25	85.5		77.2		96.5	J	33.5		22	B	17.2	B	12.6	B	9	B	10.9	B J
Iron	NA	20	300	1000	25800	E	21600	E	100	ND	100	ND	100	ND	23.4	B	33	B	43.9	B	47.1	B
Lead	400000	0.6	10	3	78.0		68.5		3	ND	3	ND	3	ND	3	ND	3	ND	3	ND	3	ND
Magnesium	NA	1000	NA	5000	6610	E	6610	E	22.1	B J	5000	ND	52.1	B J	106	B	171	B	241	B	226	B J
Manganese	NA	3	50	15	447	E	383	E	15	ND	15	ND	15	ND	0.26	B	0.69	B	0.61	B	0.85	B
Mercury	14000	0.1	2	0.2	0.967		0.819		0.057	B	0.2	ND	0.2	ND	0.035	B	0.074	B	0.2	ND	0.2	ND
Nickel	250000	8	100	40	35.2		33.7		19.8	B	5	B	1.7	B	2.1	B	1.7	B	40	ND	1.9	B
Potassium	NA	1000	NA	5000	2530	E	2770		32500		4370	B	1720	B	769	B	407	B	421	B	353	B
Selenium	63000	1	50	5	1.5		1		3.1	B	3.1	B	5	ND	5	ND	5	ND	5	ND	5	ND
Silver	110000	2	NA	10	3.35		2.80		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Sodium	NA	1000	50,000	5,000	8580	E	6880		231000		16200		5690		7050		6840		11900		6110	
Thallium	2000	2	10	10	1	ND	0.59	B	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Vanadium	370000	10	NA	50	33.3	E	27	E	34.3	B	30.9	B	26.9	B J	26.2	B	23	B	24.9	B	23.1	B
Zinc	1500000	4	5000	20	179		186		20	ND	2.5	B	20	ND	3.9	B	3.2	B	3	B	3.2	B J
Cyanide, total	1100000	0.5	200	10	0.46	B	0.37	B														
%Solids					49.5		53.6															

Table 5 Dioxins	Action Level		Action Level		Unamended Sediment (Units: ppt)		Amended Sediment (Units: ppt)		MEP Extracts Units:ppt													
ASI ID #	Soil		Leachate		20030387		20030394		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg		ug/L		Comp A	Q	A Comp A	Q	1 Comp A	Q		Q		Q		Q		Q		Q	7 Comp A	Q
2,3,7,8-TCDD					1.91		3.75		2.5	ND											3.2	ND
1,2,3,7,8-PeCDD					0.46	J	1.09	J	1.3	ND											1.6	ND
1,2,3,4,7,8-HxCDD					0.46	J	1.41	J	1.4	ND											1.9	ND
1,2,3,6,7,8-HxCDD					2.73	J	5.98		1.4	ND											1.9	ND
1,2,3,7,8,9-HxCDD					1.90	J	3.98		1.3	ND											1.8	ND
1,2,3,4,6,7,8-HpCDD					42.84		98.93		1.2	ND											2.5	ND
OCDD					368.64		847.26		2.3	B J											4.6	Q B J
2,3,7,8-TCDF					3.06	#	6.44	#	2.5	ND											3.2	ND
1,2,3,7,8-PeCDF					0.89	J	1.55	J	1.3	ND											1.5	ND
2,3,4,7,8-PeCDF					1.39	J	2.93		0.82	ND											1.2	ND
1,2,3,4,7,8-HxCDF					2.14	J	5.05		0.85	ND											0.9	ND
1,2,3,6,7,8-HxCDF					0.70	J	2.07		0.86	ND											0.93	ND
2,3,4,6,7,8-HxCDF					0.70	J	2.03	J	0.9	ND											1.1	ND
1,2,3,7,8,9-HxCDF					2.90	ND	0.31	J	1	ND											1.2	ND
1,2,3,4,6,7,8-HpCDF					13.08		26.07		1.3	ND											1.4	ND
1,2,3,4,7,8,9-HpCDF					0.55	J	1.66		1.4	ND											1.5	ND
OCDF					25.44		43.32		1.4	ND											3.4	ND

NA

* = NJDEP Required detection limit
# = value from 2nd column confirmation
ND = Not detected
B = Indicates analyte detected in method blank as well as associated field sample
J = Detection limit below the reporting limit or is an estimated value
E = Estimated value

Table 5 Volatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030387		20030394		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp A	Q	A Comp A	Q	1 Comp A	Q	2 Comp A	Q	3 Comp A	Q	4 Comp A	Q	5 Comp A	Q	6 Comp A	Q	7 Comp A	Q
Chloromethane (Methyl Chloride)	520000	10	30	10	10	ND	9.3	ND														
Bromomethane	79000	10	10	10	10	ND	9.3	ND														
Vinyl chloride	2000	10	5	10	10	ND	9.3	ND														
Chloroethane	NA	10	NA	10	10	ND	9.3	ND														
Methylene chloride (Dichloromethane)	49000	10	3	10	2.5	J B	1.9	J														
Acetone	1,000,000	10	700	10	25		67															
Carbon disulfide	NA	10	NA	10	10	ND	7.9	J														
1,1-Dichloroethene	8000	10	2	10	10	ND	9.3	ND														
1,1-Dichloroethane	570000	10	50	10	10	ND	9.3	ND														
1,2-Dichloroethene (total)	NA	10	10	10	10	ND	9.3	ND														
Chloroform	19000	10	6	10	10	ND	9.3	ND														
1,2-Dichloroethane	NA	10	NA	10	10	ND	9.3	ND														
2 Butanone (MEK)	1000000	10	300	10	4.1	J	18															
1,1,1-Trichloroethane	210000	10	30	10	10	ND	9.3	ND														
Carbon tetrachloride	2000	10	2	10	10	ND	9.3	ND														
Bromodichloromethane	11000	10	1	10	10	ND	9.3	ND														
1,2-Dichloropropane	10000	10	1	10	10	ND	9.3	ND														
cis-1,3-Dichloropropene	NA	10	NA	10	10	ND	9.3	ND														
Trichloroethene	23000	10	1	10	10	ND	9.3	ND														
Dibromochloromethane	110000	10	10	10	10	ND	9.3	ND														
1,1,2-Trichloroethane	22000	10	3	10	10	ND	9.3	ND														
Benzene	3000	10	1	10	10	ND	9.3	ND														
trans-1,3-dichloropropene	NA	10	NA	10	10	ND	9.3	ND														
Bromoform	86000	10	4	10	10	ND	9.3	ND														
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10	10	ND	9.3	ND														
2-Hexanone	NA	10	NA	10	10	ND	9.3	ND														
Tetrachloroethene	4000	10	1	10	10	ND	9.3	ND														
1,1,2,2-Tetrachloroethane	NA	10	NA	10	10	ND	9.3	ND														
Toluene	1000000	10	1000	10	10	ND	9.3	ND														
Chlorobenzene	37000	10	50	10	10	ND	9.3	ND														
Ethyl benzene	1000000	10	700	10	10	ND	9.3	ND														
Styrene	23000	10	100	10	10	ND	9.3	ND														
Xylenes(Total)	410000	10	1000	10	10	ND	9.3	ND														

Table 6 Volatiles	Action Level				Unamended Sediment (Units: ppm)		Amended Sediment (Units: ppm)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030388		20030395		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg		ug/L		Comp B	Q	A Comp B	Q	1 Comp B	Q	2 Comp B	Q	3 Comp B	Q	4 Comp B	Q	5 Comp B	Q	6 Comp B	Q	7 Comp B	Q
Chloromethane (Methyl Chloride)	520000	10	30	10	8.8	ND	7.6	ND														
Bromomethane	79000	10	10	10	8.8	ND	7.6	ND														
Vinyl chloride	2000	10	5	10	8.8	ND	7.6	ND														
Chloroethane	NA	10	NA	10	8.8	ND	7.6	ND														
Methylene chloride (Dichloromethane)	49000	10	3	10	5.1	J B	34															
Acetone	1,000,000	10	700	10	15	J	76															
Carbon disulfide	NA	10	NA	10	2.5	J	22															
1,1-Dichloroethene	8000	10	2	10	8.8	ND	7.6	ND														
1,1-Dichloroethane	570000	10	50	10	8.8	ND	7.6	ND														
1,2-Dichloroethene (total)	NA	10	10	10	8.8	ND	7.6	ND														
Chloroform	19000	10	6	10	8.8	ND	7.6	ND														
1,2-Dichloroethane	NA	10	NA	10	8.8	ND	7.6	ND														
2-Butanone (MEK)	1000000	10	300	10	2.5	J	30															
1,1,1-Trichloroethane	210000	10	30	10	8.8	ND	7.6	ND														
Carbon tetrachloride	2000	10	2	10	8.8	ND	7.6	ND														
Bromodichloromethane	11000	10	1	10	8.8	ND	7.6	ND														
1,2-Dichloropropane	10000	10	1	10	8.8	ND	7.6	ND														
cis-1,3-Dichloropropene	NA	10	NA	10	8.8	ND	7.6	ND														
Trichloroethene	23000	10	1	10	8.8	ND	7.6	ND														
Dibromochloromethane	110000	10	10	10	8.8	ND	7.6	ND														
1,1,2-Trichloroethane	22000	10	3	10	8.8	ND	7.6	ND														
Benzene	3000	10	1	10	8.8	ND	7.6	ND														
trans-1,3-dichloropropene	NA	10	NA	10	8.8	ND	7.6	ND														
Bromoform	86000	10	4	10	8.8	ND	7.6	ND														
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10	8.8	ND	7.6	ND														
2-Hexanone	NA	10	NA	10	8.8	ND	7.6	ND														
Tetrachloroethene	4000	10	1	10	8.8	ND	7.6	ND														
1,1,2,2-Tetrachloroethane	NA	10	NA	10	8.8	ND	7.6	ND														
Toluene	1000000	10	1000	10	8.8	ND	7.6	ND														
Chlorobenzene	37000	10	50	10	8.8	ND	7.6	ND														
Ethyl benzene	1000000	10	700	10	8.8	ND	7.6	ND														
Styrene	23000	10	100	10	8.8	ND	7.6	ND														
Xylenes(Total)	410000	10	1000	10	8.8	ND	7.6	ND														

Table 6 Semivolatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030388		20030395		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp B	Q	A Comp B	Q	1 Comp B	Q	2 Comp B	Q	3 Comp B	Q	4 Comp B	Q	5 Comp B	Q	6 Comp B	Q	7 Comp B	Q
Phenol	10,000,000	660	4,000	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethyl)ether	660	660	10	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2-Chlorophenol	2000	660	5	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
1,3-Dichlorobenzene	5100000	660	600	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
1,4-Dichlorobenzene	570000	660	75	10	15.46		13.77	B	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
1,2-Dichlorobenzene	5100000	660	600	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2-Methylphenol	2800000	660	NA	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
1-Chloropropane-2,2'-oxybis	2300000	660	300	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
4-Methylphenol	2800000	660	NA	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
N-Nitroso-Di-N-Propylamine	660	660	20	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Hexachloroethane	6000	660	10	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Nitrobenzene	28000	660	10	10	1500	ND	73	J	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Isophorone	1100000	660	100	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2-Nitrophenol	NA	660	NA	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2,4-Dimethylphenol	1100000	660	100	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethoxy)methane	NA	660	NA	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2,4-Dichlorophenol	170000	660	20	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
1,2,4-Trichlorobenzene	68000	660	9	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Naphthalene	230000	660	300	10	43.03	B	38.5	B	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
4-Chloroaniline	230000	1300	NA	20	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Hexachloro-1,3-butadiene	NA	660	NA	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
4-Chloro-3-methylphenol	10,000,000	1300	NA	20	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2-Methylnaphthalene	NA	660	NA	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Hexachlorocyclopentadiene	400000	660	50	10	2900	ND	1000	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
2,4,6-Trichlorophenol	62000	660	20	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2,4,5-Trichlorophenol	5600000	660	700	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2-Chloronaphthalene	NA	660	NA	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2-Nitroaniline	NA	3,300	NA	50	7100	ND	2400	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Dimethylphthalate	10,000,000	660	NA	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Acenaphthylene	NA	660	NA	10	24.09		20.11		0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2,6-Dinitrotoluene	1000	660	10	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
3-Nitroaniline	NA	3300	NA	50	7100	ND	2400	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND

Table 6 Semivolatiles continued	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm+J54													
ASI ID #	Soil		Leachate		20030388		20030395		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp B	Q	A Comp B	Q	1 Comp B	Q	2 Comp B	Q	3 Comp B	Q	4 Comp B	Q	5 Comp B	Q	6 Comp B	Q	7 Comp B	Q
Acenaphthene	3400000	660	400	10	11.58	B	10.67		0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2,4-Dinitrophenol	110000	3300	40	50	7100	ND	2400	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
4-Nitrophenol	NA	3300	NA	50	7100	ND	2400	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Dibenzofuran	NA	660	NA	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
2,4-Dinitrotoluene	1000	660	10	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Diethylphthalate	10,000,000	660	5,000	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.00093	J	0.0095	ND	0.0096	ND
4-Chlorophenyl-phenylether	NA	660	NA	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Fluorene	2300000	660	300	10	25.97		16.35		0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
4-Nitroaniline	NA	830	NA	20	3700	ND	1300	ND	0.019	ND	0.02	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
4,6-Dinitro-2-methylphenol	NA	3300	NA	50	7100	ND	2400	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
N-Nitrosodiphenylamine	140000	660	20	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
4-Bromophenyl-phenylether	NA	660	NA	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Hexachlorobenzene	660	660	10	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Pentachlorophenol	6000	3300	1	50	7100	ND	2400	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Phenanthrene	NA	6600	NA	10	126.88		105.17	B	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Anthracene	10000000	6600	2000	10	58.81		54.04		0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Carbazole	NA	330	NA	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Di-n-butylphthalate	5700000	330	900	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Fluoranthene	2300000	660	300	10	257.32		217.47		0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Pyrene	1700000	660	200	10	299.44		238.91		0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Butylbenzylphthalate	1100000	660	100	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
3,3'-Dichlorobenzidine	2000	1300	60	20	5700	ND	2000	ND	0.019	ND	0.02	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
Benzo(a)anthracene	900	660	NA	10	172.11		143.89		0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Chrysene	9000	660	NA	10	185.59		153.15		0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
bis(2-Ethylhexyl)phthalate	49000	660	30	10	630	J	410	J	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Di-n-octylphthalate	1100000	660	100	10	1500	ND	500	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Benzo(b)fluoranthene	900	660	NA	10	176.33		149.02		0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Benzo(k)fluoranthene	900	660	NA	10	163.89		139.22		0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Benzo(a)pyrene	660	660	NA	10	209.12		177.25		0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Indeno(1,2,3-cd)pyrene	900	660	NA	10	139.12		134.37		0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Dibenzo(a,h)anthracene	660	660	NA	10	30.52		30.67		0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND
Benzo(ghi)perylene	NA	660	NA	10	117.15		102.7		0.0097	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0095	ND	0.0096	ND

Table 6 Pesticides/Arochlors	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030388		20030395		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp B	Q	A Comp B	Q	1 Comp B	Q	2 Comp B	Q	3 Comp B	Q	4 Comp B	Q	5 Comp B	Q	6 Comp B	Q	7 Comp B	Q
alpha-BHC	NA	1.9	0.02	0.05	6	ND	2.6	ND	0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
beta-BHC	NA	3.3	0.2	0.05	6	ND	2.6	ND	0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
delta-BHC	NA	1.7	NA	0.05	6	ND	2.6	ND	0.013	J	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
gamma-BHC (Lindane)	520	2	0.2	0.05	6	ND	2.6	ND	0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
Heptachlor	150	2.1	0.4	0.05	0.11	ND	0.10	ND	0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
Aldrin	40	2	0.04	0.05	0.08	ND	0.07	ND	0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	0.10	ND	0.09	ND	0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
Endosulfan I		2.1	0.4	0.05	0.13	ND	0.12	ND	0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
Dieldrin	42	3.3	0.03	0.10	0.28		0.29		0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
4,4'-DDE	2000	4.2	0.1	0.10	2.63		2.50		0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
Endrin	17000	3.6	2	0.10	6	ND	2.6	ND	0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
Endosulfan II		3.3	0.4	0.10	0.13	ND	0.12	ND	0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
4,4'-DDD	381000	4.2	0.1	0.10	1.68		1.45		0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.14	ND	0.12	ND	0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
4,4'-DDT	2000	3.6	0.1	0.10	0.38		0.41		0.019	J	0.0084	J	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
Methoxychlor	280000	17	40	0.50	12	ND	5	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.099	ND	0.1	ND	0.1	ND
Endrin ketone	NA	3.3	NA	0.10	6	ND	2.6	ND	0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
Endrin aldehyde	NA	3.3	NA	0.10	6	ND	2.6	ND	0.0064	J	0.051	ND	0.051	ND	0.051	ND	0.0089	J PQ	0.052	ND	0.051	ND
alpha-Chlordane	500	1.7	NA	0.05	0.23		0.23		0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
gamma-Chlordane	NA	1.7	0.5	0.05	6	ND	2.6	ND	0.05	ND	0.051	ND	0.051	ND	0.051	ND	0.05	ND	0.052	ND	0.051	ND
Toxaphene	100	170	3	5.00	240	ND	100	ND	2	ND	2	ND	2	ND	2	ND	2	ND	2.1	ND	2	ND
Arochlor-1016 *		33		1.00	29	ND	25	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND	1	ND
Arochlor-1221 *		67		2.00	29	ND	25	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND	1	ND
Arochlor-1232 *		33		1.00	29	ND	25	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND	1	ND
Arochlor-1242 *		33		1.00	29	ND	25	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND	1	ND
Arochlor-1248 *		33		1.00	76		38		1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND	1	ND
Arochlor-1254 *		33		1.00	35		23	J	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND	1	ND
Arochlor-1260 *		33		1.00	29	ND	26		1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND	1	ND
Total Arochlor(SUM)	490		0.5																			
Combined endosulfans(SUM) Endosulfan I + II + sulfate	340000		NA		0.201184636	ND	0.179051938	ND														

* Reported as units = ppm

Table 6 Metals	Action Level		Action Level		Unamended Sediment (Units: ppm)		Amended Sediment (Units: ppm)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030388		20030395		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp B	Q	A Comp B	Q	1 Comp B	Q	2 Comp B	Q	3 Comp B	Q	4 Comp B	Q	5 Comp B	Q	6 Comp B	Q	7 Comp B	Q
Aluminum	NA	40	200	200	10800	E	10500	E	1310		870		640		354		279		231		165	B
Antimony	14000	12	20	60	0.97	ND	0.99	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Arsenic	20000	2	8	10	14.1		9.56		2.9	B	4.3	B	5.6	B	6.4	B	5.8	B	6.4	B	7.3	B
Barium	700000	40	2,000	200	34.1	E	41		12.1	B J	5.8	B	4.6	B	10.2	B	7.2	B	6.3	B	4.3	B J
Beryllium	1000	1	20	5	0.68		0.65		4	ND	4	ND	4	ND	0.63	B J	1.1	B J	1.5	B J	4	ND
Cadmium	1000	1	4	5	0.671		0.63		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Calcium	NA	1000	NA	5000	6820	E	52700	E	109000	J	63500		43700	J	27900		20200		15200		14200	J
Chromium	NA	2	100	10	75.3		60.3		10.5		10		6.2		4.7	B	5		3.2	B	2.8	B
Cobalt	NA	10	NA	50	7.9	E	6	E	1.7	B	50	ND	50	ND	50	ND	50	ND	50	ND	50	ND
Copper	600000	5	1000	25	49.6		43.9		67.8	J	15.8	B	10.3	B	7.2	B	5.2	B	3.5	B	4.7	B J
Iron	NA	20	300	1000	24300	E	20300	E	100	ND	100	ND	100	ND	26.5	B	42.1	B	68.7	B	74.1	B
Lead	400000	0.6	10	3	46.5		39.1		3	ND	3	ND	3	ND	3	ND	3	ND	3	ND	3	ND
Magnesium	NA	1000	NA	5000	5890	E	6920	E	19.1	B J	5000	ND	64.6	B J	142	B	193	B	298	B	345	B J
Manganese	NA	3	50	15	375	E	332	E	15	ND	15	ND	15	ND	0.23	B	0.56	B	0.92	B	1.2	B
Mercury	14000	0.1	2	0.2	0.490		0.389		0.2	ND	0.2	ND	0.2	ND	0.2	ND	0.039	B	0.2	ND	0.2	ND
Nickel	250000	8	100	40	29.4		29.5		13.3	B	2.7	B	1.4	B	1.1	B	40	ND	0.88	B	0.93	B
Potassium	NA	1000	NA	5000	2240	E	2660		24200		3030	B	1560	B	583	B	414	B	322	B	296	B
Selenium	63000	1	50	5	1.1		0.6		5.4		2.6	B	5	ND	5	ND	5	ND	5	ND	5	ND
Silver	110000	2	NA	10	1.79		1.41		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Sodium	NA	1000	50,000	5,000	6240	E	4820		161000		17500		5670		6190		6190		5730		7090	
Thallium	2000	2	10	10	0.97	ND	0.99	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Vanadium	370000	10	NA	50	29	E	26.6	E	58.5		43.3	B	33.3	B J	25.8	B	24.2	B	16.6	B	15.2	B
Zinc	1500000	4	5000	20	124		133		20	ND	20	ND	1.4	B	1.8	B	2.8	B	4.8	B	6.1	B J
Cyanide, total	1100000	0.5	200	10	0.4	B	0.28	B														
%Solids					56.6		65.5															

Table 6 Dioxins	Action Level		Action Level		Unamended Sediment (Units: ppt)		Amended Sediment (Units: ppt)		MEP Extracts Units:ppt													
ASI ID #	Soil		Leachate		20030388		20030395		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg		ug/L		Comp B	Q	A Comp B	Q	1 Comp B	Q		Q		Q		Q		Q		Q	7 Comp B	Q
2,3,7,8-TCDD					0.87		2.06		2.1	ND											1.8	ND
1,2,3,7,8-PeCDD					0.21	J	0.67	J	0.99	ND											0.9	ND
1,2,3,4,7,8-HxCDD					0.21	J	0.75	J	1.2	ND											0.94	ND
1,2,3,6,7,8-HxCDD					1.10	J	3.10	J	1.3	ND											0.98	ND
1,2,3,7,8,9-HxCDD					0.88	J	2.28		1.2	ND											0.92	ND
1,2,3,4,6,7,8-HpCDD					17.12		49.02		0.93	ND											0.72	ND
OCDD					169.00		456.02		4.3	Q B J											4.2	B J
2,3,7,8-TCDF					1.67	#	3.91	#	2.1	ND											1.7	ND
1,2,3,7,8-PeCDF					0.50	J	0.79	J	0.84	ND											0.83	ND
2,3,4,7,8-PeCDF					0.70	J	1.55	J	0.6	ND											0.65	ND
1,2,3,4,7,8-HxCDF					1.04	J	2.80		0.5	ND											0.61	Q B J
1,2,3,6,7,8-HxCDF					0.44	J	1.16	J	0.51	ND											0.51	ND
2,3,4,6,7,8-HxCDF					0.37	J	1.21	J	0.56	ND											0.58	ND
1,2,3,7,8,9-HxCDF					0.05	J	0.27	J	0.63	ND											0.63	ND
1,2,3,4,6,7,8-HpCDF					4.71		13.19		0.95	ND											0.78	ND
1,2,3,4,7,8,9-HpCDF					0.31	J	1.00	J	1.1	ND											0.87	ND
OCDF					8.24	J	22.87		1.5	Q J											1.1	ND

NA

* = NJDEP Required detection limit
# = value from 2nd column confirmation
ND = Not detected
B = Indicates analyte detected in method blank as well as associated field sample
J = Detection limit below the reporting limit or is an estimated value
E = Estimated value

Table 7 Volatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030389		20030396		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp C	Q	A Comp C	Q	1 Comp C	Q	2 Comp C	Q	3 Comp C	Q	4 Comp C	Q	5 Comp C	Q	6 Comp C	Q	7 Comp C	Q
Chloromethane (Methyl Chloride)	520000	10	30	10	11	ND	10	ND														
Bromomethane	79000	10	10	10	11	ND	10	ND														
Vinyl chloride	2000	10	5	10	11	ND	10	ND														
Chloroethane	NA	10	NA	10	11	ND	10	ND														
Methylene chloride (Dichloromethane)	49000	10	3	10	11	ND	10	ND														
Acetone	1,000,000	10	700	10	38		140															
Carbon disulfide	NA	10	NA	10	4	J	39															
1,1-Dichloroethene	8000	10	2	10	11	ND	10	ND														
1,1-Dichloroethane	570000	10	50	10	11	ND	10	ND														
1,2-Dichloroethene (total)	NA	10	10	10	11	ND	10	ND														
Chloroform	19000	10	6	10	11	ND	10	ND														
1,2-Dichloroethane	NA	10	NA	10	11	ND	10	ND														
2-Butanone (MEK)	1000000	10	300	10	12		45															
1,1,1-Trichloroethane	210000	10	30	10	11	ND	10	ND														
Carbon tetrachloride	2000	10	2	10	11	ND	10	ND														
Bromodichloromethane	11000	10	1	10	11	ND	10	ND														
1,2-Dichloropropane	10000	10	1	10	11	ND	10	ND														
cis-1,3-Dichloropropene	NA	10	NA	10	11	ND	10	ND														
Trichloroethene	23000	10	1	10	11	ND	10	ND														
Dibromochloromethane	110000	10	10	10	11	ND	10	ND														
1,1,2-Trichloroethane	22000	10	3	10	11	ND	10	ND														
Benzene	3000	10	1	10	11	ND	10	ND														
trans-1,3-dichloropropene	NA	10	NA	10	11	ND	10	ND														
Bromoform	86000	10	4	10	11	ND	10	ND														
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10	11	ND	10	ND														
2-Hexanone	NA	10	NA	10	11	ND	10	ND														
Tetrachloroethene	4000	10	1	10	11	ND	10	ND														
1,1,2,2-Tetrachloroethane	NA	10	NA	10	11	ND	10	ND														
Toluene	1000000	10	1000	10	11	ND	10	ND														
Chlorobenzene	37000	10	50	10	11	ND	10	ND														
Ethyl benzene	1000000	10	700	10	11	ND	10	ND														
Styrene	23000	10	100	10	11	ND	10	ND														
Xylenes(Total)	410000	10	1000	10	11	ND	10	ND														

Table 7 Semivolatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm+.183													
ASI ID #	Soil		Leachate		20030389		20030396		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp C	Q	A Comp C	Q	1 Comp C	Q	2 Comp C	Q	3 Comp C	Q	4 Comp C	Q	5 Comp C	Q	6 Comp C	Q	7 Comp C	Q
Phenol	10,000,000	660	4,000	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
bis(2-Chloroethyl)ether	660	660	10	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2-Chlorophenol	2000	660	5	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
1,3-Dichlorobenzene	5100000	660	600	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
1,4-Dichlorobenzene	570000	660	75	10	61.15		38.57	B	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
1,2-Dichlorobenzene	5100000	660	600	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2-Methylphenol	2800000	660	NA	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
1-Chloropropane-2,2'-oxybis	2300000	660	300	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
4-Methylphenol	2800000	660	NA	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
N-Nitroso-Di-N-Propylamine	660	660	20	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Hexachloroethane	6000	660	10	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Nitrobenzene	28000	660	10	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Isophorone	1100000	660	100	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2-Nitrophenol	NA	660	NA	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2,4-Dimethylphenol	1100000	660	100	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
bis(2-Chloroethoxy)methane	NA	660	NA	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2,4-Dichlorophenol	170000	660	20	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
1,2,4-Trichlorobenzene	68000	660	9	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Naphthalene	230000	660	300	10	190.75	B	151.71	B	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
4-Chloroaniline	230000	1300	NA	20	160	J	250	J	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Hexachloro-1,3-butadiene	NA	660	NA	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
4-Chloro-3-methylphenol	10,000,000	1300	NA	20	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2-Methylnaphthalene	NA	660	NA	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Hexachlorocyclopentadiene	400000	660	50	10	3600	ND	1300	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
2,4,6-Trichlorophenol	62000	660	20	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2,4,5-Trichlorophenol	5600000	660	700	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2-Chloronaphthalene	NA	660	NA	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2-Nitroaniline	NA	3,300	NA	50	8700	ND	3200	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
Dimethylphthalate	10,000,000	660	NA	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Acenaphthylene	NA	660	NA	10	138.33		93.23		0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2,6-Dinitrotoluene	1000	660	10	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
3-Nitroaniline	NA	3300	NA	50	8700	ND	3200	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND

Table 7 Semivolatiles continued	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm+J120													
ASI ID #	Soil		Leachate		20030389		20030396		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp C	Q	A Comp C	Q	1 Comp C	Q	2 Comp C	Q	3 Comp C	Q	4 Comp C	Q	5 Comp C	Q	6 Comp C	Q	7 Comp C	Q
Acenaphthene	3400000	660	400	10	70.5	B	65.16		0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2,4-Dinitrophenol	110000	3300	40	50	8700	ND	3200	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
4-Nitrophenol	NA	3300	NA	50	8700	ND	3200	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
Dibenzofuran	NA	660	NA	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2,4-Dinitrotoluene	1000	660	10	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Diethylphthalate	10,000,000	660	5,000	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
4-Chlorophenyl-phenylether	NA	660	NA	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Fluorene	2300000	660	300	10	97.04		88.06		0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
4-Nitroaniline	NA	830	NA	20	4500	ND	1700	ND	0.019	ND	0.02	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
4,6-Dinitro-2-methylphenol	NA	3300	NA	50	8700	ND	3200	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
N-Nitrosodiphenylamine	140000	660	20	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
4-Bromophenyl-phenylether	NA	660	NA	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Hexachlorobenzene	660	660	10	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Pentachlorophenol	6000	3300	1	50	8700	ND	3200	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
Phenanthrene	NA	6600	NA	10	705.97		468.14	B	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Anthracene	10000000	6600	2000	10	354.66		320.85		0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Carbazole	NA	330	NA	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Di-n-butylphthalate	5700000	330	900	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Fluoranthene	2300000	660	300	10	2056.3		1343.09	D	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Pyrene	1700000	660	200	10	2144.74		1481.19	D	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Butylbenzylphthalate	1100000	660	100	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
3,3'-Dichlorobenzidine	2000	1300	60	20	7100	ND	2600	ND	0.019	ND	0.02	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
Benzo(a)anthracene	900	660	NA	10	[illegible]		853.81	D	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Chrysene	9000	660	NA	10	993.51		818.14	D	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
bis(2-Ethylhexyl)phthalate	49000	660	30	10	1700	J	1600		0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0011	J
Di-n-octylphthalate	1100000	660	100	10	1800	ND	660	ND	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Benzo(b)fluoranthene	900	660	NA	10	[illegible]		601.09		0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Benzo(k)fluoranthene	900	660	NA	10	840.71		572.07		0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Benzo(a)pyrene	660	660	NA	10	[illegible]		[illegible]	D	0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Indeno(1,2,3-cd)pyrene	900	660	NA	10	753.15		535.9		0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Dibenzo(a,h)anthracene	660	660	NA	10	182.76		150.27		0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Benzo(ghi)perylene	NA	660	NA	10	626.84		423.96		0.0096	ND	0.0098	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND

Table 7 Pesticides/Arochlors	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030389		20030396		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp C	Q	A Comp C	Q	1 Comp C	Q	2 Comp C	Q	3 Comp C	Q	4 Comp C	Q	5 Comp C	Q	6 Comp C	Q	7 Comp C	Q
alpha-BHC	NA	1.9	0.02	0.05	3.7	ND	3.4	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
beta-BHC	NA	3.3	0.2	0.05	3.7	ND	3.4	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
delta-BHC	NA	1.7	NA	0.05	3.7	ND	3.4	ND	0.0091	J PG	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
gamma-BHC (Lindane)	520	2	0.2	0.05	3.7	ND	3.4	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Heptachlor	150	2.1	0.4	0.05	0.13	ND	0.12	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Aldrin	40	2	0.04	0.05	0.10	ND	0.09	ND	0.076		0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	0.12	ND	0.11	ND	0.0038	J PG	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Endosulfan I		2.1	0.4	0.05	0.16	ND	0.15	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Dieldrin	42	3.3	0.03	0.10	0.95		0.71		0.05	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
4,4'-DDE	2000	4.2	0.1	0.10	8.58	D	5.72		0.05	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Endrin	17000	3.6	2	0.10	3.7	ND	0.45	J PG	0.05	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Endosulfan II		3.3	0.4	0.10	0.16	ND	0.14	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
4,4'-DDD	381000	4.2	0.1	0.10	5.95		3.23		0.05	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.17	ND	0.15	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
4,4'-DDT	2000	3.6	0.1	0.10	0.69		1.01		0.042	J	0.0064	J PG	0.0091	J PG	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Methoxychlor	280000	17	40	0.50	7.2	ND	6.6	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND
Endrin ketone	NA	3.3	NA	0.10	3.7	ND	3.4	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Endrin aldehyde	NA	3.3	NA	0.10	3.7	ND	3.4	ND	0.019	J	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
alpha-Chlordane	500	1.7	NA	0.05	1.57		0.92		0.05	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
gamma-Chlordane	NA	1.7	0.5	0.05	0.66	J PG	3.4	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.05	ND
Toxaphene	100	170	3	5.00	150	ND	130	ND	2	ND	2	ND	2	ND	2.1	ND	2	ND	2	ND	2	ND
Arochlor-1016 *		33		1.00	36	ND	33	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1221 *		67		2.00	36	ND	33	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1232 *		33		1.00	36	ND	33	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1242 *		33		1.00	36	ND	33	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1248 *		33		1.00	230		140		1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1254 *		33		1.00	110		100		1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1260 *		33		1.00	110		96		1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Total Arochlor(SUM)	490		0.5																			
Combined endosulfans(SUM) Endosulfan I + II + sulfate	340000		NA		0.247113188	ND	0.219749513	ND														

* Reported as units = ppm

Table 7 Metals	Action Level		Action Level		Unamended Sediment (Units: ppm)		Amended Sediment (Units: ppm)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030389		20030396		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp C	Q	A Comp C	Q	1 Comp C	Q	2 Comp C	Q	3 Comp C	Q	4 Comp C	Q	5 Comp C	Q	6 Comp C	Q	7 Comp C	Q
Aluminum	NA	40	200	200	12900	E	12000	E	1290		1000		698		432		265		241		177	B
Antimony	14000	12	20	60	1.1	ND	0.42	BN	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Arsenic	20000	2	8	10	17.1		15.0		4.2	B	3.5	B	5.6	B	7.2	B	8.2	B	6.8	B	8.2	B
Barium	700000	40	2,000	200	67.1	E	66.5		17.1	B J	7.9	B	4.8	B	5.8	B	7.4	B	6.5	B	12.3	B J
Beryllium	1000	1	20	5	0.82		0.83		4	ND	4	ND	4	ND	0.61	B J	1.1	B J	1.6	B J	4	ND
Cadmium	1000	1	4	5	1.7		1.52		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Calcium	NA	1000	NA	5000	7610	E	35000	E	120000	J	68400		50200	J	33100		23100		17800		17500	J
Chromium	NA	2	100	10	157	B	95.9		9.3		14.2		11		8.8		7		5.3		5.5	
Cobalt	NA	10	NA	50	9.7	E	8.5	E	2.6	B	50	ND	50	ND	50	ND	50	ND	50	ND	50	ND
Copper	600000	5	1000	25	125		100		49.1	J	30		21.2	B	17	B	12.2	B	8.7	B	13.7	B J
Iron	NA	20	300	1000	28300	E	25800	E	100	ND	100	ND	100	ND	100	ND	21.4	B	45.3	B	51.3	B
Lead	400000	0.6	10	3	118		94.9		3	ND	3	ND	3	ND	3	ND	3	ND	3	ND	3	ND
Magnesium	NA	1000	NA	5000	7380	E	7940	E	22.4	B J	5000	ND	48.2	B J	83.1	B	142	B	189	B	260	B J
Manganese	NA	3	50	15	491	E	459	E	15	ND	15	ND	15	ND	15	ND	0.26	B	0.56	B	0.79	B
Mercury	14000	0.1	2	0.2	1.73		1.22		0.2	ND	0.2	ND	0.2	ND	0.2	ND	0.2	ND	0.2	ND	0.2	ND
Nickel	250000	8	100	40	41.7		38.8	E	20	B	5	B	1.6	B	1.6	B	1.4	B	0.89	B	40	ND
Potassium	NA	1000	NA	5000	2800	E	3410		27100		3980	B	1790	B	758	B	420	B	350	B	289	B
Selenium	63000	1	50	5	1.7		1.3		3.9	B	5	ND	5	ND	5	ND	5	ND	5	ND	2.8	B
Silver	110000	2	NA	10	4.93		3.83		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Sodium	NA	1000	50,000	5,000	9980	E	9270		204000		15800		6920		6340		5600		4880	B	5840	
Thallium	2000	2	10	10	1.1	ND	0.61	B	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Vanadium	370000	10	NA	50	37.3	E	33.2	E	34.8	B	40.4	B	36.6	B J	32.5	B	25.9	B	22.2	B	16.7	B
Zinc	1500000	4	5000	20	253		235		20	ND	1.7	B	1.6	B	1.6	B	1.7	B	2.9	B	3.3	B J
Cyanide, total	1100000	0.5	200	10	0.53	B	0.45	B														
%Solids					[illegible]		49.6															

Table 7 Dioxins	Action Level		Action Level		Unamended Sediment (Units: ppt)		Amended Sediment (Units: ppt)		MEP Extracts Units:ppt													
ASI ID #	Soil		Leachate		20030389		20030396		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg		ug/L		Comp C	Q	A Comp C	Q	1 Comp C	Q		Q		Q		Q		Q		Q	7 Comp C	Q
2,3,7,8-TCDD					4.50		4.80		2.4	ND											2.1	ND
1,2,3,7,8-PeCDD					0.97	J	1.15	J	1.1	ND											1.1	ND
1,2,3,4,7,8-HxCDD					0.97	J	1.27	J	1.4	ND											1.1	ND
1,2,3,6,7,8-HxCDD					5.45	J	6.77		1.4	ND											1.2	ND
1,2,3,7,8,9-HxCDD					4.12		4.46		1.3	ND											1.1	ND
1,2,3,4,6,7,8-HpCDD					89.27		110.88		0.99	ND											1.2	ND
OCDD					736.10		929.92		2.4	Q B J											8.4	B J
2,3,7,8-TCDF					7.24	#	9.70	#	2.3	ND											2	ND
1,2,3,7,8-PeCDF					3.25		2.39	J	0.98	ND											0.98	ND
2,3,4,7,8-PeCDF					3.16		3.33		0.68	ND											0.75	ND
1,2,3,4,7,8-HxCDF					6.04		5.41		0.6	ND											0.6	ND
1,2,3,6,7,8-HxCDF					2.14		2.09		0.6	ND											0.65	ND
2,3,4,6,7,8-HxCDF					1.71	J	2.05	J	0.64	ND											0.72	ND
1,2,3,7,8,9-HxCDF					0.19	J	0.28	J	0.74	ND											0.8	ND
1,2,3,4,6,7,8-HpCDF					27.99		29.48		1.1	ND											1	ND
1,2,3,4,7,8,9-HpCDF					1.23	J	1.84		1.2	ND											1.1	ND
OCDF					49.15		48.03		1.6	ND											1.7	ND

NA

* = NJDEP Required detection limit
\# = value from 2nd column confirmation
ND = Not detected
B = Indicates analyte detected in method blank as well as associated field sample
J = Detection limit below the reporting limit or is an estimated value
E = Estimated value

Table 8 Volatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030390		20030397		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp D	Q	A Comp D	Q	1 Comp D	Q	2 Comp D	Q	3 Comp D	Q	4 Comp D	Q	5 Comp D	Q	6 Comp D	Q	7 Comp D	Q
Chloromethane (Methyl Chloride)	520000	10	30	10	11	ND	8.7	ND														
Bromomethane	79000	10	10	10	11	ND	8.7	ND														
Vinyl chloride	2000	10	5	10	11	ND	8.7	ND														
Chloroethane	NA	10	NA	10	11	ND	8.7	ND														
Methylene chloride (Dichloromethane)	49000	10	3	10	11	ND	22															
Acetone	1,000,000	10	700	10	21		170															
Carbon disulfide	NA	10	NA	10	3.7	J	49															
1,1-Dichloroethene	8000	10	2	10	11	ND	8.7	ND														
1,1-Dichloroethane	570000	10	50	10	11	ND	8.7	ND														
1,2-Dichloroethene (total)	NA	10	10	10	11	ND	8.7	ND														
Chloroform	19000	10	6	10	11	ND	8.7	ND														
1,2-Dichloroethane	NA	10	NA	10	11	ND	8.7	ND														
2-Butanone (MEK)	1000000	10	300	10	7.1	J	44															
1,1,1-Trichloroethane	210000	10	30	10	11	ND	8.7	ND														
Carbon tetrachloride	2000	10	2	10	11	ND	8.7	ND														
Bromodichloromethane	11000	10	1	10	11	ND	8.7	ND														
1,2-Dichloropropane	10000	10	1	10	11	ND	8.7	ND														
cis-1,3-Dichloropropene	NA	10	NA	10	11	ND	8.7	ND														
Trichloroethene	23000	10	1	10	11	ND	8.7	ND														
Dibromochloromethane	110000	10	10	10	11	ND	8.7	ND														
1,1,2-Trichloroethane	22000	10	3	10	11	ND	8.7	ND														
Benzene	3000	10	1	10	11	ND	0.97	J														
trans-1,3-dichloropropene	NA	10	NA	10	11	ND	8.7	ND														
Bromoform	86000	10	4	10	11	ND	8.7	ND														
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10	11	ND	8.7	ND														
2-Hexanone	NA	10	NA	10	11	ND	8.7	ND														
Tetrachloroethene	4000	10	1	10	11	ND	8.7	ND														
1,1,2,2-Tetrachloroethane	NA	10	NA	10	11	ND	8.7	ND														
Toluene	1000000	10	1000	10	11	ND	8.7	ND														
Chlorobenzene	37000	10	50	10	11	ND	8.7	ND														
Ethyl benzene	1000000	10	700	10	11	ND	8.7	ND														
Styrene	23000	10	100	10	11	ND	8.7	ND														
Xylenes(Total)	410000	10	1000	10	11	ND	8.7	ND														

Table 8 Semivolatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030390		20030397		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp D	Q	A Comp D	Q	1 Comp D	Q	2 Comp D	Q	3 Comp D	Q	4 Comp D	Q	5 Comp D	Q	6 Comp D	Q	7 Comp D	Q
Phenol	10,000,000	660	4,000	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
bis(2-Chloroethyl)ether	660	660	10	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2-Chlorophenol	2000	660	5	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
1,3-Dichlorobenzene	5100000	660	600	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
1,4-Dichlorobenzene	570000	660	75	10	78.33		64.75	B	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
1,2-Dichlorobenzene	5100000	660	600	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2-Methylphenol	2800000	660	NA	10	1700	ND	580	ND	0.0011	J	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
1-Chloropropane-2,2'-oxybis	2300000	660	300	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
4-Methylphenol	2800000	660	NA	10	1700	ND	580	ND	0.0011	J	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
N-Nitroso-Di-N-Propylamine	660	660	20	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Hexachloroethane	6000	660	10	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Nitrobenzene	28000	660	10	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Isophorone	1100000	660	100	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2-Nitrophenol	NA	660	NA	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2,4-Dimethylphenol	1100000	660	100	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
bis(2-Chloroethoxy)methane	NA	660	NA	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2,4-Dichlorophenol	170000	660	20	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
1,2,4-Trichlorobenzene	68000	660	9	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Naphthalene	230000	660	300	10	174.44	B	176.54	B	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0008	J B	0.0094	ND	0.0096	ND
4-Chloroaniline	230000	1300	NA	20	260	J	260	J	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Hexachloro-1,3-butadiene	NA	660	NA	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
4-Chloro-3-methylphenol	10,000,000	1300	NA	20	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2-Methylnaphthalene	NA	660	NA	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Hexachlorocyclopentadiene	400000	660	50	10	3500	ND	1200	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.049	ND	0.047	ND	0.048	ND
2,4,6-Trichlorophenol	62000	660	20	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2,4,5-Trichlorophenol	5800000	660	700	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2-Chloronaphthalene	NA	660	NA	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2-Nitroaniline	NA	3,300	NA	50	8500	ND	2800	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.049	ND	0.047	ND	0.048	ND
Dimethylphthalate	10,000,000	660	NA	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Acenaphthylene	NA	660	NA	10	97.72		99.13		0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2,6-Dinitrotoluene	1000	660	10	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
3-Nitroaniline	NA	3300	NA	50	8500	ND	2800	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.049	ND	0.047	ND	0.048	ND

Table 6 Semivolatiles continued	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030390		20030397		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp D	Q	A Comp D	Q	1 Comp D	Q	2 Comp D	Q	3 Comp D	Q	4 Comp D	Q	5 Comp D	Q	6 Comp D	Q	7 Comp D	Q
Acenaphthene	3400000	660	400	10	51	B	72.33		0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2,4-Dinitrophenol	110000	3300	40	50	8500	ND	2800	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.049	ND	0.047	ND	0.048	ND
4-Nitrophenol	NA	3300	NA	50	8500	ND	2800	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.049	ND	0.047	ND	0.048	ND
Dibenzofuran	NA	660	NA	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2,4-Dinitrotoluene	1000	660	10	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Diethylphthalate	10,000,000	660	5,000	10	1700	ND	580	ND	0.0011	J	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
4-Chlorophenyl-phenylether	NA	660	NA	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Fluorene	2300000	660	300	10	90.47		97.2		0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
4-Nitroaniline	NA	830	NA	20	4400	ND	1500	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.02	ND	0.019	ND	0.019	ND
4,6-Dinitro-2-methylphenol	NA	3300	NA	50	8500	ND	2800	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.049	ND	0.047	ND	0.048	ND
N-Nitrosodiphenylamine	140000	660	20	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
4-Bromophenyl-phenylether	NA	660	NA	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Hexachlorobenzene	660	660	10	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Pentachlorophenol	6000	3300	1	50	8500	ND	2800	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.049	ND	0.047	ND	0.048	ND
Phenanthrene	NA	6600	NA	10	419.35		477.27	B	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Anthracene	10000000	6600	2000	10	262.83		397.96		0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Carbazole	NA	330	NA	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Di-n-butylphthalate	5700000	330	900	10	1700	ND	580	ND	0.0021	J	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Fluoranthene	2300000	660	300	10	1145.32		1087.94		0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Pyrene	1700000	660	200	10	1278.83		1018.83		0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Butylbenzylphthalate	1100000	660	100	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
3,3'-Dichlorobenzidine	2000	1300	60	20	6900	ND	2300	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.02	ND	0.019	ND	0.019	ND
Benzo(a)anthracene	900	660	NA	10	623.76		771.5		0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Chrysene	9000	660	NA	10	613.94		700.23		0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
bis(2-Ethylhexyl)phthalate	49000	660	30	10	3400		1700		0.0097	ND	0.0014	J	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Di-n-octylphthalate	1100000	660	100	10	1700	ND	580	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Benzo(b)fluoranthene	900	660	NA	10	619.59		877.05		0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Benzo(k)fluoranthene	900	660	NA	10	490.71		503.47		0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Benzo(a)pyrene	660	660	NA	10	[redacted]		585.55		0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Indeno(1,2,3-cd)pyrene	900	660	NA	10	441.41		673.42		0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Dibenzo(a,h)anthracene	660	660	NA	10	123.2		177.55		0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Benzo(ghi)perylene	NA	660	NA	10	389.3		500.13		0.0097	ND	0.0097	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND

Table 8 Pesticides/Arochlors	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030390		20030397		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp D	Q	A Comp D	Q	1 Comp D	Q	2 Comp D	Q	3 Comp D	Q	4 Comp D	Q	5 Comp D	Q	6 Comp D	Q	7 Comp D	Q
alpha-BHC	NA	1.9	0.02	0.05	3.6	ND	3	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
beta-BHC	NA	3.3	0.2	0.05	3.6	ND	3	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
delta-BHC	NA	1.7	NA	0.05	3.6	ND	3	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
gamma-BHC (Lindane)	520	2	0.2	0.05	3.6	ND	3	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
Heptachlor	150	2.1	0.4	0.05	0.13	ND	0.11	ND	0.0089	J	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
Aldrin	40	2	0.04	0.05	0.10	ND	0.08	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	0.12	ND	0.10	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
Endosulfan I		2.1	0.4	0.05	0.16	ND	0.13	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
Dieldrin	42	3.3	0.03	0.10	0.97		0.86		0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
4,4'-DDE	2000	4.2	0.1	0.10	8.13	D	7.17		0.05	ND	0.052	ND	0.051	ND	0.013	J	0.05	ND	0.051	ND	0.054	ND
Endrin	17000	3.6	2	0.10	3.6	ND	1.6	J	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
Endosulfan II		3.3	0.4	0.10	0.15	ND	0.13	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
4,4'-DDD	381000	4.2	0.1	0.10	6.90		5.09		0.05	ND	0.017	J PG	0.051	ND	0.018	J	0.011	J PG	0.051	ND	0.054	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.16	ND	0.14	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
4,4'-DDT	2000	3.6	0.1	0.10	0.14	ND	8.60		0.032	J	0.015	J PG	0.012	J	0.017	J	0.05	ND	0.012	J	0.12	
Methoxychlor	280000	17	40	0.50	7	ND	5.8	ND	0.1	ND	0.1	ND	0.1	ND	0.099	ND	0.1	ND	0.1	ND	0.11	ND
Endrin ketone	NA	3.3	NA	0.10	3.6	ND	3	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
Endrin aldehyde	NA	3.3	NA	0.10	3.6	ND	3	ND	0.011	J PG	0.052	ND	0.0051	J PG	0.05	ND	0.05	ND	0.051	ND	0.054	ND
alpha-Chlordane	500	1.7	NA	0.05	1.66		1.59		0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
gamma-Chlordane	NA	1.7	0.5	0.05	1.1	J PG	0.43	J PG	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.051	ND	0.054	ND
Toxaphene	100	170	3	5.00	140	ND	120	ND	2	ND	2.1	ND	2	ND	2	ND	2	ND	2	ND	2.2	ND
Arochlor-1016		33		1.00	35	ND	29	ND	1	ND	1	ND	1	ND	0.99		1	ND	1	ND	1.1	ND
Arochlor-1221 *		67		2.00	35	ND	29	ND	1	ND	1	ND	1	ND	0.99		1	ND	1	ND	1.1	ND
Arochlor-1232 *		33		1.00	35	ND	29	ND	1	ND	1	ND	1	ND	0.99		1	ND	1	ND	1.1	ND
Arochlor-1242 *		33		1.00	35	ND	29	ND	1	ND	1	ND	1	ND	0.99		1	ND	1	ND	1.1	ND
Arochlor-1248 *		33		1.00	320		79		1	ND	1	ND	1	ND	0.99		1	ND	1	ND	1.1	ND
Arochlor-1254 *		33		1.00	160		49		1	ND	1	ND	1	ND	0.99		1	ND	1	ND	1.1	ND
Arochlor-1260 *		33		1.00	130		67		1	ND	1	ND	1	ND	0.99		1	ND	1	ND	1.1	ND
Total Arochlor(SUM)	490		0.5																			
Combined endosulfans(SUM) Endosulfan I + II + sulfate	340000		NA		0.232988799	ND	0.199587229	ND														

* Reported as units = ppm

Table 8 Metals	Action Level		Action Level		Unamended Sediment (Units: ppm)		Amended Sediment (Units: ppm)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030390		20030397		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp D	Q	A Comp D	Q	1 Comp D	Q	2 Comp D	Q	3 Comp D	Q	4 Comp D	Q	5 Comp D	Q	6 Comp D	Q	7 Comp D	Q
Aluminum	NA	40	200	200	11500	E	11200	E	963		2110		1770		1390		1110		826		636	
Antimony	14000	12	20	60	0.57	BN	0.33	BN	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Arsenic	20000	2	8	10	15.0		14.3		10	ND	10	ND	2.4	B	4.6	B	2.9	B	3.4	B	10	ND
Barium	700000	40	2,000	200	68.6	E	69.1		42.9	B J	15.2	B	8	B	7.9	B	9	B	9.3	B	9.8	B J
Beryllium	1000	1	20	5	0.75		0.72		4	ND	4	ND	4	ND	0.67	B J	1.1	B J	1.5	B J	4	ND
Cadmium	1000	1	4	5	2.93		2.71		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Calcium	NA	1000	NA	5000	6610	E	65200	E	227000	J	135000		86600	J	71600		57700		42400		35700	J
Chromium	NA	2	100	10	154.0	B	111.0		9.8		17.6		19.3		19.8		15.7		10.4		9.7	
Cobalt	NA	10	NA	50	8.8	E	6.7	E	3.6	B	0.72	B	50	ND	50	ND	50	ND	50	ND	50	ND
Copper	600000	5	1000	25	132.0		113.0		169	J	52.9		28.5		24.6	B	20	B	14.1	B	15.8	B J
Iron	NA	20	300	1000	25500	E	21400	E	17.3	B	100	ND	100	ND	100	ND	100	ND	100	ND	100	ND
Lead	400000	0.6	10	3	130		108		3	ND	3	ND	3	ND	3	ND	3	ND	3	ND	3	ND
Magnesium	NA	1000	NA	5000	6710	E	7740	E	16.2	B J	5000	ND	28	B J	35.2	B	51.3	B	71.6	B	111	B J
Manganese	NA	3	50	15	430	E	387	E	15	ND	15	ND	15	ND	15	ND	15	ND	15	ND	15	ND
Mercury	14000	0.1	2	0.2	1.93		1.61		0.2	ND	0.2	ND	0.046	B	0.2	ND	0.2	ND	0.2	ND	0.2	ND
Nickel	250000	8	100	40	41.6		40.3		35.2	B	7.3	B	2.6	B	2.8	B	2.3	B	1.2	B	1.2	B
Potassium	NA	1000	NA	5000	2540	E	3180		37300		4540	B	1380	B	777	B	404	B	357	B	287	B
Selenium	63000	1	50	5	1.5		0.98		3.3	B	3.8	B	5	ND	5	ND	3.8	B	5	ND	5	ND
Silver	110000	2	NA	10	5.07		4.23		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Sodium	NA	1000	50,000	5,000	9670	E	7350		191000		13700		6590		4400	B	4370	B	4190	B	5530	
Thallium	2000	2	10	10	1.1	ND	0.45	B	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Vanadium	370000	10	NA	50	35.7	E	29.3	E	6.8	B	11.7	B	18.5	B J	18.4	B	22.2	B	22.1	B	20.5	B
Zinc	1500000	4	5000	20	283		277		20	ND	1.4	B	1.6	B	20	ND	20	ND	1.7	B	20	ND
Cyanide, total	1100000	0.5	200	10	0.53	B	0.37	B														
%Solids																						

Table 8 Dioxins	Action Level		Action Level		Unamended Sediment (Units: ppt)		Amended Sediment (Units: ppt)		MEP Extracts Units:ppt													
ASI ID #	Soil		Leachate		20030390		20030397		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg		ug/L		Comp D	Q	A Comp D	Q	1 Comp D	Q		Q		Q		Q		Q		Q	7 Comp D	Q
2,3,7,8-TCDD					6.25		7.93		3	ND											1.7	ND
1,2,3,7,8-PeCDD					1.30	J	1.33	J	1.4	ND											0.89	ND
1,2,3,4,7,8-HxCDD					0.91	J	1.52	J	1.6	ND											0.98	ND
1,2,3,6,7,8-HxCDD					6.10	J	10.26		1.6	ND											1	ND
1,2,3,7,8,9-HxCDD					3.87		5.83		1.6	ND											0.95	ND
1,2,3,4,6,7,8-HpCDD					109.27		168.42		1	ND											0.8	ND
OCDD					879.99		1483.27		1.1	ND											2.9	B J
2,3,7,8-TCDF					6.56	#	11.41	#	3.2	ND											1.6	ND
1,2,3,7,8-PeCDF					1.95	J	2.82		1.2	ND											0.76	ND
2,3,4,7,8-PeCDF					2.86	J	4.26		0.84	ND											0.57	ND
1,2,3,4,7,8-HxCDF					5.71		7.21		0.75	ND											0.5	ND
1,2,3,6,7,8-HxCDF					2.17		3.00		0.78	ND											0.51	ND
2,3,4,6,7,8-HxCDF					1.72	J	2.61		0.82	ND											0.55	ND
1,2,3,7,8,9-HxCDF					0.14	J	0.22	J	0.96	ND											0.63	ND
1,2,3,4,6,7,8-HpCDF					29.96		40.12		1.4	ND											0.78	ND
1,2,3,4,7,8,9-HpCDF					1.67		1.92		1.5	ND											0.86	ND
OCDF					66.96		86.37		1.6	ND											0.94	ND

NA

* = NJDEP Required detection limit
\# = value from 2nd column confirmation
ND = Not detected
B = indicates analyte detected in method blank as well as associated field sample
J = Detection limit below the reporting limit or is an estimated value
E = Estimated value

Table 9 Volatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030364		20030370		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp E	Q	A Comp E	Q	1 Comp E	Q	2 Comp E	Q	3 Comp E	Q	4 Comp E	Q	5 Comp E	Q	6 Comp E	Q	7 Comp E	Q
Chloromethane (Methyl Chloride)	520000	10	30	10	9.7	ND	8.9	ND														
Bromomethane	79000	10	10	10	9.7	ND	8.9	ND														
Vinyl chloride	2000	10	5	10	9.7	ND	8.9	ND														
Chloroethane	NA	10	NA	10	9.7	ND	8.9	ND														
Methylene chloride (Dichloromethane)	49000	10	3	10	17		25															
Acetone	1,000,000	10	700	10	27		110															
Carbon disulfide	NA	10	NA	10	9.7	ND	18															
1,1-Dichloroethene	8000	10	2	10	9.7	ND	8.9	ND														
1,1-Dichloroethane	570000	10	50	10	9.7	ND	8.9	ND														
1,2-Dichloroethene (total)	NA	10	10	10	9.7	ND	8.9	ND														
Chloroform	19000	10	6	10	9.7	ND	8.9	ND														
1,2-Dichloroethane	NA	10	NA	10	9.7	ND	8.9	ND														
2-Butanone (MEK)	1000000	10	300	10	13		41															
1,1,1-Trichloroethane	210000	10	30	10	9.7	ND	8.9	ND														
Carbon tetrachloride	2000	10	2	10	9.7	ND	8.9	ND														
Bromodichloromethane	11000	10	1	10	9.7	ND	8.9	ND														
1,2-Dichloropropane	10000	10	1	10	9.7	ND	8.9	ND														
cis-1,3-Dichloropropene	NA	10	NA	10	9.7	ND	8.9	ND														
Trichloroethene	23000	10	1	10	9.7	ND	8.9	ND														
Dibromochloromethane	110000	10	10	10	9.7	ND	8.9	ND														
1,1,2-Trichloroethane	22000	10	3	10	9.7	ND	8.9	ND														
Benzene	3000	10	1	10	9.7	ND	1	J														
trans-1,3-dichloropropene	NA	10	NA	10	9.7	ND	8.9	ND														
Bromoform	86000	10	4	10	9.7	ND	8.9	ND														
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10	9.7	ND	8.9	ND														
2-Hexanone	NA	10	NA	10	9.7	ND	8.9	ND														
Tetrachloroethene	4000	10	1	10	9.7	ND	8.9	ND														
1,1,2,2-Tetrachloroethane	NA	10	NA	10	9.7	ND	8.9	ND														
Toluene	1000000	10	1000	10	9.7	ND	8.9	ND														
Chlorobenzene	37000	10	50	10	9.7	ND	8.9	ND														
Ethyl benzene	1000000	10	700	10	9.7	ND	8.9	ND														
Styrene	23000	10	100	10	9.7	ND	8.9	ND														
Xylenes(Total)	410000	10	1000	10	9.7	ND	2	J														

Table 9 Semivolatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030364		20030370		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp E	Q	A Comp E	Q	1 Comp E	Q	2 Comp E	Q	3 Comp E	Q	4 Comp E	Q	5 Comp E	Q	6 Comp E	Q	7 Comp E	Q
Phenol	10,000,000	660	4,000	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
bis(2-Chloroethyl)ether	660	660	10	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2-Chlorophenol	2000	660	5	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
1,3-Dichlorobenzene	5100000	660	600	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
1,4-Dichlorobenzene	570000	660	75	10	87.4		68.27	B	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
1,2-Dichlorobenzene	5100000	660	600	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2-Methylphenol	2800000	660	NA	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
1-Chloropropane-2,2'-oxybis	2300000	660	300	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
4-Methylphenol	2800000	660	NA	10	640	ND	1500	ND	0.0026	J	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
N-Nitroso-Di-N-Propylamine	660	660	20	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Hexachloroethane	6000	660	10	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Nitrobenzene	28000	660	10	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Isophorone	1100000	660	100	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2-Nitrophenol	NA	660	NA	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2,4-Dimethylphenol	1100000	660	100	10	640	ND	1500	ND	0.0015	J	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
bis(2-Chloroethoxy)methane	NA	660	NA	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2,4-Dichlorophenol	170000	660	20	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
1,2,4-Trichlorobenzene	68000	660	9	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Naphthalene	230000	660	300	10	230.11	B	211.35	B	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
4-Chloroaniline	230000	1300	NA	20	220	J	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Hexachloro-1,3-butadiene	NA	660	NA	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
4-Chloro-3-methylphenol	10,000,000	1300	NA	20	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2-Methylnaphthalene	NA	660	NA	10	89	J	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Hexachlorocyclopentadiene	400000	660	50	10	1300	ND	2900	ND	0.049	ND	0.049	ND	0.048	ND	0.048	ND	0.049	ND	0.047	ND	0.048	ND
2,4,6-Trichlorophenol	62000	660	20	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2,4,5-Trichlorophenol	5600000	660	700	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2-Chloronaphthalene	NA	660	NA	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2-Nitroaniline	NA	3,300	NA	50	3100	ND	7100	ND	0.049	ND	0.049	ND	0.048	ND	0.048	ND	0.049	ND	0.047	ND	0.048	ND
Dimethylphthalate	10,000,000	660	NA	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Acenaphthylene	NA	660	NA	10	98.77		83.92		0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2,6-Dinitrotoluene	1000	660	10	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
3-Nitroaniline	NA	3300	NA	50	3100	ND	7100	ND	0.049	ND	0.049	ND	0.048	ND	0.048	ND	0.049	ND	0.047	ND	0.048	ND

Table 9 Semivolatiles continued	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030364		20030370		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp E	Q	A Comp E	Q	1 Comp E	Q	2 Comp E	Q	3 Comp E	Q	4 Comp E	Q	5 Comp E	Q	6 Comp E	Q	7 Comp E	Q
Acenaphthene	3400000	660	400	10	112.08	B	95.44		0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2,4-Dinitrophenol	110000	3300	40	50	3100	ND	7100	ND	0.049	ND	0.049	ND	0.048	ND	0.048	ND	0.049	ND	0.047	ND	0.048	ND
4-Nitrophenol	NA	3300	NA	50	3100	ND	7100	ND	0.049	ND	0.049	ND	0.048	ND	0.048	ND	0.049	ND	0.047	ND	0.048	ND
Dibenzofuran	NA	660	NA	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
2,4-Dinitrotoluene	1000	660	10	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Diethylphthalate	10,000,000	660	5,000	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
4-Chlorophenyl-phenylether	NA	660	NA	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Fluorene	2300000	660	300	10	156.09		145.09		0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
4-Nitroaniline	NA	830	NA	20	1600	ND	3700	ND	0.02	ND	0.02	ND	0.019	ND	0.019	ND	0.02	ND	0.019	ND	0.019	ND
4,6-Dinitro-2-methylphenol	NA	3300	NA	50	3100	ND	7100	ND	0.049	ND	0.049	ND	0.048	ND	0.048	ND	0.049	ND	0.047	ND	0.048	ND
N-Nitrosodiphenylamine	140000	660	20	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
4-Bromophenyl-phenylether	NA	660	NA	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Hexachlorobenzene	660	660	10	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Pentachlorophenol	6000	3300	1	50	3100	ND	7100	ND	0.049	ND	0.049	ND	0.048	ND	0.048	ND	0.049	ND	0.047	ND	0.048	ND
Phenanthrene	NA	6600	NA	10	576.56		447.74	B	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Anthracene	10000000	6600	2000	10	337.63		267.56		0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Carbazole	NA	330	NA	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Di-n-butylphthalate	5700000	330	900	10	640	ND	1500	ND	0.0011	J	0.00055	J B	0.00075	J	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Fluoranthene	2300000	660	300	10	1759.61		856.08		0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Pyrene	1700000	660	200	10	1804.77		993.75		0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Butylbenzylphthalate	1100000	660	100	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
3,3'-Dichlorobenzidine	2000	1300	60	20	2500	ND	5800	ND	0.02	ND	0.02	ND	0.019	ND	0.019	ND	0.02	ND	0.019	ND	0.019	ND
Benzo(a)anthracene	900	660	NA	10	[redacted]		629.01		0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Chrysene	9000	660	NA	10	1240.7		692.28		0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
bis(2-Ethylhexyl)phthalate	49000	660	30	10	3900	ND	1400	J	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Di-n-octylphthalate	1100000	660	100	10	640	ND	1500	ND	0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Benzo(b)fluoranthene	900	660	NA	10	[redacted]		415.04		0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Benzo(k)fluoranthene	900	660	NA	10	[redacted]		324.06		0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Benzo(a)pyrene	660	660	NA	10	[redacted]		516.94		0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Indeno(1,2,3-cd)pyrene	900	660	NA	10	485.17		358.87		0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Dibenzo(a,h)anthracene	660	660	NA	10	142.08		105.26		0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND
Benzo(ghi)perylene	NA	660	NA	10	358.24		293.39		0.0098	ND	0.0098	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0094	ND	0.0096	ND

Table 9 Pesticides/Arochlors	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030364		20030370		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp E	Q	A Comp E	Q	1 Comp E	Q	2 Comp E	Q	3 Comp E	Q	4 Comp E	Q	5 Comp E	Q	6 Comp E	Q	7 Comp E	Q
alpha-BHC	NA	1.9	0.02	0.05	3.3	ND	6.1	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
beta-BHC	NA	3.3	0.2	0.05	3.3	ND	6.1	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
delta-BHC	NA	1.7	NA	0.05	3.3	ND	6.1	ND	0.05	ND	0.0046	J PG	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
gamma-BHC (Lindane)	520	2	0.2	0.05	3.3	ND	6.1	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Heptachlor	150	2.1	0.4	0.05	0.12	ND	0.11	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Aldrin	40	2	0.04	0.05	0.09	ND	0.08	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	0.11	ND	0.10	ND	0.012	J PG	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Endosulfan I		2.1	0.4	0.05	0.15	ND	0.13	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Dieldrin	42	3.3	0.03	0.10	1.74		1.65		0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
4,4'-DDE	2000	4.2	0.1	0.10	32.63		28.89	D	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.016	J	0.05	ND	0.05	ND
Endrin	17000	3.6	2	0.10	2.9	J PG	2	J PG	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Endosulfan II		3.3	0.4	0.10	0.15	ND	0.13	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
4,4'-DDD	381000	4.2	0.1	0.10	16.48		17.65		0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.15	ND	0.14	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
4,4'-DDT	2000	3.6	0.1	0.10	0.66		4.39		0.024	J PG	0.052	ND	0.051	ND	0.05	ND	0.0047	J PG	0.05	ND	0.05	ND
Methoxychlor	280000	17	40	0.50	6.4	ND	12	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.099	ND	0.1	ND
Endrin ketone	NA	3.3	NA	0.10	3.3	ND	6.1	ND	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Endrin aldehyde	NA	3.3	NA	0.10	3.3	ND	6.1	ND	0.007	J PG	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
alpha-Chlordane	500	1.7	NA	0.05	1.78		0.87		0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
gamma-Chlordane	NA	1.7	0.5	0.05	1.1	J PG	1.2	J PG	0.05	ND	0.052	ND	0.051	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Toxaphene	100	170	3	5.00	130	ND	240	ND	2	ND	2.1	ND	2	ND	2	ND	2	ND	2	ND	2	ND
Arochlor-1016 *		33		1.00	32	ND	29	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND
Arochlor-1221 *		67		2.00	32	ND	29	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND
Arochlor-1232 *		33		1.00	32	ND	29	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND
Arochlor-1242 *		33		1.00	32	ND	29	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND
Arochlor-1248 *		33		1.00	270		290		1	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND
Arochlor-1254 *		33		1.00	180		200		1	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND
Arochlor-1260 *		33		1.00	200		220		1	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND
Total Arochlor(SUM)	490		0.5																			
Combined endosulfans(SUM) Endosulfan i + II + sulfate	340000		NA		0.223660033	ND	0.200471532	ND														

* Reported as units = ppm

Table 9 Metals	Action Level		Action Level		Unamended Sediment (Units: ppm)		Amended Sediment (Units: ppm)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030364		20030370		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp E	Q	A Comp E	Q	1 Comp E	Q	2 Comp E	Q	3 Comp E	Q	4 Comp E	Q	5 Comp E	Q	6 Comp E	Q	7 Comp E	Q
Aluminum	NA	40	200	200	12200	E	11200	E	1050	E	1810		1840		1490		1230		1040		871	
Antimony	14000	12	20	60	0.35	BN	0.49	BN	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Arsenic	20000	2	8	10	18.5		21.5		2.6	B	10	ND	3.5	B	4.7	B	3.4	B	3.8	B	6.2	B
Barium	700000	40	2,000	200	76	E	82.5		31.6	B J	16.8	B	9	B	10	B	7.4	B	8.2	B	12.9	B J
Beryllium	1000	1	20	5	0.85		0.75		4	ND	4	ND	4	ND	0.38	B J	0.78	B J	1.4	B J	4	ND
Cadmium	1000	1	4	5	3.49		3.34		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Calcium	NA	1000	NA	5000	4400	E	38900	E	179000	J	117000		89500	J	69600		53700		38500		31300	J
Chromium	NA	2	100	10	170	B	163		16.5		25.5		27.5		26.5		22.3		16.4		18.1	
Cobalt	NA	10	NA	50	9.7	E	7.3	E	1	B	50	ND	50	ND	50	ND	50	ND	0.66	B	0.59	B
Copper	600000	5	1000	25	164.0		157.0		143	J	59.4	E	40.8		33.9		28.4		20	B	23.1	B J
Iron	NA	20	300	1000	27900	E	23300	E	17.4	B	100	ND	100	ND	100	ND	18.5	B	100	ND	100	ND
Lead	400000	0.6	10	3	139.0		138		3	ND	3	ND	3	ND	3	ND	3	ND	3	ND	3	ND
Magnesium	NA	1000	NA	5000	6660	E	7000	E	32.4	B J	5000	ND	35.4	B J	48.7	B	51.2	B	65.6	B	152	B J
Manganese	NA	3	50	15	380	E	322	E	15	ND	15	ND	15	ND	15	ND	2	B	15	ND	15	ND
Mercury	14000	0.1	2	0.2	2.55		2.37		0.2	ND	0.2	ND	0.2	ND	0.2	ND	0.2	ND	0.2	ND	0.2	ND
Nickel	250000	8	100	40	42.6		42.3		48	E	7.7	B	3.3	B	2.5	B	2.8	B	1.1	B	1.2	B
Potassium	NA	1000	NA	5000	2540	E	2730		34500		5010	E	1920	B	1040	B	649	B	403	B	453	B
Selenium	63000	1	50	5	1.6		1.3		5.7		3.9	B	5	ND	3.6	B	2.8	B	4	B	5	ND
Silver	110000	2	NA	10	4.61		4.96		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Sodium	NA	1000	50,000	5,000	7970	E	6720		211000		17000		6150		4340	B	4880	B	4620	B	10200	
Thallium	2000	2	10	10	0.97	B	0.82	B	10	ND	6.2	B	13.2		10	ND	5	B	4.2	B	7.7	B
Vanadium	370000	10	NA	50	37.4	E	32.5	E	17.4	B	17.1	B	20.6	B J	26.2	B	26.3	B	27.6	B	31.3	B
Zinc	1500000	4	5000	20	306.0		312		20	ND	4.6	B	20	ND	20	ND	1.3	B	3.4	B	1.4	B J
Cyanide, total	1100000	0.5	200	10	0.37	B	0.4	B														
%Solids					51.4		56.2															

Table 9 Dioxins	Action Level		Action Level		Unamended Sediment (Units: ppt)		Amended Sediment (Units: ppt)		MEP Extracts Units:ppt													
ASI ID #	Soil		Leachate		20030364		20030370		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg		ug/L		Comp E	Q	A Comp E	Q	1 Comp E	Q		Q		Q		Q		Q		Q	7 Comp E	Q
2,3,7,8-TCDD					7.08		21.73		3.2	ND											2.2	ND
1,2,3,7,8-PeCDD					1.21	J	2.23	J	1.7	ND											1	ND
1,2,3,4,7,8-HxCDD					1.00	J	1.79	J	1.6	ND											1.3	ND
1,2,3,6,7,8-HxCDD					5.91	J	13.65		1.8	ND											1.4	ND
1,2,3,7,8,9-HxCDD					3.53		8.23		1.7	ND											1.3	ND
1,2,3,4,6,7,8-HpCDD					95.51		246.76		1.3	ND											1.1	ND
OCDD					826.82		2243.38		1.8	B J											4.2	Q B J
2,3,7,8-TCDF					6.05	#	10.45	#	3.6	ND											2.2	ND
1,2,3,7,8-PeCDF					1.50	J	3.59		1.7	ND											0.98	ND
2,3,4,7,8-PeCDF					2.52	J	5.25		1.2	ND											0.75	ND
1,2,3,4,7,8-HxCDF					6.96		17.11		0.96	ND											1.2	Q B J
1,2,3,6,7,8-HxCDF					2.74		6.24		0.95	ND											0.73	ND
2,3,4,6,7,8-HxCDF					2.07	J	4.08		1.1	ND											0.82	ND
1,2,3,7,8,9-HxCDF					0.18	J	0.29	J	1.3	ND											0.93	ND
1,2,3,4,6,7,8-HpCDF					39.87		130.57		1.2	ND											1.1	ND
1,2,3,4,7,8,9-HpCDF					2.23		4.25		1.5	ND											1.3	ND
OCDF					62.52		169.76		2.1	ND											4.9	Q B J

NA

* = NJDEP Required detection limit
\# = value from 2nd column confirmation
ND = Not detected
B = Indicates analyte detected in method blank as well as associated field sample
J = Detection limit below the reporting limit or is an estimated value
E = Estimated value

Table 10 Volatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030365		20030371		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp F	Q	A Comp F	Q	1 Comp F	Q	2 Comp F	Q	3 Comp F	Q	4 Comp F	Q	5 Comp F	Q	6 Comp F	Q	7 Comp F	Q
Chloromethane (Methyl Chloride)	520000	10	30	10	9.9	ND	9.4	ND														
Bromomethane	79000	10	10	10	9.9	ND	9.4	ND														
Vinyl chloride	2000	10	5	10	9.9	ND	9.4	ND														
Chloroethane	NA	10	NA	10	9.9	ND	9.4	ND														
Methylene chloride (Dichloromethane)	49000	10	3	10	57		3.9	J B														
Acetone	1,000,000	10	700	10	49		87															
Carbon disulfide	NA	10	NA	10	7.9	J B	8	J														
1,1-Dichloroethene	8000	10	2	10	9.9	ND	9.4	ND														
1,1-Dichloroethane	570000	10	50	10	9.9	ND	9.4	ND														
1,2-Dichloroethene (total)	NA	10	10	10	9.9	ND	9.4	ND														
Chloroform	19000	10	6	10	9.9	ND	9.4	ND														
1,2-Dichloroethane	NA	10	NA	10	9.9	ND	9.4	ND														
2-Butanone (MEK)	1000000	10	300	10	17		21															
1,1,1-Trichloroethane	210000	10	30	10	9.9	ND	9.4	ND														
Carbon tetrachloride	2000	10	2	10	9.9	ND	9.4	ND														
Bromodichloromethane	11000	10	1	10	9.9	ND	9.4	ND														
1,2-Dichloropropane	10000	10	1	10	9.9	ND	9.4	ND														
cis-1,3-Dichloropropene	NA	10	NA	10	9.9	ND	9.4	ND														
Trichloroethene	23000	10	1	10	9.9	ND	9.4	ND														
Dibromochloromethane	110000	10	10	10	9.9	ND	9.4	ND														
1,1,2-Trichloroethane	22000	10	3	10	9.9	ND	9.4	ND														
Benzene	3000	10	1	10	9.9	ND	9.4	ND														
trans-1,3-dichloropropene	NA	10	NA	10	9.9	ND	9.4	ND														
Bromoform	86000	10	4	10	9.9	ND	9.4	ND														
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10	9.9	ND	9.4	ND														
2-Hexanone	NA	10	NA	10	9.9	ND	9.4	ND														
Tetrachloroethene	4000	10	1	10	9.9	ND	9.4	ND														
1,1,2,2-Tetrachloroethane	NA	10	NA	10	9.9	ND	9.4	ND														
Toluene	1000000	10	1000	10	9.9	ND	9.4	ND														
Chlorobenzene	37000	10	50	10	9.9	ND	9.4	ND														
Ethyl benzene	1000000	10	700	10	9.9	ND	9.4	ND														
Styrene	23000	10	100	10	9.9	ND	9.4	ND														
Xylenes(Total)	410000	10	1000	10	9.9	ND	9.4	ND														

Table 10 Semivolatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030365		20030371		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp F	Q	A Comp F	Q	1 Comp F	Q	2 Comp F	Q	3 Comp F	Q	4 Comp F	Q	5 Comp F	Q	6 Comp F	Q	7 Comp F	Q
Phenol	10,000,000	660	4,000	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
bis(2-Chloroethyl)ether	660	660	10	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
2-Chlorophenol	2000	660	5	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
1,3-Dichlorobenzene	5100000	660	600	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
1,4-Dichlorobenzene	570000	660	75	10	72.62		62.7	B	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
1,2-Dichlorobenzene	5100000	660	600	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
2-Methylphenol	2800000	660	NA	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
1-Chloropropane-2,2'-oxybis	2300000	660	300	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
4-Methylphenol	2800000	660	NA	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
N-Nitroso-Di-N-Propylamine	660	660	20	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Hexachloroethane	6000	660	10	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Nitrobenzene	28000	660	10	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Isophorone	1100000	660	100	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
2-Nitrophenol	NA	660	NA	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
2,4-Dimethylphenol	1100000	660	100	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
bis(2-Chloroethoxy)methane	NA	660	NA	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
2,4-Dichlorophenol	170000	660	20	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
1,2,4-Trichlorobenzene	68000	660	9	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Naphthalene	230000	660	300	10	188.12	B	135.67	B	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
4-Chloroaniline	230000	1300	NA	20	1600	ND	210	J	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Hexachloro-1,3-butadiene	NA	660	NA	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
4-Chloro-3-methylphenol	10,000,000	1300	NA	20	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
2-Methylnaphthalene	NA	660	NA	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Hexachlorocyclopentadiene	400000	660	50	10	3300	ND	3100	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
2,4,6-Trichlorophenol	62000	660	20	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
2,4,5-Trichlorophenol	5600000	660	700	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
2-Chloronaphthalene	NA	660	NA	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
2-Nitroaniline	NA	3,300	NA	50	7900	ND	7500	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
Dimethylphthalate	10,000,000	660	NA	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Acenaphthylene	NA	660	NA	10	79.14		62.95		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
2,6-Dinitrotoluene	1000	660	10	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
3-Nitroaniline	NA	3300	NA	50	7900	ND	7500	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND

Table 10 Semivolatiles continued	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030365		20030371		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp F	Q	A Comp F	Q	1 Comp F	Q	2 Comp F	Q	3 Comp F	Q	4 Comp F	Q	5 Comp F	Q	6 Comp F	Q	7 Comp F	Q
Acenaphthene	3400000	660	400	10	102.95	B	57.65		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
2,4-Dinitrophenol	110000	3300	40	50	7900	ND	7500	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
4-Nitrophenol	NA	3300	NA	50	7900	ND	7500	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
Dibenzofuran	NA	660	NA	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
2,4-Dinitrotoluene	1000	660	10	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Diethylphthalate	10,000,000	660	5,000	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.00074	J	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
4-Chlorophenyl-phenylether	NA	660	NA	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Fluorene	2300000	660	300	10	147.5		85.12		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
4-Nitroaniline	NA	830	NA	20	4100	ND	3900	ND	0.02	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
4,6-Dinitro-2-methylphenol	NA	3300	NA	50	7900	ND	7500	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
N-Nitrosodiphenylamine	140000	660	20	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
4-Bromophenyl-phenylether	NA	660	NA	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Hexachlorobenzene	660	660	10	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Pentachlorophenol	6000	3300	1	50	7900	ND	7500	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
Phenanthrene	NA	6600	NA	10	736.26		296.38	B	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Anthracene	10000000	6600	2000	10	294.11		179.62		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Carbazole	NA	330	NA	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Di-n-butylphthalate	5700000	330	900	10	1600	ND	1600	ND	0.00093	J	0.0097	ND	0.0015	J	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Fluoranthene	2300000	660	300	10	1221.96		780.84		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Pyrene	1700000	660	200	10	1218.92		861.73		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Butylbenzylphthalate	1100000	660	100	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.00086	J	0.0096	ND	0.0094	ND	0.0096	ND
3,3'-Dichlorobenzidine	2000	1300	60	20	6500	ND	6100	ND	0.02	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
Benzo(a)anthracene	900	660	NA	10	709.57		375.66		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Chrysene	9000	660	NA	10	732.3		407.66		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
bis(2-Ethylhexyl)phthalate	49000	660	30	10	2800		2100		0.0098	ND	0.0011	J	0.0096	ND	0.0012	J	0.0096	ND	0.0094	ND	0.0096	ND
Di-n-octylphthalate	1100000	660	100	10	1600	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Benzo(b)fluoranthene	900	660	NA	10	688.25		398.4		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Benzo(k)fluoranthene	900	660	NA	10	572.29		313.06		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Benzo(a)pyrene	660	660	NA	10	[illegible]		432.77		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Indeno(1,2,3-cd)pyrene	900	660	NA	10	518.88		327.85		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Dibenzo(a,h)anthracene	660	660	NA	10	127.06		94.39		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND
Benzo(ghi)perylene	NA	660	NA	10	411.92		261.73		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0096	ND	0.0094	ND	0.0096	ND

Table 10 Pesticides/Arochlors	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030365		20030371		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp F	Q	A Comp F	Q	1 Comp F	Q	2 Comp F	Q	3 Comp F	Q	4 Comp F	Q	5 Comp F	Q	6 Comp F	Q	7 Comp F	Q
alpha-BHC	NA	1.9	0.02	0.05	1.3	J	3.2	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
beta-BHC	NA	3.3	0.2	0.05	3.4	ND	3.2	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
delta-BHC	NA	1.7	NA	0.05	3.4	ND	3.2	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
gamma-BHC (Lindane)	520	2	0.2	0.05	3.4	ND	3.2	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Heptachlor	150	2.1	0.4	0.05	0.12	ND	0.11	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Aldrin	40	2	0.04	0.05	0.09	ND	0.08	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	0.11	ND	0.10	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Endosulfan I		2.1	0.4	0.05	0.15	ND	0.14	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Dieldrin	42	3.3	0.03	0.10	2.20		1.42		0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
4,4'-DDE	2000	4.2	0.1	0.10	18.53	D	14.45	D	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Endrin	17000	3.6	2	0.10	3.4	ND	3.2	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Endosulfan II		3.3	0.4	0.10	0.15	ND	0.13	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
4,4'-DDD	381000	4.2	0.1	0.10	13.57		9.31		0.05	ND	0.011	J PG	0.05	ND	0.013	J PG	0.05	ND	0.05	ND	0.05	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.16	ND	0.14	ND	0.008	J	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
4,4'-DDT	2000	3.6	0.1	0.10	1.23		1.43		0.019	J PG	0.05	ND	0.05	ND	0.009	J PG	0.05	ND	0.05	ND	0.05	ND
Methoxychlor	280000	17	40	0.50	6.6	ND	6.2	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.099	ND	0.1	ND
Endrin ketone	NA	3.3	NA	0.10	0.42	J PG	0.45	J PG	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Endrin aldehyde	NA	3.3	NA	0.10	3.4	ND	3.2	ND	0.014	J PG	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
alpha-Chlordane	500	1.7	NA	0.05	2.08		1.85		0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.013	J	0.05	ND	0.05	ND
gamma-Chlordane	NA	1.7	0.5	0.05	1.6	J PG	0.83	J PG	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND
Toxaphene	100	170	3	5.00	130	ND	130	ND	2	ND	2	ND	2	ND	2	ND	2	ND	2	ND	2	ND
Arochlor-1016 *		33		1.00	33	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND
Arochlor-1221 *		67		2.00	33	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND
Arochlor-1232 *		33		1.00	33	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND
Arochlor-1242 *		33		1.00	33	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND
Arochlor-1248 *		33		1.00	340		180		1	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND
Arochlor-1254 *		33		1.00	220		110		1	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND
Arochlor-1260 *		33		1.00	230		100		1	ND	1	ND	1	ND	1	ND	1	ND	0.99	ND	1	ND
Total Arochlor(SUM)	490		0.5																			
Combined endosulfans(SUM) Endosulfan I + II + sulfate	340000		NA		0.228632768	ND	0.205385496	ND														

* Reported as units = ppm

Table 10 Metals	Action Level		Action Level		Unamended Sediment (Units: ppm)		Amended Sediment (Units: ppm)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030365		20030371		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp F	Q	A Comp F	Q	1 Comp F	Q	2 Comp F	Q	3 Comp F	Q	4 Comp F	Q	5 Comp F	Q	6 Comp F	Q	7 Comp F	Q
Aluminum	NA	40	200	200	10600	E	10800	E	1120		1880		1490		1170		801		837		866	
Antimony	14000	12	20	60	0.39	BN	0.35	BN	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Arsenic	20000	2	8	10	19.7		14.4		10	ND	2.8	B	5	B	5.4	B	5.1	B	4.8	B	5.4	B
Barium	700000	40	2,000	200	67	E	67		31.2	B J	12.1	B	8	B	8.2	B	11.8	B	13	B	13.1	B J
Beryllium	1000	1	20	5	0.7		0.71		4	ND	4	ND	4	ND	0.48	B J	0.84	B J	1.4	B J	0.29	B
Cadmium	1000	1	4	5	3.53		2.39		5	ND	5	ND	5	ND	5	ND	0.49	B	5	ND	5	ND
Calcium	NA	1000	NA	5000	4430	E	39000	E	189000	J	107000		76700	J	62900		43800		34400		30600	J
Chromium	NA	2	100	10	176.0	B	113.0		10.1		20.9		22.4		21		15.2		11.4		12.2	
Cobalt	NA	10	NA	50	8.4	E	7	E	3.9	B	50	ND	50	ND	0.82	B	50		50		50	ND
Copper	600000	5	1000	25	158.0		115.0		147	J	59.7		37.2		32.4		23	B	16.1	B	19.2	B J
Iron	NA	20	300	1000	23500	E	21300	E	100	ND	100	ND	100	ND	100	ND	100	ND	100	ND	100	ND
Lead	400000	0.6	10	3	141.0		102.0		3	ND	3	ND	3	ND	3	ND	3	ND	3	ND	3	ND
Magnesium	NA	1000	NA	5000	5810	E	6780	E	20.5	B J	5000	ND	30.1	B J	56.1	B	70.4	B	135	B	158	B J
Manganese	NA	3	50	15	337	E	340	E	15	ND	15	ND	15	ND	15	ND	15	ND	15	ND	0.35	B
Mercury	14000	0.1	2	0.2	2.36		1.65		0.2	ND	0.2	ND	0.2	ND	0.026	B	0.043	B	0.2	ND	0.2	ND
Nickel	250000	8	100	40	42.2		38.1		33.4	B	7.6	B	2.3	B	2.8	B	40	ND	1.2	B	1.1	B
Potassium	NA	1000	NA	5000	2260	E	2710		34800		4570	B	1490	B	1040	B	584	B	366	B	337	B
Selenium	63000	1	50	5	1.5		1.3		4	B	4.2	B	5	ND	2.6	B	2.9	B	2.8	B	5	ND
Silver	110000	2	NA	10	5.5		3.82		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Sodium	NA	1000	50,000	5,000	8330	E	7350		228000		17100		7030		5280		4990	B	10600		7850	
Thallium	2000	2	10	10	0.99	ND	0.69	B	10	ND	6.6	B	10	ND	6.9	B	7.1	B	7.9	B	6.2	B
Vanadium	370000	10	NA	50	33.7	E	29.8	E	16.9	B	24.5	B	28.5	B J	31.5	B	30.4	B	27.7	B	30.7	B
Zinc	1500000	4	5000	20	296.0		241.0		20	ND	6.2	B	20	ND	2.3	B	1.6	B	2.7	B	1.4	B J
Cyanide, total	1100000	0.5	200	10	0.4	B	0.37	B														
%Solids					50.3		53.2															

Table 10 Dioxins	Action Level		Action Level		Unamended Sediment (Units: ppt)		Amended Sediment (Units: ppt)		MEP Extracts Units:ppt													
ASI ID #	Soil		Leachate		20030365		20030371		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg		ug/L		Comp F	Q	A Comp F	Q	1 Comp F	Q		Q		Q		Q		Q		Q	7 Comp F	Q
2,3,7,8-TCDD					15.72		11.75		1.8	ND											2	ND
1,2,3,7,8-PeCDD					1.16	J	1.66	J	0.91	ND											1.1	ND
1,2,3,4,7,8-HxCDD					1.04	J	1.66	J	1.1	ND											1.1	ND
1,2,3,6,7,8-HxCDD					6.26		11.96		1.2	ND											1.1	ND
1,2,3,7,8,9-HxCDD					3.77		7.06		1.1	ND											1.1	ND
1,2,3,4,6,7,8-HpCDD					97.62		218.41		0.84	ND											1.1	ND
OCDD					827.04		1907.39		2.6	B J											5.6	Q B J
2,3,7,8-TCDF					7.22	#	11.45	#	2	ND											1.9	ND
1,2,3,7,8-PeCDF					1.89	J	2.01	J	0.83	ND											0.98	ND
2,3,4,7,8-PeCDF					2.78	J	4.36		0.6	ND											0.72	ND
1,2,3,4,7,8-HxCDF					7.11		9.55		0.5	ND											0.61	ND
1,2,3,6,7,8-HxCDF					3.08		3.29		0.51	ND											0.65	ND
2,3,4,6,7,8-HxCDF					1.92	J	2.95		0.56	ND											0.73	ND
1,2,3,7,8,9-HxCDF					2.84	ND	0.18	J	0.66	ND											0.82	ND
1,2,3,4,6,7,8-HpCDF					46.84		64.40		0.83	ND											1.1	ND
1,2,3,4,7,8,9-HpCDF					1.89		3.01		0.9	ND											1.3	ND
OCDF					71.57		106.15		0.85	ND											2.7	Q B J

NA

* = NJDEP Required detection limit
\# = value from 2nd column confirmation
ND = Not detected
B = Indicates analyte detected in method blank as well as associated field sample
J = Detection limit below the reporting limit or is an estimated value
E = Estimated value

Table 11 Volatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030366		20030372		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp G	Q	A Comp G	Q	1 Comp G	Q	2 Comp G	Q	3 Comp G	Q	4 Comp G	Q	5 Comp G	Q	6 Comp G	Q	7 Comp G	Q
Chloromethane (Methyl Chloride)	520000	10	30	10	11	ND	9.3	ND														
Bromomethane	79000	10	10	10	11	ND	9.3	ND														
Vinyl chloride	2000	10	5	10	11	ND	9.3	ND														
Chloroethane	NA	10	NA	10	11	ND	9.3	ND														
Methylene chloride (Dichloromethane)	49000	10	3	10	77		20															
Acetone	1,000,000	10	700	10	85		160															
Carbon disulfide	NA	10	NA	10	6.2	J B	45															
1,1-Dichloroethene	8000	10	2	10	11	ND	9.3	ND														
1,1-Dichloroethane	570000	10	50	10	11	ND	9.3	ND														
1,2-Dichloroethene (total)	NA	10	10	10	11	ND	9.3	ND														
Chloroform	19000	10	6	10	11	ND	9.3	ND														
1,2-Dichloroethane	NA	10	NA	10	11	ND	9.3	ND														
2-Butanone (MEK)	1000000	10	300	10	27		61															
1,1,1-Trichloroethane	210000	10	30	10	11	ND	9.3	ND														
Carbon tetrachloride	2000	10	2	10	11	ND	9.3	ND														
Bromodichloromethane	11000	10	1	10	11	ND	9.3	ND														
1,2-Dichloropropane	10000	10	1	10	11	ND	9.3	ND														
cis-1,3-Dichloropropene	NA	10	NA	10	11	ND	9.3	ND														
Trichloroethene	23000	10	1	10	11	ND	9.3	ND														
Dibromochloromethane	110000	10	10	10	11	ND	9.3	ND														
1,1,2-Trichloroethane	22000	10	3	10	11	ND	9.3	ND														
Benzene	3000	10	1	10	4.3	J	3.9	J														
trans-1,3-dichloropropene	NA	10	NA	10	11	ND	9.3	ND														
Bromoform	86000	10	4	10	11	ND	9.3	ND														
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10	11	ND	9.3	ND														
2-Hexanone	NA	10	NA	10	11	ND	9.3	ND														
Tetrachloroethene	4000	10	1	10	11	ND	9.3	ND														
1,1,2,2-Tetrachloroethane	NA	10	NA	10	11	ND	9.3	ND														
Toluene	1000000	10	1000	10	11	ND	9.3	ND														
Chlorobenzene	37000	10	50	10	11	ND	9.3	ND														
Ethyl benzene	1000000	10	700	10	11	ND	9.3	ND														
Styrene	23000	10	100	10	11	ND	9.3	ND														
Xylenes(Total)	410000	10	1000	10	4.2	J	5.2	J														

Table 11 Semivolatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030366		20030372		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp G	Q	A Comp G	Q	1 Comp G	Q	2 Comp G	Q	3 Comp G	Q	4 Comp G	Q	5 Comp G	Q	6 Comp G	Q	7 Comp G	Q
Phenol	10,000,000	660	4,000	10	1900	ND	1500	ND	0.002	J	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethyl)ether	660	660	10	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Chlorophenol	2000	660	5	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,3-Dichlorobenzene	5100000	660	600	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,4-Dichlorobenzene	570000	660	75	10	182.81		246.14	B	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,2-Dichlorobenzene	5100000	660	600	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Methylphenol	2800000	660	NA	10	1900	ND	1500	ND	0.0031	J	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
1-Chloropropane-2,2'-oxybis	2300000	660	300	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Methylphenol	2800000	660	NA	10	1900	ND	1500	ND	0.0038	J	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
N-Nitroso-Di-N-Propylamine	660	660	20	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachloroethane	6000	660	10	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Nitrobenzene	28000	660	10	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Isophorone	1100000	660	100	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Nitrophenol	NA	660	NA	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dimethylphenol	1100000	660	100	10	1900	ND	1500	ND	0.0025	J	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethoxy)methane	NA	660	NA	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dichlorophenol	170000	660	20	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,2,4-Trichlorobenzene	68000	660	9	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Naphthalene	230000	660	300	10	282.32	B	252.35	B	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0059	J B	0.0095	ND	0.0096	ND
4-Chloroaniline	230000	1300	NA	20	270	J	330	J	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachloro-1,3-butadiene	NA	660	NA	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Chloro-3-methylphenol	10,000,000	1300	NA	20	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Methylnaphthalene	NA	660	NA	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachlorocyclopentadiene	400000	660	50	10	3700	ND	3100	ND	0.049	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
2,4,6-Trichlorophenol	62000	660	20	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4,5-Trichlorophenol	5600000	660	700	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Chloronaphthalene	NA	660	NA	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Nitroaniline	NA	3,300	NA	50	9000	ND	7500	ND	0.049	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Dimethylphthalate	10,000,000	660	NA	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Acenaphthylene	NA	660	NA	10	125.31		103.16		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,6-Dinitrotoluene	1000	660	10	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
3-Nitroaniline	NA	3300	NA	50	9000	ND	7500	ND	0.049	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND

Table 11 Semivolatiles continued	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030386		20030372		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp G	Q	A Comp G	Q	1 Comp G	Q	2 Comp G	Q	3 Comp G	Q	4 Comp G	Q	5 Comp G	Q	6 Comp G	Q	7 Comp G	Q
Acenaphthene	3400000	660	400	10	98.47	B	84.1		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dinitrophenol	110000	3300	40	50	9000	ND	7500	ND	0.049	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
4-Nitrophenol	NA	3300	NA	50	9000	ND	7500	ND	0.049	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Dibenzofuran	NA	660	NA	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dinitrotoluene	1000	660	10	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Diethylphthalate	10,000,000	660	5,000	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.001	J	0.0095	ND	0.0096	ND
4-Chlorophenyl-phenylether	NA	660	NA	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Fluorene	2300000	660	300	10	159.62		148.85		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Nitroaniline	NA	830	NA	20	4700	ND	3900	ND	0.02	ND	0.02	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
4,6-Dinitro-2-methylphenol	NA	3300	NA	50	9000	ND	7500	ND	0.049	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
N-Nitrosodiphenylamine	140000	660	20	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Bromophenyl-phenylether	NA	660	NA	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachlorobenzene	660	660	10	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Pentachlorophenol	6000	3300	1	50	9000	ND	7500	ND	0.049	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Phenanthrene	NA	6600	NA	10	559.38		527.23	B	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Anthracene	10000000	6600	2000	10	435.55		479.21		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Carbazole	NA	330	NA	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Di-n-butylphthalate	5700000	330	900	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.00062	J	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Fluoranthene	2300000	660	300	10	953.6		1109.93		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Pyrene	1700000	660	200	10	1132.95		1286.86		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Butylbenzylphthalate	1100000	660	100	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
3,3'-Dichlorobenzidine	2000	1300	60	20	7300	ND	6100	ND	0.02	ND	0.02	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
Benzo(a)anthracene	900	660	NA	10	654.75		805.81		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Chrysene	9000	660	NA	10	730.8		889.96		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
bis(2-Ethylhexyl)phthalate	49000	660	30	10	5600		3700		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Di-n-octylphthalate	1100000	660	100	10	1900	ND	1500	ND	0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(b)fluoranthene	900	660	NA	10	635.99		567.9		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(k)fluoranthene	900	660	NA	10	501.08		470.38		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(a)pyrene	660	660	NA	10	[illegible]		655.85		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Indeno(1,2,3-cd)pyrene	900	660	NA	10	421.15		472.92		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Dibenzo(a,h)anthracene	660	660	NA	10	120.88		136.17		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(ghi)perylene	NA	660	NA	10	392.39		391.38		0.0098	ND	0.0098	ND	0.0096	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND

Table 11 Pesticides/Arochlors	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030366		20030372		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp G	Q	A Comp G	Q	1 Comp G	Q	2 Comp G	Q	3 Comp G	Q	4 Comp G	Q	5 Comp G	Q	6 Comp G	Q	7 Comp G	Q
alpha-BHC	NA	1.9	0.02	0.05	7.6	ND	1.5	J	0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
beta-BHC	NA	3.3	0.2	0.05	7.6	ND	4.8	ND	0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
delta-BHC	NA	1.7	NA	0.05	7.6	ND	4.8	ND	0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
gamma-BHC (Lindane)	520	2	0.2	0.05	7.6	ND	4.8	ND	0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
Heptachlor	150	2.1	0.4	0.05	0.14	ND	0.13	ND	0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
Aldrin	40	2	0.04	0.05	0.11	ND	0.10	ND	0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	0.13	ND	0.12	ND	0.05	ND	0.05	ND	0.011	J	0.051	ND	0.052	ND	0.05	ND	0.052	ND
Endosulfan I		2.1	0.4	0.05	0.17	ND	0.16	ND	0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
Dieldrin	42	3.3	0.03	0.10	2.33		4.16		0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
4,4'-DDE	2000	4.2	0.1	0.10	17.48	D	22.12	D	0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
Endrin	17000	3.6	2	0.10	7.6	ND	3	J PG	0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
Endosulfan II		3.3	0.4	0.10	0.17	ND	0.15	ND	0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
4,4'-DDD	381000	4.2	0.1	0.10	10.21		14.93		0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.015	J PG	0.05	ND	0.052	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.18	ND	0.16	ND	0.01	J	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
4,4'-DDT	2000	3.6	0.1	0.10	3.29		5.63		0.058		0.0047	J PG	0.051	ND	0.051	ND	0.0058	J PG	0.05	ND	0.052	ND
Methoxychlor	280000	17	40	0.50	15	ND	9.3	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.015	J PG
Endrin ketone	NA	3.3	NA	0.10	1.5	J PG	0.78	J PG	0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
Endrin aldehyde	NA	3.3	NA	0.10	7.6	ND	4.8	ND	0.012	J PG	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
alpha-Chlordane	500	1.7	NA	0.05	4.55		4.69		0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
gamma-Chlordane	NA	1.7	0.5	0.05	3.7	J PG	1.9	J PG	0.05	ND	0.05	ND	0.051	ND	0.051	ND	0.052	ND	0.05	ND	0.052	ND
Toxaphene	100	170	3	5.00	300	ND	190	ND	2	ND	2	ND	2	ND	2	ND	2.1	ND	2	ND	2.1	ND
Arochlor-1016 *		33		1.00	37	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1221 *		67		2.00	37	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1232 *		33		1.00	37	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1242 *		33		1.00	37	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1248 *		33		1.00	990		540		1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1254 *		33		1.00	490		270		1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1260 *		33		1.00	350		210		1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Total Arochlor(SUM)	490		0.5																			
Combined endosulfans(SUM) Endosulfan I + II + sulfate	340000		NA		0.258698826	ND	0.234558967	ND														

* Reported as units = ppm

Table 11 Metals	Action Level		Action Level		Unamended Sediment (Units: ppm)		Amended Sediment (Units: ppm)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030366		20030372		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp G	Q	A Comp G	Q	1 Comp G	Q	2 Comp G	Q	3 Comp G	Q	4 Comp G	Q	5 Comp G	Q	6 Comp G	Q	7 Comp G	Q
Aluminum	NA	40	200	200	13300	E	11400	E	1030		1620		2240		1860		1380		1150		1160	
Antimony	14000	12	20	60	0.69	BN	0.71	BN	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Arsenic	20000	2	8	10	24.6		22.8		3.8	B	10	ND	10	ND	3.3	B	3.5	B	3.3	B	3.5	B
Barium	700000	40	2,000	200	108	E	92.1		51.2	B J	18.8	B	12.3	B	11.3	B	16	B	15.6	B	13.6	B J
Beryllium	1000	1	20	5	0.87		0.73		4	ND	4	ND	4	ND	0.49	B J	0.84	B J	1.3	B J	4	ND
Cadmium	1000	1	4	5	5.71		6.58		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Calcium	NA	1000	NA	5000	6400	E	53700	E	247000	J	143000		110000	J	92900		76200		60800		55500	J
Chromium	NA	2	100	10	236.0	B	251		14.6		27.5		34.1		40.2		33.8		25.9		26.6	
Cobalt	NA	10	NA	50	10.3	E	7.2	E	4.7	B	0.63	B	50	ND	0.81	B	50		50		0.74	B
Copper	600000	5	1000	25	204.0		219		293	J	99.2		65.5		57.1		45.9		34.8		38.1	J
Iron	NA	20	300	1000	30000	E	22600	E	100	ND	100	ND	100	ND	100	ND	100	ND	100	ND	100	ND
Lead	400000	0.6	10	3	194.0		195.0		3	ND	3	ND	3	ND	3	ND	3	ND	3	ND	3	ND
Magnesium	NA	1000	NA	5000	7380	E	7570	E	20.2	B J	5000	ND	22.3	B J	34.8	B	41.2	B	54.5	B	77.6	B J
Manganese	NA	3	50	15	440	E	346	E	15	ND	15	ND	15	ND	15	ND	15	ND	15	ND	15	ND
Mercury	14000	0.1	2	0.2	3.48		3.72		0.039	B	0.2	ND	0.2	ND	0.2	ND	0.043	B	0.2	ND	0.2	ND
Nickel	250000	8	100	40	52.0		55.2		84.9		15	B	6.2	B	5.3	B	3.4	B	2.8	B	2.7	B
Potassium	NA	1000	NA	5000	2890	E	3040		44400		5960		2360	B	1390	B	699	B	434	B	496	B
Selenium	63000	1	50	5	1.9		1.3		3.9	B	3.4	B	4.2	B	3	B	3.5	B	2.7	B	2.8	B
Silver	110000	2	NA	10	7.33		7.53		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Sodium	NA	1000	50,000	5,000	10600	E	7480		234000		18300		7330		4580	B	5830		5820		5620	
Thallium	2000	2	10	10	1.1	ND	0.46	B	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Vanadium	370000	10	NA	50	45.8	E	35.2	E	9.4	B	11.6	B	15.8	B J	21.5	B	23.9	B	26.4	B	29.4	B
Zinc	1500000	4	5000	20	423.0		474.0		20	ND	5.2	B	1.7	B	20	ND	1.4	B	1.9	B	2.5	B J
Cyanide, total	1100000	0.5	200	10	0.58	B	0.49	B														
%Solids					44.6		53.5															

Table 11 Dioxins	Action Level		Action Level		Unamended Sediment (Units: ppt)		Amended Sediment (Units: ppt)		MEP Extracts Units:ppt													
ASI ID #	Soil		Leachate		20030366		20030372		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg		ug/L		Comp G	Q	A Comp G	Q	1 Comp G	Q		Q		Q		Q		Q		Q	7 Comp G	Q
2,3,7,8-TCDD					25.41		52.40		1.9	ND											1.7	ND
1,2,3,7,8-PeCDD					2.05	J	4.27	J	1.1	ND											0.93	ND
1,2,3,4,7,8-HxCDD					1.98	J	3.33	J	1.3	ND											0.95	ND
1,2,3,6,7,8-HxCDD					14.03		33.08		1.4	ND											0.98	ND
1,2,3,7,8,9-HxCDD					7.79		16.42		1.3	ND											0.93	ND
1,2,3,4,6,7,8-HpCDD					255.95		550.94		0.86	ND											0.88	ND
OCDD					2006.76		5194.29		0.91	ND											3.6	B J
2,3,7,8-TCDF					11.30	#	25.54	#	2.2	ND											1.7	ND
1,2,3,7,8-PeCDF					3.25		5.68		1.1	ND											0.77	ND
2,3,4,7,8-PeCDF					5.08		9.85		0.83	ND											0.57	ND
1,2,3,4,7,8-HxCDF					13.57		25.42		0.58	ND											0.53	ND
1,2,3,6,7,8-HxCDF					5.68		9.86		0.6	ND											0.55	ND
2,3,4,6,7,8-HxCDF					3.85		6.15		0.67	ND											0.64	ND
1,2,3,7,8,9-HxCDF					0.30	J	0.41	J	0.72	ND											0.69	ND
1,2,3,4,6,7,8-HpCDF					132.00		155.93		0.93	ND											1.1	Q J
1,2,3,4,7,8,9-HpCDF					6.82		6.05		1	ND											1.2	ND
OCDF					270.09		302.55		0.99	ND											4.2	B J

NA

* = NJDEP Required detection limit
\# = value from 2nd column confirmation
ND = Not detected
B = Indicates analyte detected in method blank as well as associated field sample
J = Detection limit below the reporting limit or is an estimated value
E = Estimated value

Table 12 Volatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030391		20030398		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp H	Q	A Comp H	Q	1 Comp H	Q	2 Comp H	Q	3 Comp H	Q	4 Comp H	Q	5 Comp H	Q	6 Comp H	Q	7 Comp H	Q
Chloromethane (Methyl Chloride)	520000	10	30	10	11	ND	9.3	ND														
Bromomethane	79000	10	10	10	11	ND	9.3	ND														
Vinyl chloride	2000	10	5	10	11	ND	9.3	ND														
Chloroethane	NA	10	NA	10	11	ND	9.3	ND														
Methylene chloride (Dichloromethane)	49000	10	3	10	2.7	J B	3.4	J B														
Acetone	1,000,000	10	700	10	85		140															
Carbon disulfide	NA	10	NA	10	9.6	J	39															
1,1-Dichloroethene	8000	10	2	10	11	ND	9.3	ND														
1,1-Dichloroethane	570000	10	50	10	11	ND	9.3	ND														
1,2-Dichloroethene (total)	NA	10	10	10	11	ND	9.3	ND														
Chloroform	19000	10	6	10	11	ND	9.3	ND														
1,2-Dichloroethane	NA	10	NA	10	11	ND	9.3	ND														
2-Butanone (MEK)	1000000	10	300	10	20		36															
1,1,1-Trichloroethane	210000	10	30	10	11	ND	9.3	ND														
Carbon tetrachloride	2000	10	2	10	11	ND	9.3	ND														
Bromodichloromethane	11000	10	1	10	11	ND	9.3	ND														
1,2-Dichloropropane	10000	10	1	10	11	ND	9.3	ND														
cis-1,3-Dichloropropene	NA	10	NA	10	11	ND	9.3	ND														
Trichloroethene	23000	10	1	10	11	ND	9.3	ND														
Dibromochloromethane	110000	10	10	10	11	ND	9.3	ND														
1,1,2-Trichloroethane	22000	10	3	10	11	ND	9.3	ND														
Benzene	3000	10	1	10	4.1	J	4	J														
trans-1,3-dichloropropene	NA	10	NA	10	11	ND	9.3	ND														
Bromoform	86000	10	4	10	11	ND	9.3	ND														
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10	11	ND	9.3	ND														
2-Hexanone	NA	10	NA	10	11	ND	9.3	ND														
Tetrachloroethene	4000	10	1	10	11	ND	9.3	ND														
1,1,2,2-Tetrachloroethane	NA	10	NA	10	11	ND	9.3	ND														
Toluene	1000000	10	1000	10	11	ND	9.3	ND														
Chlorobenzene	37000	10	50	10	11	ND	9.3	ND														
Ethyl benzene	1000000	10	700	10	11	ND	9.3	ND														
Styrene	23000	10	100	10	11	ND	9.3	ND														
Xylenes(Total)	410000	10	1000	10	3.2	J	9.3	ND														

Table 12 Semivolatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030391		20030398		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp H	Q	A Comp H	Q	1 Comp H	Q	2 Comp H	Q	3 Comp H	Q	4 Comp H	Q	5 Comp H	Q	6 Comp H	Q	7 Comp H	Q
Phenol	10,000,000	660	4,000	10	1800	ND	620	ND	0.0011	J	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethyl)ether	660	660	10	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Chlorophenol	2000	660	5	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,3-Dichlorobenzene	5100000	660	600	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,4-Dichlorobenzene	570000	660	75	10	147.88		89.49	B	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,2-Dichlorobenzene	5100000	660	600	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Methylphenol	2800000	660	NA	10	1800	ND	620	ND	0.0018	J	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
1-Chloropropane-2,2'-oxybis	2300000	660	300	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Methylphenol	2800000	660	NA	10	1800	ND	140	J	0.0035	J	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
N-Nitroso-Di-N-Propylamine	660	660	20	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachloroethane	6000	660	10	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Nitrobenzene	28000	660	10	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Isophorone	1100000	660	100	10	1800	ND	620	ND	0.00087	J	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Nitrophenol	NA	660	NA	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dimethylphenol	1100000	660	100	10	1800	ND	93	J	0.0023	J	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethoxy)methane	NA	660	NA	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dichlorophenol	170000	660	20	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,2,4-Trichlorobenzene	68000	660	9	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Naphthalene	230000	660	300	10	302.25	B	211.28	B	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0013	J B	0.0095	ND	0.0096	ND
4-Chloroaniline	230000	1300	NA	20	310	J	250	J	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachloro-1,3-butadiene	NA	660	NA	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Chloro-3-methylphenol	10,000,000	1300	NA	20	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Methylnaphthalene	NA	660	NA	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachlorocyclopentadiene	400000	660	50	10	3700	ND	1200	ND	0.048	ND	0.048	ND	0.052	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
2,4,6-Trichlorophenol	62000	660	20	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4,5-Trichlorophenol	5600000	660	700	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Chloronaphthalene	NA	660	NA	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Nitroaniline	NA	3,300	NA	50	8900	ND	3000	ND	0.048	ND	0.048	ND	0.052	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Dimethylphthalate	10,000,000	660	NA	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Acenaphthylene	NA	660	NA	10	139.75		92.39		0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,6-Dinitrotoluene	1000	660	10	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
3-Nitroaniline	NA	3300	NA	50	8900	ND	3000	ND	0.048	ND	0.048	ND	0.052	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND

Table 12 Semivolatiles continued	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030391		20030398		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp H	Q	A Comp H	Q	1 Comp H	Q	2 Comp H	Q	3 Comp H	Q	4 Comp H	Q	5 Comp H	Q	6 Comp H	Q	7 Comp H	Q
Acenaphthene	3400000	660	400	10	105.19	B	66.5		0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dinitrophenol	110000	3300	40	50	8900	ND	3000	ND	0.048	ND	0.048	ND	0.052	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
4-Nitrophenol	NA	3300	NA	50	8900	ND	3000	ND	0.048	ND	0.048	ND	0.052	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Dibenzofuran	NA	660	NA	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dinitrotoluene	1000	660	10	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Diethylphthalate	10,000,000	660	5,000	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Chlorophenyl-phenylether	NA	660	NA	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Fluorene	2300000	660	300	10	173.22		122.37		0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Nitroaniline	NA	830	NA	20	4600	ND	1500	ND	0.019	ND	0.019	ND	0.021	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
4,6-Dinitro-2-methylphenol	NA	3300	NA	50	8900	ND	3000	ND	0.048	ND	0.048	ND	0.052	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
N-Nitrosodiphenylamine	140000	660	20	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Bromophenyl-phenylether	NA	660	NA	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachlorobenzene	660	660	10	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Pentachlorophenol	6000	3300	1	50	8900	ND	3000	ND	0.048	ND	0.048	ND	0.052	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Phenanthrene	NA	6600	NA	10	567.01		415.3	B	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Anthracene	10000000	6600	2000	10	402.87		274.64		0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Carbazole	NA	330	NA	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Di-n-butylphthalate	5700000	330	900	10	1800	ND	620	ND	0.0097	ND	0.00048	J B	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Fluoranthene	2300000	660	300	10	1325.71		709.68		0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Pyrene	1700000	660	200	10	1550.45		842.95		0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Butylbenzylphthalate	1100000	660	100	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
3,3'-Dichlorobenzidine	2000	1300	60	20	7200	ND	2400	ND	0.019	ND	0.019	ND	0.021	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
Benzo(a)anthracene	900	660	NA	10	[redacted]		510.5		0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Chrysene	9000	660	NA	10	1088.36		563.81		0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
bis(2-Ethylhexyl)phthalate	49000	660	30	10	3600		1600		0.0012	J	0.0023	J	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Di-n-octylphthalate	1100000	660	100	10	1800	ND	620	ND	0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(b)fluoranthene	900	660	NA	10	675.5		498.36		0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(k)fluoranthene	900	660	NA	10	528.02		398.95		0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(a)pyrene	660	660	NA	10	[redacted]		577.77		0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Indeno(1,2,3-cd)pyrene	900	660	NA	10	515.82		420.82		0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Dibenzo(a,h)anthracene	660	660	NA	10	128.48		126.91		0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(ghi)perylene	NA	660	NA	10	399.19		353.62		0.0097	ND	0.0097	ND	0.01	ND	0.0096	ND	0.0097	ND	0.0095	ND	0.0096	ND

Table 12 Pesticides/Arochlors	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030391		20030398		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp H	Q	A Comp H	Q	1 Comp H	Q	2 Comp H	Q	3 Comp H	Q	4 Comp H	Q	5 Comp H	Q	6 Comp H	Q	7 Comp H	Q
alpha-BHC	NA	1.9	0.02	0.05	7.5	ND	6.3	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
beta-BHC	NA	3.3	0.2	0.05	7.5	ND	6.3	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
delta-BHC	NA	1.7	NA	0.05	7.5	ND	6.3	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
gamma-BHC (Lindane)	520	2	0.2	0.05	7.5	ND	6.3	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
Heptachlor	150	2.1	0.4	0.05	0.13	ND	0.12	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
Aldrin	40	2	0.04	0.05	0.10	ND	0.09	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	0.12	ND	0.11	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
Endosulfan I		2.1	0.4	0.05	0.16	ND	0.15	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
Dieldrin	42	3.3	0.03	0.10	2.34		1.42		0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
4,4'-DDE	2000	4.2	0.1	0.10	25.59	D	20.56	D	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
Endrin	17000	3.6	2	0.10	7.5	ND	2.4	J PG	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
Endosulfan II		3.3	0.4	0.10	0.16	ND	0.14	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
4,4'-DDD	381000	4.2	0.1	0.10	15.82		13.02		0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.17	ND	0.15	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
4,4'-DDT	2000	3.6	0.1	0.10	2.46		1.96		0.03	J	0.011	J PG	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
Methoxychlor	280000	17	40	0.50	15	ND	12	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND
Endrin ketone	NA	3.3	NA	0.10	7.5	ND	6.3	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
Endrin aldehyde	NA	3.3	NA	0.10	7.5	ND	6.3	ND	0.0053	J PG	0.05	ND	0.0053	J PG	0.05	ND	0.051	ND	0.05	ND	0.052	ND
alpha-Chlordane	500	1.7	NA	0.05	2.43		1.25		0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
gamma-Chlordane	NA	1.7	0.5	0.05	1.8	J PG	0.81	J PG	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.051	ND	0.05	ND	0.052	ND
Toxaphene	100	170	3	5.00	300	ND	250	ND	2	ND	2	ND	2	ND	2	ND	2	ND	2	ND	2.1	ND
Arochlor-1016 *		33		1.00	37	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1221 *		67		2.00	37	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1232 *		33		1.00	37	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1242 *		33		1.00	37	ND	31	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1248 *		33		1.00	520		200		1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1254 *		33		1.00	310		130		1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1260 *		33		1.00	220		87		1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Total Arochlor(SUM)	490		0.5																			
Combined endosulfans(SUM) Endosulfan I + II + sulfate	340000		NA		0.246843561	ND	0.217321925	ND														

* Reported as units = ppm

Table 12 Metals	Action Level		Action Level		Unamended Sediment (Units: ppm)		Amended Sediment (Units: ppm)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030391		20030398		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp H	Q	A Comp H	Q	1 Comp H	Q	2 Comp H	Q	3 Comp H	Q	4 Comp H	Q	5 Comp H	Q	6 Comp H	Q	7 Comp H	Q
Aluminum	NA	40	200	200	13200	E	12300	E	1350		2230		1500		1800		925		640		485	
Antimony	14000	12	20	60	0.63	BN	0.45	BN	10	ND	3.7	B	10	ND	10	ND	10	ND	10	ND	10	ND
Arsenic	20000	2	8	10	26.1		21.9		10	ND	2.9	B	5.2	B	4.9	B	6.1	B	7.9	B	7.8	B
Barium	700000	40	2,000	200	98.8	E	86.9		25.7	B J	13.9	B	7.6	B	18.6	B	7.2	B	10.6	B	6.8	B J
Beryllium	1000	1	20	5	0.88		0.79		4	ND	4	ND	4	ND	0.82	B J	1.1	B J	1.6	B J	4	ND
Cadmium	1000	1	4	5	5.18		3.95		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Calcium	NA	1000	NA	5000	6320	E	67600	E	181000	J	106000		79100	J	63300		46000		29900		26800	J
Chromium	NA	2	100	10	230.0	B	180.0		6.8		27.3		28.1		28.6		21		15.3		18.4	
Cobalt	NA	10	NA	50	10.1	E	7.3	E	2.2	B	50	ND	50	ND	50	ND	50	ND	0.65	B	0.67	B
Copper	600000	5	1000	25	200.0		162.0		36.3	J	63.2		45.7		35.5		30.3		19.8	B	24.4	B J
Iron	NA	20	300	1000	30100	E	23800	E	100	ND	100	ND	100	ND	100	ND	100	ND	100	ND	18.8	B
Lead	400000	0.6	10	3	177.0		141.0		3	ND	3	ND	3	ND	3	ND	3	ND	3	ND	3	ND
Magnesium	NA	1000	NA	5000	7500	E	8370	E	19.1	B J	5000	ND	32.6	B J	80.9	B	58.1	B	70.6	B	112	B J
Manganese	NA	3	50	15	455	E	387	E	0.18	B	15	ND	15	ND	15	ND	15	ND	15	ND	0.26	B
Mercury	14000	0.1	2	0.2	2.99		2.52		0.2	ND	0.031	B	0.2	ND	0.049	B	0.037	B	0.2	ND	0.2	ND
Nickel	250000	8	100	40	52.8		45.5		37.1	B	9.1	B	4	B	2.5	B	2.2	B	1.9	B	2.1	B
Potassium	NA	1000	NA	5000	2870	E	3190		34000		5130		1930	B	558	B	374	B	343	B	398	B
Selenium	63000	1	50	5	2		1		4.5	B	3.7	B	5	ND	2.8	B	5	ND	5	ND	4.9	B
Silver	110000	2	NA	10	7.03		5.72		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Sodium	NA	1000	50,000	5,000	10600	E	7570		236000		18600		6190		5110		5170		4450	B	5400	
Thallium	2000	2	10	10	0.7	B	0.5	B	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Vanadium	370000	10	NA	50	43.5	E	33.5	E	18	B	23.9	B	28.6	B J	35.2	B	30.6	B	30	B	31.8	B
Zinc	1500000	4	5000	20	396.0		338.0		20	ND	1.7	B	2.9	B	20	ND	20	ND	2.9	B	2.1	B J
Cyanide, total	1100000	0.5	200	10	0.65	B	0.53	B														
%Solids					45.2		53.6															

Table 12 Dioxins	Action Level		Action Level		Unamended Sediment (Units: ppt)		Amended Sediment (Units: ppt)		MEP Extracts Units:ppt													
ASI ID #	Soil		Leachate		20030391		20030398		MEP Day 1												MEP Day 7	
STL ID #	ug/kg		ug/L		Comp H	Q	A Comp H	Q	1 Comp H	Q		Q		Q		Q		Q		Q	7 Comp H	Q
2,3,7,8-TCDD					14.80		18.24		2	ND											2.2	ND
1,2,3,7,8-PeCDD					1.84	J	2.52	J	0.91	ND											1.2	ND
1,2,3,4,7,8-HxCDD					1.58	J	3.94	J	1.1	ND											1.3	ND
1,2,3,6,7,8-HxCDD					10.60		19.03		1.1	ND											1.3	ND
1,2,3,7,8,9-HxCDD					6.13		10.85		1.1	ND											1.2	ND
1,2,3,4,6,7,8-HpCDD					158.71		254.49		0.98	ND											1.2	ND
OCDD					1341.12		2379.24		1.2	Q B J											5.8	Q B J
2,3,7,8-TCDF					7.88	#	13.56	#	2.1	ND											2.2	ND
1,2,3,7,8-PeCDF					3.12		4.38		0.9	ND											0.94	ND
2,3,4,7,8-PeCDF					4.47		6.15		0.64	ND											0.76	ND
1,2,3,4,7,8-HxCDF					10.33		14.85		0.53	ND											0.64	ND
1,2,3,6,7,8-HxCDF					4.35		5.55		0.51	ND											0.67	ND
2,3,4,6,7,8-HxCDF					2.43	J	3.88		0.56	ND											0.77	ND
1,2,3,7,8,9-HxCDF					0.23	J	1.13	J	0.65	ND											0.83	ND
1,2,3,4,6,7,8-HpCDF					82.36		98.72		0.8	ND											1.2	ND
1,2,3,4,7,8,9-HpCDF					2.88		5.09		0.86	ND											1.5	ND
OCDF					116.64		148.83		1.1	ND											2.6	ND

NA

* = NJDEP Required detection limit
# = value from 2nd column confirmation
ND = Not detected
B = Indicates analyte detected in method blank as well as associated field sample
J = Detection limit below the reporting limit or is an estimated value
E = Estimated value

Table 13 Volatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units: ppb													
ASI ID #	Soil		Leachate		20030392		20030399		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp I	Q	A Comp I	Q	1 Comp I	Q	2 Comp I	Q	3 Comp I	Q	4 Comp I	Q	5 Comp I	Q	6 Comp I	Q	7 Comp I	Q
Chloromethane (Methyl Chloride)	520000	10	30	10	10	ND	8.6	ND														
Bromomethane	79000	10	10	10	10	ND	8.6	ND														
Vinyl chloride	2000	10	5	10	10	ND	8.6	ND														
Chloroethane	NA	10	NA	10	10	ND	8.6	ND														
Methylene chloride (Dichloromethane)	49000	10	3	10	10	ND	61	B														
Acetone	1,000,000	10	700	10	82		200															
Carbon disulfide	NA	10	NA	10	10		45															
1,1-Dichloroethene	8000	10	2	10	10	ND	8.6	ND														
1,1-Dichloroethane	570000	10	50	10	10	ND	8.6	ND														
1,2-Dichloroethene (total)	NA	10	10	10	10	ND	8.6	ND														
Chloroform	19000	10	6	10	10	ND	8.6	ND														
1,2-Dichloroethane	NA	10	NA	10	10	ND	8.6	ND														
2-Butanone (MEK)	1000000	10	300	10	23		49															
1,1,1-Trichloroethane	210000	10	30	10	10	ND	8.6	ND														
Carbon tetrachloride	2000	10	2	10	10	ND	8.6	ND														
Bromodichloromethane	11000	10	1	10	10	ND	8.6	ND														
1,2-Dichloropropane	10000	10	1	10	10	ND	8.6	ND														
cis-1,3-Dichloropropene	NA	10	NA	10	10	ND	8.6	ND														
Trichloroethene	23000	10	1	10	10	ND	8.6	ND														
Dibromochloromethane	110000	10	10	10	10	ND	8.6	ND														
1,1,2-Trichloroethane	22000	10	3	10	2.1	J	8.6	ND														
Benzene	3000	10	1	10	10	ND	1.1	J														
trans-1,3-dichloropropene	NA	10	NA	10	10	ND	8.6	ND														
Bromoform	86000	10	4	10	10	ND	8.6	ND														
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10	10	ND	8.6	ND														
2-Hexanone	NA	10	NA	10	10	ND	8.6	ND														
Tetrachloroethene	4000	10	1	10	10	ND	8.6	ND														
1,1,2,2-Tetrachloroethane	NA	10	NA	10	10	ND	8.6	ND														
Toluene	1000000	10	1000	10	10	ND	8.6	ND														
Chlorobenzene	37000	10	50	10	10	ND	8.6	ND														
Ethyl benzene	1000000	10	700	10	10	ND	8.6	ND														
Styrene	23000	10	100	10	10	ND	8.6	ND														
Xylenes(Total)	410000	10	1000	10	10	ND	8.6	ND														

Table 13 Semivolatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030392		20030399		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp I	Q	A Comp I	Q	1 Comp I	Q	2 Comp I	Q	3 Comp I	Q	4 Comp I	Q	5 Comp I	Q	6 Comp I	Q	7 Comp I	Q
Phenol	10,000,000	660	4,000	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethyl)ether	660	660	10	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2-Chlorophenol	2000	660	5	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
1,3-Dichlorobenzene	5100000	660	600	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
1,4-Dichlorobenzene	570000	660	75	10	57.31		50.86	B	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
1,2-Dichlorobenzene	5100000	660	600	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2-Methylphenol	2800000	660	NA	10	1700	ND	570	ND	0.0011	J	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
1-Chloropropane-2,2'-oxybis	2300000	660	300	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
4-Methylphenol	2800000	660	NA	10	1700	ND	130	J	0.0038	J	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
N-Nitroso-Di-N-Propylamine	660	660	20	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Hexachloroethane	6000	660	10	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Nitrobenzene	28000	660	10	10	1700	ND	71	J	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Isophorone	1100000	660	100	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2-Nitrophenol	NA	660	NA	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2,4-Dimethylphenol	1100000	660	100	10	1700	ND	100	J	0.0026	J	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethoxy)methane	NA	660	NA	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2,4-Dichlorophenol	170000	660	20	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
1,2,4-Trichlorobenzene	68000	660	9	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Naphthalene	230000	660	300	10	200.91	B	163.94	B	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0014	J B	0.0095	ND	0.0096	ND
4-Chloroaniline	230000	1300	NA	20	1700	ND	100	J	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Hexachloro-1,3-butadiene	NA	660	NA	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
4-Chloro-3-methylphenol	10,000,000	1300	NA	20	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2-Methylnaphthalene	NA	660	NA	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Hexachlorocyclopentadiene	400000	660	50	10	3300	ND	1100	ND	0.048	ND	0.048	ND	0.049	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND
2,4,6-Trichlorophenol	62000	660	20	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2,4,5-Trichlorophenol	5600000	660	700	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2-Chloronaphthalene	NA	660	NA	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2-Nitroaniline	NA	3,300	NA	50	8100	ND	2700	ND	0.048	ND	0.048	ND	0.049	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND
Dimethylphthalate	10,000,000	660	NA	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Acenaphthylene	NA	660	NA	10	100.46		82.74		0.0021	J	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2,6-Dinitrotoluene	1000	660	10	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
3-Nitroaniline	NA	3300	NA	50	8100	ND	2700	ND	0.048	ND	0.048	ND	0.049	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND

Table 13 Semivolatiles continued	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030392		20030399		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp I	Q	A Comp I	Q	1 Comp I	Q	2 Comp I	Q	3 Comp I	Q	4 Comp I	Q	5 Comp I	Q	6 Comp I	Q	7 Comp I	Q
Acenaphthene	3400000	660	400	10	69.92	B	52.55		0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2,4-Dinitrophenol	110000	3300	40	50	8100	ND	2700	ND	0.048	ND	0.048	ND	0.049	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND
4-Nitrophenol	NA	3300	NA	50	8100	ND	2700	ND	0.048	ND	0.048	ND	0.049	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND
Dibenzofuran	NA	660	NA	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2,4-Dinitrotoluene	1000	660	10	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Diethylphthalate	10,000,000	660	5,000	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
4-Chlorophenyl-phenylether	NA	660	NA	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Fluorene	2300000	660	300	10	117.83		99.93		0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
4-Nitroaniline	NA	830	NA	20	4200	ND	1400	ND	0.019	ND	0.019	ND	0.02	ND	0.019	ND	0.02	ND	0.019	ND	0.019	ND
4,6-Dinitro-2-methylphenol	NA	3300	NA	50	8100	ND	2700	ND	0.048	ND	0.048	ND	0.049	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND
N-Nitrosodiphenylamine	140000	660	20	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
4-Bromophenyl-phenylether	NA	660	NA	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Hexachlorobenzene	660	660	10	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Pentachlorophenol	6000	3300	1	50	8100	ND	2700	ND	0.048	ND	0.048	ND	0.049	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND
Phenanthrene	NA	6600	NA	10	440.93		347.09	B	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Anthracene	10000000	6600	2000	10	231.33		206.18		0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Carbazole	NA	330	NA	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Di-n-butylphthalate	5700000	330	900	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Fluoranthene	2300000	660	300	10	747.9		817.77		0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Pyrene	1700000	660	200	10	899.18		963.57		0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Butylbenzylphthalate	1100000	660	100	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
3,3'-Dichlorobenzidine	2000	1300	60	20	6500	ND	2200	ND	0.019	ND	0.019	ND	0.02	ND	0.019	ND	0.02	ND	0.019	ND	0.019	ND
Benzo(a)anthracene	900	660	NA	10	521.86		458.07		0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Chrysene	9000	660	NA	10	580.94		491.49		0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
bis(2-Ethylhexyl)phthalate	49000	660	30	10	1800		1000		0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Di-n-octylphthalate	1100000	660	100	10	1700	ND	570	ND	0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Benzo(b)fluoranthene	900	660	NA	10	472.41		421.84		0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Benzo(k)fluoranthene	900	660	NA	10	451.91		359.14		0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Benzo(a)pyrene	660	660	NA	10	585.83		517.3		0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Indeno(1,2,3-cd)pyrene	900	660	NA	10	423.97		368		0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Dibenzo(a,h))anthracene	660	660	NA	10	94.24		109.86		0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Benzo(ghi)perylene	NA	660	NA	10	319.78		308.87		0.0097	ND	0.0097	ND	0.0098	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND

Table 13 Pesticides/Arochlors	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030392		20030399		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp I	Q	A Comp I	Q	1 Comp I	Q	2 Comp I	Q	3 Comp I	Q	4 Comp I	Q	5 Comp I	Q	6 Comp I	Q	7 Comp I	Q
alpha-BHC	NA	1.9	0.02	0.05	6.9	ND	5.8	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
beta-BHC	NA	3.3	0.2	0.05	6.9	ND	5.8	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
delta-BHC	NA	1.7	NA	0.05	6.9	ND	5.8	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
gamma-BHC (Lindane)	520	2	0.2	0.05	6.9	ND	5.8	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
Heptachlor	150	2.1	0.4	0.05	0.13	ND	0.11	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
Aldrin	40	2	0.04	0.05	0.10	ND	0.08	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	0.12	ND	0.10	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
Endosulfan I		2.1	0.4	0.05	0.16	ND	0.13	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
Dieldrin	42	3.3	0.03	0.10	1.30		1.28		0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
4,4'-DDE	2000	4.2	0.1	0.10	25.08	D	27.54	D	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
Endrin	17000	3.6	2	0.10	6.9	ND	5.8	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
Endosulfan II		3.3	0.4	0.10	0.16	ND	0.13	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
4,4'-DDD	381000	4.2	0.1	0.10	17.49		16.21		0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.013	J PG	0.05	ND	0.052	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.16	ND	0.13	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
4,4'-DDT	2000	3.6	0.1	0.10	4.45		2.99		0.019	J	0.0093	J PG	0.05	ND	0.0045	J PG	0.0056	J PG	0.05	ND	0.052	ND
Methoxychlor	280000	17	40	0.50	13	ND	11	ND	0.1	ND	0.1	ND	0.1	ND	0.099	ND	0.1	ND	0.1	ND	0.1	ND
Endrin ketone	NA	3.3	NA	0.10	6.9	ND	5.8	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
Endrin aldehyde	NA	3.3	NA	0.10	6.9	ND	5.8	ND	0.012	J	0.052	ND	0.0055	J	0.05	ND	0.052	ND	0.05	ND	0.052	ND
alpha-Chlordane	500	1.7	NA	0.05	1.31		0.63		0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
gamma-Chlordane	NA	1.7	0.5	0.05	1.3	J PG	5.8	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.052	ND	0.05	ND	0.052	ND
Toxaphene	100	170	3	5.00	270	ND	230	ND	2	ND	2.1	ND	2	ND	2	ND	2.1	ND	2	ND	2.1	ND
Arochlor-1016 *		33		1.00	33	ND	28	ND	1	ND	1	ND	1	ND	0.099	ND	1	ND	1	ND	1	ND
Arochlor-1221*		67		2.00	33	ND	28	ND	1	ND	1	ND	1	ND	0.099	ND	1	ND	1	ND	1	ND
Arochlor-1232 *		33		1.00	33	ND	28	ND	1	ND	1	ND	1	ND	0.099	ND	1	ND	1	ND	1	ND
Arochlor-1242 *		33		1.00	33	ND	28	ND	1	ND	1	ND	1	ND	0.099	ND	1	ND	1	ND	1	ND
Arochlor-1248 *		33		1.00	230		96		1	ND	1	ND	1	ND	0.099	ND	1	ND	1	ND	1	ND
Arochlor-1254 *		33		1.00	180		95		1	ND	1	ND	1	ND	0.099	ND	1	ND	1	ND	1	ND
Arochlor-1260 *		33		1.00	150		85		1	ND	1	ND	1	ND	0.099	ND	1	ND	1	ND	1	ND
Total Arochlor(SUM)	490		0.5																			
Combined endosulfans(SUM) Endosulfan I + II + sulfate	340000		NA		0.239779675	ND	0.198101684	ND														

* Reported as units = ppm

Table 13 Metals	Action Level		Action Level		Unamended Sediment (Units: ppm)		Amended Sediment (Units: ppm)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030392		20030399		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp I	Q	A Comp I	Q	1 Comp I	Q	2 Comp I	Q	3 Comp I	Q	4 Comp I	Q	5 Comp I	Q	6 Comp I	Q	7 Comp I	Q
Aluminum	NA	40	200	200	11700	E	10800	E	1220		2250		1780		1470		1010		766		548	
Antimony	14000	12	20	60	0.56	BN	0.45	BN	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Arsenic	20000	2	8	10	20.3		19.0		2.8	B	2.6	B	3.4	B	5.8	B	4.7	B	7	B	7.8	B
Barium	700000	40	2,000	200	79.7	E	78.3		33	B J	12.8	B	9.3	B	10.2	B	8.6	B	10	B	7.2	B J
Beryllium	1000	1	20	5	0.79		0.74		4	ND	4	ND	4	ND	0.78	B J	1.1	B J	1.6	B J	4	ND
Cadmium	1000	1	4	5	2.59		2.97		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Calcium	NA	1000	NA	5000	6700	E	51700	E	193000	J	113000		84000	J	65000		49000		34200		28400	J
Chromium	NA	2	100	10	175.0	B	154.0		11.4		25.8		29		27.2		20.6		15.2		17.8	
Cobalt	NA	10	NA	50	8.8	E	6.7	E	4	B	50	ND	50	ND	50	ND	50	ND	50	ND	50	ND
Copper	600000	5	1000	25	159.0		135.0		121	J	62.6		43.2		34.4		28		19.6	B	23.6	B J
Iron	NA	20	300	1000	26400	E	21800	E	100	ND	100	ND	100	ND	100	ND	100	ND	100	ND	100	ND
Lead	400000	0.6	10	3	136.0		117.0		3	ND	3	ND	3	ND	3	ND	3	ND	3	ND	3	ND
Magnesium	NA	1000	NA	5000	6360	E	7190	E	20	B J	5000	ND	28.7	B J	52.3	B	47.7	B	64.6	B	104	B J
Manganese	NA	3	50	15	410	E	343	E	15	ND	15	ND	15	ND	15	ND	15	ND	15	ND	0.22	B
Mercury	14000	0.1	2	0.2	2.33		2.09		0.2	ND	0.2	ND	0.029	B	0.029	B	0.2	ND	0.2	ND	0.2	ND
Nickel	250000	8	100	40	45.1		39.5		35.5	B	8.2	B	3.3	B	2.5	B	2.9	B	2.1	B	1.3	B
Potassium	NA	1000	NA	5000	2500	E	2760		35800		4530	B	1840	B	757	B	481	B	398	B	439	B
Selenium	63000	1	50	5	1.7		1.1		3.5	B	3.9	B	3.9	B	5	ND	5	ND	5	ND	5	ND
Silver	110000	2	NA	10	5.54		4.80		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Sodium	NA	1000	50,000	5,000	8620	E	6770		217000		18500		6730		5670		6310		4980	B	5950	
Thallium	2000	2	10	10	0.54	B	0.38	B	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Vanadium	370000	10	NA	50	37.5	E	30.6	E	14.3	B	19.6	B	27.8	B J	30	B	32.8	B	29.5	B	31	B
Zinc	1500000	4	5000	20	292.0		285.0		20	ND	1.4	B	3.5	B	20	ND	2.5	B	1.6	B	1.7	B J
Cyanide, total	1100000	0.5	200	10	0.38	B	0.42	B														
%Solids					10.8		35.4															

Table 13 Dioxins	Action Level		Action Level		Unamended Sediment (Units: ppt)		Amended Sediment (Units: ppt)		MEP Extracts Units:ppt													
ASI ID #	Soil		Leachate		20030392		20030399		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg		ug/L		Comp I	Q	A Comp I	Q	1 Comp I	Q		Q		Q		Q		Q		Q	7 Comp I	Q
2,3,7,8-TCDD					13.39		10.47		2.4	ND											2.1	ND
1,2,3,7,8-PeCDD					1.27	J	1.52	J	1.4	ND											1	ND
1,2,3,4,7,8-HxCDD					1.65	J	1.31	J	1.2	ND											1.1	ND
1,2,3,6,7,8-HxCDD					7.99		9.72		1.3	ND											1.2	ND
1,2,3,7,8,9-HxCDD					5.42		6.62		1.2	ND											1.1	ND
1,2,3,4,6,7,8-HpCDD					123.80		169.37		1.2	ND											1.1	ND
OCDD					924.14		1456.24		0.98	ND											3.7	B J
2,3,7,8-TCDF					8.00	#	8.43	#	2.7	ND											2.3	ND
1,2,3,7,8-PeCDF					1.63	J	2.45		1.3	ND											0.99	ND
2,3,4,7,8-PeCDF					3.13		3.98		0.9	ND											0.78	ND
1,2,3,4,7,8-HxCDF					7.95		9.94		0.68	ND											0.56	ND
1,2,3,6,7,8-HxCDF					3.37		3.70		0.71	ND											0.57	ND
2,3,4,6,7,8-HxCDF					2.54	J	2.69		0.79	ND											0.67	ND
1,2,3,7,8,9-HxCDF					0.35	J	0.17	J	0.89	ND											0.72	ND
1,2,3,4,6,7,8-HpCDF					56.70		106.29		1	ND											0.87	ND
1,2,3,4,7,8,9-HpCDF					3.36		3.02		1.1	ND											0.94	ND
OCDF					88.76		161.20		1.5	ND											1.2	ND

NA

* = NJDEP Required detection limit
# = value from 2nd column confirmation
ND = Not detected
B = Indicates analyte detected in method blank as well as associated field sample
J = Detection limit below the reporting limit or is an estimated value
E = Estimated value

Table 14 Volatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030367		20030373		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp J	Q	A Comp J	Q	1 Comp J	Q	2 Comp J	Q	3 Comp J	Q	4 Comp J	Q	5 Comp J	Q	6 Comp J	Q	7 Comp J	Q
Chloromethane (Methyl Chloride)	520000	10	30	10	11	ND	9.6	ND														
Bromomethane	79000	10	10	10	11	ND	9.6	ND														
Vinyl chloride	2000	10	5	10	11	ND	9.6	ND														
Chloroethane	NA	10	NA	10	11	ND	9.6	ND														
Methylene chloride (Dichloromethane)	49000	10	3	10	11	ND	9.6	ND														
Acetone	1,000,000	10	700	10	73		99															
Carbon disulfide	NA	10	NA	10	2.5	J	35															
1,1-Dichloroethene	8000	10	2	10	11	ND	9.6	ND														
1,1-Dichloroethane	570000	10	50	10	11	ND	9.6	ND														
1,2-Dichloroethene (total)	NA	10	10	10	11	ND	9.6	ND														
Chloroform	19000	10	6	10	11	ND	9.6	ND														
1,2-Dichloroethane	NA	10	NA	10	11	ND	9.6	ND														
2-Butanone (MEK)	1000000	10	300	10	13		24															
1,1,1-Trichloroethane	210000	10	30	10	11	ND	9.6	ND														
Carbon tetrachloride	2000	10	2	10	11	ND	9.6	ND														
Bromodichloromethane	11000	10	1	10	11	ND	9.6	ND														
1,2-Dichloropropane	10000	10	1	10	11	ND	9.6	ND														
cis-1,3-Dichloropropene	NA	10	NA	10	11	ND	9.6	ND														
Trichloroethene	23000	10	1	10	11	ND	9.6	ND														
Dibromochloromethane	110000	10	10	10	11	ND	9.6	ND														
1,1,2-Trichloroethane	22000	10	3	10	11	ND	9.6	ND														
Benzene	3000	10	1	10	2	J	3.9	J														
trans-1,3-dichloropropene	NA	10	NA	10	11	ND	9.6	ND														
Bromoform	86000	10	4	10	11	ND	9.6	ND														
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10	11	ND	9.6	ND														
2-Hexanone	NA	10	NA	10	11	ND	9.6	ND														
Tetrachloroethene	4000	10	1	10	11	ND	9.6	ND														
1,1,2,2-Tetrachloroethane	NA	10	NA	10	11	ND	9.6	ND														
Toluene	1000000	10	1000	10	11	ND	9.6	ND														
Chlorobenzene	37000	10	50	10	11	ND	9.6	ND														
Ethyl benzene	1000000	10	700	10	11	ND	9.6	ND														
Styrene	23000	10	100	10	11	ND	9.6	ND														
Xylenes(Total)	410000	10	1000	10	3	J	2.6	J														

Table 14 Semivolatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030367		20030373		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp J	Q	A Comp J	Q	1 Comp J	Q	2 Comp J	Q	3 Comp J	Q	4 Comp J	Q	5 Comp J	Q	6 Comp J	Q	7 Comp J	Q
Phenol	10,000,000	660	4,000	10	1800	ND	1600	ND	0.0019	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethyl)ether	660	660	10	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Chlorophenol	2000	660	5	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,3-Dichlorobenzene	5100000	660	600	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,4-Dichlorobenzene	570000	660	75	10	163.01		119.54	B	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,2-Dichlorobenzene	5100000	660	600	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Methylphenol	2800000	660	NA	10	1800	ND	1600	ND	0.0033	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
1-Chloropropane-2,2'-oxybis	2300000	660	300	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Methylphenol	2800000	660	NA	10	1800	ND	1600	ND	0.0058	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
N-Nitroso-Di-N-Propylamine	660	660	20	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachloroethane	6000	660	10	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Nitrobenzene	28000	660	10	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Isophorone	1100000	660	100	10	1800	ND	1600	ND	0.00084	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Nitrophenol	NA	660	NA	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dimethylphenol	1100000	660	100	10	1800	ND	140	J	0.0039	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethoxy)methane	NA	660	NA	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dichlorophenol	170000	660	20	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,2,4-Trichlorobenzene	68000	660	9	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Naphthalene	230000	660	300	10	649.59	B	301.74	B	0.00077	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0037	J B	0.0095	ND	0.0096	ND
4-Chloroaniline	230000	1300	NA	20	410	J	430	J	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachloro-1,3-butadiene	NA	660	NA	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Chloro-3-methylphenol	10,000,000	1300	NA	20	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Methylnaphthalene	NA	660	NA	10	220	J	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachlorocyclopentadiene	400000	660	50	10	3700	ND	3200	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
2,4,6-Trichlorophenol	62000	660	20	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4,5-Trichlorophenol	5600000	660	700	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Chloronaphthalene	NA	660	NA	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Nitroaniline	NA	3,300	NA	50	8900	ND	7700	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Dimethylphthalate	10,000,000	660	NA	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Acenaphthylene	NA	660	NA	10	164.7		101.2		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,6-Dinitrotoluene	1000	660	10	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
3-Nitroaniline	NA	3300	NA	50	8900	ND	7700	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND

Table 14 Semivolatiles continued	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030367		20030373		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp J	Q	A Comp J	Q	1 Comp J	Q	2 Comp J	Q	3 Comp J	Q	4 Comp J	Q	5 Comp J	Q	6 Comp J	Q	7 Comp J	Q
Acenaphthene	3400000	660	400	10	128.66	B	75.5		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dinitrophenol	110000	3300	40	50	8900	ND	7700	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
4-Nitrophenol	NA	3300	NA	50	8900	ND	7700	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Dibenzofuran	NA	660	NA	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dinitrotoluene	1000	660	10	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Diethylphthalate	10,000,000	660	5,000	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.00097	J	0.0095	ND	0.0096	ND
4-Chlorophenyl-phenylether	NA	660	NA	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Fluorene	2300000	660	300	10	212.03		140.7		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Nitroaniline	NA	830	NA	20	4600	ND	4000	ND	0.02	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
4,6-Dinitro-2-methylphenol	NA	3300	NA	50	8900	ND	7700	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
N-Nitrosodiphenylamine	140000	660	20	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Bromophenyl-phenylether	NA	660	NA	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachlorobenzene	660	660	10	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Pentachlorophenol	6000	3300	1	50	8900	ND	7700	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Phenanthrene	NA	6600	NA	10	808.26		593.19	B	0.0098	ND	0.0097	ND	0.00049	J	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Anthracene	10000000	6600	2000	10	459.34		350.35		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Carbazole	NA	330	NA	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Di-n-butylphthalate	5700000	330	900	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.00064	J	0.0014	J	0.0097	ND	0.0095	ND	0.0096	ND
Fluoranthene	2300000	660	300	10	1298.71		1291.3		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Pyrene	1700000	660	200	10	1555.81		1499.13		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Butylbenzylphthalate	1100000	660	100	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
3,3'-Dichlorobenzidine	2000	1300	60	20	7200	ND	6200	ND	0.02	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
Benzo(a)anthracene	900	660	NA	10	[illegible]		[illegible]		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Chrysene	9000	660	NA	10	966.35		1023.89		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
bis(2-Ethylhexyl)phthalate	49000	660	30	10	6000		3700		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Di-n-octylphthalate	1100000	660	100	10	1800	ND	1600	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(b)fluoranthene	900	660	NA	10	770.02		669.18		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(k)fluoranthene	900	660	NA	10	748.63		494.39		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(a)pyrene	660	660	NA	10	[illegible]		[illegible]		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Indeno(1,2,3-cd)pyrene	900	660	NA	10	637.68		511.18		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Dibenzo(a,h)anthracene	660	660	NA	10	177.77		160.44		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(ghi)perylene	NA	660	NA	10	549.83		436.27		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND

Table 14 Pesticides/Arochlors	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030367		20030373		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp J	Q	A Comp J	Q	1 Comp J	Q	2 Comp J	Q	3 Comp J	Q	4 Comp J	Q	5 Comp J	Q	6 Comp J	Q	7 Comp J	Q
alpha-BHC	NA	1.9	0.02	0.05	9.4	ND	16	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
beta-BHC	NA	3.3	0.2	0.05	9.4	ND	16	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
delta-BHC	NA	1.7	NA	0.05	9.4	ND	16	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
gamma-BHC (Lindane)	520	2	0.2	0.05	9.4	ND	16	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
Heptachlor	150	2.1	0.4	0.05	0.13	ND	0.11	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
Aldrin	40	2	0.04	0.05	0.10	ND	0.09	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	0.12	ND	0.10	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
Endosulfan I		2.1	0.4	0.05	0.17	ND	0.14	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
Dieldrin	42	3.3	0.03	0.10	5.69		2.17		0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
4,4'-DDE	2000	4.2	0.1	0.10	52.30	D	22.47	D	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.021	J	0.0082	J
Endrin	17000	3.6	2	0.10	9.4	ND	16	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
Endosulfan II		3.3	0.4	0.10	0.16	ND	0.13	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
4,4'-DDD	381000	4.2	0.1	0.10	34.55		15.53		0.016	J PG	0.015	J PG	0.05	ND	0.018	J PG	0.028	J	0.013	J PG	0.05	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.17	ND	0.14	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
4,4'-DDT	2000	3.6	0.1	0.10	6.58		15.06		0.025	J	0.0095	J PG	0.05	ND	0.0056	J PG	0.007	J PG	0.034	J	0.05	ND
Methoxychlor	280000	17	40	0.50	18	ND	32	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.098	ND	0.1	ND
Endrin ketone	NA	3.3	NA	0.10	9.4	ND	16	ND	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
Endrin aldehyde	NA	3.3	NA	0.10	9.4	ND	16	ND	0.011	J	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
alpha-Chlordane	500	1.7	NA	0.05	3.41		1.41		0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
gamma-Chlordane	NA	1.7	0.5	0.05	3.7	J PG	2	J PG	0.05	ND	0.052	ND	0.05	ND	0.05	ND	0.051	ND	0.049	ND	0.05	ND
Toxaphene	100	170	3	5.00	370	ND	640	ND	2	ND	2.1	ND	2	ND	2	ND	2	ND	2	ND	2	ND
Arochlor-1016 *		33		1.00	37	ND	32	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.98	ND	1	ND
Arochlor-1221 *		67		2.00	37	ND	32	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.98	ND	1	ND
Arochlor-1232 *		33		1.00	37	ND	32	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.98	ND	1	ND
Arochlor-1242 *		33		1.00	37	ND	32	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.98	ND	1	ND
Arochlor-1248 *		33		1.00	740		390		1	ND	1	ND	1	ND	1	ND	1	ND	0.98	ND	1	ND
Arochlor-1254 *		33		1.00	510		32	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.98	ND	1	ND
Arochlor-1260 *		33		1.00	390		32	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.98	ND	1	ND
Total Arochlor(SUM)	490		0.5																			
Combined endosulfans(SUM) Endosulfan I + II + sulfate	340000		NA		0.249842213	ND	0.207077459	ND														

* Reported as units = ppm

Table 14 Metals	Action Level		Action Level		Unamended Sediment (Units: ppm)		Amended Sediment (Units: ppm)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030367		20030373		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp J	Q	A Comp J	Q	1 Comp J	Q	2 Comp J	Q	3 Comp J	Q	4 Comp J	Q	5 Comp J	Q	6 Comp J	Q	7 Comp J	Q
Aluminum	NA	40	200	200	12100	E	11300	E	1210		2250		2120		1520		1150		1090		864	
Antimony	14000	12	20	60	0.94	BN	0.66	BN	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Arsenic	20000	2	8	10	25.4		21.5		2.9	B	3.5	B	10	ND	4.9	B	3.9	B	3.4	B	4.7	B
Barium	700000	40	2,000	200	112	E	96		34.8	B J	14.9	B	9.7	B	9.1	B	7.8	B	12.1	B	9.3	B J
Beryllium	1000	1	20	5	0.81		0.75		4	ND	4	ND	4	ND	0.48	B J	0.88	B J	1.5	B J	4	ND
Cadmium	1000	1	4	5	6.48		5.96		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Calcium	NA	1000	NA	5000	5930	E	40500	E	208000	J	122000		93500	J	76800		57100		41100		34400	J
Chromium	NA	2	100	10	277.0	B	220		8		33.8		42.8		44.5		34.1		25.1		27.2	
Cobalt	NA	10	NA	50	9.2	E	7.3	E	3.2	B	0.84	B	50	ND	50	ND	50	ND	50	ND	50	ND
Copper	600000	5	1000	25	248.0		200.0		93.1	J	83.4		61.1		55		40.9		28		31.4	J
Iron	NA	20	300	1000	28000	E	23100	E	100	ND	100	ND	100	ND	100	ND	100	ND	100	ND	100	ND
Lead	400000	0.6	10	3	207.0		184.0		3	ND	3	ND	3	ND	3	ND	3	ND	3	ND	3	ND
Magnesium	NA	1000	NA	5000	6820	E	7160	E	18.5	B J	5000	ND	24.6	B J	37.3	B	41.1	B	82.6	B	98.4	B J
Manganese	NA	3	50	15	375	E	335	E	15	ND	15	ND	15	ND	15	ND	15	ND	15	ND	15	ND
Mercury	14000	0.1	2	0.2	4.27		3.57		0.059	B	0.2	ND	0.2	ND	0.2	ND	0.047	B	0.2	ND	0.2	ND
Nickel	250000	8	100	40	55.6		49.4		48.6		16.2	B	6.4	B	4.9	B	3.4	B	1.2	B	2.1	B
Potassium	NA	1000	NA	5000	2710	E	2900		37900		5980		2430	B	1510	B	692	B	455	B	465	B
Selenium	63000	1	50	5	2		1.4		4.1	B	5.1		3.4	B	5	ND	3	B	2.5	B	2.4	B
Silver	110000	2	NA	10	9.14		7.19		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Sodium	NA	1000	50,000	5,000	10400	E	8120		253000		22700		7860		5130		4550	B	11800		7640	
Thallium	2000	2	10	10	1.1	ND	0.58	B	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Vanadium	370000	10	NA	50	46.1	E	36.5	E	15.1	B	18.9	B	25.2	B J	30.6	B	29.9	B	29.4	B	34.3	B
Zinc	1500000	4	5000	20	477.0		423.0		20	ND	7.5	B	20	ND	20	ND	20	ND	2.5	B	1.8	B J
Cyanide, total	1100000	0.5	200	10	1.1	ND	0.55	B														
%Solids					45		52.3															

Table 14 Dioxins	Action Level		Action Level		Unamended Sediment (Units: ppt)		Amended Sediment (Units: ppt)		MEP Extracts Units:ppt													
ASI ID #	Soil		Leachate		20030367		20030373		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg		ug/L		Comp J	Q	A Comp J	Q	1 Comp J	Q		Q		Q		Q		Q		Q	7 Comp J	Q
2,3,7,8-TCDD					17.41		44.56		3.1	ND											1.7	ND
1,2,3,7,8-PeCDD					2.19	J	3.74	J	1.8	ND											0.84	ND
1,2,3,4,7,8-HxCDD					1.68	J	2.22	J	1.6	ND											0.97	ND
1,2,3,6,7,8-HxCDD					11.30		29.75		1.7	ND											1.1	ND
1,2,3,7,8,9-HxCDD					6.55		17.16		1.5	ND											0.97	ND
1,2,3,4,6,7,8-HpCDD					189.99		560.22		1.2	ND											0.88	J
OCDD					1492.20		4801.19		1.2	ND											2.7	B J
2,3,7,8-TCDF					13.80	#	20.38	#	3.1	ND											1.8	ND
1,2,3,7,8-PeCDF					2.97		6.23		1.5	ND											0.81	ND
2,3,4,7,8-PeCDF					4.44		9.56		1.1	ND											0.62	ND
1,2,3,4,7,8-HxCDF					11.63		23.07		0.9	ND											0.45	ND
1,2,3,6,7,8-HxCDF					4.12		9.22		0.87	ND											0.44	ND
2,3,4,6,7,8-HxCDF					2.48	J	6.48		1	ND											0.49	ND
1,2,3,7,8,9-HxCDF					0.07	J	0.27	J	1.1	ND											0.53	ND
1,2,3,4,6,7,8-HpCDF					79.34		168.13		1.4	ND											0.67	ND
1,2,3,4,7,8,9-HpCDF					3.44		6.44		1.6	ND											0.69	ND
OCDF					137.19		300.88		1.8	ND											2.6	B J

NA

* = NJDEP Required detection limit

# = value from 2nd column confirmation
ND = Not detected
B = Indicates analyte detected in method blank as well as associated field sample
J = Detection limit below the reporting limit or is an estimated value
E = Estimated value

Table 15 Volatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030368		20030374		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp K	Q	A Comp K	Q	1 Comp K	Q	2 Comp K	Q	3 Comp K	Q	4 Comp K	Q	5 Comp K	Q	6 Comp K	Q	7 Comp K	Q
Chloromethane (Methyl Chloride)	520000	10	30	10	10	ND	8.5	ND														
Bromomethane	79000	10	10	10	10	ND	8.5	ND														
Vinyl chloride	2000	10	5	10	10	ND	8.5	ND														
Chloroethane	NA	10	NA	10	10	ND	8.5	ND														
Methylene chloride (Dichloromethane)	49000	10	3	10	18	B	9.2	B														
Acetone	1,000,000	10	700	10	46		80															
Carbon disulfide	NA	10	NA	10	7.2	J	26															
1,1-Dichloroethene	8000	10	2	10	10	ND	8.5	ND														
1,1-Dichloroethane	570000	10	50	10	10	ND	8.5	ND														
1,2-Dichloroethene (total)	NA	10	10	10	10	ND	8.5	ND														
Chloroform	19000	10	6	10	10	ND	8.5	ND														
1,2-Dichloroethane	NA	10	NA	10	10	ND	8.5	ND														
2-Butanone (MEK)	1000000	10	300	10	14		20															
1,1,1-Trichloroethane	210000	10	30	10	10	ND	8.5	ND														
Carbon tetrachloride	2000	10	2	10	10	ND	8.5	ND														
Bromodichloromethane	11000	10	1	10	10	ND	8.5	ND														
1,2-Dichloropropane	10000	10	1	10	10	ND	8.5	ND														
cis-1,3-Dichloropropene	NA	10	NA	10	10	ND	8.5	ND														
Trichloroethene	23000	10	1	10	10	ND	8.5	ND														
Dibromochloromethane	110000	10	10	10	10	ND	8.5	ND														
1,1,2-Trichloroethane	22000	10	3	10	10	ND	8.5	ND														
Benzene	3000	10	1	10	1.6	J	2.8	J														
trans-1,3-dichloropropene	NA	10	NA	10	10	ND	8.5	ND														
Bromoform	86000	10	4	10	10	ND	8.5	ND														
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10	10	ND	8.5	ND														
2-Hexanone	NA	10	NA	10	10	ND	8.5	ND														
Tetrachloroethene	4000	10	1	10	10	ND	8.5	ND														
1,1,2,2-Tetrachloroethane	NA	10	NA	10	10	ND	8.5	ND														
Toluene	1000000	10	1000	10	10	ND	8.5	ND														
Chlorobenzene	37000	10	50	10	10	ND	8.5	ND														
Ethyl benzene	1000000	10	700	10	10	ND	0.91	J														
Styrene	23000	10	100	10	10	ND	8.5	ND														
Xylenes(Total)	410000	10	1000	10	4	J	4.4	J														

Table 15 Semivolatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030368		20030374		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp K	Q	A Comp K	Q	1 Comp K	Q	2 Comp K	Q	3 Comp K	Q	4 Comp K	Q	5 Comp K	Q	6 Comp K	Q	7 Comp K	Q
Phenol	10,000,000	660	4,000	10	1700	ND	1400	ND	0.002	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethyl)ether	660	660	10	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Chlorophenol	2000	660	5	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,3-Dichlorobenzene	5100000	660	600	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,4-Dichlorobenzene	570000	660	75	10	147.01		106.95	B	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,2-Dichlorobenzene	5100000	660	600	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Methylphenol	2800000	660	NA	10	1700	ND	1400	ND	0.0035	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
1-Chloropropane-2,2'-oxybis	2300000	660	300	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Methylphenol	2800000	660	NA	10	1700	ND	1400	ND	0.0072	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
N-Nitroso-Di-N-Propylamine	660	660	20	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachloroethane	6000	660	10	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Nitrobenzene	28000	660	10	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Isophorone	1100000	660	100	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Nitrophenol	NA	660	NA	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dimethylphenol	1100000	660	100	10	1700	ND	150	J	0.0054	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethoxy)methane	NA	660	NA	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dichlorophenol	170000	660	20	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
1,2,4-Trichlorobenzene	68000	660	9	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Naphthalene	230000	660	300	10	307.98	B	210.77	B	0.0023	J	0.0009	J	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Chloroaniline	230000	1300	NA	20	210	J	230	J	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachloro-1,3-butadiene	NA	660	NA	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Chloro-3-methylphenol	10,000,000	1300	NA	20	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Methylnaphthalene	NA	660	NA	10	1700	ND	160	J	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachlorocyclopentadiene	400000	660	50	10	3400	ND	2800	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
2,4,6-Trichlorophenol	62000	660	20	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4,5-Trichlorophenol	5600000	660	700	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Chloronaphthalene	NA	660	NA	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2-Nitroaniline	NA	3,300	NA	50	8100	ND	6800	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Dimethylphthalate	10,000,000	660	NA	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Acenaphthylene	NA	660	NA	10	149.22		93.78		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,6-Dinitrotoluene	1000	660	10	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
3-Nitroaniline	NA	3300	NA	50	8100	ND	6800	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND

Table 15 Semivolatiles continued	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030368		20030374		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp K	Q	A Comp K	Q	1 Comp K	Q	2 Comp K	Q	3 Comp K	Q	4 Comp K	Q	5 Comp K	Q	6 Comp K	Q	7 Comp K	Q
Acenaphthene	3400000	660	400	10	121.67	B	70.18		0.0011	J	0.00074	J	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dinitrophenol	110000	3300	40	50	8100	ND	6800	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
4-Nitrophenol	NA	3300	NA	50	8100	ND	6800	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Dibenzofuran	NA	660	NA	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
2,4-Dinitrotoluene	1000	660	10	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Diethylphthalate	10,000,000	660	5,000	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0008	J	0.0095	ND	0.0096	ND
4-Chlorophenyl-phenylether	NA	660	NA	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Fluorene	2300000	660	300	10	185.48		125.33		0.00063	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Nitroaniline	NA	830	NA	20	4200	ND	3500	ND	0.02	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
4,6-Dinitro-2-methylphenol	NA	3300	NA	50	8100	ND	6800	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
N-Nitrosodiphenylamine	140000	660	20	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
4-Bromophenyl-phenylether	NA	660	NA	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Hexachlorobenzene	660	660	10	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Pentachlorophenol	6000	3300	1	50	8100	ND	6800	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND
Phenanthrene	NA	6600	NA	10	702.87		453.94	B	0.00091	J	0.00069	J	0.00083	J	0.00053	J	0.00063	J	0.00068	J	0.00076	J
Anthracene	10000000	6600	2000	10	411.95		298.3		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Carbazole	NA	330	NA	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Di-n-butylphthalate	5700000	330	900	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Fluoranthene	2300000	660	300	10	1204.14		772.9		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Pyrene	1700000	660	200	10	1458.61		958.82		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Butylbenzylphthalate	1100000	660	100	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
3,3'-Dichlorobenzidine	2000	1300	60	20	6600	ND	5500	ND	0.02	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
Benzo(a)anthracene	900	660	NA	10	874.34		560.2		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Chrysene	9000	660	NA	10	884.05		584.8		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
bis(2-Ethylhexyl)phthalate	49000	660	30	10	4000		2600		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Di-n-octylphthalate	1100000	660	100	10	1700	ND	1400	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(b)fluoranthene	900	660	NA	10	713.22		503.32		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(k)fluoranthene	900	660	NA	10	677.92		431.46		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(a)pyrene	660	660	NA	10	[illegible]		640.58		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Indeno(1,2,3-cd)pyrene	900	660	NA	10	579.67		437.38		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Dibenzo(a,h)anthracene	660	660	NA	10	155.49		128.3		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND
Benzo(ghi)perylene	NA	660	NA	10	515.24		364.97		0.0098	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0095	ND	0.0096	ND

Table 15 Pesticides/Arochlors	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030368		20030374		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp K	Q	A Comp K	Q	1 Comp K	Q	2 Comp K	Q	3 Comp K	Q	4 Comp K	Q	5 Comp K	Q	6 Comp K	Q	7 Comp K	Q
alpha-BHC	NA	1.9	0.02	0.05	1.2	J	5.8	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
beta-BHC	NA	3.3	0.2	0.05	6.9	ND	5.8	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
delta-BHC	NA	1.7	NA	0.05	6.9	ND	5.8	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
gamma-BHC (Lindane)	520	2	0.2	0.05	6.9	ND	5.8	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
Heptachlor	150	2.1	0.4	0.05	0.13	ND	0.11	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
Aldrin	40	2	0.04	0.05	0.10	ND	0.09	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	0.12	ND	0.10	ND	0.05	ND	0.05	ND	0.0038	J PG	0.05	ND	0.05	ND	0.048	ND	0.05	ND
Endosulfan I		2.1	0.4	0.05	0.16	ND	0.14	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
Dieldrin	42	3.3	0.03	0.10	1.64		1.81		0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
4,4'-DDE	2000	4.2	0.1	0.10	32.07	D	20.04	D	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
Endrin	17000	3.6	2	0.10	6.9	ND	2.1	J PG	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
Endosulfan II		3.3	0.4	0.10	0.15	ND	0.14	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
4,4'-DDD	381000	4.2	0.1	0.10	16.99		16.49		0.011	J PG	0.013	J PG	0.05	ND	0.015	J	0.012	J PG	0.013	J	0.05	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.16	ND	0.14	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
4,4'-DDT	2000	3.6	0.1	0.10	5.19		23.23		0.017	J PG	0.012	J PG	0.05	ND	0.0096	J PG	0.012	J PG	0.026	J	0.05	ND
Methoxychlor	280000	17	40	0.50	13	ND	11	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.028	J PG	0.052	J
Endrin ketone	NA	3.3	NA	0.10	6.9	ND	2	J PG	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
Endrin aldehyde	NA	3.3	NA	0.10	6.9	ND	5.8		0.0095	J	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
alpha-Chlordane	500	1.7	NA	0.05	2.29		0.95		0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
gamma-Chlordane	NA	1.7	0.5	0.05	2.5	J PG	1.8	J PG	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.048	ND	0.05	ND
Toxaphene	100	170	3	5.00	270	ND	230	ND	2	ND	2	ND	2	ND	2	ND	2	ND	1.9	ND	2	ND
Arochlor-1016 *		33		1.00	34	ND	28	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.97	ND	1	ND
Arochlor-1221 *		67		2.00	34	ND	28	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.97	ND	1	ND
Arochlor-1232 *		33		1.00	34	ND	28	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.97	ND	1	ND
Arochlor-1242 *		33		1.00	34	ND	28	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.97	ND	1	ND
Arochlor-1248 *		33		1.00	500		520		1	ND	1	ND	1	ND	1	ND	1	ND	0.97	ND	1	ND
Arochlor-1254 *		33		1.00	310		280		1	ND	1	ND	1	ND	1	ND	1	ND	0.97	ND	1	ND
Arochlor-1260 *		33		1.00	240		28	ND	1	ND	1	ND	1	ND	1	ND	1	ND	0.97	ND	1	ND
Total Arochlor(SUM)	490		0.5																			
Combined endosulfans(SUM) Endosulfan I + II + sulfate	340000		NA		0.23541324	U	0.20879753	U														

* Reported as units = ppm

Table 15 Metals	Action Level		Action Level		Unamended Sediment (Units: ppm)		Amended Sediment (Units: ppm)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030368		20030374		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp K	Q	A Comp K	Q	1 Comp K	Q	2 Comp K	Q	3 Comp K	Q	4 Comp K	Q	5 Comp K	Q	6 Comp K	Q	7 Comp K	Q
Aluminum	NA	40	200	200	10800	E	9740	E	856		2070		2570		1980		1460		1280		1430	
Antimony	14000	12	20	60	0.75	BN	0.57	BN	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Arsenic	20000	2	8	10	23.4		22.3		10	ND	2.6	B	3.2	B	3.6	B	4.1	B	4	B	10	ND
Barium	700000	40	2,000	200	103	E	90.9		77.9	B J	23	B	13.2	B	13.2	B	11.7	B	8.4	B	21	B J
Beryllium	1000	1	20	5	0.73		0.65		4	ND	4	ND	4	ND	0.51	B J	0.94	B J	1.5	B J	4	ND
Cadmium	1000	1	4	5	5.87		5.13		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Calcium	NA	1000	NA	5000	4840	E	52300	E	259000	J	144000		103000	J	86900		66500		50300		44400	J
Chromium	NA	2	100	10	227.0	B	200		22.9		45.5		50		50.7		38.5		27.9		29.8	
Cobalt	NA	10	NA	50	8.8	E	5.9	E	4.4	B	0.81	B	50	ND	50	ND	50	ND	50	ND	50	ND
Copper	600000	5	1000	25	206.0		195.0		222	J	81.5		52.9		45.2		33.5		24.6	B	23.5	B J
Iron	NA	20	300	1000	24700	E	18600	E	100	ND	100	ND	100	ND	100	ND	100	ND	100	ND	100	ND
Lead	400000	0.6	10	3	188.0		177.0		3	ND	3	ND	3	ND	3	ND	3	ND	3	ND	3	ND
Magnesium	NA	1000	NA	5000	6060	E	6620	E	18.8	B J	5000	ND	20	B J	35.5	B	32.5	B	47.3	B	110	B J
Manganese	NA	3	50	15	305	E	249	E	15	ND	15	ND	15	ND	15	ND	15	ND	15	ND	15	ND
Mercury	14000	0.1	2	0.2	4.3		3.88		0.2	ND	0.2	ND	0.2	ND	0.2	ND	0.036	B	0.2	ND	0.2	ND
Nickel	250000	8	100	40	49.1		50.6		63		14.4	B	5.3	B	4.6	B	3.3	B	1.6	B	1.8	B
Potassium	NA	1000	NA	5000	2420	E	2430		43900		4500	B	1530	B	872	B	495	B	311	B	349	B
Selenium	63000	1	50	5	1.8		1.2		3.3	B	5.7		2.7	B	5	ND	2.6	B	5	ND	3.2	B
Silver	110000	2	NA	10	6.59		6.38		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Sodium	NA	1000	50,000	5,000	9200	E	6300		217000		16400		5780		5730		5390		4970	B	14300	
Thallium	2000	2	10	10	1	ND	0.64	B	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Vanadium	370000	10	NA	50	39.8	E	31.3	E	9.2	B	13	B	15.7	B J	19.1	B	23	B	25.6	B	27.9	B
Zinc	1500000	4	5000	20	479.0		447.0		20	ND	4.9	B	20	ND	8.9	B	1.6	B	20	ND	1.8	B J
Cyanide, total	1100000	0.5	200	10	1	ND	0.37	B														
%Solids					49.1		58.9															

Table 15 Dioxins	Action Level		Action Level		Unamended Sediment (Units: ppt)		Amended Sediment (Units: ppt)		MEP Extracts Units:ppt													
ASI ID #	Soil		Leachate		20030368		20030374		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg		ug/L		Comp K	Q	A Comp K	Q	1 Comp K	Q		Q		Q		Q		Q		Q	7 Comp K	Q
2,3,7,8-TCDD					13.47		23.02		2.5	ND											2.1	ND
1,2,3,7,8-PeCDD					1.65	J	2.96	J	1.3	ND											1.2	ND
1,2,3,4,7,8-HxCDD					1.23	J	1.53	J	1.5	ND											1.3	ND
1,2,3,6,7,8-HxCDD					10.59		16.61		1.7	ND											1.3	ND
1,2,3,7,8,9-HxCDD					6.42		9.38		1.5	ND											1.2	ND
1,2,3,4,6,7,8-HpCDD					171.23		298.41		1.1	ND											1.2	ND
OCDD					1555.02		2858.98		3	B J											1.9	Q B J
2,3,7,8-TCDF					8.82	#	12.81	#	2.7	ND											2.2	ND
1,2,3,7,8-PeCDF					2.76		4.58		1.2	ND											1.1	ND
2,3,4,7,8-PeCDF					4.45		6.16		0.82	ND											0.86	ND
1,2,3,4,7,8-HxCDF					12.70		20.70		0.73	ND											0.71	ND
1,2,3,6,7,8-HxCDF					4.72		7.66		0.74	ND											0.71	ND
2,3,4,6,7,8-HxCDF					2.88		4.63		0.87	ND											0.74	ND
1,2,3,7,8,9-HxCDF					0.22	J	0.23	J	0.89	ND											0.88	ND
1,2,3,4,6,7,8-HpCDF					81.61		135.98		1.2	ND											0.91	ND
1,2,3,4,7,8,9-HpCDF					3.11		4.90		1.2	ND											1.1	ND
OCDF					119.00		195.90		1.9	ND											1.9	ND

NA

* = NJDEP Required detection limit
# = value from 2nd column confirmation
ND = Not detected
B = Indicates analyte detected in method blank as well as associated field sample
J = Detection limit below the reporting limit or is an estimated value
E = Estimated value

Table 16 Volatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030393		20030400		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp L	Q	A Comp L	Q	1 Comp L	Q	2 Comp L	Q	3 Comp L	Q	4 Comp L	Q	5 Comp L	Q	6 Comp L	Q	7 Comp L	Q
Chloromethane (Methyl Chloride)	520000	10	30	10	6.9	ND	6.5	ND														
Bromomethane	79000	10	10	10	6.9	ND	6.5	ND														
Vinyl chloride	2000	10	5	10	6.9	ND	6.5	ND														
Chloroethane	NA	10	NA	10	6.9	ND	6.5	ND														
Methylene chloride (Dichloromethane)	49000	10	3	10	1.6	J	41	B														
Acetone	1,000,000	10	700	10	21		80															
Carbon disulfide	NA	10	NA	10	1.6	J	34															
1,1-Dichloroethene	8000	10	2	10	6.9	ND	6.5	ND														
1,1-Dichloroethane	570000	10	50	10	6.9	ND	6.5	ND														
1,2-Dichloroethene (total)	NA	10	10	10	6.9	ND	6.5	ND														
Chloroform	19000	10	6	10	6.9	ND	6.5	ND														
1,2-Dichloroethane	NA	10	NA	10	6.9	ND	6.5	ND														
2-Butanone (MEK)	1000000	10	300	10	3.7	J	18															
1,1,1-Trichloroethane	210000	10	30	10	6.9	ND	6.5	ND														
Carbon tetrachloride	2000	10	2	10	6.9	ND	6.5	ND														
Bromodichloromethane	11000	10	1	10	6.9	ND	6.5	ND														
1,2-Dichloropropane	10000	10	1	10	6.9	ND	6.5	ND														
cis-1,3-Dichloropropene	NA	10	NA	10	6.9	ND	6.5	ND														
Trichloroethene	23000	10	1	10	6.9	ND	6.5	ND														
Dibromochloromethane	110000	10	10	10	6.9	ND	6.5	ND														
1,1,2-Trichloroethane	22000	10	3	10	6.9	ND	6.5	ND														
Benzene	3000	10	1	10	6.9	ND	6.5	ND														
trans-1,3-dichloropropene	NA	10	NA	10	6.9	ND	6.5	ND														
Bromoform	86000	10	4	10	6.9	ND	6.5	ND														
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10	6.9	ND	6.5	ND														
2-Hexanone	NA	10	NA	10	6.9	ND	6.5	ND														
Tetrachloroethene	4000	10	1	10	6.9	ND	6.5	ND														
1,1,2,2-Tetrachloroethane	NA	10	NA	10	6.9	ND	6.5	ND														
Toluene	1000000	10	1000	10	6.9	ND	6.5	ND														
Chlorobenzene	37000	10	50	10	6.9	ND	6.5	ND														
Ethyl benzene	1000000	10	700	10	6.9	ND	6.5	ND														
Styrene	23000	10	100	10	6.9	ND	6.5	ND														
Xylenes(Total)	410000	10	1000	10	6.9	ND	6.5	ND														

Table 16 Semivolatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030393		20030400		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp L	Q	A Comp L	Q	1 Comp L	Q	2 Comp L	Q	3 Comp L	Q	4 Comp L	Q	5 Comp L	Q	6 Comp L	Q	7 Comp L	Q
Phenol	10,000,000	660	4,000	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethyl)ether	660	660	10	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2-Chlorophenol	2000	660	5	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
1,3-Dichlorobenzene	5100000	660	600	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
1,4-Dichlorobenzene	570000	660	75	10	12.33		12.96	B	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
1,2-Dichlorobenzene	5100000	660	600	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2-Methylphenol	2800000	660	NA	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
1-Chloropropane-2,2'-oxybis	2300000	660	300	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
4-Methylphenol	2800000	660	NA	10	1100	ND	430	ND	0.004	J	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
N-Nitroso-Di-N-Propylamine	660	660	20	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Hexachloroethane	6000	660	10	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Nitrobenzene	28000	660	10	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Isophorone	1100000	660	100	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2-Nitrophenol	NA	660	NA	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2,4-Dimethylphenol	1100000	660	100	10	1100	ND	430	ND	0.0023	J	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
bis(2-Chloroethoxy)methane	NA	660	NA	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2,4-Dichlorophenol	170000	660	20	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
1,2,4-Trichlorobenzene	68000	660	9	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Naphthalene	230000	660	300	10	126.77	B	126.67	B	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0014	J B	0.0095	ND	0.0096	ND
4-Chloroaniline	230000	1300	NA	20	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Hexachloro-1,3-butadiene	NA	660	NA	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
4-Chloro-3-methylphenol	10,000,000	1300	NA	20	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2-Methylnaphthalene	NA	660	NA	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Hexachlorocyclopentadiene	400000	660	50	10	2300	ND	860	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND
2,4,6-Trichlorophenol	62000	660	20	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2,4,5-Trichlorophenol	5600000	660	700	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2-Chloronaphthalene	NA	660	NA	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2-Nitroaniline	NA	3,300	NA	50	5500	ND	2100	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND
Dimethylphthalate	10,000,000	660	NA	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Acenaphthylene	NA	660	NA	10	94.34		87.89		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2,6-Dinitrotoluene	1000	660	10	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
3-Nitroaniline	NA	3300	NA	50	5500	ND	2100	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND

Table 16 Semivolatiles continued	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030393		20030400		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp L	Q	A Comp L	Q	1 Comp L	Q	2 Comp L	Q	3 Comp L	Q	4 Comp L	Q	5 Comp L	Q	6 Comp L	Q	7 Comp L	Q
Acenaphthene	3400000	660	400	10	44.75	B	44.85		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2,4-Dinitrophenol	110000	3300	40	50	5500	ND	2100	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND
4-Nitrophenol	NA	3300	NA	50	5500	ND	2100	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND
Dibenzofuran	NA	660	NA	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
2,4-Dinitrotoluene	1000	660	10	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Diethylphthalate	10,000,000	660	5,000	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
4-Chlorophenyl-phenylether	NA	660	NA	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Fluorene	2300000	660	300	10	41.03		50.61		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
4-Nitroaniline	NA	830	NA	20	2800	ND	1100	ND	0.02	ND	0.019	ND	0.019	ND	0.019	ND	0.02	ND	0.019	ND	0.019	ND
4,6-Dinitro-2-methylphenol	NA	3300	NA	50	5500	ND	2100	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND
N-Nitrosodiphenylamine	140000	660	20	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
4-Bromophenyl-phenylether	NA	660	NA	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Hexachlorobenzene	660	660	10	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Pentachlorophenol	6000	3300	1	50	5500	ND	2100	ND	0.049	ND	0.048	ND	0.048	ND	0.048	ND	0.049	ND	0.048	ND	0.048	ND
Phenanthrene	NA	6600	NA	10	256.06		251.28	B	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Anthracene	10000000	6600	2000	10	171.97		198.47		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Carbazole	NA	330	NA	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Di-n-butylphthalate	5700000	330	900	10	1100	ND	430	ND	0.00076	J	0.00088	J B	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Fluoranthene	2300000	660	300	10	814.01		786.21	D	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Pyrene	1700000	660	200	10	1166.46		1132.79	D	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Butylbenzylphthalate	1100000	660	100	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
3,3'-Dichlorobenzidine	2000	1300	60	20	4500	ND	1700	ND	0.02	ND	0.019	ND	0.019	ND	0.019	ND	0.02	ND	0.019	ND	0.019	ND
Benzo(a)anthracene	900	660	NA	10	546.08		651.24	D	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Chrysene	9000	660	NA	10	525.56		605.93	D	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
bis(2-Ethylhexyl)phthalate	49000	660	30	10	120	J	88	J	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Di-n-octylphthalate	1100000	660	100	10	1100	ND	430	ND	0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Benzo(b)fluoranthene	900	660	NA	10	375.62		390.84		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Benzo(k)fluoranthene	900	660	NA	10	364.38		409.17		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Benzo(a)pyrene	660	660	NA	10	550.27		603.07		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Indeno(1,2,3-cd)pyrene	900	660	NA	10	306.63		366.25		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Dibenzo(a,h))anthracene	660	660	NA	10	76.75		110.47		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND
Benzo(ghi)perylene	NA	660	NA	10	276.82		305.32		0.0098	ND	0.0097	ND	0.0096	ND	0.0096	ND	0.0098	ND	0.0095	ND	0.0096	ND

Table 16 Pesticides/Arochlors	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030393		20030400		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp L	Q	A Comp L	Q	1 Comp L	Q	2 Comp L	Q	3 Comp L	Q	4 Comp L	Q	5 Comp L	Q	6 Comp L	Q	7 Comp L	Q
alpha-BHC	NA	1.9	0.02	0.05	4.7	ND	1.1	J	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
beta-BHC	NA	3.3	0.2	0.05	4.7	ND	11	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
delta-BHC	NA	1.7	NA	0.05	4.7	ND	11	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
gamma-BHC (Lindane)	520	2	0.2	0.05	4.7	ND	11	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
Heptachlor	150	2.1	0.4	0.05	0.09	ND	0.08	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
Aldrin	40	2	0.04	0.05	0.07	ND	0.06	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	0.08	ND	0.07	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
Endosulfan I		2.1	0.4	0.05	0.11	ND	0.10	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
Dieldrin	42	3.3	0.03	0.10	0.20		0.20		0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
4,4'-DDE	2000	4.2	0.1	0.10	19.16	D	21.12	D	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
Endrin	17000	3.6	2	0.10	4.7	ND	11	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
Endosulfan II		3.3	0.4	0.10	0.11	ND	0.10	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
4,4'-DDD	381000	4.2	0.1	0.10	16.10		16.66		0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.11	ND	0.10	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
4,4'-DDT	2000	3.6	0.1	0.10	58.52	D	54.19		0.028	J PG	0.01	J PG	0.05	ND	0.05	ND	0.0053	J PG	0.05	ND	0.052	ND
Methoxychlor	280000	17	40	0.50	9.1	ND	22	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND	0.1	ND
Endrin ketone	NA	3.3	NA	0.10	4.7	ND	11	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
Endrin aldehyde	NA	3.3	NA	0.10	4.7	ND	11	ND	0.0059	J PG	0.05	ND	0.0054	J PG	0.05	ND	0.013	J PG	0.05	ND	0.0046	J
alpha-Chlordane	500	1.7	NA	0.05	0.02	J	0.18		0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
gamma-Chlordane	NA	1.7	0.5	0.05	0.52	J PG	11	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.05	ND	0.052	ND
Toxaphene	100	170	3	5.00	180	ND	440	ND	2	ND	2	ND	2	ND	2	ND	2	ND	2	ND	2.1	ND
Arochlor-1016 *		33		1.00	23	ND	22	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1221 *		67		2.00	23	ND	22	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1232 *		33		1.00	23	ND	22	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1242 *		33		1.00	23	ND	22	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1248 *		33		1.00	20	J	10	J	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1254 *		33		1.00	23	ND	31		1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Arochlor-1260 *		33		1.00	36		18	J	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1	ND
Total Arochlor(SUM)	490		0.5																			
Combined endosulfans(SUM) Endosulfan I + II + sulfate	340000		NA		0.16	ND	0.15	ND														

* Reported as units = ppm

Table 16 Metals	Action Level		Action Level		Unamended Sediment (Units: ppm)		Amended Sediment (Units: ppm)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030393		20030400		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp L	Q	A Comp L	Q	1 Comp L	Q	2 Comp L	Q	3 Comp L	Q	4 Comp L	Q	5 Comp L	Q	6 Comp L	Q	7 Comp L	Q
Aluminum	NA	40	200	200	5420	E	7630	E	816		2440		2590		2070		1690		1470		1120	
Antimony	14000	12	20	60	0.96	ND	0.98	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Arsenic	20000	2	8	10	11.8		11.3		10	ND	10	ND	10	ND	3.5	B	10	ND	10	ND	10	ND
Barium	700000	40	2,000	200	38.2	E	50.1		76.9	B J	22.2	B	14.8	B	13.2	B	12.3	B	9.1	B	8.4	B J
Beryllium	1000	1	20	5	0.42		0.54		4	ND	4	ND	4	ND	0.79	B J	1.2	B J	1.5	B J	4	ND
Cadmium	1000	1	4	5	1.08		0.979		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Calcium	NA	1000	NA	5000	2340	E	45200	E	293000	J	146000		104000	J	80800		61900		44200		36600	J
Chromium	NA	2	100	10	68.4	B	58.4		14.7		26.7		25.9		23.2		17.1		11.7		13.2	
Cobalt	NA	10	NA	50	4.1	BE	4.3	BE	50	ND	50	ND	50	ND	50	ND	50	ND	50	ND	50	ND
Copper	600000	5	1000	25	65.4		59.3		106	J	37.7		25.5		19.8	B	16.3	B	8.4	B	11.3	B J
Iron	NA	20	300	1000	12800	E	14900	E	17.9	B	100	ND	100	ND	100	ND	100	ND	100	ND	100	ND
Lead	400000	0.6	10	3	58.6		49.6		3	ND	3	ND	3	ND	3	ND	3	ND	3	ND	3	ND
Magnesium	NA	1000	NA	5000	2890	E	5240	E	13.5	B J	5000	ND	27.2	B J	27.6	B	35.5	B	53.2	B	58.3	B J
Manganese	NA	3	50	15	129	E	186	E	15	ND	15	ND	15	ND	15	ND	15	ND	15	ND	15	ND
Mercury	14000	0.1	2	0.2	1.16		1.05		0.2	ND	0.2	ND	0.2	ND	0.2	ND	0.028	B	0.2	ND	0.2	ND
Nickel	250000	8	100	40	22.9		21.7		18.3	B	4.7	B	2.7	B	2.1	B	1.6	B	1.1	B	1.3	B
Potassium	NA	1000	NA	5000	1130	E	1920		33100		2920	B	777	B	495	B	279	B	158	B	240	B
Selenium	63000	1	50	5	0.88		0.74		2.5	B	3	B	2.6	B	5	ND	5	ND	5	ND	3.7	B
Silver	110000	2	NA	10	1.69		1.46		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Sodium	NA	1000	50,000	5,000	3320	E	3760		132000		8840		5750		5030		5390		5140		5320	
Thallium	2000	2	10	10	0.96	ND	0.98	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Vanadium	370000	10	NA	50	17	E	20.3	E	4.1	B	7.9	B	11.6	B J	14.8	B	16.6	B	20.2	B	21.6	B
Zinc	1500000	4	5000	20	1.69		1.46		20	ND	2.5	B	1.8	B	20	ND	3.2	B	20	ND	20	ND
Cyanide, total	1100000	0.5	200	10	0.69	ND	0.28	B														
%Solids					72.8		76.4															

Table 16 Dioxins	Action Level		Action Level		Unamended Sediment (Units: ppt)		Amended Sediment (Units: ppt)		MEP Extracts Units:ppt													
ASI ID #	Soil		Leachate		20030393		20030400		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg		ug/L		Comp L	Q	A Comp L	Q	1 Comp L	Q		Q		Q		Q		Q		Q	7 Comp L	Q
2,3,7,8-TCDD					0.96		0.90		2.5	ND											2.6	ND
1,2,3,7,8-PeCDD					0.44	J	0.40	J	1.2	ND											1.4	ND
1,2,3,4,7,8-HxCDD					0.39	J	0.35	J	1.3	ND											1.4	ND
1,2,3,6,7,8-HxCDD					2.17	J	2.21	J	1.4	ND											1.4	ND
1,2,3,7,8,9-HxCDD					1.38	J	1.35		1.3	ND											1.4	ND
1,2,3,4,6,7,8-HpCDD					30.55		32.60		0.98	ND											1.2	ND
OCDD					277.19		315.15		0.9	ND											0.99	ND
2,3,7,8-TCDF					1.06	#	1.28	#	2.6	ND											2.7	ND
1,2,3,7,8-PeCDF					1.12	J	0.91	J	1.1	ND											1.1	ND
2,3,4,7,8-PeCDF					1.41	J	1.21	J	0.78	ND											0.86	ND
1,2,3,4,7,8-HxCDF					6.02		5.51		0.68	ND											0.67	ND
1,2,3,6,7,8-HxCDF					2.48		2.35		0.69	ND											0.7	ND
2,3,4,6,7,8-HxCDF					1.10	J	0.96	J	0.79	ND											0.79	ND
1,2,3,7,8,9-HxCDF					0.09	J	0.09	J	0.81	ND											0.89	ND
1,2,3,4,6,7,8-HpCDF					44.13		40.32		1.2	ND											1.3	ND
1,2,3,4,7,8,9-HpCDF					1.37	J	1.13		1.3	ND											1.4	ND
OCDF					37.43		35.06		1.4	ND											1.3	ND

NA

* = NJDEP Required detection limit
\# = value from 2nd column confirmation
ND = Not detected
B = Indicates analyte detected in method blank as well as associated field sample
J = Detection limit below the reporting limit or is an estimated value
E = Estimated value

Table 17 Volatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030369		20030375		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp M	Q	A Comp M	Q	1 Comp M	Q	2 Comp M	Q	3 Comp M	Q	4 Comp M	Q	5 Comp M	Q	6 Comp M	Q	7 Comp M	Q
Chloromethane (Methyl Chloride)	520000	10	30	10	9.6	ND	8.6	ND														
Bromomethane	79000	10	10	10	9.6	ND	8.6	ND														
Vinyl chloride	2000	10	5	10	9.6	ND	8.6	ND														
Chloroethane	NA	10	NA	10	9.6	ND	8.6	ND														
Methylene chloride (Dichloromethane)	49000	10	3	10	1.5	J B	2.8	J														
Acetone	1,000,000	10	700	10	53		130															
Carbon disulfide	NA	10	NA	10	7.9	J	45															
1,1-Dichloroethene	8000	10	2	10	9.6	ND	8.6	ND														
1,1-Dichloroethane	570000	10	50	10	9.6	ND	8.6	ND														
1,2-Dichloroethene (total)	NA	10	10	10	9.6	ND	8.6	ND														
Chloroform	19000	10	6	10	9.6	ND	8.6	ND														
1,2-Dichloroethane	NA	10	NA	10	9.6	ND	8.6	ND														
2-Butanone (MEK)	1000000	10	300	10	10		36															
1,1,1-Trichloroethane	210000	10	30	10	9.6	ND	8.6	ND														
Carbon tetrachloride	2000	10	2	10	9.6	ND	8.6	ND														
Bromodichloromethane	11000	10	1	10	9.6	ND	8.6	ND														
1,2-Dichloropropane	10000	10	1	10	9.6	ND	8.6	ND														
cis-1,3-Dichloropropene	NA	10	NA	10	9.6	ND	8.6	ND														
Trichloroethene	23000	10	1	10	9.6	ND	8.6	ND														
Dibromochloromethane	110000	10	10	10	9.6	ND	8.6	ND														
1,1,2-Trichloroethane	22000	10	3	10	9.6	ND	8.6	ND														
Benzene	3000	10	1	10	3.3	J	3.5	J														
trans-1,3-dichloropropene	NA	10	NA	10	9.6	ND	8.6	ND														
Bromoform	86000	10	4	10	9.6	ND	8.6	ND														
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10	9.6	ND	8.6	ND														
2-Hexanone	NA	10	NA	10	9.6	ND	8.6	ND														
Tetrachloroethene	4000	10	1	10	9.6	ND	8.6	ND														
1,1,2,2-Tetrachloroethane	NA	10	NA	10	9.6	ND	8.6	ND														
Toluene	1000000	10	1000	10	9.6	ND	8.6	ND														
Chlorobenzene	37000	10	50	10	9.6	ND	8.6	ND														
Ethyl benzene	1000000	10	700	10	9.6	ND	1.5	J														
Styrene	23000	10	100	10	9.6	ND	8.6	ND														
Xylenes(Total)	410000	10	1000	10	4.4	J	7.8	J														

Table 17 Semivolatiles	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030369		20030375		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp M	Q	A Comp M	Q	1 Comp M	Q	2 Comp M	Q	3 Comp M	Q	4 Comp M	Q	5 Comp M	Q	6 Comp M	Q	7 Comp M	Q
Phenol	10,000,000	660	4,000	10	1600	ND	1400	ND	0.002	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
bis(2-Chloroethyl)ether	660	660	10	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2-Chlorophenol	2000	660	5	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
1,3-Dichlorobenzene	5100000	660	600	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
1,4-Dichlorobenzene	570000	660	75	10	257.04		195.39	B	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
1,2-Dichlorobenzene	5100000	660	600	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2-Methylphenol	2800000	660	NA	10	1600	ND	1400	ND	0.0025	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
1-Chloropropane-2,2'-oxybis	2300000	660	300	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
4-Methylphenol	2800000	660	NA	10	1600	ND	1400	ND	0.0075	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
N-Nitroso-Di-N-Propylamine	660	660	20	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Hexachloroethane	6000	660	10	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Nitrobenzene	28000	660	10	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Isophorone	1100000	660	100	10	1600	ND	1400	ND	0.00073	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2-Nitrophenol	NA	660	NA	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2,4-Dimethylphenol	1100000	660	100	10	1600	ND	130	J	0.0049	J	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
bis(2-Chloroethoxy)methane	NA	660	NA	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2,4-Dichlorophenol	170000	660	20	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
1,2,4-Trichlorobenzene	68000	660	9	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Naphthalene	230000	660	300	10	741.23	B	628.96	B	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
4-Chloroaniline	230000	1300	NA	20	310	J	290	J	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Hexachloro-1,3-butadiene	NA	660	NA	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
4-Chloro-3-methylphenol	10,000,000	1300	NA	20	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2-Methylnaphthalene	NA	660	NA	10	220	J	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Hexachlorocyclopentadiene	400000	660	50	10	3200	ND	2800	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
2,4,6-Trichlorophenol	62000	660	20	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2,4,5-Trichlorophenol	5600000	660	700	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2-Chloronaphthalene	NA	660	NA	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2-Nitroaniline	NA	3,300	NA	50	7700	ND	6900	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
Dimethylphthalate	10,000,000	660	NA	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Acenaphthylene	NA	660	NA	10	186.43		146.6		0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2,6-Dinitrotoluene	1000	660	10	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
3-Nitroaniline	NA	3300	NA	50	7700	ND	6900	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND

Table 17 Semivolatiles continued	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppm													
ASI ID #	Soil		Leachate		20030369		20030375		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp M	Q	A Comp M	Q	1 Comp M	Q	2 Comp M	Q	3 Comp M	Q	4 Comp M	Q	5 Comp M	Q	6 Comp M	Q	7 Comp M	Q
Acenaphthene	3400000	660	400	10	348.74	B	319.83		0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2,4-Dinitrophenol	110000	3300	40	50	7700	ND	6900	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
4-Nitrophenol	NA	3300	NA	50	7700	ND	6900	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
Dibenzofuran	NA	660	NA	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
2,4-Dinitrotoluene	1000	660	10	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Diethylphthalate	10,000,000	660	5,000	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0013	J	0.0094	ND	0.0096	ND
4-Chlorophenyl-phenylether	NA	660	NA	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Fluorene	2300000	660	300	10	403.47		346.93		0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
4-Nitroaniline	NA	830	NA	20	4000	ND	3600	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
4,6-Dinitro-2-methylphenol	NA	3300	NA	50	7700	ND	6900	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
N-Nitrosodiphenylamine	140000	660	20	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
4-Bromophenyl-phenylether	NA	660	NA	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Hexachlorobenzene	660	660	10	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Pentachlorophenol	6000	3300	1	50	7700	ND	6900	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.048	ND	0.047	ND	0.048	ND
Phenanthrene	NA	6600	NA	10	1354.77		1106.05	B	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Anthracene	10000000	6600	2000	10	837.7		626.87		0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Carbazole	NA	330	NA	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Di-n-butylphthalate	5700000	330	900	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.00077	J
Fluoranthene	2300000	660	300	10	2005.57		1208.9		0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Pyrene	1700000	660	200	10	2177.77		1315.9		0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Butylbenzylphthalate	1100000	660	100	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
3,3'-Dichlorobenzidine	2000	1300	60	20	6300	ND	5600	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND	0.019	ND
Benzo(a)anthracene	900	660	NA	10	[redacted]		844.79		0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Chrysene	9000	660	NA	10	1043.07		824.53		0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
bis(2-Ethylhexyl)phthalate	49000	660	30	10	3700		2600		0.0096	ND	0.0011	J	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Di-n-octylphthalate	1100000	660	100	10	1600	ND	1400	ND	0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Benzo(b)fluoranthene	900	660	NA	10	816.48		684.3		0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Benzo(k)fluoranthene	900	660	NA	10	706.65		630.42		0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Benzo(a)pyrene	660	660	NA	10	[redacted]		[redacted]		0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Indeno(1,2,3-cd)pyrene	900	660	NA	10	689.33		594.74		0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Dibenzo(a,h)anthracene	660	660	NA	10	166.56		184.76		0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND
Benzo(ghi)perylene	NA	660	NA	10	547.09		488.84		0.0096	ND	0.0097	ND	0.0096	ND	0.0097	ND	0.0097	ND	0.0094	ND	0.0096	ND

Table 17 Pesticides/Arochlors	Action Level		Action Level		Unamended Sediment (Units: ppb)		Amended Sediment (Units: ppb)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030369		20030375		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp M	Q	A Comp M	Q	1 Comp M	Q	2 Comp M	Q	3 Comp M	Q	4 Comp M	Q	5 Comp M	Q	6 Comp M	Q	7 Comp M	Q
alpha-BHC	NA	1.9	0.02	0.05	6.5	ND	15	ND	0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
beta-BHC	NA	3.3	0.2	0.05	6.5	ND	15	ND	0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
delta-BHC	NA	1.7	NA	0.05	6.5	ND	15	ND	0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
gamma-BHC (Lindane)	520	2	0.2	0.05	6.5	ND	15	ND	0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
Heptachlor	150	2.1	0.4	0.05	0.12	ND	0.10	ND	0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
Aldrin	40	2	0.04	0.05	0.09	ND	0.08	ND	0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	0.11	ND	0.10	ND	0.05	ND	0.0056	J PG	0.0082	J	0.049	ND	0.05	ND	0.05	ND	0.051	ND
Endosulfan I		2.1	0.4	0.05	0.14	ND	0.13	ND	0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
Dieldrin	42	3.3	0.03	0.10	2.02		2.02		0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
4,4'-DDE	2000	4.2	0.1	0.10	22.09	D	14.95	D	0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
Endrin	17000	3.6	2	0.10	6.5	ND	15	ND	0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
Endosulfan II		3.3	0.4	0.10	0.14	ND	0.13	ND	0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
4,4'-DDD	381000	4.2	0.1	0.10	15.27		15.63		0.012	J PG	0.014	J PG	0.051	ND	0.021	J PG	0.05	ND	0.01	J PG	0.051	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.15	ND	0.13	ND	0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
4,4'-DDT	2000	3.6	0.1	0.10	12.52		94.71		0.025	J	0.0089	J PG	0.051	ND	0.011	J PG	0.0063	J PG	0.05	ND	0.018	J
Methoxychlor	280000	17	40	0.50	13	ND	28	ND	0.1	ND	0.1	ND	0.1	ND	0.098	ND	0.1	ND	0.1	ND	0.1	ND
Endrin ketone	NA	3.3	NA	0.10	2.1	J PG	15	ND	0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
Endrin aldehyde	NA	3.3	NA	0.10	6.5	ND	15	ND	0.0085	J PG	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
alpha-Chlordane	500	1.7	NA	0.05	2.42		2.03		0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
gamma-Chlordane	NA	1.7	0.5	0.05	3.5	J PG	1.4	J PG	0.05	ND	0.052	ND	0.051	ND	0.049	ND	0.05	ND	0.05	ND	0.051	ND
Toxaphene	100	170	3	5.00	260	ND	580	ND	2	ND	2.1	ND	2	ND	2	ND	2	ND	2	ND	2	ND
Arochlor-1016 *		33		1.00	32	ND	28	ND	1	ND	1	ND	1	ND	0.98	ND	1	ND	1	ND	1	ND
Arochlor-1221 *		67		2.00	32	ND	28	ND	1	ND	1	ND	1	ND	0.98	ND	1	ND	1	ND	1	ND
Arochlor-1232 *		33		1.00	32	ND	28	ND	1	ND	1	ND	1	ND	0.98	ND	1	ND	1	ND	1	ND
Arochlor-1242 *		33		1.00	32	ND	28	ND	1	ND	1	ND	1	ND	0.98	ND	1	ND	1	ND	1	ND
Arochlor-1248 *		33		1.00	870		270		1	ND	1	ND	1	ND	0.98	ND	1	ND	1	ND	1	ND
Arochlor-1254 *		33		1.00	460		160		1	ND	1	ND	1	ND	0.98	ND	1	ND	1	ND	1	ND
Arochlor-1260 *		33		1.00	450		28	ND	1	ND	1	ND	1	ND	0.98	ND	1		1	ND	1	ND
Total Arochlor(SUM)	490		0.5																			
Combined endosulfans(SUM) Endosulfan I + II + sulfate	340000		NA		0.215049547	ND	0.193940955	ND														

* Reported as units = ppm

Table 17 Metals	Action Level		Action Level		Unamended Sediment (Units: ppm)		Amended Sediment (Units: ppm)		MEP Extracts Units:ppb													
ASI ID #	Soil		Leachate		20030369		20030375		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg	*	ug/L	*	Comp M	Q	A Comp M	Q	1 Comp M	Q	2 Comp M	Q	3 Comp M	Q	4 Comp M	Q	5 Comp M	Q	6 Comp M	Q	7 Comp M	Q
Aluminum	NA	40	200	200	9480	E	10600	E	711		1780		2910		2440		2000		1380		1240	
Antimony	14000	12	20	60	0.78	BN	0.68	BN	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Arsenic	20000	2	8	10	21.1		20.1		3	B	10	ND	3.4	B	10	ND	3.7	B	4.6	B	2.6	B
Barium	700000	40	2,000	200	105	E	92.8		81.8	B J	26	B	14.5	B	18.7	B	17	B	8.9	B	8.4	B J
Beryllium	1000	1	20	5	0.63		0.69		4	ND	4	ND	4	ND	0.64	B J	1.2	B J	1.6	B J	0.45	B
Cadmium	1000	1	4	5	6.1		6.01		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Calcium	NA	1000	NA	5000	4850	E	63700	E	280000	J	157000		116000	J	95000		79500		59100		54000	J
Chromium	NA	2	100	10	242.0	B	188.0		14.3		35.7		43.4		47.7		39.3		27.3		27.1	
Cobalt	NA	10	NA	50	7.7	E	6.4	E	4.7	B	1.2	B	50	ND	0.61	B	50	ND	50	ND	0.62	B
Copper	600000	5	1000	25	200.0		170.0		198	J	85.5		52.8		46.4		36.5		27.2		29.8	J
Iron	NA	20	300	1000	21700	E	20200	E	100	ND	100	ND	100	ND	100	ND	23.2	B	100	ND	100	ND
Lead	400000	0.6	10	3	194.0		161.0		3	ND	3	ND	3	ND	3	ND	3	ND	3	ND	3	ND
Magnesium	NA	1000	NA	5000	5370	E	7260	E	17.8	B J	5000	ND	22.5	B J	29.9	B	48	B	39.4	B	55.5	B J
Manganese	NA	3	50	15	250	E	288	E	15	ND	15	ND	15	ND	15	ND	15	ND	15	ND	0.22	B
Mercury	14000	0.1	2	0.2	3.34		2.91		0.2	ND	0.2	ND	0.2	ND	0.2	ND	0.2	ND	0.2	ND	0.2	ND
Nickel	250000	8	100	40	56.0		46.1		61.7		15.8	B	5.9	B	4	B	3.2	B	1.9	B	3	B
Potassium	NA	1000	NA	5000	2220	E	2810		45800		5510		1800	B	870	B	497	B	316	B	366	B
Selenium	63000	1	50	5	1.7		1.1		5	ND	3	B	2.3	B	2.5	B	3	B	5	ND	5	ND
Silver	110000	2	NA	10	6.73		5.47		5	ND	5	ND	5	ND	5	ND	5	ND	5	ND	5	ND
Sodium	NA	1000	50,000	5,000	8150	E	6690		210000		15800		6520		4750	B	4970	B	4560	B	4990	B
Thallium	2000	2	10	10	0.96	ND	0.54	B	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND	10	ND
Vanadium	370000	10	NA	50	37.9	E	31	E	5.2	B	8.9	B	11.3	B J	14.5	B	20.9	B	23.1	B	24.6	B
Zinc	1500000	4	5000	20	442.0		398.0		20	ND	1.7	B	20	ND	20	ND	20	ND	20	ND	1.7	B J
Cyanide, total	1100000	0.5	200	10	0.96	ND	0.34	B														
%Solids					52		57.9															

Table 17 Dioxins	Action Level		Action Level		Unamended Sediment (Units: ppt)		Amended Sediment (Units: ppt)		MEP Extracts Units:ppt													
ASI ID #	Soil		Leachate		20030369		20030375		MEP Day 1		MEP Day 2		MEP Day 3		MEP Day 4		MEP Day 5		MEP Day 6		MEP Day 7	
STL ID #	ug/kg		ug/L		Comp M	Q	A Comp M	Q	1 Comp M	Q		Q		Q		Q		Q		Q	7 Comp M	Q
2,3,7,8-TCDD					21.34		48.15		2.7	ND											2.1	ND
1,2,3,7,8-PeCDD					1.75	J	3.57	J	1.4	ND											1.2	ND
1,2,3,4,7,8-HxCDD					1.26	J	3.28	J	1.6	ND											1.2	ND
1,2,3,6,7,8-HxCDD					10.91		32.93		1.7	ND											1.2	ND
1,2,3,7,8,9-HxCDD					6.04		13.56		1.6	ND											1.2	ND
1,2,3,4,6,7,8-HpCDD					153.83		545.65		1.3	ND											1.4	ND
OCDD					1278.96		4622.97		1.7	Q B J											1.5	ND
2,3,7,8-TCDF					8.75	#	14.73	#	3.2	ND											2.1	ND
1,2,3,7,8-PeCDF					2.38	J	5.57		1.2	ND											0.88	ND
2,3,4,7,8-PeCDF					3.63		8.74		0.9	ND											0.71	ND
1,2,3,4,7,8-HxCDF					11.37		27.85		0.74	ND											0.69	ND
1,2,3,6,7,8-HxCDF					4.39		10.01		0.73	ND											0.69	ND
2,3,4,6,7,8-HxCDF					2.37	J	4.77		0.85	ND											0.82	ND
1,2,3,7,8,9-HxCDF					0.22	J	0.26	J	0.97	ND											0.91	ND
1,2,3,4,6,7,8-HpCDF					69.73		221.07		1.3	ND											1.1	ND
1,2,3,4,7,8,9-HpCDF					2.88		8.43		1.4	ND											1.4	ND
OCDF					100.59		490.73		1.7	ND											1.7	ND

NA

* = NJDEP Required detection limit
# = value from 2nd column confirmation
ND = Not detected
B = Indicates analyte detected in method blank as well as associated field sample
J = Detection limit below the reporting limit or is an estimated value
E = Estimated value

Table 18 Volatiles	Action Level		Action Level		Field Blank		Field Blank	
ASI ID #	Soil		Leachate		20030385		20030363	
STL ID #	ug/kg	*	ug/L	*		Q		Q
Chloromethane (Methyl Chloride)	520000	10	30	10				
Bromomethane	79000	10	10	10				
Vinyl chloride	2000	10	5	10				
Chloroethane	NA	10	NA	10				
Methylene chloride (Dichloromethane)	49000	10	3	10				
Acetone	1,000,000	10	700	10				
Carbon disulfide	NA	10	NA	10				
1,1-Dichloroethene	8000	10	2	10				
1,1-Dichloroethane	570000	10	50	10				
1,2-Dichloroethene (total)	NA	10	10	10				
Chloroform	19000	10	6	10				
1,2-Dichloroethane	NA	10	NA	10				
2-Butanone (MEK)	1000000	10	300	10				
1,1,1-Trichloroethane	210000	10	30	10				
Carbon tetrachloride	2000	10	2	10				
Bromodichloromethane	11000	10	1	10				
1,2-Dichloropropane	10000	10	1	10				
cis-1,3-Dichloropropene	NA	10	NA	10				
Trichloroethene	23000	10	1	10				
Dibromochloromethane	110000	10	10	10				
1,1,2-Trichloroethane	22000	10	3	10				
Benzene	3000	10	1	10				
trans-1,3-dichloropropene	NA	10	NA	10				
Bromoform	86000	10	4	10				
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10				
2-Hexanone	NA	10	NA	10				
Tetrachloroethene	4000	10	1	10				
1,1,2,2-Tetrachloroethane	NA	10	NA	10				
Toluene	1000000	10	1000	10				
Chlorobenzene	37000	10	50	10				
Ethyl benzene	1000000	10	700	10				
Styrene	23000	10	100	10				
Xylenes(Total)	410000	10	1000	10				

Table 18 Semivolatiles	Action Level		Action Level		Field Blank		Field Blank	
ASI ID #	Soil		Leachate		20030385		20030363	
STL ID #	ug/kg	*	ug/L	*		Q		Q
Phenol	10,000,000	660	4,000	10				
bis(2-Chloroethyl)ether	660	660	10	10				
2-Chlorophenol	2000	660	5	10				
1,3-Dichlorobenzene	5100000	660	600	10	16.12	B	12.12	B
1,4-Dichlorobenzene	570000	660	75	10				
1,2-Dichlorobenzene	5100000	660	600	10				
2-Methylphenol	2800000	660	NA	10				
1-Chloropropane-2,2'-oxybis	2300000	660	300	10				
4-Methylphenol	2800000	660	NA	10				
N-Nitroso-Di-N-Propylamine	660	660	20	10				
Hexachloroethane	6000	660	10	10				
Nitrobenzene	28000	660	10	10				
Isophorone	1100000	660	100	10				
2-Nitrophenol	NA	660	NA	10				
2,4-Dimethylphenol	1100000	660	100	10				
bis(2-Chloroethoxy)methane	NA	660	NA	10				
2,4-Dichlorophenol	170000	660	20	10				
1,2,4-Trichlorobenzene	68000	660	9	10				
Naphthalene	230000	660	300	10	14.25	B	8.66	B
4-Chloroaniline	230000	1300	NA	20				
Hexachloro-1,3-butadiene	NA	660	NA	10				
4-Chloro-3-methylphenol	10,000,000	1300	NA	20				
2-Methylnaphthalene	NA	660	NA	10				
Hexachlorocyclopentadiene	400000	660	50	10				
2,4,6-Trichlorophenol	62000	660	20	10				
2,4,5-Trichlorophenol	5600000	660	700	10				
2-Chloronaphthalene	NA	660	NA	10				
2-Nitroaniline	NA	3,300	NA	50				
Dimethylphthalate	10,000,000	660	NA	10				
Acenaphthylene	NA	660	NA	10	0.96	ND	0.96	ND
2,6-Dinitrotoluene	1000	660	10	10				
3-Nitroaniline	NA	3300	NA	50				

B= Analyte detected in the PB at level >3xMDL
ND = Not detected

Table 18 Semivolatiles continued	Action Level		Action Level		Field Blank ng/L		Field Blank ng/L	
ASI ID #	Soil		Leachate		20030385		20030363	
STL ID #	ug/kg	*	ug/L	*		Q		Q
Acenaphthene	3400000	660	400	10	1.02	ND	0.63	J
2,4-Dinitrophenol	110000	3300	40	50				
4-Nitrophenol	NA	3300	NA	50				
Dibenzofuran	NA	660	NA	10				
2,4-Dinitrotoluene	1000	660	10	10				
Diethylphthalate	10,000,000	660	5,000	10				
4-Chlorophenyl-phenylether	NA	660	NA	10				
Fluorene	2300000	660	300	10	0.93	ND	0.85	ND
4-Nitroaniline	NA	830	NA	20				
4,6-Dinitro-2-methylphenol	NA	3300	NA	50				
N-Nitrosodiphenylamine	140000	660	20	10				
4-Bromophenyl-phenylether	NA	660	NA	10				
Hexachlorobenzene	660	660	10	10				
Pentachlorophenol	6000	3300	1	50				
Phenanthrene	NA	6600	NA	10	2.15		4.43	
Anthracene	10000000	6600	2000	10	0.22	J	1.3	
Carbazole	NA	330	NA	10				
Di-n-butylphthalate	5700000	330	900	10				
Fluoranthene	2300000	660	300	10	2.26		5.24	
Pyrene	1700000	660	200	10	3.81		6.99	
Butylbenzylphthalate	1100000	660	100	10				
3,3'-Dichlorobenzidine	2000	1300	60	20				
Benzo(a)anthracene	900	660	NA	10	0.78	J	2.05	
Chrysene	9000	660	NA	10	1.06		2.63	
bis(2-Ethylhexyl)phthalate	49000	660	30	10				
Di-n-octylphthalate	1100000	660	100	10				
Benzo(b)fluoranthene	900	660	NA	10	1.58	ND	1.28	J
Benzo(k)fluoranthene	900	660	NA	10	1.79	ND	1.80	
Benzo(a)pyrene	660	660	NA	10	1.37	ND	1.84	
Indeno(1,2,3-cd)pyrene	900	660	NA	10	1.35	ND	1.28	J
Dibenzo(a,h)anthracene	660	660	NA	10	1.14	ND	1.14	ND
Benzo(ghi)perylene	NA	660	NA	10	0.95	J	1.23	J

Table 18 Pesticides/Arochlors	Action Level		Action Level		Field Blank ng/L		Field Blank ng/L	
ASI ID #	Soil		Leachate		20030385		20030363	
STL ID #	ug/kg	*	ug/L	*		Q		Q
alpha-BHC	NA	1.9	0.02	0.05				
beta-BHC	NA	3.3	0.2	0.05				
delta-BHC	NA	1.7	NA	0.05				
gamma-BHC (Lindane)	520	2	0.2	0.05				
Heptachlor	150	2.1	0.4	0.05	1.33	ND	1.33	ND
Aldrin	40	2	0.04	0.05	3.21	ND	3.21	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	1.08	ND	1.08	ND
Endosulfan I		2.1	0.4	0.05	1.26	ND	1.26	ND
Dieldrin	42	3.3	0.03	0.10	1.11	ND	1.11	ND
4,4'-DDE	2000	4.2	0.1	0.10	0.95	ND	0.95	ND
Endrin	17000	3.6	2	0.10				
Endosulfan II		3.3	0.4	0.10	0.58	ND	0.58	ND
4,4'-DDD	381000	4.2	0.1	0.10	0.68	ND	0.68	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.64	ND	0.64	ND
4,4'-DDT	2000	3.6	0.1	0.10	0.63	ND	0.63	ND
Methoxychlor	280000	17	40	0.50				
Endrin ketone	NA	3.3	NA	0.10				
Endrin aldehyde	NA	3.3	NA	0.10				
alpha-Chlordane	500	1.7	NA	0.05				
gamma-Chlordane	NA	1.7	0.5	0.05				
Toxaphene	100	170	3	5.00				
Arochlor-1016 *		33		1.00				
Arochlor-1221 *		67		2.00				
Arochlor-1232 *		33		1.00				
Arochlor-1242 *		33		1.00				
Arochlor-1248 *		33		1.00				
Arochlor-1254 *		33		1.00				
Arochlor-1260 *		33		1.00				
Total Arochlor(SUM)	490		0.5					
Combined endosulfans(SUM) Endosulfan I + II + sulfate	340000		NA					

* Reported as units = ppm

J = Less than ss MDL

ND = Not detected

Table 18 Metals	Action Level		Action Level		Field Blank ug/L		Field Blank ug/L	
ASI ID #	Soil		Leachate		20030385		20030363	
STL ID #	ug/kg	*	ug/L	*		Q		Q
Aluminum	NA	40	200	200				
Antimony	14000	12	20	60				
Arsenic	20000	2	8	10	0.051	ND	0.051	ND
Barium	700000	40	2,000	200				
Beryllium	1000	1	20	5				
Cadmium	1000	1	4	5	0.15		0.116	
Calcium	NA	1000	NA	5000				
Chromium	NA	2	100	10	0.276	J	0.278	J
Cobalt	NA	10	NA	50				
Copper	600000	5	1000	25	1.58		0.876	
Iron	NA	20	300	1000				
Lead	400000	0.6	10	3	0.262	J	0.239	J
Magnesium	NA	1000	NA	5000				
Manganese	NA	3	50	15				
Mercury	14000	0.1	2	0.2				
Nickel	250000	8	100	40	0.829		1.2	
Potassium	NA	1000	NA	5000				
Selenium	63000	1	50	5				
Silver	110000	2	NA	10	0.0367	J	0.0412	J
Sodium	NA	1000	50,000	5,000				
Thallium	2000	2	10	10				
Vanadium	370000	10	NA	50				
Zinc	1500000	4	5000	20	19.6		28.2	
Cyanide, total	1100000	0.5	200	10				
%Solids								

Table 18 Dioxins	Action Level		Action Level		Field Blank		Field Blank	
ASI ID #	Soil		Leachate		20030385		20030363	
STL ID #	ug/kg		ug/L					
2,3,7,8-TCDD								
1,2,3,7,8-PeCDD								
1,2,3,4,7,8-HxCDD								
1,2,3,6,7,8-HxCDD								
1,2,3,7,8,9-HxCDD								
1,2,3,4,6,7,8-HpCDD								
OCDD								
2,3,7,8-TCDF								
1,2,3,7,8-PeCDF								
2,3,4,7,8-PeCDF								
1,2,3,4,7,8-HxCDF								
1,2,3,6,7,8-HxCDF								
2,3,4,6,7,8-HxCDF								
1,2,3,7,8,9-HxCDF								
1,2,3,4,6,7,8-HpCDF								
1,2,3,4,7,8,9-HpCDF								
OCDF								

* = NJDEP Required detection limit
# = value from 2nd column confirmation
ND = Not detected
B = Indicates analyte detected in method blank as well as associated field sample
J = Analyte detected above the achieved MDL, but below the target MDL
E = Estimated value

Please note that only the data above was provided by Battelle for the field-blank

STL Qualifiers

Qualifier	definition	comments
J (semi voa)	Estimated Result. Result is less than RL	semivoa
J (pesticide)	Estimated Result. Result is less than RL	pesticides
J (metals)	Method Blank Contamination. The associated method blank contains the target analyte at a reporteable level.	metals
J (dioxin)	Estimated Result. Result is less than RL	dioxin data
B (metals)	Estimated Result. Result is less than RL	metals
B (dioxin)	Method Blank Contamination. The associated method blank contains the target analyte at a reportable level. (any hits in dioxin blank were "B" flagged regardless of amt.)	dioxin data
E	The reported result is an estimate. The amount reported is above the UCL described below.	dioxin data
Q	estimated maximum possible concentration (EMPC)	dioxin data
C	co-eluting isomer	dioxin data
X	Other. See narrative	dioxin data
PG	percent difference between original and confirmation analyses is greater than 40%.	pesticides
*	value outside QC limits	percent recoveries (organics)/Hg
D	system monitoring compound dilluted out	
E	Matrix Interference	metals
N	spiked analyte is outside stated control limits	metals/general chem (cyanide)/Hg
NC	The recovery and/or RPD were not calculated	metals/Hg
U	Result is less than MDL	Hg
B	Result is between the MDL and RL	Hg

APPENDIX

Core Logs

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: ET
Job#: 23037	Date: 7/1/03	Time : 0815
Sample Coordinates: 612505 E	667280 N	
Core # PJ2AU- 1	DTW(ft) 17	HDOP= 1.3

Project Depth (inc_ ft. overdredge) [PD]: 34	Core Penetration Length: 10'
Measured Water Depth [MWD]: 36	Recovered Core Length: 8.2
Tide Adjust [TA] (+/- ft. from MLW): 4.4	Sample Length Retained : 2.4
Corrected Depth @ MLW: 31.6	Core Volume Retained: 1.5 Gal
Required Sample Core Length [SCL] : 2.4	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		WET, SOFT BLACK SILT
2.4	20030352	
8.2		FIRMER W/DEPTH, SANDIER W/DEPTH
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
(1) 35-40° - WIND 7-10KN WNW 1-3' SEAS
Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	(.50gal/ft)

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)
Oil Present	Y	(N)
Odor Present	(Y)	N
Debris Present	Y	(N)
Within 10% of Req'd Core Length	(Y)	N
Photo	(Y)	N

CHLORO 0-2.4'

ver 010503

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: at
Job#: 23037	Date: 4/ / /03	Time : 08:45
Sample Coordinates: 612689 E	667011 N	
Core # PJ2AU- 2	DTW(ft) 11	HDOP= 13

Project Depth (inc_ ft. overdredge) [PD]: 34	Core Penetration Length: 10
Measured Water Depth [MWD]: 32	Recovered Core Length: 5.2
Tide Adjust [TA] (+/- ft. from MLW): 4.2	Sample Length Retained : 6.2
Corrected Depth @ MLW: 27.8	Core Volume Retained: 3.5 Gal
Required Sample Core Length [SCL] : 6.2	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		Wet / Soft Black Silt
6.2	20030353	
8.2		Finer w/ Depth, Sandier w/ Depth
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
35-40°, wind 7-10kn WNW 1-3' seas

Comments:

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	(.50gal/ft)

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	Oil odor 0 - 6.2'
Debris Present	Y	(N)	
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

ver 010503

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: Et
Job#: 23037	Date: 7/2/03	Time : 1405
Sample Coordinates: 612894 E	666951 N	
Core # PJ2AU-3	DTW(ft) 5	HDOP= .8

Project Depth (inc_ ft. overdredge) [PD]:	34	Core Penetration Length:	19'
Measured Water Depth [MWD]:	15	Recovered Core Length:	12'
Tide Adjust [TA] (+/- ft. from MLW):	.3	Sample Length Retained :	4'
Corrected Depth @ MLW:	14.7	Core Volume Retained:	2.5 Gal
Required Sample Core Length [SCL] :	19.3	Collected to Project Depth:	(Y) N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0	ASI #	Wet, SOFT BLACK SILT
4	2003038 2	SANDIER W/DEPTH, FIRMER W/DEPTH
4		MOIST TO wet, med TO CORSE,
8		GREY SAND DRIER W/DEPTH
8		MOIST TO wet med TO CORSE
12		Red/Grey/BROWN SAND/Gravel MIX (STAYS TO 12")
12'		BROWN/ Red SAND/CLAY MIX FIRM, MOIST.
		More SAND Than CLAY
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
35-45° 10-15KN SSW 1-3' SEAS

Comments:

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	(.50gal/ft)

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)
Oil Present	Y	(N)
Odor Present	(Y)	N
Debris Present	Y	(N)
Within 10% of Req'd Core Length	(Y)	N
Photo	(Y)	N

OIL ODOR 0-4'

ver 010503

AQUA SURVEY, INC.

SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: at
Job#: 23037	Date: 8/ 2/03	Time : 14:55
Sample Coordinates: 613059 E 666825 N		
Core # PJ2AU- 4	DTW(ft) 14	HDOP= .8

Project Depth (inc_ ft. overdredge) [PD]: 34	Core Penetration Length: 20.5
Measured Water Depth [MWD]: 13	Recovered Core Length: 14.2
Tide Adjust [TA] (+/- ft. from MLW): 0	Sample Length Retained : 6
Corrected Depth @ MLW: 13	Core Volume Retained: 3.5 gal
Required Sample Core Length [SCL] : 21	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		wet, SOFT BLACK SILT
3	20030383	FIRMER W/ DEPTH, SANDIER W/DEPTH
3		wet, SOFT, BLACK SILT, GRAY SAND MIX
6		SANDIER W/ DEPTH, FIRMER W/DEPTH
6		med-coarse, wet-moist, GRAY SAND
12		DRIER W/DEPTH
12		med coarse, MUCH COARSER SAND
14		GRAVEL MIX, GRAY/BROWN IN COLOR
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
35-40° WIND 10-15KN SSW 1-3' Seas

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	.50gal/ft

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)
Oil Present	Y	(N)
Odor Present	(Y)	N
Debris Present	(Y)	N
Within 10% of Req'd Core Length	(Y)	N
Photo	(Y)	N

OIL ODOR 0-6'
Shell

ver 010503

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger:
Job#: 23037	Date: 4/ /03	Time : 09:30
Sample Coordinates: 613017 E	666606 N	
Core # PJ2AU- 5	DTW(ft) 15	HDOP=1.0

Project Depth (inc_ ft. overdredge) [PD]: 34	Core Penetration Length: 10'
Measured Water Depth [MWD]: 29.5	Recovered Core Length: 7.2
Tide Adjust [TA] (+/- ft. from MLW): 4	Sample Length Retained : 7.2
Corrected Depth @ MLW: 25.5	Core Volume Retained: 3.5 Gal
Required Sample Core Length [SCL] : 8.5	Collected to Project Depth: (Y)/ N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		WET, SOFT BLACK SILT
7.2' est	20030354	FIRMER W/ DEPTH, SANDIER W/ DEPTH
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
35-40° WIND 7-10 NNW 1-3' SEAS

Comments: APPROX 1' FELL OUT ON EXTRACTION

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
4.0"	.50gal/ft

Liner Type: Soft Hard

Vibra Corer: P3 P4 VT6 Other

Live Organisms present	Y	N
Oil Present	Y	N
Odor Present	Y	N
Debris Present	Y	N
Within 10% of Req'd Core Length	Y	N
Photo	Y	N

OIL ODOR 0 - 7.2' - SLIGHT

ver 010503

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: GT
Job#: 23037	Date: 8/2/03	Time : 15:35
Sample Coordinates: 613334 E 666545		
Core # PJ2AU- 6	DTW(ft) 11	HDOP= .9
Project Depth (inc_ ft. overdredge) [PD]: 34	Core Penetration Length: 19.5	
Measured Water Depth [MWD]: 14.6	Recovered Core Length: 14.3	
Tide Adjust [TA] (+/- ft. from MLW): .6	Sample Length Retained : 5	
Corrected Depth @ MLW: 14	Core Volume Retained: 3 Gal	
Required Sample Core Length [SCL] : 20	Collected to Project Depth: (Y) / N	

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		wet/SOFT BLACK SILT
5		FIRMER W/DEPTH, SANDIER W/DEPTH
5	20030384	wet, SOFT SAND ~~SILT~~ CLAY MIX
7		FIRMER W/DEPTH, DRIER W/DEPTH
10		MOIST TO wet GRAY CLAY
10		FIRMER W/DEPTH
14.3		MED-COARSE, MOIST GRAY SAND/GRAVEL MIX, TO 1/2" STONES
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
40° WIND 10-15KN SSW 1-3' Seas

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	(.50gal/ft)

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	OIL odor 0-5'
Debris Present	(Y)	N	Shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

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AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: ET
Job#: 23037	Date: 7/2/03	Time : 12:30
Sample Coordinates: 613401 E	666436 N	
Core # PJ2AU- 7	DTW(ft) 3	HDOP= .9

Project Depth (inc_ ft. overdredge) [PD]: 34	Core Penetration Length: 12'
Measured Water Depth [MWD]: 24	Recovered Core Length: 8.
Tide Adjust [TA] (+/- ft. from MLW): 1.5	Sample Length Retained : 8
Corrected Depth @ MLW: 22.5	Core Volume Retained: 4 Gal
Required Sample Core Length [SCL] : 11.5	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		Wet, Soft, Black Silt
8	20030379	Finer w/Depth, Sandier w/Depth
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
40-45° WIND 10-12 SSW 1-3' SEAS

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	.50gal/ft

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	OIL ODOR 0-8'
Debris Present	(Y)	N	shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

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AQUA SURVEY, INC.

SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CT
Job#: 23037	Date: 4/1/03	Time : 11:50
Sample Coordinates: 613474 E	666158 N	
Core # PJ2AU- 8	DTW(ft) 15 HDOP= .9	

Project Depth (inc_ ft. overdredge) [PD]: 34	Core Penetration Length: 9
Measured Water Depth [MWD]: 31.9 32	Recovered Core Length: 7
Tide Adjust [TA] (+/- ft. from MLW): .9	Sample Length Retained : ~~29~~ 2.9
Corrected Depth @ MLW: 31.1	Core Volume Retained: 1.5 Gal
Required Sample Core Length [SCL] : ~~3~~ 2.9	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		WET, SOFT, BLACK SILT
2.9	20030358	FIRMER WITH DEPTH
2.9		WET SOFT BLACK SILT
7		FIRMER W/DEPTH, SANDIER W/DEPTH
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
30-35° WIND 10-15 KN WSW 1-3' SEAS

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	(.50gal/ft)

Liner Type: (Soft) Hard

Vibra Core: (P3) P4 VT6 Other

Live Organisms present	Y	(N)
Oil Present	(Y)	N
Odor Present	(Y)	N
Debris Present	Y	(N)
Within 10% of Req'd Core Length	(Y)	N
Photo	(Y)	N

OIL SHEEN 0-~~5~~ 2.9'
OIL ODOR 0-7'

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AQUA SURVEY, INC.

SEDIMENT CORE LOG

Client: ACOE NYD	Project: Port Jersey Area 2A Upland	Logger: cl
Job#: 23037	Date: 9/1/03	Time: 14:15
Sample Coordinates: 613878 E	666076 N	
Core # PJ2AU- 9	DTW(ft) 11	HDOP= .8

Project Depth (inc_ ft. overdredge) [PD]: 34	Core Penetration Length: 9.5
Measured Water Depth [MWD]: 31	Recovered Core Length: 7.5
Tide Adjust [TA] (+/- ft. from MLW): .1	Sample Length Retained: 3.1
Corrected Depth @ MLW: 30.9	Core Volume Retained: 2 Gal
Required Sample Core Length [SCL]: 3.1	Collected to Project Depth: Y / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		WET, SOFT BLACK SILT
1		
2		
3	20030361	
4		
5		
6		
7.5		FINER W/DEPTH
		SANDIER W/DEPTH
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions: LIGHT RAIN
35-40° WIND 10-20KN WNW 1-3' SEAS

Comments:

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
4.0"	.50gal/ft

Liner Type: Soft Hard

Vibra Corer: P3 P4 VT6 Other

Live Organisms present	Y	N
Oil Present	Y	N
Odor Present	Y	N
Debris Present	Y	N
Within 10% of Req'd Core Length	Y	N
Photo	Y	N

OIL ODOR 0-7.5'

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AQUA SURVEY, INC.

SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CJ
Job#: 23037	Date: 8/1/03	Time : 13:50
Sample Coordinates: 613830 E	665961 N	
Core # PJ2AU- 10	DTW(ft) 15	HDOP= .9

Project Depth (inc_ ft. overdredge) [PD]: 38	Core Penetration Length: 10'
Measured Water Depth [MWD]: 33	Recovered Core Length: 7.6
Tide Adjust [TA] (+/- ft. from MLW): 0	Sample Length Retained : 5.0
Corrected Depth @ MLW: 33	Core Volume Retained: 2.5 Gal
Required Sample Core Length [SCL] : 5.0	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		WET, SOFT, BLACK SILT
5.0	20030360	FIRMER W/DEPTH, SANDIER W/DEPTH
5.0		WET SOFT BLACK SILT
7.6		FIRMER W/DEPTH, SANDIER W/DEPTH
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
35-40° WIND 10-15 K WAVE 1-3' SEAS, LIGHT RAIN

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	.50gal/ft

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)
Oil Present	~~(Y)~~	(N)
Odor Present	(Y)	N
Debris Present	Y	(N)
Within 10% of Req'd Core Length	(Y)	N
Photo	(Y)	N

OIL ODOR 0-7.6'

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AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CT
Job#: 23037	Date: 7/2/03	Time : 12:00
Sample Coordinates: 614031 E	665957 N	
Core # PJ2AU- 11	DTW(ft) 16	HDOP= .9

Project Depth (inc_ ft. overdredge) [PD]: 38	Core Penetration Length: 10'
Measured Water Depth [MWD]: 32	Recovered Core Length: 8.2'
Tide Adjust [TA] (+/- ft. from MLW): 2	Sample Length Retained : 7.5
Corrected Depth @ MLW: 30	Core Volume Retained: 3.5 Gal
Required Sample Core Length [SCL] : 8	Collected to Project Depth: (Y)/ N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		wet, SOFT BLACK SILT
7.5	20030378	FIRMER W/DEPTH, SANDIER W/DEPTH
7.5		MOIST TO wet, med TO CORSE GRAY SAND
8.2		FIRMER W/DEPTH, DRIER W/DEPTH
8.2		RED/BROWN, MOIST, FIRM CLAY
Bottom		

# of containers:				
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
45-45° WIND 10-12KN SSW 1-3' SEAS

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	.60gal/ft

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	OIL ODOR 0-7.5'
Debris Present	(Y)	N	Shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

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AQUA SURVEY, INC.

SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CT
Job#: 23037	Date: 7/2 /03	Time : 11:30
Sample Coordinates: 614179 E	665780 N	
Core # PJ2AU- 12	DTW(ft) 11	HDOP= 1.1

Project Depth (inc_ ft. overdredge) [PD]: 38	Core Penetration Length: 10'
Measured Water Depth [MWD]: 35.7	Recovered Core Length: 9'
Tide Adjust [TA] (+/- ft. from MLW): 2.7	Sample Length Retained : 5'
Corrected Depth @ MLW: 33	Core Volume Retained: 3Gal
Required Sample Core Length [SCL] : 5	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		wet, soft, BLACK SILT
		FIRMER W/DEPTH, SANDIER W/DEPTH
5'	20030377	
5		wet, BLACK, SOFT SILT
		FIRMER W/DEPTH, SANDIER W/DEPTH
9'		
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
40-45° WIND 10-12 KN SSW 1-3' SEAS

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
4.0"	.50gal/ft

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	OIL ODOR 0-9'
Debris Present	(Y)	N	Shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

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AQUA SURVEY, INC.
SEDIMENT CORE LOG

2 Deployments

Client: ACOE NYD	Project: Port Jersey Area 2A Upland	Logger: [illegible]
Job#: 23037	Date: 3/31/03	Time: 11:30
Sample Coordinates: 611400 E	66752.9 N	
Core # PJ2AU- 13	DTW(ft) 15	HDOP= 1.1

Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 14
Measured Water Depth [MWD]: 35.5	Recovered Core Length: 8.3
Tide Adjust [TA] (+/- ft. from MLW): 1.1	Sample Length Retained: 6.3
Corrected Depth @ MLW: 34.4	Core Volume Retained: 3Gal
Required Sample Core Length [SCL]: 10.1	Collected to Project Depth: (Y) N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0 - 6.3	20030345	wet / soft, Black silt ~~finer with depth, sand/clay~~
6.3 - 7		firm Red/Brown clay/Gravel mix
7 - 8.3		med/coarse, wet/moist, Red/Brown sand Gravel mix
Bottom		

					Core Volumes	
# of containers:	1				Nominal core-barrel diameter	EST. Volume
type of container:	bucket	hardliner	cup	other	3.0"	.25 gal/ft
Water and surface conditions: 40° wind 20-40KNW 1-3' seas					3.5"	.33gal/ft
Comments: 2 Deployments Required. 1st Deploy 8' Pen, 6.2 Recovered - Discarded					(4.0)	.50gal/ft
					Liner Type: (Soft) Hard	
Approx 1.5 feet out on Recovery (Red/Brown sand)					Vibra Corer: (P3) P4 VT6 Other	

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	Oil Odor 0 - 6.3
Debris Present	(Y)	N	shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	Y	(N)	

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2 Deployments

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: FT
Job#: 23037	Date: 3/31/03	Time : 12:50
Sample Coordinates: 611737 E	667263 N	
Core # PJ2AU- 14	DTW(ft) 11	HDOP= .9

Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 7'
Measured Water Depth [MWD] 33	Recovered Core Length: 5.5
Tide Adjust [TA] (+/- ft. from MLW): 4	Sample Length Retained : 5.5
Corrected Depth @ MLW 32.6	Core Volume Retained: 3 Gal
Required Sample Core Length [SCL] : 11.9	Collected to Project Depth: Y / (N)

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		Wet, Soft, Black Silt/Gravel Mix.
5.5'	20030346	More Gravel w/ Depth, Some Metal Fragments found in Core Nose
Refusal Hit Gravel Layer w/		Metal Fragments Stiffer w/ Depth
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
4-6 45° Wind 20-40KNW 1-3' Seas

Comments: 1ST Deployment 7' Pen, 5.5 Recovered
2ND Deployment 6' Pen 5' Recovered.
Discarded 2ND Deployment

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	.60gal/ft

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	Oil Odor 0 5.5'
Debris Present	(Y)	N	Shell, Metal Slag
Within 10% of Req'd Core Length	Y	(N)	
Photo	Y	(N)	

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AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: ET
Job#: 23037	Date: 3/31/03	Time : 13:30
Sample Coordinates: 612010 E	667053 N	
Core # PJ2AU- 15	DTW(ft) 12	HDOP= 1

Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 14'
Measured Water Depth [MWD]: 37	Recovered Core Length: 13
Tide Adjust [TA] (+/- ft. from MLW): - .8	Sample Length Retained : 6.5
Corrected Depth @ MLW: 37.8	Core Volume Retained: 3.5 Gal
Required Sample Core Length [SCL] : 6.7	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		wet/soft Black silt
6.5	20030317	firmer w/ depth, sandier w/ depth
6.5		Moist to wet, medium to coarse,
7.9		Grey sand.
7.9		moist, Red Brown Clay
13'		
Bottom		

					Core Volumes	
# of containers:	1				Nominal core-barrel	
type of container:	bucket	hardliner	cup	other	diameter	EST. Volume
Water and surface conditions:					3.0"	.25 gal/ft
40-45° winds 20-40KNW 1-3' seas					3.5"	.33gal/ft
Comments:					(4.0")	(.50gal/ft)
Approx 1' fell out during extraction (Red clay)					Liner Type: (Soft) Hard	
					Vibra Corer: (P3) P4 VT6 Other	

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	oil odor 0-6.5
Debris Present	(Y)	N	Shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	Y	(N)	

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AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CT
Job#: 23037	Date: 3/31 /03	Time : 08:05
Sample Coordinates: 612177 E	667533 N	
Core # PJ2AU- 16	DTW(ft) 8	HDOP=1.3

Project Depth (inc_ ft. overdredge) (PD): 44.5	Core Penetration Length: 15
Measured Water Depth (MWD): 37	Recovered Core Length: 12.2
Tide Adjust (TA) (+/- ft. from MLW): 4.9	Sample Length Retained : 5.5
Corrected Depth @ MLW: 32.1	Core Volume Retained: 3Gal
Required Sample Core Length (SCL): 12.4	Collected to Project Depth: Y / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		Wet / Soft Black Silt
5.5	20030342	Firmer w/ Depth
5.5		Gray Sand Silt Mix Med to Coarse
6.3		
6.8		Brown Sand/Gravel mix / Moist, Med-Coarse
12.2		Dense, Sanding w/ Depth
Bottom		

					Core Volumes	
# of containers:	1				Nominal core-barrel	
type of container:	bucket	hardliner	cup	other	diameter	EST. Volume
Water and surface conditions:					3.0"	.25 gal/ft
30-35° WIND 20-29 KN W 1-3' Seas					3.5"	.33gal/ft
Comments:					4.0"	50gal/ft
Just kept 5.5' of Silt as per DEP					Liner Type: Soft Hard	
					Vibra Corer: P3 P4 VT6 Other	

Live Organisms present	Y	N	
Oil Present	Y	N	
Odor Present	Y	N	Oil Odor 0-5.5
Debris Present	Y	N	Shell
Within 10% of Req'd Core Length	Y	N	
Photo	Y	N	Camera unavailable 3/31/03 CT

ver 010503

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: ET
Job#: 23037	Date: 3/31/03	Time : 15:25
Sample Coordinates: 612145 E	667301 N	
Core # PJ2AU- 17	DTW(ft) 12	HDOP= .9
Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 6.5	
Measured Water Depth [MWD]: 39	Recovered Core Length: 4.2	
Tide Adjust [TA] (+/- ft. from MLW): .5	Sample Length Retained : 2'	
Corrected Depth @ MLW: 38.5	Core Volume Retained: 1 Gal	
Required Sample Core Length [SCL] : 6	Collected to Project Depth: (Y) N	

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0 – 1	20030351	wet, soft, black silt, finer w/depth, sandier w/depth
1 – 2.8		wet, med-coarse, grey sand, drier w/depth, finer w/depth
2.8 – 4.2		moist red/brown firm clay / rock mix, stones to 3"
Refusal —	more stone suspected	
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions: Lt 45°, wind 20-40 kn, 1-3' seas

Comments: barrel bent on extraction

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
4.0"	.50gal/ft
Liner Type: (Soft) Hard	
Vibra Corer: (P3) P4 VT6 Other	

Live Organisms present	Y	(N)
Oil Present	Y	(N)
Odor Present	(Y)	N
Debris Present	Y	(N)
Within 10% of Req'd Core Length	(Y)	N
Photo	Y	(N)

Oil odor 0-2'

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AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CT
Job#: 23037	Date: 3/31/03	Time : 14:00
Sample Coordinates: 612145 E	666891 N	
Core # PJ2AU- 18	DTW(ft) 6	HDOP= 9

Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 13'
Measured Water Depth [MWD]: 35	Recovered Core Length: 10.6
Tide Adjust [TA] (+/- ft. from MLW): -0.8	Sample Length Retained : 7.8
Corrected Depth @ MLW: 35.8	Core Volume Retained: 4 Gallons
Required Sample Core Length [SCL] : 8.7	Collected to Project Depth: (Y) N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top		
0		wet, soft BLACK SILT,
7.8'	20030348	fine w/Depth, SAND w/Depth
7.8		Grey, moist to wet, med-coarse SAND
10'		broad mix
10		moist Red/Brown, firm CLAY
10.6		
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
40-45° WIND 20-40KN SW 1-3' Seas

Comments:

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
4.0"	.50gal/ft

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	OIL ODOR 0-7.8
Debris Present	(Y)	N	Shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	Y	(N)	

ver 010503

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client: ACOE NYD	Project: Port Jersey Area 2A Upland	Logger: ET
Job#: 23037	Date: 3/31/03	Time: 09:25
Sample Coordinates: 612615 E	666841 N	
Core # PJ2AU- 19	DTW(ft) 12	HDOP= 1.3

Project Depth (inc. ft. overdredge) [PD]: 44.5	Core Penetration Length: 12.5
Measured Water Depth [MWD]: 39.5	Recovered Core Length: 10.5
Tide Adjust [TA] (+/- ft. from MLW): 3.3	Sample Length Retained: 7.2
Corrected Depth @ MLW: 36.2	Core Volume Retained: 4 Gal
Required Sample Core Length [SCL]: 8.3	Collected to Project Depth: (Y)/N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		wet / soft / Brown Silt
1 / 7.2	20030343	Fining w/ Depth
7.2 / 7.9		Gray, moist to wet, med-coarse, Sand Silt mix
7.9 / 10.5		Moist, Brown, med-coarse Sand Gravel mix Stiffer w/ Depth
		Drier w/ Depth
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
40° wind 20-30kn W 1-3' seas

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
4.0"	.50gal/ft

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)
Oil Present	Y	(N)
Odor Present	(Y)	N
Debris Present	(Y)	N
Within 10% of Req'd Core Length	(Y)	N
Photo	Y	(N)

Oil odor 0-7.2'
Shell

ver 010503

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: ET
Job#: 23037	Date: 3/31/03	Time : 10:00
Sample Coordinates: 612650 E	666807 N	
Core # PJ2AU-20	DTW(ft) 8	HDOP= 1.0
Project Depth (inc. ft. overdredge) [PD]: 44.5	Core Penetration Length: 12.6	
Measured Water Depth [MWD]: 38.8	Recovered Core Length: 9.2	
Tide Adjust [TA] (+/- ft. from MLW): 2.4	Sample Length Retained : 5.4	
Corrected Depth @ MLW: 36.4	Core Volume Retained: 3/12 Gal	
Required Sample Core Length [SCL]: 8.1	Collected to Project Depth: Y / N	

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		Wet, SOFT, BLACK SILT
5.4	20030314	FIRMER W/DEPTH, DRIER W/DEPTH
5.4		MOIST to wet Dense, med to coarse
8.5		Grey SAND Some Gravel
8.5		MOIST, red/BROWN, med-coarse SAND
9.2		
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
4/0-4.5' WIND 20-30KN W 1-3' SEAS

Comments: APPROX 1.5' W RD/BROWN SAND Fell out ON EXTRACTION, SAMPLE LENGTH WOULD HAVE BEEN 10.7 Recovered.

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
4.0"	.50gal/ft
Liner Type: Soft Hard	
Vibra Corer: P3 P4 VT6 Other	

Live Organisms present	Y	N
Oil Present	Y	N
Odor Present	Y	N
Debris Present	Y	N
Within 10% of Req'd Core Length	Y	N
Photo	Y	N

OIL ODOR 0-5.9'
Shell

ver 010503

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CJT
Job#: 23037	Date: 3/31/03	Time : 15:05
Sample Coordinates: 612420 E	667163 N	
Core # PJ2AU- 21	DTW(ft) 16	HDOP= .8

Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 12.5
Measured Water Depth [MWD]: 36.5	Recovered Core Length: 9.6
Tide Adjust [TA] (+/- ft. from MLW): -.5	Sample Length Retained : 3
Corrected Depth @ MLW: 36	Core Volume Retained: 1.5 Gal
Required Sample Core Length [SCL]: 8.5	Collected to Project Depth: Y / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0 – 3	2003 0350	SOFT, NOT, BLACK SILT. FIRMER W/ DEPTH
3 – 6		GREY, MOIST TO WET MED-COARSE SAND FINER W/DEPTH, DRIER W/DEPTH
6 – 9.6		GREY/BROWN SAND GRAVEL MIX COARSE, MOIST
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
40-45° WIND 15-20KNW 1-3' SEAS

Comments:

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
4.0"	.50gal/ft

Liner Type: Soft Hard

Vibra Corer: P3 P4 VT6 Other

Live Organisms present	Y	N
Oil Present	Y	N
Odor Present	Y	N
Debris Present	Y	N
Within 10% of Req'd Core Length	Y	N
Photo	Y	N

OIL ODOR 0-3'
Shell

ver 010503

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CJ
Job#: 23037	Date: 3/31/03	Time : 14:35
Sample Coordinates: 612364 E 666667		
Core # PJ2AU- 22	DTW(ft) 13	HDOP= .9
Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 14.5	
Measured Water Depth [MWD]: 35	Recovered Core Length: 13.2	
Tide Adjust [TA] (+/- ft. from MLW): .1	Sample Length Retained : 8.7	
Corrected Depth @ MLW: 34.9	Core Volume Retained: 4 Gal	
Required Sample Core Length [SCL] : 9.6	Collected to Project Depth: (Y) / N	

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0-8.7		wet/soft BLACK SILT
8.7	20030349	FINE w/ TRACE SAND w/ TRACE
8.7		Firm, moist RED/BROWN clay
13.2		
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions: 40-45° winds 15-20knw 1-3' Seas

Comments:

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	(.50gal/ft)

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)
Oil Present	Y	(N)
Odor Present	(Y)	N
Debris Present	(Y)	N
Within 10% of Req'd Core Length	(Y)	N
Photo	Y	(N)

oil odor 0-8.7
shell

ver 010503

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: ET
Job#: 23037	Date: 7/2/03	Time : 13:00
Sample Coordinates: 612780 E 666778 N		
Core # PJ2AU- 23	DTW(ft) 10	HDOP= 1.

Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 12'
Measured Water Depth [MWD]: 34.3	Recovered Core Length: 8.8
Tide Adjust [TA] (+/- ft. from MLW): 1.0	Sample Length Retained : 8.8
Corrected Depth @ MLW: 33.3	Core Volume Retained: 4 Gal
Required Sample Core Length [SCL]: 11.2	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		wet, soft, BLACK SILT
8.8	20030380	Firmer w/ Depth, Sandier w/ Depth
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
40-45° WIND 10-12 KN SSW 1-3' SEAS

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
4.0"	.50gal/ft

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	OIL ODOR 0-8.8
Debris Present	(Y)	N	Shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

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AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CT
Job#: 23037	Date: 7/2/03	Time : 13:30
Sample Coordinates: 612 840 E	666886 N	
Core # PJ2AU- 24	DTW(ft) 17	HDOP= 1.0

Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 12'
Measured Water Depth [MWD]: 33.5	Recovered Core Length: 9.7
Tide Adjust [TA] (+/- ft. from MLW): .5	Sample Length Retained : 9.7
Corrected Depth @ MLW: 33	Core Volume Retained: 5 gal
Required Sample Core Length [SCL] : 11.5	Collected to Project Depth: (Y) N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		wet, SOFT, BLACK SILT
	20030381	
9.7		FIRMER w/ DEPTH, SANDIER w/ DEPTH
Bottom		

# of containers:	2			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
35-40° WIND 10-15KN SSW 1-3' SEAS

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	(.50gal/ft)

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	OIL ODOR 0 - 9.7
Debris Present	(Y)	N	Shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

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AQUA SURVEY, INC.

SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CT	
Job#: 23037	Date: 8/ / /03	Time : 10:00	
Sample Coordinates: 612878 E 666297 N			
Core # PJ2AU- 25	DTW(ft) 15	HDOP=	

Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 10
Measured Water Depth [MWD]: 42	Recovered Core Length: 6
Tide Adjust [TA] (+/- ft. from MLW): 3.2	Sample Length Retained : ~~5.0~~ 5.0
Corrected Depth @ MLW: 38.8	Core Volume Retained: 2.5 Gal
Required Sample Core Length [SCL] : 5.7	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		SOFT wet BLACK SILT
1		
2		
3		
4 - 5.0	20030355	FIRMER W/ DEPTH SANDIER W/ DEPTH
5.7		GRAY SAND, MOIST TO WET / GRAVEL / BLACK SILT MIX
6		GRAY SAND, MOIST TO WET, GRAVEL MIX
		STONES TO 3/4"
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
35-40° WIND 7-10KN WSW 1-2' SEAS

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	.50gal/ft

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	OIL ODOR 0-5'
Debris Present	(Y)	N	Shell
Within 10% of Req'd Core Length	Y	(N)	
Photo	(Y)	N	

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AQUA SURVEY, INC.

SEDIMENT CORE LOG

Client: ACOE NYD	Project: Port Jersey Area 2A Upland	Logger: CA
Job#: 23037	Date: 8/1/03	Time: 10:30
Sample Coordinates: 613187 E	666239 N	
Core # PJ2AU- 26	DTW(ft) 11	HDOP= 1.1

Project Depth (inc. ft. overdredge) [PD]: 44.5	Core Penetration Length: 10
Measured Water Depth [MWD]: 41	Recovered Core Length: 8'
Tide Adjust [TA] (+/- ft. from MLW): 2.5	Sample Length Retained: 2.5
Corrected Depth @ MLW: 38.5	Core Volume Retained: 1 5 Gal
Required Sample Core Length [SCL]: 6	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		wet, soft black silt
2.5	20030356	finer w/depth sandier w/depth
2.5		moist to wet, med-coarse, gray sand
5.4		shell present in sample
5.4		moist red/brown med-coarse
8		sand/gravel mix, stones to 3/4"
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions: 30-35° wind 7-10 kn WSW 1-2' seas

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
4.0"	.50gal/ft

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	oil odor @ 2.5'
Debris Present	(Y)	N	shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

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AQUA SURVEY, INC.

SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CT
Job#: 23037	Date: 7/1 /03	Time : 11:15
Sample Coordinates: 613368 E 666186 N		
Core # PJ2AU- 27	DTW(ft) 13	HDOP= 1.1

Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 10
Measured Water Depth [MWD]: 38.5	Recovered Core Length: 8
Tide Adjust [TA] (+/- ft. from MLW): 1.5	Sample Length Retained : 5.2'
Corrected Depth @ MLW: 37	Core Volume Retained: 36gal
Required Sample Core Length [SCL] : 7.5	Collected to Project Depth: (Y) N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		WET, SOFT, BLACK SILT
5.2	20030357	FIRMER W/DEPTH, SANDIER W/DEPTH
5.2		
8'		MOIST TO WET, MED-COARSE, GRAY SAND
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
30-35° 7-15KN WINDS WSW 1-3' SEAS

Comments:

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	(.50gal/ft)

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)
Oil Present	Y	(N)
Odor Present	(Y)	N
Debris Present	Y	(N)
Within 10% of Req'd Core Length	(Y)	N
Photo	(Y)	N

OIL ODOR 0-5.2'

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AQUA SURVEY, INC.

SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland		Logger: CT
Job#: 23037	Date: 9/1/03	Time : 13:20	
Sample Coordinates: 613232 E	665927 N		
Core # PJ2AU- 28	DTW(ft) 16	HDOP= 1	
Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 10'		
Measured Water Depth [MWD]: 38	Recovered Core Length: 7.2		
Tide Adjust [TA] (+/- ft. from MLW): 0 1	Sample Length Retained : 4.3		
Corrected Depth @ MLW: 37.9	Core Volume Retained: 2.5 Gal		
Required Sample Core Length [SCL] : 6.6	Collected to Project Depth: (Y) N		

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		wet, soft BLACK SILT
4.3		firmer w/ depth, sandier w/ depth
4.3	20030359	moist to wet, med to coarse
4.7		Grey SAND
4.7		moist Red/Brown, Med-Coarse,
7.2		~~Red~~ SAND/Gravel mix stones to 1/2"
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
35-40 wind 10-15k WNW, LIGHT RAIN Seas 1-3'

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	(.50gal/ft)

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)
Oil Present	(Y)	N
Odor Present	(Y)	N
Debris Present	Y	(N)
Within 10% of Req'd Core Length	(Y)	N
Photo	(Y)	N

Oil Sheen 0-4.3'
Oil Odor 0-4.3'

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AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CT
Job#: 2305~~1~~37	Date: 3/28/03	Time : 15:20
Sample Coordinates: 613602 E	665932 N	
Core # PJ2AU- 29	DTW(ft) 14	HDOP= .8
Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 9	
Measured Water Depth [MWD]: 40.5	Recovered Core Length: 7.7	
Tide Adjust [TA] (+/- ft. from MLW): 3.4	Sample Length Retained : 7.4	
Corrected Depth @ MLW: 37.1	Core Volume Retained:	
Required Sample Core Length [SCL] : 7.4	Collected to Project Depth: (Y) / N	

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		Wet / SOFT BLACK SILT
1		
2		
3		
4		
5		FIRMER W/ DEPTH
6		SOME ORGANIC MATERIAL MIXED IN
7.4	20030341	
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
40-50, WIND 10-15KSW 1-3' Seas

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
4.0	50gal/ft

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	OIL ODOR 0-7.4'
Debris Present	(Y)	N	Shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

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AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: ET
Job#: 2305137	Date: 3/28/03	Time : 14:00
Sample Coordinates: 613611 E	665617 N	
Core # PJ2AU- 30	DTW(ft) 19	HDOP= 1

Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 9'
Measured Water Depth [MWD]: 42.5	Recovered Core Length: 8'
Tide Adjust [TA] (+/- ft. from MLW): 2.3	Sample Length Retained : 4.3
Corrected Depth @ MLW: 40.2	Core Volume Retained: 2.5 Gal
Required Sample Core Length [SCL] : 4.3	Collected to Project Depth: (Y) N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		SOFT/wet BLACK SILT
1		
2		
3		SOFT/wet BLACK SILT, FIBER w/DEPTH
4.3	20030339	SOFT/wet BLACK SILT/SAND mix
		~~FIBER w/DEPTH~~ FIBER w/DEPTH
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
40-50' WIND 10-20K 1-3' SEAS

Comments: LIGHT RAIN

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	.50gal/ft
Liner Type: (Soft) Hard	
Vibra Corer: (P3) P4 VT6 Other	

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	OIL ODOR 0-4.3'
Debris Present	(Y)	N	shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

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AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CT
Job#: 2305~~1~~37	Date: 3/28/03	Time : 14:40
Sample Coordinates: 614255 E 665712 N		
Core # PJ2AU- 31	DTW(ft) 12	HDOP= .8

Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 13.5
Measured Water Depth [MWD]: 40	Recovered Core Length: 12.6
Tide Adjust [TA] (+/- ft. from MLW): 2.8	Sample Length Retained : 7.3
Corrected Depth @ MLW: 37.2	Core Volume Retained: 4 Gal
Required Sample Core Length [SCL] : 7.3	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		wet/SOFT BLACK SILT
1		
2		
3		FIRMER w/ DEPTH
4		
5		SOME PEAT mixed IN
6		
7.3 ~~80~~ CT	20030340	
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
40-50' WIND 15-20KSW 1-3' SEAS

Comments:

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	.50gal/ft
Liner Type: (Soft) Hard	
Vibra Corer: (P3) P4 VT6 Other	

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	OIL ODOR 0-7.3, ORGANIC ODOR 5-7.3'
Debris Present	(Y)	N	Shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

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AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CT
Job#: 2305/37	Date: 3/28/03	Time : 13:20
Sample Coordinates: 614247 E	665540 N	
Core # PJ2AU- 32	DTW(ft) 15	HDOP= 1.0

Project Depth (inc_ ft. overdredge) [PD]: 44.5	Core Penetration Length: 11.5
Measured Water Depth [MWD]: 40.8	Recovered Core Length: 10.5
Tide Adjust [TA] (+/- ft. from MLW): 1.8	Sample Length Retained : 5.5
Corrected Depth @ MLW: 39	Core Volume Retained: 3 Gal
Required Sample Core Length [SCL] : 5.5	Collected to Project Depth: (Y)/ N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		SOFT / WET / BLACK SILT
1		
2		
3		
4		
5.5	20030338	FIBER W/ DEPTH, DRICK W/ DEPTH
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
40-50°F WIND 15-20KSW 1-3' SEAS

Comments:

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	.50gal/ft
Liner Type: (Soft) Hard	
Vibra Corer: (P3) P4 VT6 Other	

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	OIL ODOR 0-5.5
Debris Present	(Y)	N	Shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

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AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CT
Job#: 2305137	Date: 3/28/03	Time : 10:25
Sample Coordinates: 614073 E	665330 N	
Core # PJ2AU- 33	DTW(ft) 12	HDOP= 1.4

Project Depth (inc_ ft. overdredge) [PD]: 49	Core Penetration Length: 11
Measured Water Depth [MWD]: 44	Recovered Core Length: 8.5
Tide Adjust [TA] (+/- ft. from MLW): 1.1	Sample Length Retained : 6.1
Corrected Depth @ MLW: 42.9	Core Volume Retained: 3 1/2 Gallons
Required Sample Core Length [SCL] : 6.1	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		wet, Loose, BLACK SILT
1		
2		FIRMER W/ DEPTH
3		
4		GRAY SAND, MOIST TO wet
5		DENSE. SOME SILT SMEAR
6.1	20030335	
		5.5 - 6.1 - BROWN SAND DRIER W/ DEPTH
Bottom		

# of containers:	2			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
45-50° F WND 15-20 SW 1-3' SEAS

Comments:

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	.50gal/ft

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	OIL ODOR TOP 3'
Debris Present	(Y)	N	Shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

ver 010503

AQUA SURVEY, INC.

SEDIMENT CORE LOG

Client: ACOE NYD	Project: Port Jersey Area 2A Upland	Logger: [illegible]
Job#: 23037	Date: 7/1/03	Time: 14:45
Sample Coordinates: 614424 E	665034	
Core #: PJ2AU-34	DTW(ft) 19	HDOP= .8

Project Depth (inc_ ft. overdredge) [PD]: 49	Core Penetration Length: 6'
Measured Water Depth [MWD]: 44.5	Recovered Core Length: 5.7
Tide Adjust [TA] (+/- ft. from MLW): .2	Sample Length Retained: 5.2
Corrected Depth @ MLW: 44.3	Core Volume Retained: 2Gal
Required Sample Core Length [SCL]: 4.7	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0	20030362	FINE TO MEDIUM, MOIST TO WET
3.2		GREY SAND, DRIER W/DEPTH
3.2		FIRM GREY CLAY, SAND MIX, PEAT
5		MIXED IN at 4' FINE TO MEDIUM MOIST TO WET SAND
5		FIRM GREY CLAY, PEAT MIX, MOIST
5.7		DRIER W/DEPTH
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
35°-40° WIND 10-15KN WNW 1-3' SEAS

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	(50gal/ft)

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	Y	(N)
Oil Present	Y	(N)
Odor Present	(Y)	N
Debris Present	Y	(N)
Within 10% of Req'd Core Length	(Y)	N
Photo	(Y)	N

ORGANIC ODOR 4-5.7', OIL ODOR 0-2' wet

ver 010503

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: CT
Job#: 2305T 37	Date: 3/28/03	Time : 0950
Sample Coordinates: 614391 E	665381 N	
Core # PJ2AU- 35	DTW(ft) 18	HDOP= 1.3

Project Depth (inc_ ft. overdredge) [PD]: 49	Core Penetration Length: 15'
Measured Water Depth [MWD]: 43.5	Recovered Core Length: 14'
Tide Adjust [TA] (+/- ft. from MLW): 1.5	Sample Length Retained : 7'
Corrected Depth @ MLW: 42	Core Volume Retained: 4 Gal
Required Sample Core Length [SCL] : 7	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		wet, Loose, BLACK, SILT
1		
2		
3		wet Grey SAND GRAVEL mix
4		DRIER w/ DEPTH
5		
6		Gray SAND / MOIST TO ~~wet~~ CT wet
7	20030334	Some GRAVEL / Some Peat
Bottom		

# of containers:	2			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
45-50°F WIND 10-20 SW SEAS 1-3'

Comments:

Core Volumes

Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
4.0"	.50gal/ft

Liner Type: Soft Hard

Vibra Corer: P3 P4 VT6 Other

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	~~OIL~~ CT
Odor Present	(Y)	N	OIL ODOR IN TOP 2', ORGANIC ODOR 3-7'
Debris Present	(Y)	N	Shells
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

ver 010503

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: ET
Job#: 2305~~4~~ 37	Date: 3/28/03	Time : 09:00
Sample Coordinates: 614730 E 665541 N		
Core # PJ2AU- 36	DTW(ft) 6'	HDOP= 1.3

Project Depth (inc_ ft. overdredge) [PD]: 49	Core Penetration Length: 15'
Measured Water Depth [MWD]: 42.2	Recovered Core Length: 15'
Tide Adjust [TA] (+/- ft. from MLW): 2.2	Sample Length Retained : 9'
Corrected Depth @ MLW: 40	Core Volume Retained: 4.5 GAL - 5 GAL
Required Sample Core Length [SCL] : 9	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		wet / loose / BLACK SILT / TRACE AMOUNTS OF SAND
1		
2		
3		
4		
5		
6		
7		
8		
9 Bottom	20030333	FIRMER W/ DEPTH

# of containers:	2			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
45-50°F WIND 10-20 SW 1-3' SEAS

Comments:

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	(.50gal/ft)

Liner Type: (Soft) Hard

Vibra Corer: (P3) P4 VT6 Other

Live Organisms present	(Y)	N
Oil Present	Y	(N)
Odor Present	(Y)	N
Debris Present	(Y)	N
Within 10% of Req'd Core Length	(Y)	N
Photo	(Y)	N

OIL ODOR
SHELLS

ver 010503

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: [illegible]
Job#: 2305137	Date: 3/28/03	Time : 11:25
Sample Coordinates: 614719 E	665319 N	
Core # PJ2AU- 37	DTW(ft) 12	HDOP= 1.2
Project Depth (inc_ ft. overdredge) [PD]: 49	Core Penetration Length: 13'	
Measured Water Depth [MWD]: ~~44~~ 43	Recovered Core Length: 12'	
Tide Adjust [TA] (+/- ft. from MLW): .3	Sample Length Retained : 6.3	
Corrected Depth @ MLW: 42.7	Core Volume Retained: 3.5 Gal	
Required Sample Core Length [SCL] : 6.3	Collected to Project Depth: (Y) / N	

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		Loose / wet / BLACK SILT
1		
2		
3		
4		FIRMER w/DEPTH, DRIER w/DEPTH
5		~~LOST~~ SOFT / MOIST TO WET, BLACK,
6.3	20030336	SILT SAND MIX. SANDIER FROM
		6' - 6.3'
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
45-50' WIND 15-20 SW SEAS 1-3'

Comments:

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	(.50gal/ft)
Liner Type: (Soft) Hard	
Vibra Corer: (P3) P4 VT6 Other	

Live Organisms present	Y	(N)	
Oil Present	Y	(N)	
Odor Present	(Y)	N	OIL ODOR FROM 0 - 6'
Debris Present	(Y)	N	Shell
Within 10% of Req'd Core Length	(Y)	N	
Photo	(Y)	N	

ver 010503

AQUA SURVEY, INC.
SEDIMENT CORE LOG

Client : ACOE NYD	Project : Port Jersey Area 2A Upland	Logger: ET
Job#: 2305137	Date: 3/28/03	Time : 12:40
Sample Coordinates: 614886 E	665459 N	
Core # PJ2AU- 38	DTW(ft) 19	HDOP= .9

Project Depth (inc_ ft. overdredge) [PD]: 49	Core Penetration Length: 11.5
Measured Water Depth [MWD]: 44.8	Recovered Core Length: 11.0
Tide Adjust [TA] (+/- ft. from MLW): 1.2	Sample Length Retained : 5.4
Corrected Depth @ MLW: 43.6	Core Volume Retained: 3 GAL
Required Sample Core Length [SCL] : 5.4	Collected to Project Depth: (Y) / N

All Length Measurements are in Decimal Feet

Sample Interval (ft.)	Sample Id #	Description
Top 0		Wet, SOFT, BLACK SILT
1		
2		
3		
4		
5.4	20030337	Firmer w/Depth
Bottom		

# of containers:	1			
type of container:	bucket	hardliner	cup	other

Water and surface conditions:
40-50°F Wind 15-20KSW, 1-3' Seas

Comments:

Core Volumes	
Nominal core-barrel diameter	EST. Volume
3.0"	.25 gal/ft
3.5"	.33gal/ft
(4.0")	(.50gal/ft)
Liner Type: (Soft) Hard	
Vibra Corer: (P3) P4 VT6 Other	

Live Organisms present	Y	(N)
Oil Present	Y	(N)
Odor Present	(Y)	N
Debris Present	(Y)	N
Within 10% of Req'd Core Length	(Y)	N
Photo	(Y)	N

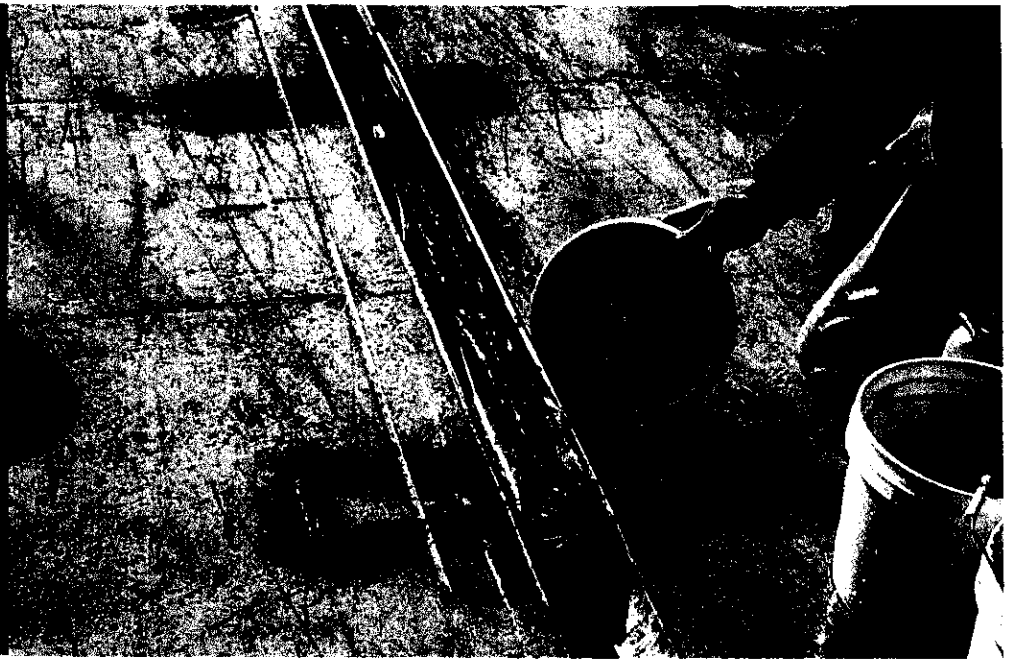
OIL odor 0 - 5.4'
Shell

ver 010503

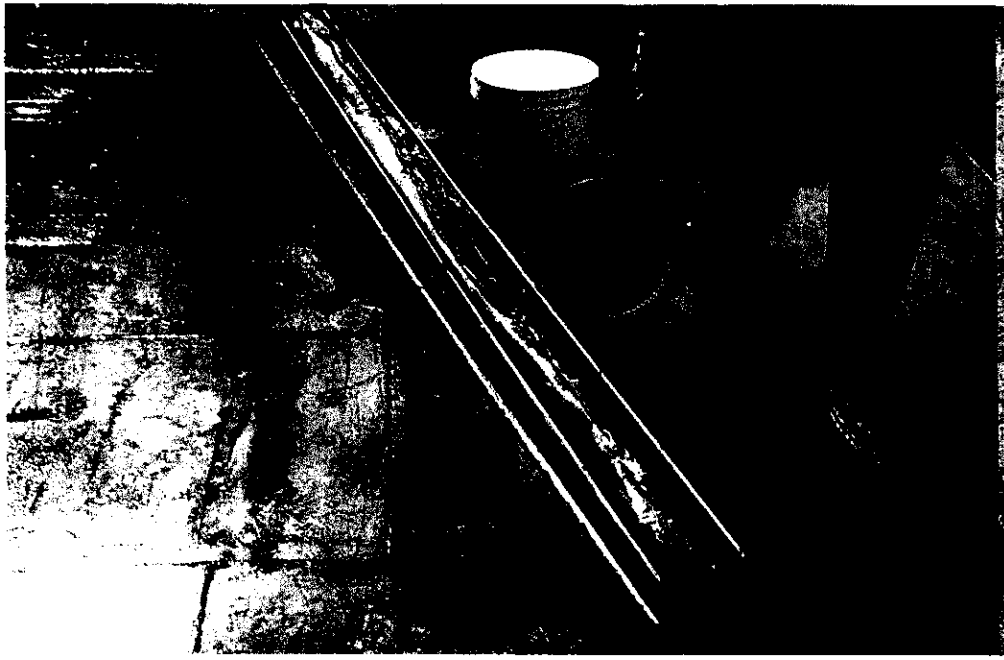
Photographs

Please note cores taken on March 31, 2003 were not photographed due to the unavailability of a camera

PJ2AU-01

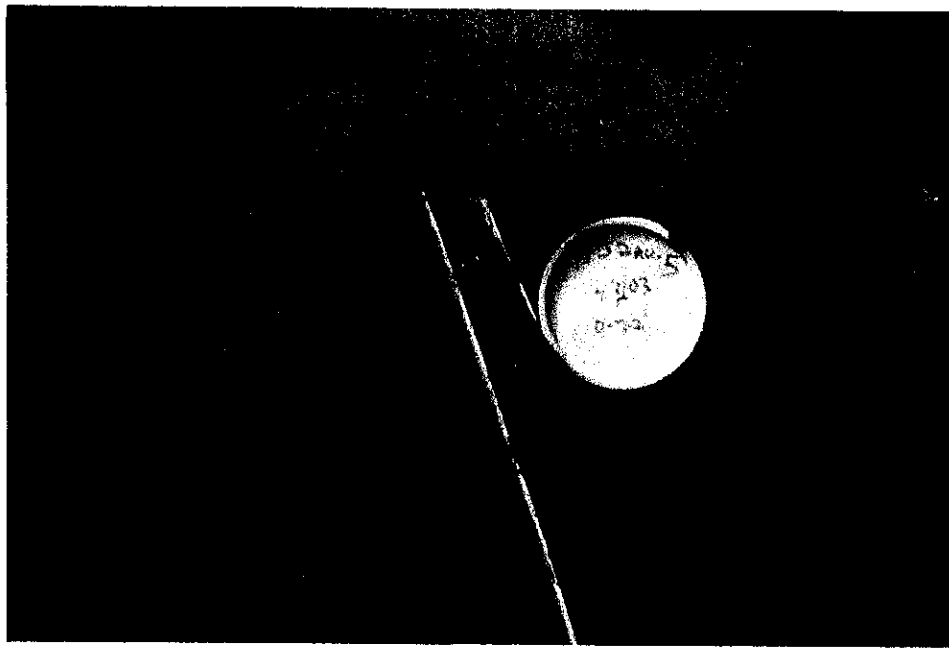


PJ2AU-02



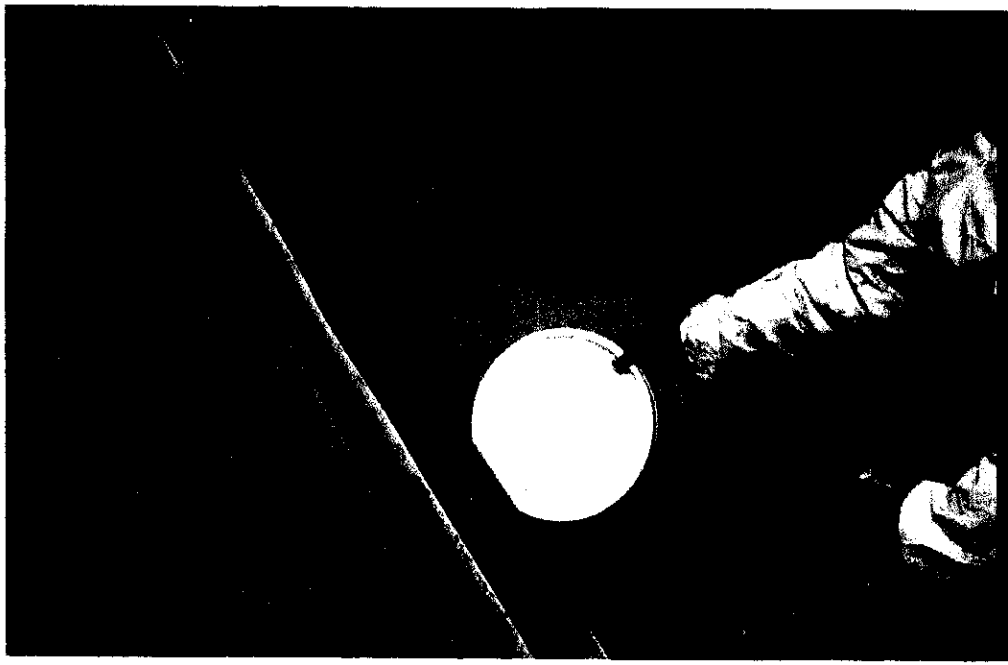
PJ2AU-03

PJ2AU-04



PJ2AU-05

PJ2AU-06



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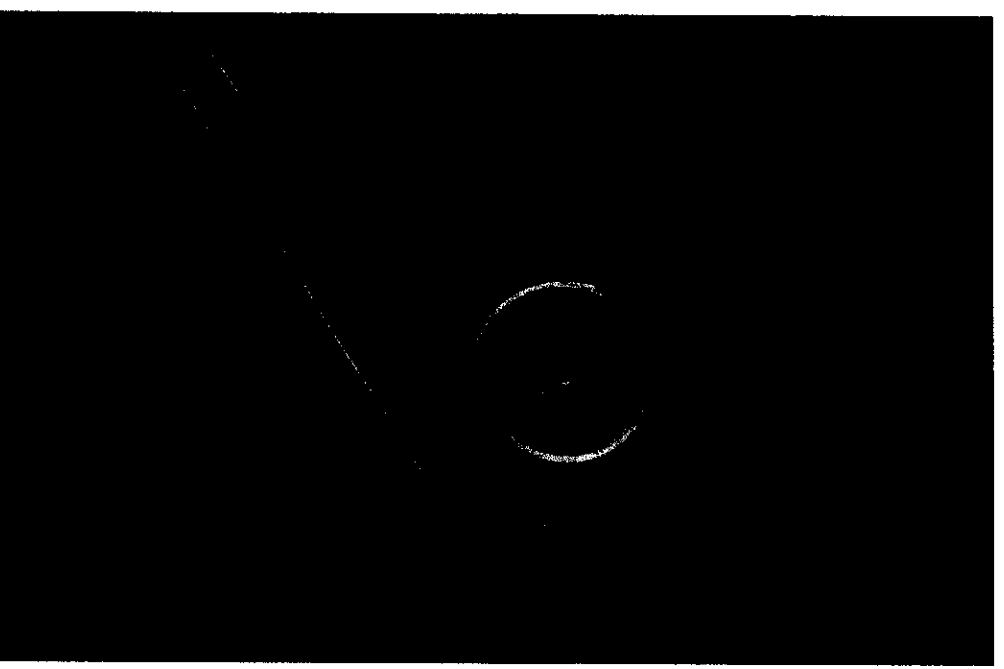
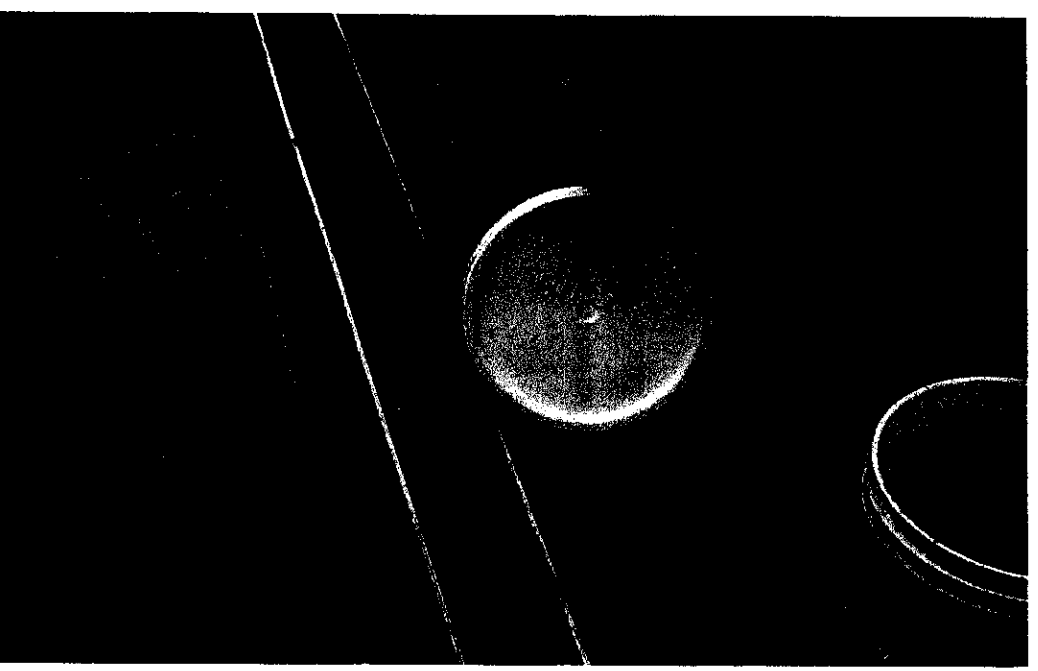


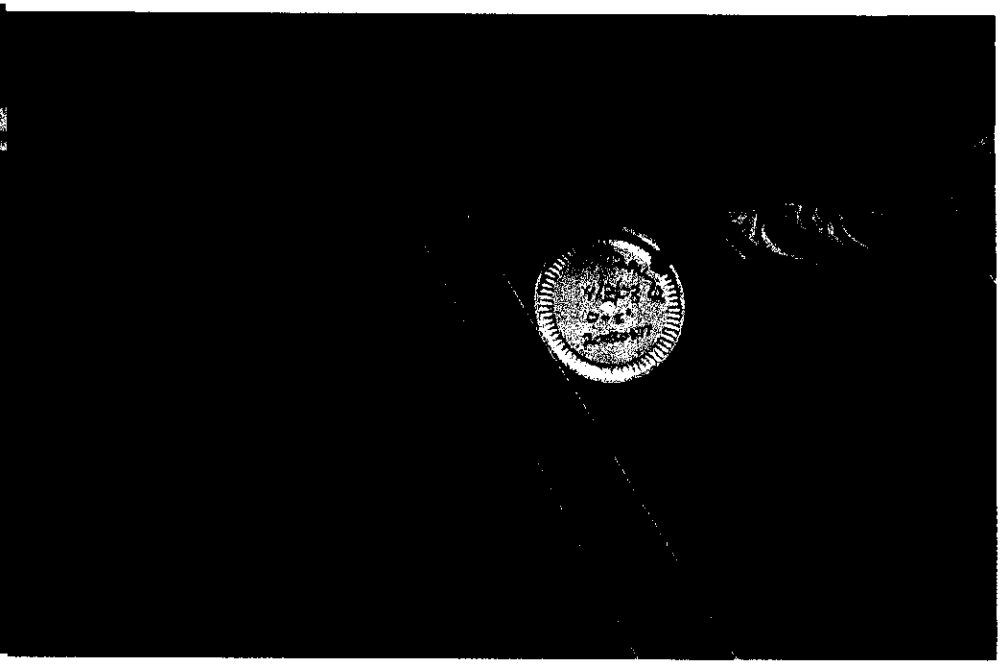
PJ2AU-08

PJ2AU-09



PJ2AU-10

PJ2AU-11



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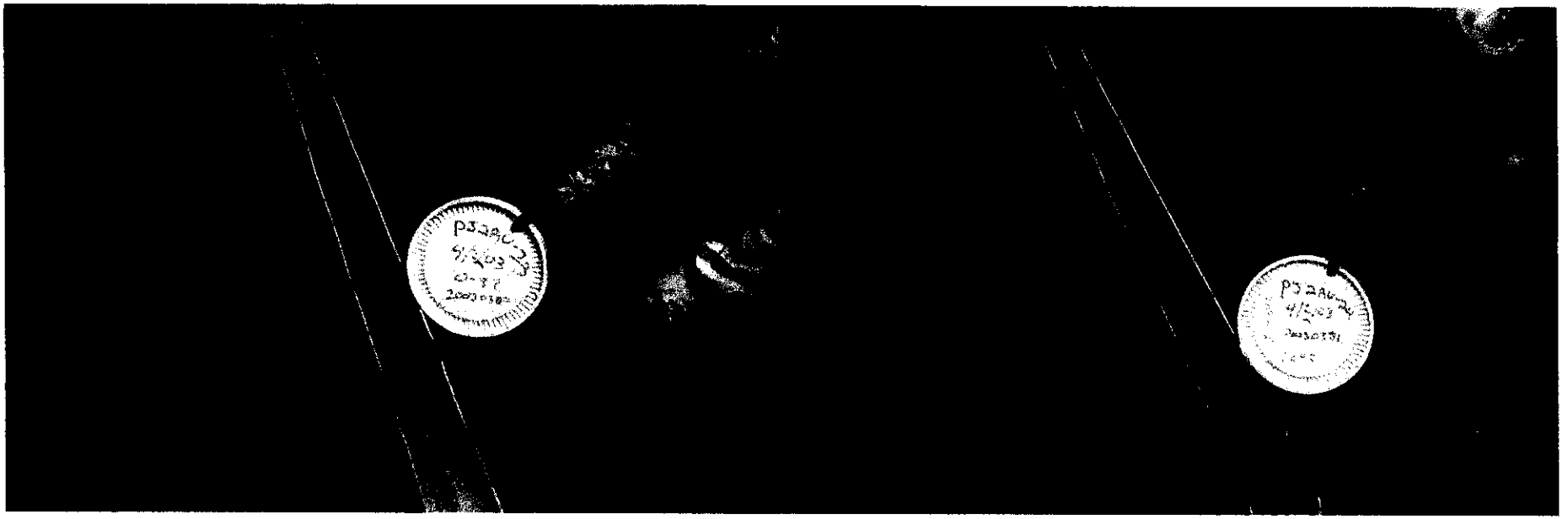
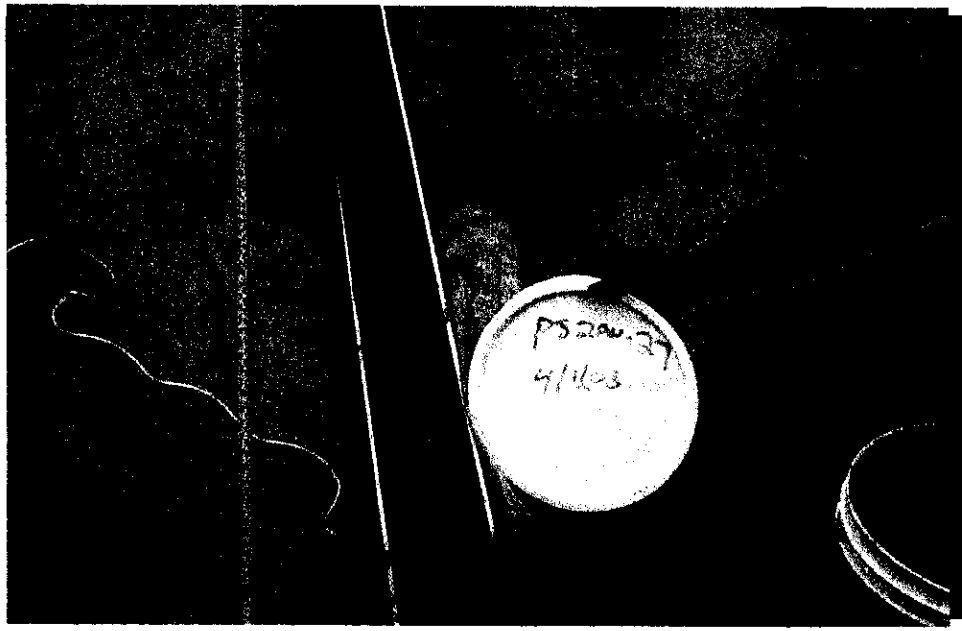


PJ2AU-23

PJ2AU-24

PJ2AU-25

PJ2AU-26



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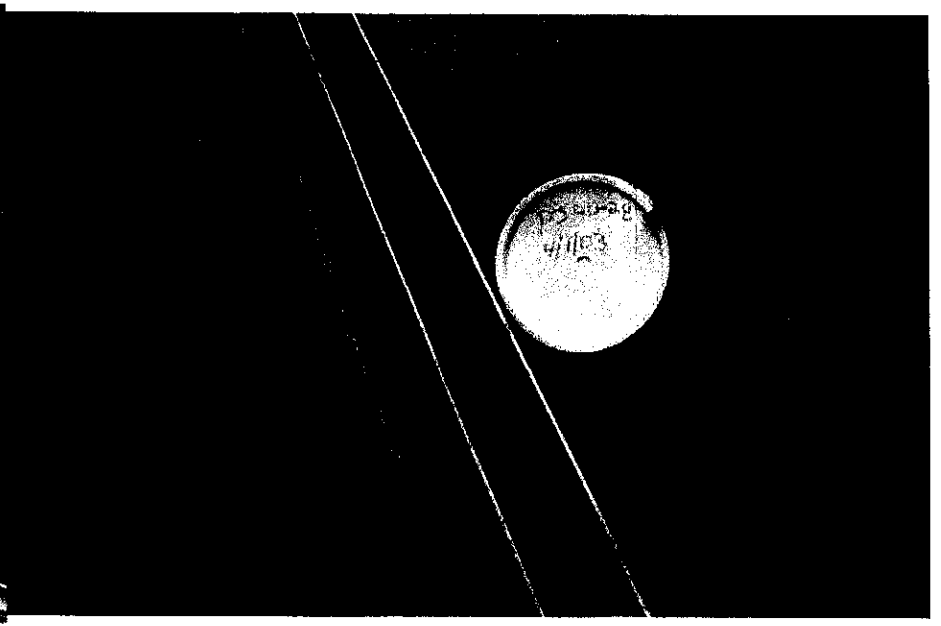
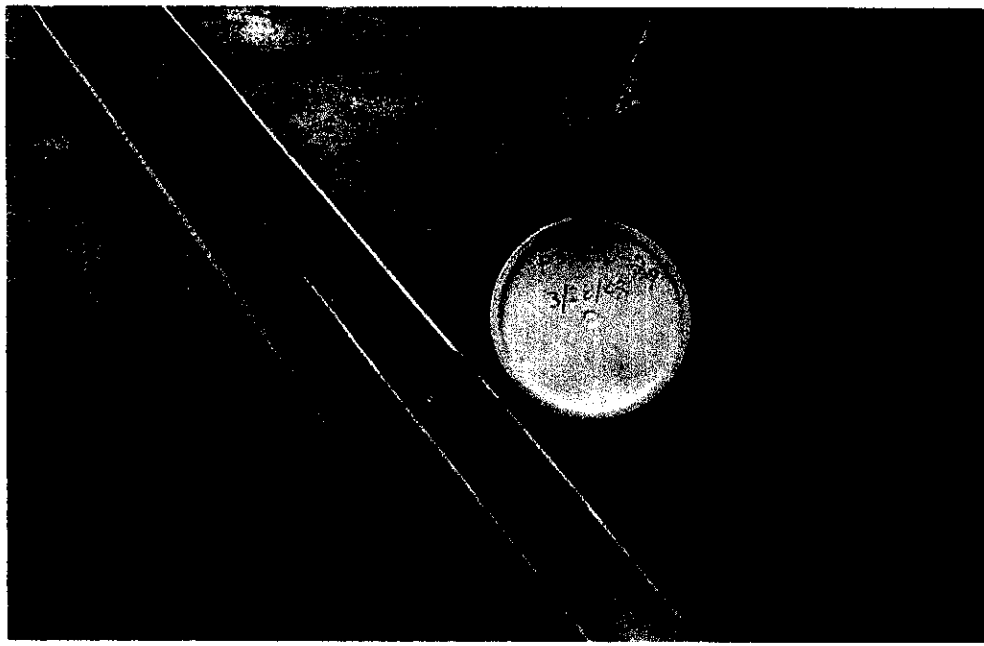
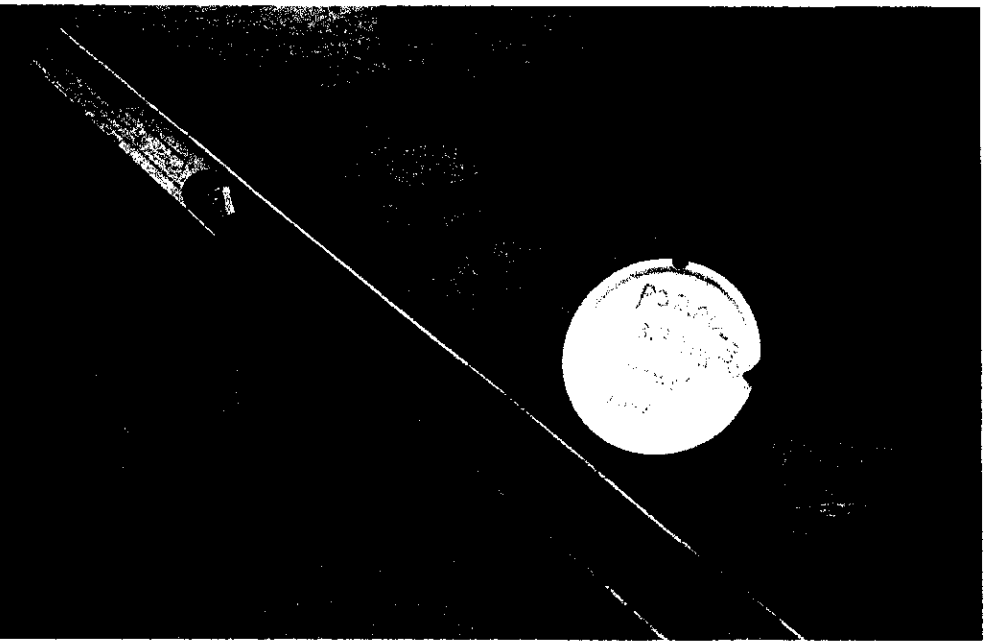


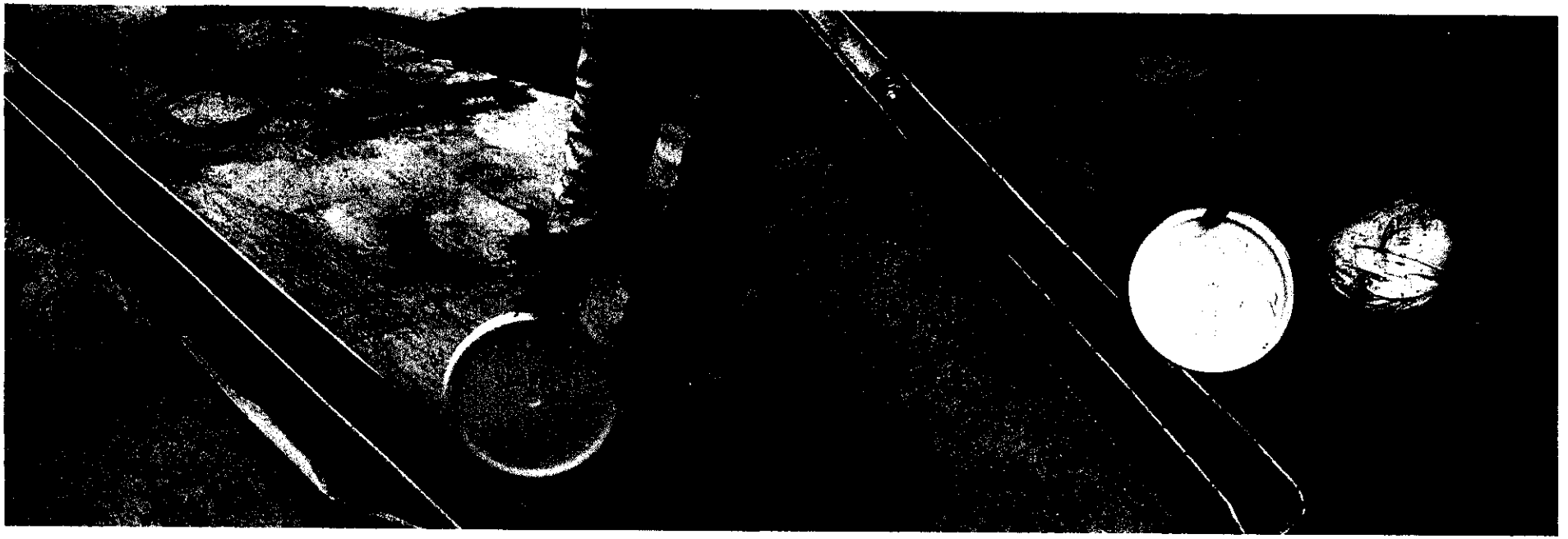
PJ2AU-28



PJ2AU-29



PJ2AU-30

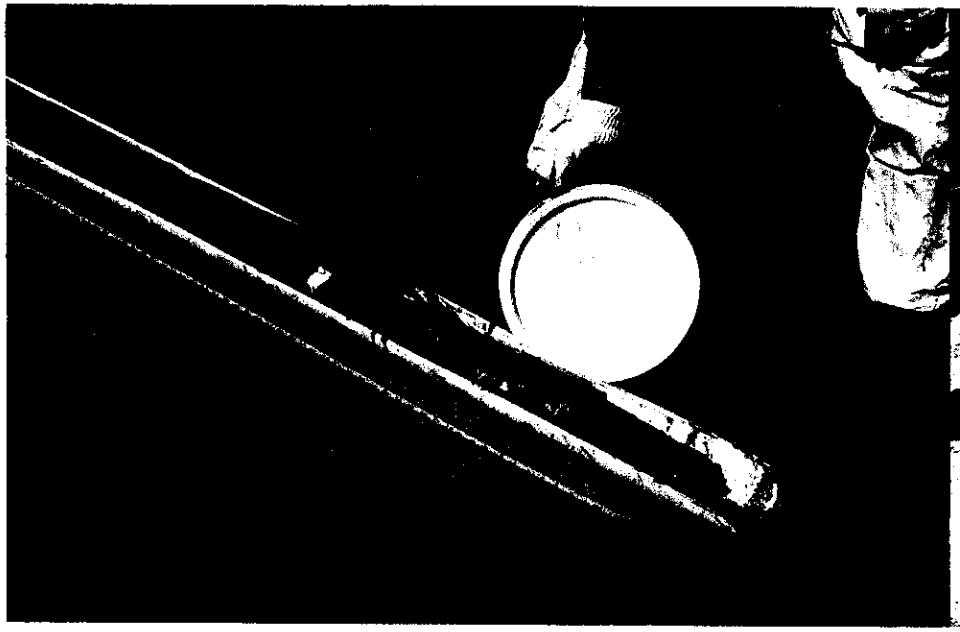


PJ2AU-31

PJ2AU-32

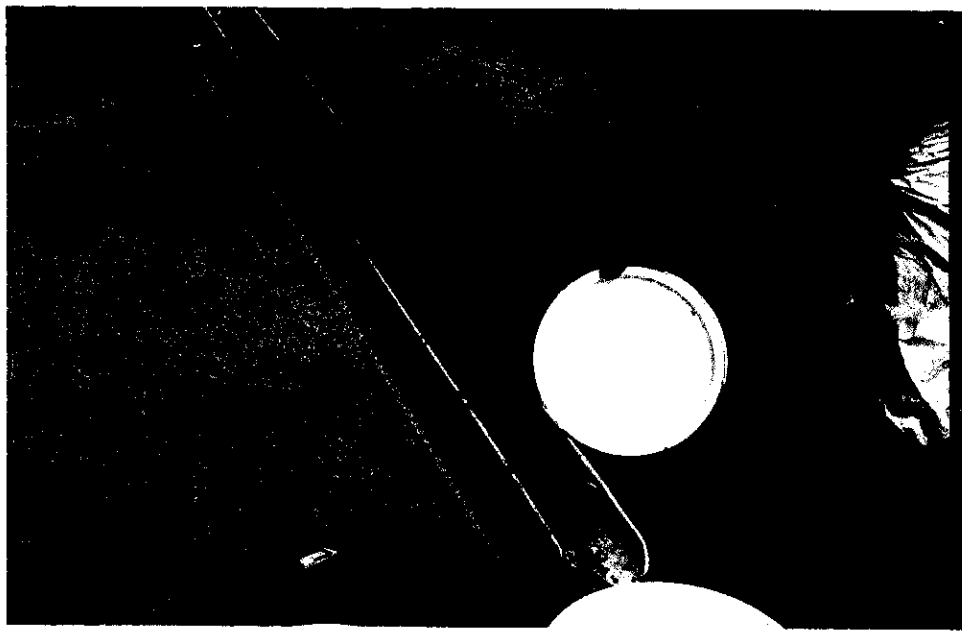
PJ2AU-33

PJ2AU-34



PJ2AU-35

PJ2AU-36



PJ2AU-37

PJ2AU-38

Chains of Custody

23057 37 at

CHAIN OF CUSTODY RECORD

FACILITY/LOCATION: Port Jersey Area 2A Upland	METHOD OF SHIPMENT: ASI Truck TO ASI FROM Port Jersey
SAMPLING AND ANALYSES AUTHORIZED BY: ACOE NYD	DATE: 3.28.03

SAMPLE #	SAMPLING LOCATION AND DESCRIPTION	DATE	TIME	SAMPLE TYPE C	G	SOLID	# OF CONT.	ANALYSES REQUIRED
2003 0333	PJ2AU-36	3.28	928		✓	Sediment	2	3.5 gal
2003 0334	PJ2AU-35	3-28-03	1008		✓		2	3.5 Gal
2003 0335	PJ2AU-33	3-28-03	1048		✓		2	3.5 Gal
2003 0336	PJ2AU-37	3/28/03	1141		✓		1	3.5 Gal
2003 0337	PJ2AU-38	3/28/03	1255		✓		1	3.5 GAL
2003 0338	PJ2AU-32	3/28/03	1340		✓		1	3.5 Gal
2003 0339	PJ2AU-30	3/28/03	1422		✓		1	3.5 Gal
2003 0340	PJ2AU-31	3/28/03	1458		✓		1	3.5 Gal
2003 0341	PJ2AU-29	3/28/03	1532		✓	Sediment	1	3.5 Gal

SAMPLE COLLECTED BY: E. Thayer M. Beaston, J. Nickles	EXACT SAMPLING LOCATION: MOT Channel Upper Harbor		
SAMPLE RELINQUISHED BY: Eric Thayer	SAMPLE RECEIVED BY: Jim Dor	DATE 3-28-03	TIME 18:30
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME

SAMPLE RELINQUISHED AFTER ANALYSES:	ANALYZED SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE DESCRIPTION:	# OF CONTAINERS:		

asi

AQUA SURVEY, INC.
(908) 788-8700

23-037

CHAIN OF CUSTODY RECORD

FACILITY/LOCATION:	METHOD OF SHIPMENT: ASI TRUCK TO ASI FROM PORT JERSEY
PORT JERSEY AREA 2A UPLAND	

SAMPLING AND ANALYSES AUTHORIZED BY:	DATE:
ACOE NYD	3/31/03

SAMPLE #	SAMPLING LOCATION AND DESCRIPTION	DATE	TIME	SAMPLE TYPE C	G	SOLID	# OF CONT.	~~ANALYSES REQUIRED~~ CONTAINER
2003 0342	PJ2AU-16	3/31/03	0835		✓	SEDIMENT	1	3.5 BUCKET
2003 0343	PJ2AU-19		0945		✓		1	3.5 BUCKET
2003 0344	PJ2AU-20		1030		✓		1	3.5 BUCKET
2003 0345	PJ2AU-13		1200		✓		1	3.5 BUCKET
2003 0346	PJ2AU-14		1308		✓		1	3.5 BUCKET
2003 0347	PJ2AU-15		1350		✓		1	3.5 BUCKET
2003 0348	PJ2AU-18		1424		✓		1	3.5 BUCKET
2003 0349	PJ2AU-22		1455		✓		1	3.5 BUCKET
2003 0350	PJ2AU-21	3/31/03	1520		✓	SEDIMENT	1	3.5 BUCKET

SAMPLE COLLECTED BY:	EXACT SAMPLING LOCATION:
E. THAYER, M. BERGSTON, J. NICKLES	PORT JERSEY NOT CHANNEL

SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
[signature]	[signature]	3/31/03	1815
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME

SAMPLE RELINQUISHED AFTER ANALYSES:	ANALYZED SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE DESCRIPTION:	# OF CONTAINERS:		

asi

AQUA SURVEY, INC.
(908) 788-8700

23-037

CHAIN OF CUSTODY RECORD

FACILITY/LOCATION:	METHOD OF SHIPMENT: ASI TRUCK TO ASI FROM PORT JERSEY
PORT JERSEY AREA 2A UPLAND	

SAMPLING AND ANALYSES AUTHORIZED BY:	DATE:
ACOE NYD	3/31/03

SAMPLE #	SAMPLING LOCATION AND DESCRIPTION	DATE	TIME	SAMPLE TYPE C	G	SOLID	# OF CONT.	~~ANALYSES REQUIRED~~ CONTAINER
2003 0351	PJ2AU-17	3/31/03	1540		✓	Sediment	1	3.5 Gal

SAMPLE COLLECTED BY:	EXACT SAMPLING LOCATION:		
E. THAYER, M. BEASTON, J. NICKLES	PORT JERSEY MOT CHANNEL		
SAMPLE RELINQUISHED BY: [signature]	SAMPLE RECEIVED BY: [signature]	DATE 3/31/03	TIME 1815
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME

SAMPLE RELINQUISHED AFTER ANALYSES:	ANALYZED SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE DESCRIPTION:	# OF CONTAINERS:		

asi

AQUA SURVEY, INC.
(908) 788-8700

23037

CHAIN OF CUSTODY RECORD

FACILITY/LOCATION: PORT JERSEY AREA 2A UPLAND	METHOD OF SHIPMENT: ASI TRUCK TO ASI FROM PORT JERSEY
SAMPLING AND ANALYSES AUTHORIZED BY: ACOE NYD	DATE: 4/1/03

SAMPLE #	SAMPLING LOCATION AND DESCRIPTION	DATE	TIME	SAMPLE TYPE C	G	SOLID	# OF CONT.	~~ANALYSES REQUIRED~~ CONTAINER
2003 0352	PJ2AU-1	4/1/03	0835		✓	SEDIMENT	1	3.5 BUCKET
2003 0353	PJ2AU-2		0920		✓		1	3.5 BUCKET
2003 0354	PJ2AU-5		0945		✓		1	3.5 BUCKET
2003 0355	PJ2AU-25		1021		✓		1	3.5 BUCKET
2003 0356	PJ2AU-26		1110		✓		1	3.5 BUCKET
2003 0357	PJ2AU-27		1138		✓		1	3.5 BUCKET
2003 0358	PJ2AU-8		1237		✓		1	3.5 BUCKET
2003 0359	PJ2AU-28		1330		✓		1	3.5 BUCKET
2003 0360	PJ2AU-10	4/1/03	1403		✓	SEDIMENT	1	3.5 BUCKET

SAMPLE COLLECTED BY:	EXACT SAMPLING LOCATION:
E. THAYER, M. BOSTON, J. NICKLES	PORT JERSEY MOT CHANNEL

SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
[signature]	[signature]	4/1/03	1730
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME

SAMPLE RELINQUISHED AFTER ANALYSES:	ANALYZED SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE DESCRIPTION:	# OF CONTAINERS:		

asi

AQUA SURVEY, INC.
(908) 788-8700

23037

CHAIN OF CUSTODY RECORD

FACILITY/LOCATION:	METHOD OF SHIPMENT: ASI TRUCK TO ASI FROM PORT JERSEY
PORT JERSEY AREA 2A UPLAND	

SAMPLING AND ANALYSES AUTHORIZED BY:	DATE:
ACOE NYD	4/1/03

SAMPLE #	SAMPLING LOCATION AND DESCRIPTION	DATE	TIME	SAMPLE TYPE C	G	SOLID	# OF CONT.	~~ANALYSES REQUIRED~~ CONTAINER
2003 0361	PJ2AU-9	4/1/03	1429		✓	SEDIMENT	1	3.5 BUCKET
2003 0362	PJ2AU-34	4/1/03	1458		✓	SEDIMENT	1	3.5 BUCKET
2003 0363 ET 6/18/03	PJ2AU FIELD BLANK	4/1/03	1550		✓	WATER	8	FIELD BLANK BOTTLES

SAMPLE COLLECTED BY:	EXACT SAMPLING LOCATION:
E. TIMPLE, M BRASTON, J NICKLES	PORT JERSEY MOT CHANNEL

SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
[illegible]	[illegible]	4/1/03	1730
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME

SAMPLE RELINQUISHED AFTER ANALYSES:	ANALYZED SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE DESCRIPTION:	# OF CONTAINERS:		

asi

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23037

CHAIN OF CUSTODY RECORD

FACILITY/LOCATION: Port Jersey Channel	METHOD OF SHIPMENT: ASI Truck TO Flemington FROM Jersey City
SAMPLING AND ANALYSES AUTHORIZED BY: ACOE NYD	DATE: 4.2.03

SAMPLE #	SAMPLING LOCATION AND DESCRIPTION	DATE	TIME	SAMPLE TYPE C	G	SOLID	# OF CONT.	~~ANALYSES REQUIRED~~ CONTAINER
2003 0377	PJ2AU-12	4.2.03	11:30		✓	Sediment	1	3.5 gal
2003 0378	PJ2AU-11	4/2/03	1208		✓		1	3.5 gal
2003 0379	PJ2AU-7	4/2/03	1240		✓		1	3.5 gal
2003 0380	PJ2AU-23	4/2/03	1311		✓		1	3.5 gal
2003 0381	PJ2AU-24	4/2/03	1341		✓		2	3.5 gal
2003 0382	PJ2AU-3	4/2/03	1440		✓		1	3.5 gal
2003 0383	PJ2AU-4	4/2/03	1515		✓		1	3.5 gal
2003 0384	PJ2AU-6	4/2/03	1557		✓		1	3.5 gal
2003 0385	PJ2AU-FIELD BLANK	4/2/03	1630		✓	Sediment	8 BOTTLES	MISC. BOTTLES

SAMPLE COLLECTED BY:	EXACT SAMPLING LOCATION:
E. THAYER, M. BEASTON, J. NICKLES	MOT Channel PORT JERSEY

SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
[signature]	[signature]	4/2/03	1900
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE RELINQUISHED BY:	SAMPLE RECEIVED BY:	DATE	TIME

SAMPLE RELINQUISHED AFTER ANALYSES:	ANALYZED SAMPLE RECEIVED BY:	DATE	TIME
SAMPLE DESCRIPTION:	# OF CONTAINERS:		

asi

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Sample Use Forms

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030352 **Sample ID:** PJ2AU - 1

SEDIMENT CHARACTERIZATION

Odor: slight Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 1.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	~1.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~1.5 gal	**Archive**	TD
4/3/03	1.5 gal	—	**Composite** A	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030353 **Sample ID:** PJ2AU – 2

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3.0 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
3 4/2/03	4 oz	~3.0 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~3.0 gal	**Archive**	TD
4/3/03	~1.5 gal	~1.5 gal	**Composite A**	TD
4/3/03	1.5 gal		archive	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030 382 **Sample ID:** PJ2AU - 3

SEDIMENT CHARACTERIZATION

Odor: sulfur Color: black / brown

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 2 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	~2 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~2 gal	**Archive**	TD
4/3/03	1.5 gal	~0.5 gal	**Composite** A	TD
4/3/03	0.5 gal	—	archive	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030387 **Sample ID:** PJ2AU COMPOSITE A

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ **COMPOSITING**

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

20030382 - 1.5 gal
20030352 - 1.5 gal
20030353 - 1.5 gal

Total Sample Volume: 4.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	4.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	4.5 gal	**Archive**	TD
4/3/03	2 gal	2.5 gal	Chemistry	TD
4/3/03	2.0 gal	0.5 gal	AMENDED A - all out for chemistry	TD
4/3/03	0.5 gal	—	archive	

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

94 TO 5/8/03

Job #: 23-037 **Client:** ACOE-PJ 2A Upland **ASI Sample #:** 20030387 **Sample ID:** Amended Comp. A

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ AMENDED **COMPOSITING**

Method Used: drill Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030387 - 2 gallons

Used Portland Cement – 8% by Volume to amend

Total Sample Volume: 2 gallons Date/ Initials: TO 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	2 gallons	–	Chemistry to Battelle	TO

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030303 **Sample ID:** PJ2AU-4

SEDIMENT CHARACTERIZATION

Odor: sulfur Color: brown

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
3 4/2/03	4 oz	~3 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~5 gal	**Archive**	TD
4/3/03	1.5 gal	~1.5 gal	**Composite B**	TD
4/3/03	~1.5 gal	—	archive	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030354 **Sample ID:** PJ2AU-5

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 2.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other:

Water Volume Used: Sediment Volume Used:

Mixing Duration: Date/ Initials:

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
3 4/2/03	4 oz	~2.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~2.5 gal	**Archive**	TD
4/3/03	~1.5 gal	1.0 gal	**Composite B**	TD
4/3/03	1.0 gal	—	archive	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030384 **Sample ID:** PJ2AU-6

SEDIMENT CHARACTERIZATION

Odor: sulfur Color: brown

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/~~2~~3/03	4 oz	~3 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~3 gal	**Archive**	TD
4/3/03	~1.5 gal	~1.5 gal	**Composite B**	TD
4/3/03	1.5 gal	—	archive	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030388 **Sample ID:** PJ2AU - COMP B OSIR

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ **COMPOSITING**

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030384 - 1.5 gal
20030354 - 1.5 gal
20030383 - 1.5 gal

Total Sample Volume: 4.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~4.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~4.5 gal	**Archive**	TD
4/3/03	2 gal	~2.5 gal	COMPOSITE AMENDED B - OUT FOR CHEM	TD
4/3/03	2 gal	0.5 gal	CHEMISTRY	TD
4/3/03	0.5 gal	—	archive	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE-PJ 2A Upland **ASI Sample #:** 20030395 **Sample ID:** Amended Comp. B

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ AMENDED **COMPOSITING**

Method Used: drill Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030388 · 2 gallons

Used Portland Cement – 8% by Volume to amend

Total Sample Volume: 2 gallons Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	2 gallons	—	chemistry to Battelle	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030379 **Sample ID:** PJ2AU - 7

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	~3.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~3.5 gal	**Archive**	TD
4/3/03	1.5 gal	2.0 gal	**Composite** C	TD
4/3/03	2.0 gal		ARCHIVE	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030 358 **Sample ID:** PJ2AU - 8

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 1.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
3 4/2/03	4 oz	~1.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~1.5 gal	**Archive**	TD
4/3/03	1.5 gal	—	**Composite C**	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030361 **Sample ID:** PJ2AU - 9

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 2 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	~2 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~2 gal	**Archive**	TD
4/3/03	1.5 gal	0.5 gal	**Composite C**	TD
4/3/03	0.5 gal	—	ARCHIVE	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030389 **Sample ID:** PJ2AU comp. C 0-12

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ **COMPOSITING**

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

20030361 – 1.5 gal
20030358 – 1.5 gal
20030379 – 1.5 gal

Total Sample Volume: 4.5 gal Date/ Initials: TP 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	~4.5 gal	**% moisture, TOC, Grain Size**	TP
4/3/03	4 oz	~4.5 gal	**Archive**	TP
4/3/03	2 gal	2.5 gal	chemistry	TP
4/3/03	2 gal	0.5 gal	ARCHIVED COMPOSITE C - out for chemistry	TP
4/3/03	0.5 gal	—	archive	TP

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE-PJ 2A Upland **ASI Sample #:** 20030596 **Sample ID:** Amended Comp. C

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ AMENDED **COMPOSITING**

Method Used: drill Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030389 - 2 gallons

Used Portland Cement – 8% by Volume to amend

Total Sample Volume: 2 gallons Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	2 gallons	–	Chemistry to Battelle	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030360 **Sample ID:** PJ2AU-10

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 2.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
3 4/2/03	4 oz	~2.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~2.5 gal	**Archive**	TD
4/3/03	1.5 gal	~1.0 gal	**Composite** D	TD
4/3/03	1.0 gal	—	archive	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030378 **Sample ID:** PJ2AU-11

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	~3.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~3.5 gal	**Archive**	TD
4/3/03	1.5 gal	2.0 gal	**Composite** D	TD
4/3/03	2.0 gal	—	archive	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030377 **Sample ID:** PJ2AU - 12

SEDIMENT CHARACTERIZATION

Odor: Slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 2.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~2.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~2.5 gal	**Archive**	TD
4/3/03	1.5 gal	1.0 gal	**Composite**	TD
4/3/03	1.0 gal	—	archive	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030390 **Sample ID:** PJ2AU composite D

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ **COMPOSITING**

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030377 – 1.5 gal
20030360 – 1.5 gal
20030378 – 1.5 gal

Total Sample Volume: 4.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	4.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	4.5 gal	**Archive**	TD
4/3/03	2.0 gal	2.5 gal	AMENDED D – out for chemistry	TD
4/3/03	2.0 gal	0.5 gal	chemistry	TD
4/3/03	0.5 gal	—	archive	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE-PJ 2A Upland **ASI Sample #:** 20030 397 **Sample ID:** Amended Comp. D

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ AMENDED **COMPOSITING**

Method Used: drill Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030390 - 2 gallons

Used Portland Cement – 8% by Volume to amend

Total Sample Volume: 2 gallons Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	2 gallons	—	Chemistry to Battelle	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030345 **Sample ID:** PJ2AU-13

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3.5 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~3.5 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~3.5 gal	**Archive**	TD
4/2/03	1.5 gal	~2.0 gal	**Composite E**	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030346 **Sample ID:** PJ2AU-14

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 2 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~2 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~2 gal	**Archive**	TD
4/2/03	1.5 gal	~0.5 gal	**Composite E**	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030347 **Sample ID:** PJ2AU-15

SEDIMENT CHARACTERIZATION

Odor: oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~3 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~3 gal	**Archive**	TD
4/2/03	1.5 gal	~1.5 gal	**Composite E**	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030364 **Sample ID:** PJ2AU-Comp E

SEDIMENT CHARACTERIZATION

Odor: oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ **COMPOSITING**

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030347 - 1.5 gal
20030346 - 1.5 gal
20030345 - 1.5 gal

Total Sample Volume: 4.5 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~4.5 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~4.5 gal	**Archive**	TD
4/2/03	2 gal	~2.5 gal	Amended Comp E - all sent for chemistry	TD
4/2/03	~2.0 gal	–	chemistry	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE-PJ 2A Upland **ASI Sample #:** 20030370 **Sample ID:** Amended Comp. E

SEDIMENT CHARACTERIZATION

Odor: oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ AMENDED **COMPOSITING**

Method Used: drill Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030364 - 2 gal

Used Portland Cement – 8% by Volume to amend

Total Sample Volume: 2 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	2 gal	–	chemistry - Battelle	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030342 **Sample ID:** PJ2AU-16

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 2.5 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~2.5 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~2.5 gal	**Archive**	TD
4/2/03	1.5 gal	—	**Composite** F	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030351 **Sample ID:** PJ2AU-17

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: ~1.5 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~1.5 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~1.5 gal	**Archive**	TD
4/2/03	1.5 gal	–	**Composite** F	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 2003034 8 **Sample ID:** PJ2AU - 18

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3.5 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~3.5 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~3.5 gal	**Archive**	TD
4/2/03	1.5 gal	~2.0 gal	**Composite** F	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030365 **Sample ID:** PJ2AU COMPOSITE F

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ **COMPOSITING**

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

20030342 – 1.5 gal
20030351 – 1.5 gal
20030348 – 1.5 gal

Total Sample Volume: 4.5 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other:

Water Volume Used: Sediment Volume Used:

Mixing Duration: Date/ Initials:

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~4.5 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~4.5 gal	**Archive**	TD
4/2/03	2 gal	~2.5 gal	AMENDED COMPOSITE F	TD
4/2/03	2 gal	~0.5 gal	Chemistry	TD
4/2/03	0.5 gal	—	ARCHIVE	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE-PJ 2A Upland **ASI Sample #:** 20030371 **Sample ID:** Amended Comp. F

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/(AMENDED) **COMPOSITING**

Method Used: drill Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030365 - 2 gallon

Used Portland Cement – 8% by Volume to amend

Total Sample Volume: 2 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	2 gal	—	Chemistry – Battelle	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030343 **Sample ID:** PJ2AU-19

SEDIMENT CHARACTERIZATION

Odor: Petroleum Color: Black

Consistency (sandy, silty, clayey): Silty (Stiff)

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3.5 gallons Date/ Initials: 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz		**% moisture, TOC, Grain Size**	
4/2/03	4 oz		**Archive**	
4/2/03	2 gallons		**Composite** G	
~~4/2/03~~			~~Chemistry~~	

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030344 **Sample ID:** PJ2AU-20

SEDIMENT CHARACTERIZATION

Odor: Petroleum Color: Black

Consistency (sandy, silty, clayey): Silty (Stiff)

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3gallons Date/ Initials: 4/2/03 [illegible]

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz		**% moisture, TOC, Grain Size**	[illegible]
	4 oz		**Archive**	[illegible]
	2gallons		**Composite G**	

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030366 **Sample ID:** PJ2AU - Comp G

SEDIMENT CHARACTERIZATION

Odor: Petroleum Color: Black

Consistency (sandy, silty, clayey): Stiff Silt

HOMOGENIZATION/ **COMPOSITING**

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)
20030343 - 2 gall.
20030344 - 2 gall.

Total Sample Volume: 4 gallons Date/ Initials: 4/2/03 M

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~4 gal	**% moisture, TOC, Grain Size**	M
4/2/03	4 oz	~4 gal	**Archive**	M TD
4/2/03	~2 gal	~2 gal	Amended Composite G all sent for Chemistry	TD
4/2/03	2 gal		Chemistry	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE-PJ 2A Upland **ASI Sample #:** 20030372 **Sample ID:** Amended Comp. 6

SEDIMENT CHARACTERIZATION

Odor: petroleum Color: black

Consistency (sandy, silty, clayey): consolidated silt

HOMOGENIZATION/ AMENDED **COMPOSITING**

Method Used: drill Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030366 - 2 gallon

Used Portland Cement – 8% by Volume to amend

Total Sample Volume: 2 gallon Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	2 gallons	—	Chemistry to Battelle	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030 3 50 **Sample ID:** PJ2AU-2(

SEDIMENT CHARACTERIZATION

Odor: oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 1.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	1.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	1.5 gal	**Archive**	TD
4/3/03	1.5 gal	—	**Composite H**	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030349 **Sample ID:** PJ2AU- 22

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
3 4/2/03	4 oz	~3.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~3.5 gal	**Archive**	TD
4/3/03	~1.5 gal	2.0 gal	**Composite** H	TD
4/3/03	2.0 gal	—	archive	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030380 **Sample ID:** PJ2AU-23

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3.5 gal Date/ Initials: TO 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	~3.5 gal	**% moisture, TOC, Grain Size**	TO
4/3/03	4 oz	~3.5 gal	**Archive**	TO
4/3/03	1.5 gal	2.0 gal	**Composite**	TO
4/3/03	2.0 gal		archive	TO

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030391 **Sample ID:** PJ2AU Composite H

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ **COMPOSITING**

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030350 – 1.5 gal
20030349 – 1.5 gal
20030380 – 1.5 gal

Total Sample Volume: 4.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other:

Water Volume Used: Sediment Volume Used:

Mixing Duration: Date/ Initials:

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	~4.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~4.5 gal	**Archive**	TD
4/3/03	2.0 gal	2.5 gal	chemistry	TD
4/3/03	2.0 gal	0.5 gal	AMENDED COMPOSITE H – all out for chem	TD
4/3/03	0.5 gal	—	archive	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE-PJ 2A Upland **ASI Sample #:** 20030398 **Sample ID:** Amended Comp. H

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ AMENDED **COMPOSITING**

Method Used: drill Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030391 - 2 gallons

Used Portland Cement – 8% by Volume to amend

Total Sample Volume: 2 gallons Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	2 gallons	—	chemistry to Battelle	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030381 **Sample ID:** PJ2AU-24

SEDIMENT CHARACTERIZATION

Odor: none Color: brown

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 4.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	~4.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~4.5 gal	**Archive**	TD
4/3/03	1.5 gal	3.0 gal	**Composite** I	TD
4/3/03	3.0 gal		archive	

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030355 **Sample ID:** PJ2AU-25

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 2.5 gal Date/ Initials: TO 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
3 4/2/03	4 oz	2.5 gal	**% moisture, TOC, Grain Size**	TO
4/3/03	4 oz	2.5 gal	**Archive**	TO
4/3/03	1.5 gal	1.0 gal	**Composite I**	TO
4/3/03	1.0 gal	—	archive	

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030356 **Sample ID:** PJ2AU-26

SEDIMENT CHARACTERIZATION

Odor: oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 1.5 gal Date/ Initials: TO 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
~~4/2/03~~ 3	4 oz	1.5 gal	**% moisture, TOC, Grain Size**	TO
4/3/03	4 oz	1.5 gal	**Archive**	TO
4/3/03	1.5 gal	—	**Composite I**	TO

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030382 **Sample ID:** PJ2AU Composite I

SEDIMENT CHARACTERIZATION

Odor: oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ **COMPOSITING**

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

20030381 - 1.5 gal
20030355 - 1.5 gal
20030356 - 1.5 gal

Total Sample Volume: 4.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other:

Water Volume Used: Sediment Volume Used:

Mixing Duration: Date/ Initials:

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	~4.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~4.5 gal	**Archive**	TD
4/3/03	2.0 gal	2.5 gal	chemistry	TD
4/3/03	2.0 gal	0.5 gal	AVERD composite I - all used for chemistry	TD
4/3/03	0.5 gal	—	archive	

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE-PJ 2A Upland **ASI Sample #:** 20030399 **Sample ID:** Amended Comp. I

SEDIMENT CHARACTERIZATION

Odor: oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ AMENDED **COMPOSITING**

Method Used: drill Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030392 - 2 gallons

Used Portland Cement – 8% by Volume to amend

Total Sample Volume: 2 gallons Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	2 gallons	—	chemistry to Battelle	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030357 **Sample ID:** PJ2AU-27

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 2 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~2 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~2 gal	**Archive**	TD
4/2/03	1.5 gal	0.5 gal	**Composite** J	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030359 **Sample ID:** PJ2AU-28

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 1.5 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~1.5 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~1.5 gal	**Archive**	TD
4/2/03	~1.5 gal	—	**Composite J**	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030341 **Sample ID:** PJ2AU-29

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3.0 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~3.0	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~3.0 gal	**Archive**	TD
4/2/03	~1.5 gal	1.5 gal	**Composite J**	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

TD 5/8/03

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030~~375~~ 367 **Sample ID:** PJ2AU Composite J

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt

HOMOGENIZATION/ **COMPOSITING**

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

20030357 - 1.5 gal
20030359 - 1.5 gal
20030341 - 1.5 gal

Total Sample Volume: 4.5 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other:

Water Volume Used: Sediment Volume Used:

Mixing Duration: Date/ Initials:

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~4.5 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~4.5 gal	**Archive**	TD
4/2/03	2 gal	~2.5 gal	Chemistry	TD
4/2/03	2 gal	0.5 gal	Amended Composite J	TD
4/2/03	0.5 gal		ARCHIVE	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE-PJ 2A Upland **ASI Sample #:** 20030 373 **Sample ID:** Amended Comp. J

SEDIMENT CHARACTERIZATION

Odor: light oil Color: black

Consistency (sandy, silty, clayey): silt

HOMOGENIZATION/ AMENDED **COMPOSITING**

Method Used: drill Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030367 - 2 gallons

Used Portland Cement – 8% by Volume to amend

Total Sample Volume: 2 gallons Date/ Initials: TO 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	2 gallons	—	chemistry to Battelle	TO

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030339 **Sample ID:** PJ2AU - 30

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 2.5 gal Date/ Initials: 4/2/03 TD

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~2.5 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~2.5 gal	**Archive**	TD
4/2/03	1.5 gal	~1.0 gal	**Composite** K	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030340 **Sample ID:** PJ2AU - 31

SEDIMENT CHARACTERIZATION

Odor: oil Color: black

Consistency (sandy, silty, clayey): silt

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3.0 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~3.0 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~3.0 gal	**Archive**	TD
4/2/03	1.5 gal	~1.5 gal	**Composite** K	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030338 **Sample ID:** PJ2AU - 32

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3.5 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~3.5 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~3.5 gal	**Archive**	TD
4/2/03	1.5 gal	2.0 gal	**Composite** IC	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030368 **Sample ID:** PJ2AU Composite K

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt

HOMOGENIZATION/ **COMPOSITING**

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030338 - 1.5 gal
20030339 - .5 gal
20030340 - 1.5 gal

Total Sample Volume: 4.5 gal Date/ Initials:

ELUTRIATE PREPARATION

Water used: site dilution other:

Water Volume Used: Sediment Volume Used:

Mixing Duration: Date/ Initials:

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~4.5 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~4.5 gal	**Archive**	TD
4/2/03	2.0 gal	2.5 gal	AMENDED K → sent for chemistry	TD
4/2/03	2.0 gal	0.5 gal	chemistry	TD
4/2/03	0.5 gal	—	archive	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE-PJ 2A Upland **ASI Sample #:** 20030374 **Sample ID:** Amended Comp. K

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt

HOMOGENIZATION/ (AMENDED) **COMPOSITING**

Method Used: drill Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030368 - 2 gallons

Used Portland Cement – 8% by Volume to amend

Total Sample Volume: 2 gallons Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	2 gallons	—	chemistry to Battelle	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030335 **Sample ID:** PJ2AU- 33

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt ~~and fine sand~~

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	3.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	3.5 gal	**Archive**	TD
4/3/03	2.0 gal	1.5 gal	**Composite**	TD
4/3/03	1.5 gal	~~1.5 gal~~	archive	

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030334 **Sample ID:** PJ2AU - 35

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): fine silt + sand

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 4.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
3 4/~~2~~/03	4 oz	~ 4.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~ 4.5 gal	**Archive**	TD
4/3/03	2 gal	~ 2.5 gal	**Composite**	TD
4/3/03	~ 2.5 gal	—	archive	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030393 **Sample ID:** PJ2AU composite L

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt some fine sand

HOMOGENIZATION/ **COMPOSITING**

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

20030334 - 2 gal
20030335 - 2 gal

Total Sample Volume: 4 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other:

Water Volume Used: Sediment Volume Used:

Mixing Duration: Date/ Initials:

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	4 oz	~4 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~4 gal	**Archive**	TD
4/3/03	2 gal	2 gal	AMENDED composite L - all out chemistry	TD
4/3/03	2 gal	—	chemistry	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE-PJ 2A Upland **ASI Sample #:** 20030 400 **Sample ID:** Amended Comp. L

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt and fine sand

HOMOGENIZATION/ AMENDED **COMPOSITING**

Method Used: drill Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030393 - 2 gallons

Used Portland Cement – 8% by Volume to amend

Total Sample Volume: 2 gallons Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/3/03	2 gallons	—	chemistry to Battelle	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030333 **Sample ID:** PJ2AU - 36

SEDIMENT CHARACTERIZATION

Odor: sulfur Color: black

Consistency (sandy, silty, clayey): silty

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 4.5 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~4.5 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~4.5 gal	**Archive**	TD
4/2/03	1.5 gal	3.0 gal	**Composite** m	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030336 **Sample ID:** PJ2AU-37

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~3 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~3 gal	**Archive**	TD
4/2/03	1.5 gal	~1.5 gal	**Composite** M	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030 337 **Sample ID:** PJ2AU38

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 3 gal Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~3 gal	**% moisture, TOC, Grain Size**	TD
4/2/03	4 oz	~3 gal	**Archive**	TD
4/2/03	1.5 gal	~1.5 gal	**Composite** m	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

TO 5/8/03

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030~~375~~ 369 **Sample ID:** PJ2AU - Comp M

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt

HOMOGENIZATION/ **COMPOSITING**

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030333 - 1.5 gal
20030336 - 1.5 gal
20030337 - 1.5 gal

Total Sample Volume: 4.5 gal Date/ Initials: TO 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~ 4.5 gal	**% moisture, TOC, Grain Size**	TO
4/2/03	4 oz	~ 4.5 gal	**Archive**	TO
4/2/03	2 gal	~ 2.5 gal	Chemistry	TO
4/2/03	2 gal	0.5 gal	Archived Composite M	TO
4/2/03	0.5 gal	—	archive	TO

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE-PJ 2A Upland **ASI Sample #:** 20030375 **Sample ID:** Amended Comp. M

SEDIMENT CHARACTERIZATION

Odor: slight oil Color: black

Consistency (sandy, silty, clayey): silt

HOMOGENIZATION/ AMENDED **COMPOSITING**

Method Used: drill Duration of Mixing: ~5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores) 20030369 - 2 gallons

Used Portland Cement – 8% by Volume to amend

Total Sample Volume: 2 gallons Date/ Initials: TD 4/2/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	2 gallons	—	chemistry to Battelle	TD

AQUA SURVEY, INC.
SPECIAL STUDIES DEPARTMENT
SAMPLE USE FORM

Job #: 23-037 **Client:** ACOE- PJ 2A Upland **ASI Sample #:** 20030362 **Sample ID:** PJ2AU-34

SEDIMENT CHARACTERIZATION

Odor: sulfur/slight oil Color: brown

Consistency (sandy, silty, clayey): fine sand + silt

HOMOGENIZATION/ COMPOSITING

Method Used: Drill- mixer Duration of Mixing: ~ 5 mins

If Composite, list all constituent ASI sample #'s:
(Also provide the amount of each sample used, of the number of cores)

Total Sample Volume: 1.5 gal Date/ Initials: TD 4/3/03

ELUTRIATE PREPARATION

Water used: site dilution other: _____

Water Volume Used: _____ Sediment Volume Used: _____

Mixing Duration: _____ Date/ Initials: _____

RECORD OF SAMPLE USE

DATE	AMOUNT USED	AMOUNT REMAINING	USED FOR	INITIALS
4/2/03	4 oz	~1.5 gal	**% moisture, TOC, Grain Size**	TD
4/3/03	4 oz	~1.5 gal	**Archive**	TD
4/3/03			~~**Composite**~~ MAY HAVE >90% SAND DID NOT USE IN COMPOSITE	
				TD

Percent Moisture
And Grain Size Distribution

PERCENT MOISTURE & HYDROSCOPIC CORRECTION FACTOR

Balance: Sartorious **Calibration:** x Yes No **Client:** ACOE Port Jersey 2A-Upland

Drying Oven: QL Model 40 **Temperature:** 105 degrees C **Job #:** 23-037

Sample	Sample ID#	Pan Weight g	Wet Sample + Pan g	Air Dry Sample +Pan Weight g	First Oven Dry Sample +Pan Weight g	Second Oven Dry Weight +Pan Weight g	% Moisture*	HMCF**
PJ2AU-36	20030333	1.1297	20.9570	11.3392	11.7321	11.1327	49.5	0.98
PJ2AU-35	20030334	1.1445	30.0460	23.3560	23.2510	23.2500	23.5	1.00
PJ2AU-33	20030335	1.1449	32.9284	21.5912	21.2485	21.2424	36.8	0.98
PJ2AU-37	20030336	1.1302	23.6613	13.9176	13.7184	13.7160	44.1	0.98
PJ2AU-38	20030337	1.1493	21.1942	11.6910	11.5039	11.5037	48.3	0.98
PJ2AU-32	20030338	1.1438	20.4442	11.7953	11.6189	11.6142	45.8	0.98
PJ2AU-30	20030339	1.1451	16.5030	8.9626	8.7944	8.7918	50.2	0.98
PJ2AU-31	20030340	1.1430	21.0796	11.2504	11.0458	11.0433	50.3	0.98
PJ2AU-29	20030341	1.1295	27.3459	13.6155	13.3034	13.2952	53.6	0.97
PJ2AU-16	20030342	1.1309	19.9402	9.4052	9.1797	9.1798	57.2	0.97
PJ2AU-19	20030343	1.1429	22.0964	10.6994	10.4319	10.4241	55.7	0.97
PJ2AU-20	20030344	1.1425	22.7761	11.4313	11.1759	11.1735	53.6	0.97
PJ2AU-13	20030345	1.1498	22.0331	13.4024	13.1821	13.1813	42.4	0.98
PJ2AU-14	20030346	1.1454	20.8137	9.6848	9.4446	9.4476	57.8	0.97
PJ2AU-15	20030347	1.1417	21.3520	13.0497	12.8405	12.8370	42.1	0.98
PJ2AU-18	20030348	1.1357	22.6311	12.3932	12.1599	12.1595	48.7	0.98
PJ2AU-22	20030349	1.1405	18.0199	9.6319	9.4363	9.4340	50.9	0.98
PJ2AU-21	20030350	1.1341	22.7121	10.5356	10.2872	10.2872	57.6	0.97
PJ2AU-17	20030351	1.1344	28.6500	16.0883	15.8387	15.8392	46.6	0.98
PJ2AU-1	20030352	1.1423	17.4176	7.7616	7.5839	7.5725	60.5	0.97
PJ2AU-2	20030353	1.1414	21.7725	10.0129	9.7743	9.7732	58.2	0.97
PJ2AU-5	20030354	1.1319	18.7292	9.3425	9.1227	9.1247	54.6	0.97
PJ2AU-25	20030355	1.1340	21.7630	13.1351	12.9205	12.9179	42.9	0.98
PJ2AU-26	20030356	1.1432	23.1090	12.2588	12.0200	12.0230	50.5	0.98
PJ2AU-27	20030357	1.1278	20.6702	10.2892	10.0485	10.0419	54.4	0.97
PJ2AU-8	20030358	1.1377	20.7372	9.9309	9.6944	9.6869	56.4	0.97
PJ2AU-28	20030359	1.1364	14.4323	7.4470	7.2868	7.2852	53.8	0.97
PJ2AU-10	20030360	1.1302	18.9287	9.8274	9.6166	9.6126	52.3	0.98
PJ2AU-9	20030361	1.1329	23.7960	11.8524	11.5849	11.5786	53.9	0.97
PJ2AU-34	20030362	1.1498	36.2688	29.3457	29.2390	29.2390	20.0	1.00
PJ2AU-12	20030377	1.1412	20.3804	11.0709	10.8765	10.8725	49.4	0.98
PJ2AU-11	20030378	1.1498	20.9953	10.7245	10.4907	10.4941	52.9	0.98
PJ2AU-7	20030379	1.1420	18.0376	9.1737	8.9793	8.9780	53.6	0.98
PJ2AU-23	20030380	1.1265	17.2053	8.5302	8.3251	8.3259	55.2	0.97
PJ2AU-24	20030381	1.1360	21.5185	9.9883	9.7461	9.7461	57.8	0.97
PJ2AU-3	20030382	1.1391	24.0195	15.2786	15.1148	15.1108	38.9	0.99
PJ2AU-4	20030383	1.1354	30.5251	20.2313	20.0289	20.0289	35.7	0.99
PJ2AU-6	20030384	1.1317	23.7550	15.2930	15.1011	15.1038	38.2	0.99
PJ2AU-13-Dup	20030345-Dup	1.1209	22.4560	13.5650	13.3398	13.3351	42.8	0.98
PJ2AU-13-Trip	20030345-Trip	1.1320	17.4887	10.7730	10.5884	10.5900	42.2	0.98
PJ2AU-8-Dup	20030358-Dup	1.1368	19.5600	9.4098	9.1843	9.1865	56.3	0.97
PJ2AU-8-Trip	20030358-Trip	1.1318	19.2598	9.2829	9.0779	9.0779	56.2	0.97
PJ2AU-6-Dup	20030384-Dup	1.1323	22.4023	14.4657	14.2883	14.2890	38.1	0.99
PJ2AU-6-Trip	20030384-Trip	1.1398	20.6262	13.3225	13.1587	13.1632	38.3	0.99

* % Moisture = $\frac{\text{[wet weight + pan - 2nd oven dry weight + pan]}}{\text{[wet weight + pan - pan]}}$

**HMCF = $\frac{\text{2nd oven dry sample - pan}}{\text{air dry sample - pan}}$

%MOISTURE.xls %MOISTUR-A

PERCENT MOISTURE & HYDROSCOPIC CORRECTION FACTOR

Balance: Sartorious **Calibration:** x Yes No **Client:** ACOE Port Jersey 2A-Upland

Drying Oven: QL Model 40 **Temperature:** 105 degrees C **Job #:** 23-037

Sample	Sample ID#	Pan Weight g	Wet Sample + Pan g	Air Dry Sample +Pan Weight g	First Oven Dry Sample +Pan Weight g	Second Oven Dry Weight +Pan Weight g	% Moisture*	HMCF**
PJ2AU-Composite-E	20030364	1.1349	19.2335	10.6705	10.4788	10.4778	48.4	0.98
PJ2AU-Composite-F	20030365	1.1454	18.9938	10.3205	10.1310	10.1339	49.6	0.98
PJ2AU-Composite-G	20030366	1.1384	19.1459	9.5460	9.3283	9.3248	54.5	0.97
PJ2AU-Composite-J	20030367	1.1499	25.9774	12.8408	12.5370	12.5370	54.1	0.97
PJ2AU-Composite-K	20030368	1.1300	21.7919	11.8152	11.6049	11.6025	49.3	0.98
PJ2AU-Composite-A	20030387	1.1320	22.5930	11.8012	11.5929	11.5930	51.3	0.98
PJ2AU-Composite-B	20030388	1.1362	21.6464	13.0672	12.8769	12.8818	42.7	0.98
PJ2AU-Composite-C	20030389	1.1418	20.2415	10.1476	9.9331	9.9372	54.0	0.98
PJ2AU-Composite-D	20030390	1.1472	18.9415	9.9347	9.7373	9.7373	51.7	0.98
PJ2AU-Composite-H	20030391	1.1394	18.8753	9.4282	9.2183	9.2150	54.5	0.97
PJ2AU-Composite-I	20030392	1.1406	18.9953	9.8854	9.6878	9.6872	52.1	0.98
PJ2AU-Composite-L	20030393	1.1345	26.0241	19.0250	18.8910	18.8884	28.7	0.99
PJ2AU-Composite-M	20030369	1.1494	17.6565	9.8893	97.4180	9.7367	48.0	0.98
PJ2AU-Composite-M-Dup	20030369-Dup	1.1370	21.1875	11.7634	11.5724	11.5716	48.0	0.98
PJ2AU-Composite-M-Trip	20030369-Trip	1.1403	19.5226	10.8721	10.6987	10.6963	48.0	0.98

* % Moisture = $\frac{\text{[wet weight + pan - 2nd oven dry weight + pan]}}{\text{[wet weight + pan - pan]}}$

**HMCF = $\frac{\text{2nd oven dry sample - pan}}{\text{air dry sample - pan}}$

%MOISTURE.xls %MOISTUR-B

AQUA SURVEY, INC.
PERCENT MOISTURE & HYDROSCOPIC CORRECTION FACTOR BENCHSHEET

Balance: (Sartorious) Mettler

Calibration: (YES) NO

Client: ACOE - PJ 2AU

Drying Oven: QL Model 40

Temperature: _____ °C

Job #: 23-037

Cores

	Sample #	A	B	C	D	E	F	G	H	I	% Moisture*	HMCF**
1.	20030333	1.1297	20.9570	11.3392	11.1321	11.1327						
2.	20030334	1.1445	30.0460	23.3560	23.2510	23.2500						
3.	20030335	1.1449	32.9284	21.5912	21.2485	21.2424						
4.	20030336	1.1302	23.6613	13.9176	13.7184	13.7160						
5.	20030337	1.1493	21.1942	11.6910	11.5039	11.5037						
6.	20030338	1.1438	20.4442	11.7953	11.6189	11.6142						
7.	20030339	1.1451	16.5030	8.9626	8.7944	8.7918						
8.	20030340	1.1430	21.0796	11.2504	11.0458	11.0433						
9.	20030341	1.1295	27.3459	13.6155	13.3034	13.2952						
10.	20030342	1.1309	19.9402	9.4052	9.1797	9.1798						
11.	20030343	1.1429	22.0964	10.6994	10.4319	10.4241						
12.	20030344	1.1425	22.7761	11.4313	11.1759	11.1735						
13.	20030345	1.1498	22.0331	13.4024	13.1821	13.1813						
14.	20030346	1.1454	20.8137	9.6848	9.4446	9.4476						
15.	20030347	1.1417	21.3520	13.0497	12.8405	12.8430	12.8370					
16.	20030348	1.1357	22.6311	12.3932	12.1599	12.1595						
17.	20030349	1.1405	18.0199	9.6319	9.4363	9.4340						
18.	20030350	1.1341	22.7121	10.5356	10.2872	10.2872						
19.	20030351	1.1344	28.6500	16.0883	15.8387	15.8392						
20.	20030352	1.1423	17.4176	7.7616	7.5839	7.5725						
21.	20030353	1.1414	21.7725	10.0129	9.7743	9.7732						
22.	20030354	1.1319	18.7292	9.3425	9.1227	9.1247						
23.	20030355	1.1340	21.7630	13.1351	12.9205	12.9179						
24.	20030356	1.1432	23.1090	12.2588	12.0200	12.0250	12.0230					
	Initials/ Date	AA 4/7/03 →		C.A.K. 4/16/03	M 4/22/03	AA 4/23/03 →						

A= Empty Pan (g)
B= Wet Sample + Pan (g)
C= Air Dry Sample + Pan (g)
D= First Oven Dry Sample + Pan (g)
E= Second Oven Dry Sample + Pan (g)

* % moisture = $\frac{\text{B- Final oven dry wt.}}{\text{B-A}}$ X100

** HMCF= (Final oven dry wt.- A)/ (C-A)

If oven dried sample is not ± 0.05g or at a constant weight after second oven dry, return samples to oven and use F, G, H, and I until requirement is met.

AQUA SURVEY, INC.
PERCENT MOISTURE & HYDROSCOPIC CORRECTION FACTOR BENCHSHEET

Balance: (Sartorious) Mettler

Calibration: (YES) NO

Client: ACOE-PJ 2AU

Drying Oven: QL Model 40

Temperature: _____°C

Job #: 23-137

	Sample #	A	B	C	D	E	F	G	H	I	% Moisture*	HMCF**
25.	20030357	1.1278	20.6702	10.2892	10.0465	10.0419						
26.	20030358	1.1377	20.7372	9.9309	~~9.0779~~ ④	9.6869						
27.	20030359	1.1364	14.4323	~~9.4098~~ ①	7.2868	7.2852						
28.	20030360	1.1302	18.9287	~~9.2829~~ ②	9.6166	9.4126						
29.	20030361	1.1329	23.7960	11.8524	11.5849	11.5786						
30.	20030362	1.1498	36.2688	29.3457	29.2390	29.2390						
31.	20030377	1.1412	20.3804	11.0709	10.8765	10.8725						
32.	20030378	1.1498	20.9953	10.7245	10.4907	10.4941						
33.	20030379	1.1420	18.0376	9.1737	8.9793	8.9818	8.9780					
34.	20030380	1.1265	17.2053	8.5302	8.3251	8.3270	8.3259					
35.	20030381	1.1360	21.5185	9.9883	9.7461	9.7461						
36.	20030382	1.1391	24.0195	15.2786	15.1148	15.1108						
37.	20030383	1.1354	30.5251	20.2313	20.0289	20.0289						
38.	20030384	1.1317	23.7550	15.2930	~~13.1587~~ ③	15.1038						
	20030345 dup	1.1209	22.4560	13.5650	13.3398	13.3351						
	20030345 trp	1.1320	17.4887	10.7730	10.5884	10.5930	10.5900					
	20030358 dup	1.1368	19.5600	9.4098	9.1843	9.1865						
	20030358 trp	1.1318	19.2598	9.2829	9.0779	9.0779						
	20030384 dup	1.1323	22.4023	14.4657	14.2883	14.2890						
	20030384 trp	1.1398	20.6262	13.3225	13.1587	13.1620	13.1632					
	Initials/ Date	MM 4/7/03 →		C.A.K 4/16/03	7/4/22/03	AA 4/23/03 →						

A= Empty Pan (g)
B= Wet Sample + Pan (g)
C= Air Dry Sample + Pan (g)
D= First Oven Dry Sample + Pan (g)
E= Second Oven Dry Sample + Pan (g)

* % moisture = $\frac{\text{B- Final oven dry wt.}}{\text{B-A}}$ X100

** HMCF= (Final oven dry wt.- A)/ (C-A)

If oven dried sample is not ± 0.05g or at a constant weight after second oven dry, return samples to oven and use F, G, H, and I until requirement is met.

① 7.4470 C.A.K 4/14/03 ③ 15.1011 7/4/22/03 ④ 9.6944 7/4/22/03

② 9.8274 C.A.K 4/16/03

AQUA SURVEY, INC.
PERCENT MOISTURE & HYDROSCOPIC CORRECTION FACTOR BENCHSHEET

Balance: (Sartorious) Mettler

Calibration: (YES) NO

Client: ACOE-PT 2ALL

Drying Oven: QL Model 40

Temperature: _____°C

Job #: 23-037

Composites

Sample #	A	B	C	D	E	F	G	H	I	% Moisture*	HMCF**
20030364	1.1349	19.2335	10.6705	10.4788	10.4778						
20030365	1.1454	18.9938	10.3205	10.1310	10.1340	10.1339					
20030366	1.1384	19.1459	9.5460	9.3283	9.3248						
20030367	1.1499	25.9774	12.8408	12.5370	12.5376	12.5370					
20030368	1.1300	21.7919	11.8152	11.6049	11.6025						
20030387	1.1320	22.5930	11.8012	11.5929	11.5930						
20030388	1.1362	21.6464	13.0672	12.8769	12.8818	12.8818					
20030389	1.1418	20.2415	10.1476	9.9331	9.9396	9.9372					
20030390	1.1472	18.9415	9.9347	9.7373	9.7397	9.7373					
20030391	1.1394	18.8753	9.4282	9.2183	9.2150						
20030392	1.1406	18.9953	9.8854	9.6878	9.6872						
20030393	1.1345	26.0241	19.0250	18.8910	18.8884						
20030369D	1.1494	17.6565	9.8893	97.418	9.7367						
20030369dp	1.1370	21.1875	11.7634	11.5724	11.5767	11.5716					
20030369tp	1.1403	19.5226	10.8721	10.6987	10.6963						
Initials/ Date	AH 4/7/03		C.A.K 4/16/03	AH 4/22/03							

A= Empty Pan (g)
B= Wet Sample + Pan (g)
C= Air Dry Sample + Pan (g)
D= First Oven Dry Sample + Pan (g)
E= Second Oven Dry Sample + Pan (g)

* **% moisture** = $\frac{\text{B- Final oven dry wt.}}{\text{B-A}}$ X100

** **HMCF**= (Final oven dry wt.- A)/ (C-A)

If oven dried sample is not ± 0.05g or at a constant weight after second oven dry, return samples to oven and use F, G, H, and I until requirement is met.

D 20030369

PARTICLE SIZE CORRECTION BENCHSHEET

Client: ACOE-Port Jersey 2A Upland
ASI Job #: 23-037

Sample	Sample ID#	Container Mass g	Sample and Container g	Gravel and Container g	Percent Gravel
PJ2AU-14	20030346	12.48	83.01	12.62	0.20
PJ2AU-15	20030347	12.54	80.21	12.71	0.25
PJ2AU-18	20030348	12.35	88.35	12.63	0.37
PJ2AU-22	20030349	12.69	79.53	12.69	0.00
PJ2AU-21	20030350	12.61	76.96	12.61	0.00
PJ2AU-17	20030351	12.64	82.22	14.65	2.89
PJ2AU-1	20030352	12.56	70.68	12.56	0.00
PJ2AU-2	20030353	12.59	78.66	12.59	0.00
PJ2AU-5	20030354	12.65	70.91	12.65	0.00
PJ2AU-25	20030355	12.31	66.09	12.55	0.45
PJ2AU-26	20030356	12.54	73.31	12.68	0.23
PJ2AU-27	20030357	12.61	72.23	12.61	0.00
PJ2AU-8	20030358	12.59	67.49	12.59	0.00
PJ2AU-8 Duplicate	20030358	12.64	66.12	12.64	0.00
PJ2AU-8 Triplicate	20030358	12.32	72.65	12.32	0.00

Percent Gravel = [(gravel +container- container)/(sample + container - container)] * 100

RT 5/14/03

% Gravel.xls 051003 gravel

PARTICLE SIZE CORRECTION BENCHSHEET

Client: ACOE-Port Jersey 2A Upland
ASI Job #: 23-037

Sample	Sample ID#	Container Mass g	Sample and Container g	Gravel and Container g	Percent Gravel
PJ2AU-36	20030333	12.39	65.06	12.39	0.00
PJ2AU-35	20030334	12.63	77.32	16.80	6.45
PJ2AU-33	20030335	12.58	80.23	14.17	2.35
PJ2AU-37	20030336	12.66	75.84	12.76	0.16
PJ2AU-38	20030337	12.31	76.35	12.31	0.00
PJ2AU-32	20030338	12.70	82.92	12.70	0.00
PJ2AU-30	20030339	12.69	68.58	12.72	0.05
PJ2AU-31	20030340	12.64	65.32	12.64	0.00
PJ2AU-29	20030341	12.51	68.90	12.73	0.39
PJ2AU-16	20030342	12.61	66.96	12.61	0.00
PJ2AU-19	20030343	12.30	85.81	12.33	0.04
PJ2AU-20	20030344	12.38	89.41	12.38	0.00
PJ2AU-13	20030345	12.64	76.30	12.64	0.00
PJ2AU-13 Duplicate	20030345	12.53	81.95	12.53	0.00
PJ2AU-13 Triplicate	20030345	12.51	81.99	12.51	0.00

Percent Gravel = [(gravel +container- container)/(sample + container - container)] * 100

5/14/03

% Gravel.xls 050803 gravel

PARTICLE SIZE CORRECTION BENCHSHEET

Client: ACOE-Port Jersey 2A Upland

ASI Job #: 23-037

Sample	Sample ID#	Container Mass g	Sample and Container g	Gravel and Container g	Percent Gravel
PJ2AU-Composite-E	20030364	12.38	71.83	12.50	0.20
PJ2AU-Composite-F	20030365	12.36	83.84	12.48	0.17
PJ2AU-Composite-G	20030366	12.31	83.20	12.31	0.00
PJ2AU-Composite-J	20030367	12.59	78.42	12.78	0.29
PJ2AU-Composite-K	20030368	12.33	83.86	12.33	0.00
PJ2AU-Composite-A	20030387	12.65	81.49	12.79	0.20
PJ2AU-Composite-B	20030388	12.66	83.95	12.79	0.18
PJ2AU-Composite-C	20030389	12.60	70.48	12.60	0.00
PJ2AU-Composite-D	20030390	12.62	76.17	12.62	0.00
PJ2AU-Composite-H	20030391	12.53	80.16	12.53	0.00
PJ2AU-Composite-I	20030392	12.61	72.52	12.70	0.15
PJ2AU-Composite-L	20030393	12.56	83.54	15.48	4.11
PJ2AU-Composite-M	20030369	12.54	64.12	12.54	0.00
PJ2AU-Composite-M-Dup	20030369-Dup	12.52	70.95	12.52	0.00
PJ2AU-Composite-M-Trip	20030369-Trip	12.35	80.46	12.35	0.00

Percent Gravel = [(gravel +container- container)/(sample + container - container)] * 100

KF 5/27/03

% Gravel.xls %Gravel

PARTICLE SIZE CORRECTION BENCHSHEET

Client: ACOE-Port Jersey 2A Upland

ASI Job #: 23-037

Sample	Sample ID#	Container Mass g	Sample and Container g	Gravel and Container g	Percent Gravel
PJ2AU-28	20030359	12.58	69.57	12.58	0.00
PJ2AU-10	20030360	12.65	81.34	12.65	0.00
PJ2AU-9	20030361	12.62	76.86	12.62	0.00
PJ2AU-34	20030362	12.61	75.11	16.94	6.93
PJ2AU-12	20030377	12.48	77.08	12.48	0.00
PJ2AU-11	20030378	12.33	70.17	12.42	0.16
PJ2AU-7	20030379	12.64	80.97	12.64	0.00
PJ2AU-23	20030380	12.85	87.20	12.85	0.00
PJ2AU-24	20030381	12.63	88.35	12.63	0.00
PJ2AU-3	20030382	12.65	75.34	12.76	0.18
PJ2AU-4	20030383	12.79	80.33	12.79	0.00
PJ2AU-6	20030384	12.57	70.43	12.64	0.12
PJ2AU-6-Dup	20030384-Dup	12.52	81.34	12.52	0.00
PJ2AU-6-Trip	20030384-Trip	12.64	86.03	12.64	0.00

Percent Gravel = [(gravel +container- container)/(sample + container - container)] * 100

RS 2/27/03

% Gravel.xls %Gravel4

AQUA SURVEY, INC
PERCENT GRAVEL DETERMINATION &
PARTICLE SIZE CORRECTION BENCHSHEET

JOB #: 23-037

CLIENT: ACOE

Sample ID	Container Mass (g)	Sample and Container (g)	Gravel and Container (g)	% Gravel	% Sand (Corrected)	% Silt (Corrected)	% Clay (Corrected)
2003 0346	12.48	83.01	12.62				
0347	12.54	80.21	12.71				
0348	12.35	88.35	12.63				
0349	12.69	79.53	12.69	0			
0350	12.61	76.96	12.61	0			
0351	12.64	82.22	14.65				
0352	12.56	70.68	12.56	0			
0353	12.59	78.66	12.59	0			
0354	12.65	70.91	12.65	0			
0355	12.31	66.09	12.55				
0356	12.54	73.31	12.68				
0357	12.61	72.23	12.61	0			
0358	12.59	67.49	12.59	0			
DUP 0358	12.64	66.12	12.64	0			
TRP 0358	12.32	72.65	12.32	0			
Date/ Initials	5/1/03 C.A.K	5/1/03 C.A.K	5/1/03 C.A.K	5/1/03 C.A.K			

Percent Gravel = [(Gravel and Container- Container) / (Sample and Container – Container)] * 100

Fraction Ceorrection: [(Hydrometer Percentage/ 100) * (1.0 – Percent Gravel)] * 100

(Hydrometer Percentage from Graph)

AQUA SURVEY, INC
PERCENT GRAVEL DETERMINATION &
PARTICLE SIZE CORRECTION BENCHSHEET

JOB #: 23-037

CLIENT: ACOE

Sample ID	Container Mass (g)	Sample and Container (g)	Gravel and Container (g)	% Gravel	% Sand (Corrected)	% Silt (Corrected)	% Clay (Corrected)
2003 0333	12.39	65.06	12.39	0			
0334	12.63	77.32	16.80				
0335	12.58	80.23	14.17				
0336	12.66	75.84	12.76				
0337	12.31	76.35	12.31	0			
0338	12.70	82.92	12.70	0			
0339	12.69	68.58	12.72				
0340	12.64	65.32	12.64	0			
0341	12.51	68.90	12.73				
0342	12.61	66.96	12.61	0			
0343	12.30	85.81	12.33				
0344	12.38	89.41	12.38	0			
0345	12.64	76.30	12.64	0			
Dup 0345	12.53	81.95	12.53	0			
Trp 0345	12.51	81.99	12.51	0			
Date/ Initials	5/1/03 C.A.K	5/1/03 C.A.K	5/1/03 C.A.K	5/1/03 C.A.K			

Percent Gravel = [(Gravel and Container- Container) / (Sample and Container – Container)] * 100

Fraction Ceorrection: [(Hydrometer Percentage/ 100) * (1.0 – Percent Gravel)] * 100

(Hydrometer Percentage from Graph)

AQUA SURVEY, INC
PERCENT GRAVEL DETERMINATION &
PARTICLE SIZE CORRECTION BENCHSHEET

JOB #: 23-037

CLIENT: ACOE

Sample ID	Container Mass (g)	Sample and Container (g)	Gravel and Container (g)	% Gravel	% Sand (Corrected)	% Silt (Corrected)	% Clay (Corrected)
2003 0364	12.38	71.83	12.50				
0365	12.36	83.84	12.48				
0366	12.31	83.20	12.31	0			
0367	12.59	78.42	12.78				
0368	12.33	83.86	12.33	0			
0387	12.65	81.49	12.79				
0388	12.66	83.95	12.79				
0389	12.60	70.48	12.60	0			
0390	12.6~~7~~2 CAK	76.17	12.62	0			
0391	12.53	80.16	12.53	0			
0392	12.61	72.52	12.70				
0393	12.56	83.54	~~12~~ 15.48 CAK				
0369	12.54	64.12	12.54	0			
Dup 0369	12.52	70.95	12.52	0			
Trp. 0369	12.35	80.46	12.35	0			
Date/ Initials	5/6/03 C.A.K	5/6/03 C.A.K	5/6/03 C.A.K	5/6/03 C.A.K			

Percent Gravel = [(Gravel and Container- Container) / (Sample and Container – Container)] * 100

Fraction Ceorrection: [(Hydrometer Percentage/ 100)* (1.0 – Percent Gravel)] * 100

(Hydrometer Percentage from Graph)

AQUA SURVEY, INC
PERCENT GRAVEL DETERMINATION &
PARTICLE SIZE CORRECTION BENCHSHEET

JOB #: 23-037

CLIENT: ACOE

Sample ID	Container Mass (g)	Sample and Container (g)	Gravel and Container (g)	% Gravel	% Sand (Corrected)	% Silt (Corrected)	% Clay (Corrected)
2003 0359	12.58	69.57	12.58	0			
0360	12.65	81.34	12.65	0			
0361	12.62	76.86	12.62	0			
0362	12.61	75.11	16.94				
0377	12.48	77.08	12.48	0			
0378	12.33	70.17	12.42				
0379	12.64	80.97	12.64	0			
0380	12.85	87.20	12.85	0			
0381	12.63	88.35	12.63	0			
0382	12.65	75.34	12.76				
0383	12.79	80.33	12.79	0			
0384	12.57	70.43	12.64				
DUP 0384	12.52	81.34	12.52	0			
TRP. 0384	12.64	86.03	12.64	0			
Date/ Initials	5/5/03 C.A.K	5/5/03 C.A.K	5/5/03 C.A.K	5/5/03 C.A.K			

Percent Gravel = [(Gravel and Container- Container) / (Sample and Container – Container)] * 100

Fraction Ceorrection: [(Hydrometer Percentage/ 100) * (1.0 – Percent Gravel)] * 100

(Hydrometer Percentage from Graph)

HYDROMETRIC READINGS FOR GRAIN SIZE ANALYSIS

Job #: 23-037 Client: ACOE

Balance: Sartorius Calibration: Yes ✓ No ___

Sample: 20030364 Grams Used: ___ DC: 6

Clock Time	T	R_h	Initials/Date
9:00	0	XXXX	5/15/03
9:02	2	43	
9:05	5	38	
9:15	15	33.5	
9:30	30	30	
10:00	60	25	
1:10	250	17	
9:00	1440	13	5/16/03

Sample: 20030367 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:12	0	XXXX	5/15/03
9:14	2	46	
9:17	5	40	
9:27	15	35	
9:42	30	30	
10:12	60	21	
1:22	250	15	
9:12	1440	11	5/16/03

Sample: 20030365 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:04	0	XXXX	5/15/03
9:06	2	39	
9:09	5	35	
9:19	15	31	
9:34	30	27	
10:04	60	21	
1:14	250	15	
9:04	1440	11	5/16/03

Sample: 20030368 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:16	0	XXXX	5/15/03
9:18	2	36	
9:21	5	32	
9:31	15	29	
9:46	30	35	
10:16	60	20	
1:26	250	14	
9:16	1440	11	5/16/03

Sample: 20030366 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:08	0	XXXX	5/15/03
9:10	2	46	
9:13	5	41	
9:23	15	36	
9:38	30	30	
10:08	60	22	
1:18	250	15	
9:08	1440	12	5/16/03

DC= Dispersant Constant T= Time in minutes after initial mixing R_h= Hydrometer Reading

Hydrometer - Green

Grain Size Calculations

ASI #: 20030364
Sample:PJ2AU-Composite-E

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
43	37	75.5102	2	9.243	0.028978865	-1.537919
38	32	65.30612	5	10.063	0.019123555	-1.718431
33.5	27.5	56.12245	15	10.801	0.011438689	-1.941624
30	24	48.97959	30	11.375	0.008300514	-2.080895
25	19	38.77551	60	12.195	0.006077223	-2.216295
17	11	22.44898	250	13.507	0.003133281	-2.504001
13	7	14.28571	1440	14.163	0.001336861	-2.873914

DC =	6
HMCF=	0.98
K =	0.01348
% Gravel	0.2

	Hydrometer	Corrected for % Gravel
Percent Clay	32.25456424	32.19006
Percent Silt	57.92329559	57.80745
Percent Sand	9.82214017	9.802496
Percent Gravel	0.2	0.2
Total		100

Regression Output

Constant	148.0677
Std. Error of Y Est.	3.433697
R Squared	0.980134
No. of Observations	7
X Coefficients	48.07651
Std. Error of Coeffic.	3.060946

RF 5/27/03

Grain Size Calculations

ASI #: 20030365
Sample:PJ2AU-Composite-F

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
39	33	67.34694	2	9.899	0.029989592	-1.523029
35	29	59.18367	5	10.555	0.01958547	-1.708066
31	25	51.02041	15	11.211	0.01165377	-1.933534
27	21	42.85714	30	11.867	0.008478123	-2.0717
21	15	30.61224	60	12.851	0.006238537	-2.204917
15	9	18.36735	250	13.835	0.003171097	-2.498791
11	5	10.20408	1440	14.491	0.001352253	-2.868942

DC =	6
HMCF=	0.98
K =	0.01348
% Gravel	0.17

	Hydrometer	Corrected for % Gravel
Percent Clay	26.65488053	26.60957
Percent Silt	54.56705679	54.47429
Percent Sand	18.77806269	18.74614
Percent Gravel	0.17	0.17
Total		100

Regression Output

Constant	135.7575
Std. Error of Y Est.	3.866464
R Squared	0.972206
No. of Observations	7
X Coefficients	45.29082
Std. Error of Coeffic.	3.424686

RJ 5/27/03

Grain Size Calculations

ASI #: 20030366
Sample:PJ2AU-Composite-G

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
46	40	82.47423	2	8.751	0.028197054	-1.549796
41	35	72.16495	5	9.571	0.018650202	-1.729316
36	30	61.85567	15	10.391	0.011219485	-1.950027
30	24	49.48454	30	11.375	0.008300514	-2.080895
22	16	32.98969	60	12.687	0.006198602	-2.207706
15	9	18.5567	250	13.835	0.003171097	-2.498791
12	6	12.37113	1440	14.327	0.001344579	-2.871414

DC =	6
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	30.82735086	30.82735
Percent Silt	69.17264914	69.17265
Percent Sand	0	0
Percent Gravel	0	0
Total		100

Regression Output

Constant	170.0316
Std. Error of Y Est.	6.881418
R Squared	0.945229
No. of Observations	7
X Coefficients	57.78663
Std. Error of Coeffic.	6.220832

5/27/03

Grain Size Calculations

ASI #: 20030367
Sample:PJ2AU-Composite-J

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
46	40	82.47423	2	8.751	0.028197054	-1.549796
40	34	70.10309	5	9.735	0.01880931	-1.725627
35	29	59.79381	15	10.555	0.011307677	-1.946627
30	24	49.48454	30	11.375	0.008300514	-2.080895
21	15	30.92784	60	12.851	0.006238537	-2.204917
15	9	18.5567	250	13.835	0.003171097	-2.498791
11	5	10.30928	1440	14.491	0.001352253	-2.868942

DC =	6
HMCF=	0.97
K =	0.01348
% Gravel	0.29

	Hydrometer	Corrected for % Gravel
Percent Clay	29.42596484	29.34063
Percent Silt	70.13675158	69.93336
Percent Sand	0.437283575	0.436015
Percent Gravel	0.29	0.29
Total		100

Regression Output

Constant	169.659
Std. Error of Y Est.	6.648546
R Squared	0.949399
No. of Observations	7
X Coefficients	58.21371
Std. Error of Coeffic.	6.010262

5/21/03

Grain Size Calculations

ASI #: 20030368
Sample:PJ2AU-Composite-K

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
36	30	61.22449	2	10.391	0.030725826	-1.512496
32	26	53.06122	5	11.047	0.02003674	-1.698173
29	23	46.93878	15	11.539	0.011823018	-1.927272
35	29	59.18367	30	10.555	0.007995735	-2.097142
20	14	28.57143	60	13.015	0.006278217	-2.202164
14	8	16.32653	250	13.999	0.003189836	-2.496232
11	5	10.20408	1440	14.491	0.001352253	-2.868942

DC =	6
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	27.4459995	27.446
Percent Silt	48.76760698	48.76761
Percent Sand	23.78639353	23.78639
Percent Gravel	0	0
Total		100

Regression Output

Constant	124.9531
Std. Error of Y Est.	9.936017
R Squared	0.811104
No. of Observations	7
X Coefficients	40.47726
Std. Error of Coeffic.	8.735727

TCF 5/27/07

HYDROMETRIC READINGS FOR GRAIN SIZE ANALYSIS

Job #: 23-037

Client: ACDE

Balance: Sartorius

Calibration: Yes ✓ No ___

Sample: 20030319 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:36	0	XXXX	5/15/03
9:38	2	31	
9:41	5	27	
9:51	15	24	
10:06	30	20	
10:36	60	17	
1:46	250	12	
9:36	1440	9	5/16/03

Sample: 20030387 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:48	0	XXXX	5/15/03
9:50	2	36	
9:53	5	33	
10:03	15	29	
10:18	30	26	
10:48	60	21	
1:58	250	15	
9:48	1440	10	5/16/03

Sample: 20030319 dup Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:40	0	XXXX	5/15/03
9:42	2	31	
9:45	5	27	
9:55	15	24	
10:10	30	21	
10:40	60	17	
1:50	250	12	
9:40	1440	9	5/16/03

Sample: 20030388 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:52	0	XXXX	5/15/03
9:54	2	34	
9:57	5	30	
10:07	15	25	
10:22	30	22	
10:52	60	20	
2:02	250	15	
9:52	1440	10	5/16/03

Sample: 20030319 hp Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:44	0	XXXX	5/15/03
9:46	2	31	
9:49	5	26	
9:59	15	23	
10:14	30	20	
10:44	60	17	
1:54	250	13	
9:44	1440	9	5/16/03

DC= Dispersant Constant T= Time in minutes after initial mixing R_h= Hydrometer Reading

Hydrometer- Blue

Grain Size Calculations

ASI #: 20030369
Sample:PJ2AU-Composite-M

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
31	27	55.10204	2	11.211	0.031915163	-1.496003
27	23	46.93878	5	11.867	0.020767076	-1.682625
24	20	40.81633	15	12.359	0.0122359	-1.912364
20	16	32.65306	30	13.015	0.00887874	-2.051649
17	13	26.53061	60	13.507	0.006395783	-2.194106
12	8	16.32653	250	14.327	0.003226989	-2.491202
9	5	10.20408	1440	14.819	0.001367471	-2.864082

DC =	4
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	22.06078939	22.06079
Percent Silt	41.15711496	41.15711
Percent Sand	36.78209565	36.7821
Percent Gravel	0	0
Total		100

Regression Output

Constant	104.3513
Std. Error of Y Est.	2.816569
R Squared	0.974938
No. of Observations	7
X Coefficients	34.16053
Std. Error of Coeffic.	2.449406

RF 5/27/03

Grain Size Calculations

ASI #: 20030369-Dup
Sample:PJ2AU-Composite-M-Dup

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
31	27	55.10204	2	11.211	0.031915163	-1.496003
27	23	46.93878	5	11.867	0.020767076	-1.682625
24	20	40.81633	15	12.359	0.0122359	-1.912364
21	17	34.69388	30	12.851	0.008822623	-2.054402
17	13	26.53061	60	13.507	0.006395783	-2.194106
12	8	16.32653	250	14.327	0.003226989	-2.491202
9	5	10.20408	1440	14.819	0.001367471	-2.864082

DC =	4
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	22.34230163	22.3423
Percent Silt	41.24842863	41.24843
Percent Sand	36.40926974	36.40927
Percent Gravel	0	0
Total		100

Regression Output

Constant	104.8154
Std. Error of Y Est.	2.70843
R Squared	0.976877
No. of Observations	7
X Coefficients	34.23632
Std. Error of Coeffic.	2.35559

5/27/03

Grain Size Calculations

ASI #: 20030369-Trip
Sample:PJ2AU-Composite-M-Trip

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
31	27	55.10204	2	11.211	0.031915163	-1.496003
26	22	44.89796	5	12.031	0.020910083	-1.679644
23	19	38.77551	15	12.523	0.012316816	-1.909502
20	16	32.65306	30	13.015	0.00887874	-2.051649
17	13	26.53061	60	13.507	0.006395783	-2.194106
13	9	18.36735	250	14.163	0.003208467	-2.493702
9	5	10.20408	1440	14.819	0.001367471	-2.864082

DC =	4
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	22.2508791	22.25088
Percent Silt	39.2252715	39.22527
Percent Sand	38.5238494	38.52385
Percent Gravel	0	0
Total		100

Regression Output

Constant	100.6788
Std. Error of Y Est.	2.4036
R Squared	0.979888
No. of Observations	7
X Coefficients	32.55709
Std. Error of Coeffic.	2.085912

RF 5/27/03

Grain Size Calculations

ASI #: 20030387
Sample:PJ2AU-Composite-A

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
36	32	65.30612	2	10.391	0.030725826	-1.512496
33	29	59.18367	5	10.883	0.019887455	-1.701421
29	25	51.02041	15	11.539	0.011823018	-1.927272
26	22	44.89796	30	12.031	0.008536506	-2.06872
21	17	34.69388	60	12.851	0.006238537	-2.204917
15	11	22.44898	250	13.835	0.003171097	-2.498791
10	6	12.2449	1440	14.655	0.001359883	-2.866498

DC =	4
HMCF=	0.98
K =	0.01348
% Gravel	0.2

	Hydrometer	Corrected for % Gravel
Percent Clay	29.07291745	29.01477
Percent Silt	49.92151469	49.82167
Percent Sand	21.00556785	20.96356
Percent Gravel	0.2	0.2
Total		100

Regression Output

Constant	128.8871
Std. Error of Y Est.	2.424317
R Squared	0.98692
No. of Observations	7
X Coefficients	41.435
Std. Error of Coeffic.	2.133265

TE 5/27/03

Grain Size Calculations

ASI #: 20030388
Sample:PJ2AU-Composite-B

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
34	30	61.22449	2	10.719	0.031207001	-1.505748
30	26	53.06122	5	11.375	0.020332023	-1.691819
25	21	42.85714	15	12.195	0.012154446	-1.915265
22	18	36.73469	30	12.687	0.008766147	-2.057191
20	16	32.65306	60	13.015	0.006278217	-2.202164
15	11	22.44898	250	13.835	0.003171097	-2.498791
10	6	12.2449	1440	14.655	0.001359883	-2.866498

DC =	4
HMCF=	0.98
K =	0.01348
% Gravel	0.18

	Hydrometer	Corrected for % Gravel
Percent Clay	26.387548	26.34005
Percent Silt	43.37854082	43.30046
Percent Sand	30.23391118	30.17949
Percent Gravel	0.18	0.18
Total		100

Regression Output

Constant	113.1196
Std. Error of Y Est.	2.024719
R Squared	0.988096
No. of Observations	7
X Coefficients	36.00432
Std. Error of Coeffic.	1.767322

5/27/03

HYDROMETRIC READINGS FOR GRAIN SIZE ANALYSIS

Job #: 23-037 Client: ACOE

Balance: Sartorius Calibration: Yes √ No ___

Sample: 20030389 Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:12	0	XXXX	[illegible] 5/15/03
10:14	2	42	
10:17	5	36	
10:27	15	32	
10:42	30	28	
11:12	60	23	
2:22	250	16	
10:12	1440	11	[illegible] 5/16/03

Sample: 20030392 [illegible] Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:24	0	XXXX	[illegible] 5/15/03
10:26	2	40	
10:29	5	36	
10:39	15	31	
10:54	30	27	
11:24	60	23	
2:34	250	16	
10:24	1440	11	[illegible] 5/16/03

Sample: 20030390 Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:16	0	XXXX	[illegible] 5/15/03
10:18	2	39	
10:21	5	34	
10:31	15	30.5	
10:46	30	26	
11:16	60	21	
2:26	250	15	
10:16	1440	11	[illegible] 5/16/03

Sample: 20030393 [illegible] Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:28	0	XXXX	[illegible] 5/15/03
10:30	2	18	
10:33	5	16	
10:43	15	15	
10:58	30	14	
11:28	60	13	
2:38	250	10	
10:28	1440	8	[illegible] 5/16/03

Sample: 20030391 Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:20	0	XXXX	[illegible] 5/15/03
10:22	2	45	
10:25	5	40	
10:35	15	35	
10:50	30	30	
11:20	60	22	
2:30	250	15	
10:20	1440	11	[illegible] 5/16/03

DC= Dispersant Constant T= Time in minutes after initial mixing R_h= Hydrometer Reading

Hydrometer - Yellow

Grain Size Calculations

ASI #: 20030389
Sample:PJ2AU-Composite-C

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
42	37	75.5102	2	9.407	0.029234823	-1.5341
36	31	63.26531	5	10.391	0.019432719	-1.711466
32	27	55.10204	15	11.047	0.011568217	-1.936734
28	23	46.93878	30	11.703	0.008419336	-2.074722
23	18	36.73469	60	12.523	0.006158408	-2.210532
16	11	22.44898	250	13.671	0.003152245	-2.50138
11	6	12.2449	1440	14.491	0.001352253	-2.868942

DC =	5
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	30.57143036	30.57143
Percent Silt	58.46233325	58.46233
Percent Sand	10.96623639	10.96624
Percent Gravel	0	0
Total		100

Regression Output

Constant	147.4624
Std. Error of Y Est.	3.204273
R Squared	0.982995
No. of Observations	7
X Coefficients	48.52391
Std. Error of Coeffic.	2.854167

TF 5/27/03

Grain Size Calculations

ASI #: 20030390
Sample:PJ2AU-Composite-D

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
39	34	69.38776	2	9.899	0.029989592	-1.523029
34	29	59.18367	5	10.719	0.01973704	-1.704718
30.5	25.5	52.04082	15	11.293	0.011696312	-1.931951
26	21	42.85714	30	12.031	0.008536506	-2.06872
21	16	32.65306	60	12.851	0.006238537	-2.204917
15	10	20.40816	250	13.835	0.003171097	-2.498791
11	6	12.2449	1440	14.491	0.001352253	-2.868942

DC =	5
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	28.18917006	28.18917
Percent Silt	53.44805691	53.44806
Percent Sand	18.36277303	18.36277
Percent Gravel	0	0
Total		100

Regression Output

Constant	135.0545
Std. Error of Y Est.	3.645327
R Squared	0.974267
No. of Observations	7
X Coefficients	44.36204
Std. Error of Coeffic.	3.224292

5/27/07

Grain Size Calculations

ASI #: 20030391
Sample:PJ2AU-Composite-H

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
45	40	82.47423	2	8.915	0.028460044	-1.545764
40	35	72.16495	5	9.735	0.01880931	-1.725627
35	30	61.85567	15	10.555	0.011307677	-1.946627
30	25	51.54639	30	11.375	0.008300514	-2.080895
22	17	35.05155	60	12.687	0.006198602	-2.207706
15	10	20.61856	250	13.835	0.003171097	-2.498791
11	6	12.37113	1440	14.491	0.001352253	-2.868942

DC =	5
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	31.81796866	31.81797
Percent Silt	68.18203134	68.18203
Percent Sand	0	0
Percent Gravel	0	0
Total		100

Regression Output

Constant	169.1633
Std. Error of Y Est.	5.820324
R Squared	0.959321
No. of Observations	7
X Coefficients	57.01494
Std. Error of Coeffic.	5.250605

5/27/03

Grain Size Calculations

ASI #: 20030392
Sample:PJ2AU-Composite-I

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
40	35	71.42857	2	9.735	0.029740131	-1.526657
36	31	63.26531	5	10.391	0.019432719	-1.711466
31	26	53.06122	15	11.211	0.01165377	-1.933534
27	22	44.89796	30	11.867	0.008478123	-2.0717
23	18	36.73469	60	12.523	0.006158408	-2.210532
16	11	22.44898	250	13.671	0.003152245	-2.50138
11	6	12.2449	1440	14.491	0.001352253	-2.868942

DC =	5
HMCF=	0.98
K =	0.01348
% Gravel	0.15

	Hydrometer	Corrected for % Gravel
Percent Clay	30.02262782	29.97759
Percent Silt	55.51599014	55.43272
Percent Sand	14.46138204	14.43969
Percent Gravel	0.15	0.15
Total		100

Regression Output

Constant	141.0226
Std. Error of Y Est.	2.533139
R Squared	0.988247
No. of Observations	7
X Coefficients	46.07844
Std. Error of Coeffic.	2.247281

RF 5/27/03

Grain Size Calculations

ASI #: 20030393
Sample:PJ2AU-Composite-L

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
18	13	26.26263	2	13.343	0.034817825	-1.458198
16	11	22.22222	5	13.671	0.022289741	-1.651895
15	10	20.20202	15	13.835	0.012945948	-1.887866
14	9	18.18182	30	13.999	0.009208264	-2.035822
13	8	16.16162	60	14.163	0.006549255	-2.183808
10	5	10.10101	250	14.655	0.003263719	-2.486287
8	3	6.060606	1440	14.983	0.001375017	-2.861692

DC =	5
HMCF=	0.99
K =	0.01348
% Gravel	4.11

	Hydrometer	Corrected for % Gravel
Percent Clay	12.3006888	11.79513
Percent Silt	17.35491847	16.64163
Percent Sand	70.34439273	67.45324
Percent Gravel	4.11	4.11
Total		100

Regression Output

Constant	47.00051
Std. Error of Y Est.	0.786237
R Squared	0.98944
No. of Observations	7
X Coefficients	14.40463
Std. Error of Coeffic.	0.665524

RJ 5/27/03

HYDROMETRIC READINGS FOR GRAIN SIZE ANALYSIS

Job #: 23-037 Client: ACOE

Balance: Sartorius Calibration: Yes ✓ No ___

Sample: 20030359 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:00	0	XXXX	M 5/12/03
9:02	2	46	
9:05	5	40	
9:15	15	34	
9:30	30	29	
10:00	60	22	
1:10	250	15	
9:00	1440	11	M 5/13/03

Sample: 20030362 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:12	0	XXXX	M 5/12/03
9:14	2	11	
9:17	5	10	
9:27	15	10	
9:42	30	9.5	
10:12	60	9	
1:22	250	8	
9:12	1440	7	M 5/13/03

Sample: 20030360 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:04	0	XXXX	M 5/12/03
9:06	2	43	
9:09	5	37	
9:19	15	33	
9:34	30	28	
10:04	60	21	
1:14	250	15	
9:04	1440	11	M 5/13/03

Sample: ~~20030360~~ 377① M Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:16	0	XXXX	M 5/12/03
9:18	2	38	
9:21	5	32	
9:31	15	29	
9:46	30	25	
10:16	60	20	
1:26	250	14	
9:16	1440	11	M 5/13/03

①20030377M

Sample: 20030361 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:08	0	XXXX	M 5/12/03
9:10	2	44	
9:13	5	37	
9:23	15	32	
9:38	30	28	
10:08	60	22	
1:18	250	15	
9:08	1440	11	M 5/13/03

DC= Dispersant Constant T= Time in minutes after initial mixing R_h= Hydrometer Reading

Grain Size Calculations

ASI #: 20030359
Sample:PJ2AU-28

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
46	40	82.47423	2	8.751	0.028197054	-1.549796
40	34	70.10309	5	9.735	0.01880931	-1.725627
34	28	57.73196	15	10.719	0.011395185	-1.943279
29	23	47.42268	30	11.539	0.008360136	-2.077787
22	16	32.98969	60	12.687	0.006198602	-2.207706
15	9	18.5567	250	13.835	0.003171097	-2.498791
11	5	10.30928	1440	14.491	0.001352253	-2.868942

DC =	6
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	29.25299689	29.253
Percent Silt	69.4924218	69.49242
Percent Sand	1.25458131	1.254581
Percent Gravel	0	0
Total		100

Regression Output

Constant	168.1978
Std. Error of Y Est.	5.812639
R Squared	0.960217
No. of Observations	7
X Coefficients	57.67891
Std. Error of Coeffic.	5.25044

5/27/03

Grain Size Calculations

ASI #: 20030360
Sample:PJ2AU-10

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
43	37	75.5102	2	9.243	0.028978865	-1.537919
37	31	63.26531	5	10.227	0.019278756	-1.714921
33	27	55.10204	15	10.883	0.011482027	-1.939981
28	22	44.89796	30	11.703	0.008419336	-2.074722
21	15	30.61224	60	12.851	0.006238537	-2.204917
15	9	18.36735	250	13.835	0.003171097	-2.498791
11	5	10.20408	1440	14.491	0.001352253	-2.868942

DC =	6
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	27.68228331	27.68228
Percent Silt	62.06708409	62.06708
Percent Sand	10.2506326	10.25063
Percent Gravel	0	0
Total		100

Regression Output

Constant	151.7806
Std. Error of Y Est.	5.244156
R Squared	0.960168
No. of Observations	7
X Coefficients	51.51586
Std. Error of Coeffic.	4.692445

5/27/03

Grain Size Calculations

ASI #: 20030361
Sample:PJ2AU-9

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
44	38	78.35052	2	9.079	0.028720626	-1.541806
37	31	63.91753	5	10.227	0.019278756	-1.714921
32	26	53.60825	15	11.047	0.011568217	-1.936734
28	22	45.36082	30	11.703	0.008419336	-2.074722
22	16	32.98969	60	12.687	0.006198602	-2.207706
15	9	18.5567	250	13.835	0.003171097	-2.498791
11	5	10.30928	1440	14.491	0.001352253	-2.868942

DC =	6
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	28.1191379	28.11914
Percent Silt	63.41113638	63.41114
Percent Sand	8.469725722	8.469726
Percent Gravel	0	0
Total		100

Regression Output

Constant	154.9048
Std. Error of Y Est.	4.882821
R Squared	0.966618
No. of Observations	7
X Coefficients	52.63143
Std. Error of Coeffic.	4.37412

5/27/03

Grain Size Calculations

ASI #: 20030362
Sample:PJ2AU-34

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
11	5	10	2	14.491	0.036284745	-1.440276
10	4	8	5	14.655	0.02307798	-1.636802
10	4	8	15	14.655	0.013324078	-1.875363
9.5	3.5	7	30	14.737	0.009447868	-2.024666
9	3	6	60	14.819	0.006699212	-2.173976
8	2	4	250	14.983	0.003300041	-2.481481
7	1	2	1440	15.147	0.001382522	-2.859328

DC =	6
HMCF=	1
K =	0.01348
% Gravel	6.93

	Hydrometer	Corrected for % Gravel
Percent Clay	4.577603781	4.260376
Percent Silt	6.58490145	6.128568
Percent Sand	88.83749477	82.68106
Percent Gravel	6.93	6.93
Total		100

Regression Output

Constant	17.74361
Std. Error of Y Est.	0.464349
R Squared	0.975338
No. of Observations	7
X Coefficients	5.465488
Std. Error of Coeffic.	0.388673

5/27/03

Grain Size Calculations

ASI #: 20030377
Sample:PJ2AU-12

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
38	32	65.30612	2	10.063	0.030236995	-1.519461
32	26	53.06122	5	11.047	0.02003674	-1.698173
29	23	46.93878	15	11.539	0.011823018	-1.927272
25	19	38.77551	30	12.195	0.008594491	-2.06578
20	14	28.57143	60	13.015	0.006278217	-2.202164
14	8	16.32653	250	13.999	0.003189836	-2.496232
11	5	10.20408	1440	14.491	0.001352253	-2.868942

DC =	6
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	24.46008834	24.46009
Percent Silt	50.8410173	50.84102
Percent Sand	24.69889436	24.69889
Percent Gravel	0	0
Total		100

Regression Output

Constant	126.1128
Std. Error of Y Est.	4.128884
R Squared	0.964149
No. of Observations	7
X Coefficients	42.19819
Std. Error of Coeffic.	3.63904

RF 5/27/03

HYDROMETRIC READINGS FOR GRAIN SIZE ANALYSIS

Job #: 23037 Client: ACDE

Balance: Sartorius Calibration: Yes ✓ No ___

Sample: 20030378 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:36	0	XXXX	MJ 5/12/03
9:38	2	40	
9:41	5	35	
9:51	15	29	
10:06	30	26	
10:36	60	19	
1:46	250	13	
9:36	1440	10	MJ 5/13/03

Sample: 20030381 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:48	0	XXXX	MJ 5/12/03
9:50	2	46	
9:53	5	41	
10:03	15	36	
10:18	30	31	
10:48	60	~~25~~ 23	
1:58	250	15	
9:48	1440	10	MJ 5/13/03

Sample: 20030379 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:40	0	XXXX	MJ 5/12/03
9:42	2	41	
9:45	5	36	
9:55	15	31.5	
10:10	30	27	
10:40	60	21	
1:50	250	14	
9:40	1440	10	MJ 5/13/03

Sample: 20030382 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:52	0	XXXX	MJ 5/12/03
9:54	2	26	
9:57	5	23	
10:07	15	20	
10:22	30	18	
10:52	60	16	
2:02	250	13	
9:52	1440	10	MJ 5/13/03

Sample: 20030380 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:44	0	XXXX	MJ 5/12/03
9:46	2	45	
9:49	5	38	
9:59	15	34	
10:14	30	27	
10:44	60	19	
1:54	250	13	
9:44	1440	9	MJ 5/13/03

DC= Dispersant Constant T= Time in minutes after initial mixing R_h= Hydrometer Reading

Grain Size Calculations

ASI #: 20030378
Sample:PJ2AU-11

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
40	36	73.46939	2	9.735	0.029740131	-1.526657
35	31	63.26531	5	10.555	0.01958547	-1.708066
29	25	51.02041	15	11.539	0.011823018	-1.927272
26	22	44.89796	30	12.031	0.008536506	-2.06872
19	15	30.61224	60	13.179	0.006317649	-2.199445
13	9	18.36735	250	14.163	0.003208467	-2.493702
10	6	12.2449	1440	14.655	0.001359883	-2.866498

DC =	4
HMCF=	0.98
K =	0.01348
% Gravel	0.16

	Hydrometer	Corrected for % Gravel
Percent Clay	27.63800966	27.59379
Percent Silt	58.38149855	58.28809
Percent Sand	13.98049179	13.95812
Percent Gravel	0.16	0.16
Total		100

Regression Output

Constant	144.3673
Std. Error of Y Est.	5.234049
R Squared	0.955897
No. of Observations	7
X Coefficients	48.45682
Std. Error of Coeffic.	4.654756

5/27/03

Grain Size Calculations

ASI #: 20030379
Sample:PJ2AU-7

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
41	37	75.5102	2	9.571	0.029488559	-1.530346
36	32	65.30612	5	10.391	0.019432719	-1.711466
31.5	27.5	56.12245	15	11.129	0.011611072	-1.935128
27	23	46.93878	30	11.867	0.008478123	-2.0717
21	17	34.69388	60	12.851	0.006238537	-2.204917
14	10	20.40816	250	13.999	0.003189836	-2.496232
10	6	12.2449	1440	14.655	0.001359883	-2.866498

DC =	4
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	29.80364965	29.80365
Percent Silt	60.40920214	60.4092
Percent Sand	9.787148217	9.787148
Percent Gravel	0	0
Total		100

Regression Output

Constant	150.5872
Std. Error of Y Est.	4.296693
R Squared	0.97162
No. of Observations	7
X Coefficients	50.13982
Std. Error of Coeffic.	3.832298

RF 5/27/03

Grain Size Calculations

ASI #: 20030380
Sample:PJ2AU-23

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
45	41	84.53608	2	8.915	0.028460044	-1.545764
38	34	70.10309	5	10.063	0.019123555	-1.718431
34	30	61.85567	15	10.719	0.011395185	-1.943279
27	23	47.42268	30	11.867	0.008478123	-2.0717
19	15	30.92784	60	13.179	0.006317649	-2.199445
13	9	18.5567	250	14.163	0.003208467	-2.493702
9	5	10.30928	1440	14.819	0.001367471	-2.864082

DC =	4
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	29.05812884	29.05813
Percent Silt	70.94187116	70.94187
Percent Sand	0	0
Percent Gravel	0	0
Total		100

Regression Output

Constant	172.0914
Std. Error of Y Est.	7.172492
R Squared	0.943753
No. of Observations	7
X Coefficients	59.37613
Std. Error of Coeffic.	6.482552

RF 5/27/03

Grain Size Calculations

ASI #: 20030381
Sample:PJ2AU-24

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
46	42	86.59794	2	8.751	0.028197054	-1.549796
41	37	76.28866	5	9.571	0.018650202	-1.729316
36	32	65.97938	15	10.391	0.011219485	-1.950027
31	27	55.6701	30	11.211	0.00824046	-2.084049
23	19	39.17526	60	12.523	0.006158408	-2.210532
15	11	22.68041	250	13.835	0.003171097	-2.498791
10	6	12.37113	1440	14.655	0.001359883	-2.866498

DC =	4
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	34.20934977	34.20935
Percent Silt	65.79065023	65.79065
Percent Sand	0	0
Percent Gravel	0	0
Total		100

Regression Output

Constant	179.826
Std. Error of Y Est.	5.314157
R Squared	0.969214
No. of Observations	7
X Coefficients	60.44857
Std. Error of Coeffic.	4.81804

RT 5/27/03

Grain Size Calculations

ASI #: 20030382
Sample:PJ2AU-3

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
26	22	44.44444	2	12.031	0.033061744	-1.480674
23	19	38.38384	5	12.523	0.021333351	-1.670941
20	16	32.32323	15	13.015	0.012556435	-1.901134
18	14	28.28283	30	13.343	0.008989924	-2.046244
16	12	24.24242	60	13.671	0.006434494	-2.191486
13	9	18.18182	250	14.163	0.003208467	-2.493702
10	6	12.12121	1440	14.655	0.001359883	-2.866498

DC =	4
HMCF=	0.99
K =	0.01348
% Gravel	0.18

	Hydrometer	Corrected for % Gravel
Percent Clay	20.87909824	20.84152
Percent Silt	28.22995798	28.17914
Percent Sand	50.89094378	50.79934
Percent Gravel	0.18	0.18
Total		100

Regression Output

Constant	77.32273
Std. Error of Y Est.	1.55587
R Squared	0.984055
No. of Observations	7
X Coefficients	23.43095
Std. Error of Coeffic.	1.333835

5/27/03

HYDROMETRIC READINGS FOR GRAIN SIZE ANALYSIS

Job #: 23037 Client: ACME

Balance: Sartorius Calibration: Yes ✓ No ___

Sample: 20030383 Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:12	0	XXXX	MJ 5/12/03
10:14	2	27	
10:17	5	23	
10:27	15	22	
10:42	30	19	
11:12	60	17	
2:22	250	14	
10:12	1440	10	MJ 5/13/03

Sample: 20030384 tp Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:24	0	XXXX	MJ 5/12/03
10:26	2	33	
10:29	5	28	
10:39	15	24	
10:54	30	~~16~~ 22 MJ	
11:24	60	20	
2:34	250	16	
10:24	1440	12	MJ 5/13/03

Sample: 20030384 Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:16	0	XXXX	MJ 5/12/03
10:18	2	33	
10:21	5	28	
10:31	15	24	
10:46	30	22	
11:16	60	20	
2:26	250	16	
10:16	1440	12	MJ 5/13/03

Sample: ___ Grams Used: ___ DC: 5

Clock Time	T	R_h	Initials/Date
10:28	0	XXXX	
10:30	2		
10:33	5		
10:43	15		
10:58	30		
11:28	60		
2:38	250		
10:28	1440		

Sample: 20030384 dup Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:20	0	XXXX	MJ 5/12/03
10:22	2	33	
10:25	5	28	
10:35	15	24	
10:50	30	~~16~~ 22 MJ	
11:20	60	20	
2:30	250	16	
10:20	1440	12	MJ 5/13/03

DC= Dispersant Constant T= Time in minutes after initial mixing R_h= Hydrometer Reading

Grain Size Calculations

ASI #: 20030383
Sample:PJ2AU-4

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
27	22	44.44444	2	11.867	0.032835631	-1.483655
23	18	36.36364	5	12.523	0.021333351	-1.670941
22	17	34.34343	15	12.687	0.012397204	-1.906676
19	14	28.28283	30	13.179	0.008934505	-2.04893
17	12	24.24242	60	13.507	0.006395783	-2.194106
14	9	18.18182	250	13.999	0.003189836	-2.496232
10	5	10.10101	1440	14.655	0.001359883	-2.866498

DC =	5
HMCF=	0.99
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	20.3844704	20.38447
Percent Silt	29.23171764	29.23172
Percent Sand	50.38381196	50.38381
Percent Gravel	0	0
Total		100

Regression Output

Constant	78.83104
Std. Error of Y Est.	1.59108
R Squared	0.984404
No. of Observations	7
X Coefficients	24.26241
Std. Error of Coeffic.	1.365759

5/27/03

Grain Size Calculations

ASI #: 20030384
Sample:PJ2AU-6

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
33	28	56.56566	2	10.883	0.031444827	-1.502451
28	23	46.46465	5	11.703	0.020623078	-1.685647
24	19	38.38384	15	12.359	0.0122359	-1.912364
22	17	34.34343	30	12.687	0.008766147	-2.057191
20	15	30.30303	60	13.015	0.006278217	-2.202164
16	11	22.22222	250	13.671	0.003152245	-2.50138
12	7	14.14141	1440	14.327	0.001344579	-2.871414

DC =	5
HMCF=	0.99
K =	0.01348
% Gravel	0.12

	Hydrometer	Corrected for % Gravel
Percent Clay	25.51217897	25.48156
Percent Silt	36.11104159	36.06771
Percent Sand	38.37677943	38.33073
Percent Gravel	0.12	0.12
Total		100

Regression Output

Constant	97.71343
Std. Error of Y Est.	2.491617
R Squared	0.97472
No. of Observations	7
X Coefficients	29.97227
Std. Error of Coeffic.	2.158669

RF 5/27/03

Grain Size Calculations

ASI #: 20030384-Dup
Sample:PJ2AU-6-Dup

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
33	28	56.56566	2	10.883	0.031444827	-1.502451
28	23	46.46465	5	11.703	0.020623078	-1.685647
24	19	38.38384	15	12.359	0.0122359	-1.912364
22	17	34.34343	30	12.687	0.008766147	-2.057191
20	15	30.30303	60	13.015	0.006278217	-2.202164
16	11	22.22222	250	13.671	0.003152245	-2.50138
12	7	14.14141	1440	14.327	0.001344579	-2.871414

DC =	5
HMCF=	0.99
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	25.51217897	25.51218
Percent Silt	36.11104159	36.11104
Percent Sand	38.37677943	38.37678
Percent Gravel	0	0
Total		100

Regression Output

Constant	97.71343
Std. Error of Y Est.	2.491617
R Squared	0.97472
No. of Observations	7
X Coefficients	29.97227
Std. Error of Coeffic.	2.158669

Grain Size Calculations

ASI #: 20030384-Trip
Sample:PJ2AU-6-Trip

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
33	28	56.56566	2	10.883	0.031444827	-1.502451
28	23	46.46465	5	11.703	0.020623078	-1.685647
24	19	38.38384	15	12.359	0.0122359	-1.912364
22	17	34.34343	30	12.687	0.008766147	-2.057191
20	15	30.30303	60	13.015	0.006278217	-2.202164
16	11	22.22222	250	13.671	0.003152245	-2.50138
12	7	14.14141	1440	14.327	0.001344579	-2.871414

DC =	5
HMCF=	0.99
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	25.51217897	25.51218
Percent Silt	36.11104159	36.11104
Percent Sand	38.37677943	38.37678
Percent Gravel	0	0
Total		100

Regression Output

Constant	97.71343
Std. Error of Y Est.	2.491617
R Squared	0.97472
No. of Observations	7
X Coefficients	29.97227
Std. Error of Coeffic.	2.158669

HYDROMETRIC READINGS FOR GRAIN SIZE ANALYSIS

Job #: 23-037 Client: ACOE

Balance: Sartorius Calibration: Yes ✓ No ___

Sample: 20030333 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:00	0	XXXX	5/7/03
9:02	2	37	
9:05	5	31	
9:15	15	28	
9:30	30	25	
10:00	60	21	
1:10	250	15	
9:00	1440	12	5/8/03

Sample: 20030336 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:12	0	XXXX	5/7/03
9:14	2	31	
9:17	5	27	
9:27	15	24	
9:42	30	22	
10:12	60	19	
1:22	250	14	
9:12	1440	11	5/8/03

Sample: 20030334 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:04	0	XXXX	5/7/03
9:06	2	14	
9:09	5	12	
9:19	15	12	
9:34	30	11	
10:04	60	10	
1:14	250	9	
9:04	1440	8	5/8/03

Sample: 20030337 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:16	0	XXXX	5/7/03
9:18	2	32	
9:21	5	29	
9:31	15	26	
9:46	30	23	
10:16	60	18	
1:26	250	14	
9:16	1440	11	5/8/03

Sample: 20030335 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:08	0	XXXX	5/7/03
9:10	2	27	
9:13	5	23	
9:23	15	21	
9:38	30	20	
10:08	60	17	
1:18	250	13	
9:08	1440	10	5/8/03

DC= Dispersant Constant T= Time in minutes after initial mixing R_h= Hydrometer Reading

Hydrometer - Green

Grain Size Calculations

ASI #: 20030333
Sample: PJ2AU-36

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
37	31	63.26531	2	10.227	0.030482	-1.515951
31	25	51.02041	5	11.211	0.020185	-1.694973
28	22	44.89796	15	11.703	0.011907	-1.924207
25	19	38.77551	30	12.195	0.008594	-2.06578
21	15	30.61224	60	12.851	0.006239	-2.204917
15	9	18.36735	250	13.835	0.003171	-2.498791
12	6	12.2449	1440	14.327	0.001345	-2.871414

DC =	6
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	25.65158	25.65158
Percent Silt	45.97649	45.97649
Percent Sand	28.37193	28.37193
Percent Gravel	0	0
Total		100

Regression Output

Constant	117.578
Std. Error of Y Est.	3.389031
R Squared	0.970592
No. of Observations	7
X Coefficients	38.16063
Std. Error of Coeffic.	2.97063

5/13/03

Grain Size Calculations

ASI #: 20030334
Sample: PJ2AU-35

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
14	8	16	2	13.999	0.035663	-1.447777
12	6	12	5	14.327	0.022818	-1.641717
12	6	12	15	14.327	0.013174	-1.880278
11	5	10	30	14.491	0.009369	-2.028322
10	4	8	60	14.655	0.006662	-2.176393
9	3	6	250	14.819	0.003282	-2.483871
8	2	4	1440	14.983	0.001375	-2.861692

DC =	6
HMCF=	1
K =	0.01348
% Gravel	6.45

	Hydrometer	Corrected for % Gravel
Percent Clay	6.980826	6.530562
Percent Silt	9.841296	9.206533
Percent Sand	83.17788	77.8129
Percent Gravel	6.45	6.45
Total		100

Regression Output

Constant	26.65774
Std. Error of Y Est.	0.984507
R Squared	0.951259
No. of Observations	7
X Coefficients	8.168305
Std. Error of Coeffic.	0.826886

5/13/03

Grain Size Calculations

ASI #: 20030335
Sample: PJ2AU-33

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
27	21	42.85714	2	11.867	0.032836	-1.483655
23	17	34.69388	5	12.523	0.021333	-1.670941
21	15	30.61224	15	12.851	0.012477	-1.903887
20	14	28.57143	30	13.015	0.008879	-2.051649
17	11	22.44898	60	13.507	0.006396	-2.194106
13	7	14.28571	250	14.163	0.003208	-2.493702
10	4	8.163265	1440	14.655	0.00136	-2.866498

DC =	6
HMCF=	0.98
K =	0.01348
% Gravel	2.35

	Hydrometer	Corrected for % Gravel
Percent Clay	18.12737	17.70138
Percent Silt	30.00439	29.29929
Percent Sand	51.86824	50.64933
Percent Gravel	2.35	2.35
Total		100

Regression Output

Constant	78.11885
Std. Error of Y Est.	1.710543
R Squared	0.982901
No. of Observations	7
X Coefficients	24.90374
Std. Error of Coeffic.	1.468957

RF 5/13/03

Grain Size Calculations

ASI #: 20030336
Sample: PJ2AU-37

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
31	25	51.02041	2	11.211	0.031915	-1.496003
27	21	42.85714	5	11.867	0.020767	-1.682625
24	18	36.73469	15	12.359	0.012236	-1.912364
22	16	32.65306	30	12.687	0.008766	-2.057191
19	13	26.53061	60	13.179	0.006318	-2.199445
14	8	16.32653	250	13.999	0.00319	-2.496232
11	5	10.20408	1440	14.491	0.001352	-2.868942

DC =	6
HMCF=	0.98
K =	0.01348
% Gravel	0.16

	Hydrometer	Corrected for % Gravel
Percent Clay	21.59614	21.56159
Percent Silt	36.51502	36.4566
Percent Sand	41.88883	41.82181
Percent Gravel	0.16	0.16
Total		100

Regression Output

Constant	94.60513
Std. Error of Y Est.	1.959517
R Squared	0.984576
No. of Observations	7
X Coefficients	30.30758
Std. Error of Coeffic.	1.696445

RF 5/13/03

Grain Size Calculations

ASI #: 20030337
Sample: PJ2AU-38

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
32	26	53.06122	2	11.047	0.031681	-1.499203
29	23	46.93878	5	11.539	0.020478	-1.688711
26	20	40.81633	15	12.031	0.012072	-1.918205
23	17	34.69388	30	12.523	0.008709	-2.060017
18	12	24.4898	60	13.343	0.006357	-2.196759
14	8	16.32653	250	13.999	0.00319	-2.496232
11	5	10.20408	1440	14.491	0.001352	-2.868942

DC =	6
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	22.1653	22.1653
Percent Silt	40.28709	40.28709
Percent Sand	37.54761	37.54761
Percent Gravel	0	0
Total		100

Regression Output

Constant	102.7162
Std. Error of Y Est.	3.144914
R Squared	0.967634
No. of Observations	7
X Coefficients	33.4384
Std. Error of Coeffic.	2.73493

KF 5/13/03

HYDROMETRIC READINGS FOR GRAIN SIZE ANALYSIS

Job #: 23-037 Client: ACDE

Balance: Sartorius Calibration: Yes ✓ No ___

Sample: 20030346 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:00	0	XXXX	[illegible] 5/9/03
9:02	2	47	
9:05	5	42	
9:15	15	37	
9:30	30	28	
10:00	60	19	
1:10	250	14	
9:00	1440	11	[illegible] 5/10/03

Sample: 20030349 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:12	0	XXXX	[illegible] 5/9/03
9:14	2	44	
9:17	5	39	
9:27	15	37	
9:42	30	30	
10:12	60	23	
1:22	250	16	
9:12	1440	12	[illegible] 5/10/03

Sample: 20030347 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:04	0	XXXX	[illegible] 5/9/03
9:06	2	42	
9:09	5	37	
9:19	15	32	
9:34	30	28	
10:04	60	24	
1:14	250	18	
9:04	1440	13	[illegible] 5/10/03

Sample: 20030350 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:16	0	XXXX	[illegible] 5/9/03
9:18	2	47	
9:21	5	41	
9:31	15	36	
9:46	30	28	
10:16	60	19	
1:26	250	14	
9:16	1440	11	[illegible] 5/10/03

Sample: 20030348 Grams Used: 50g DC: 6

Clock Time	T	R_h	Initials/Date
9:08	0	XXXX	[illegible] 5/9/03
9:10	2	40	
9:13	5	35	
9:23	15	31	
9:38	30	27	
10:08	60	22	
1:18	250	16	
9:08	1440	12	[illegible] 5/10/03

DC= Dispersant Constant T= Time in minutes after initial mixing R_h= Hydrometer Reading

Hydrometer: Green

Grain Size Calculations

ASI #: 20030346
Sample: PJ2AU-14

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
47	41	84.53608	2	8.587	0.027931588	-1.553904
42	36	74.2268	5	9.407	0.018489725	-1.73307
37	31	63.91753	15	10.227	0.011130595	-1.953482
28	22	45.36082	30	11.703	0.008419336	-2.074722
19	13	26.80412	60	13.179	0.006317649	-2.199445
14	8	16.49485	250	13.999	0.003189836	-2.496232
11	5	10.30928	1440	14.491	0.001352253	-2.868942

DC =	6
HMCF=	0.97
K =	0.01348
% Gravel	0.2

	Hydrometer	Corrected for % Gravel
Percent Clay	28.36073775	28.30402
Percent Silt	71.63926225	71.49598
Percent Sand	0	0
Percent Gravel	0.2	0.2
Total		100

Regression Output

Constant	177.9503
Std. Error of Y Est.	9.548884
R Squared	0.910888
No. of Observations	7
X Coefficients	62.09778
Std. Error of Coeffic.	8.686162

5/13/03

Grain Size Calculations		ASI #: 20030347			Client ID:	ACOE-Port Jersey
		Sample: PJ2AU-15			Job #:	23-037
R-obs	R-corr.	P	T	L	D	log D
42	36	73.46939	2	9.407	0.029234823	-1.5341
37	31	63.26531	5	10.227	0.019278756	-1.714921
32	26	53.06122	15	11.047	0.011568217	-1.936734
28	22	44.89796	30	11.703	0.008419336	-2.074722
24	18	36.73469	60	12.359	0.00611795	-2.213394
18	12	24.4898	250	13.343	0.003114201	-2.506653
13	7	14.28571	1440	14.163	0.001336861	-2.873914

DC =	6
HMCF=	0.98
K =	0.01348
% Gravel	0.25

	Hydrometer	Corrected for % Gravel
Percent Clay	31.34485639	31.26649
Percent Silt	54.47181067	54.33563
Percent Sand	14.18333294	14.14787
Percent Gravel	0.25	0.25
Total		100

Regression Output

Constant	140.2571
Std. Error of Y Est.	2.933407
R Squared	0.983692
No. of Observations	7
X Coefficients	45.21176
Std. Error of Coeffic.	2.603404

5/13/07

Grain Size Calculations

ASI #: 20030348
Sample: PJ2AU-18

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
40	34	69.38776	2	9.735	0.029740131	-1.526657
35	29	59.18367	5	10.555	0.01958547	-1.708066
31	25	51.02041	15	11.211	0.01165377	-1.933534
27	21	42.85714	30	11.867	0.008478123	-2.0717
22	16	32.65306	60	12.687	0.006198602	-2.207706
16	10	20.40816	250	13.671	0.003152245	-2.50138
12	6	12.2449	1440	14.327	0.001344579	-2.871414

DC =	6
HMCF=	0.98
K =	0.01348
% Gravel	0.37

	Hydrometer	Corrected for % Gravel
Percent Clay	28.20013716	28.0958
Percent Silt	53.3081925	53.11095
Percent Sand	18.49167034	18.42325
Percent Gravel	0.37	0.37
Total		100

Regression Output

Constant	134.7858
Std. Error of Y Est.	3.513176
R Squared	0.975902
No. of Observations	7
X Coefficients	44.24596
Std. Error of Coeffic.	3.109421

RZ 5/13/03

Grain Size Calculations

ASI #: 20030349
Sample: PJ2AU-22

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
44	38	77.55102	2	9.079	0.028720626	-1.541806
39	33	67.34694	5	9.899	0.018967083	-1.721999
37	31	63.26531	15	10.227	0.011130595	-1.953482
30	24	48.97959	30	11.375	0.008300514	-2.080895
23	17	34.69388	60	12.523	0.006158408	-2.210532
16	10	20.40816	250	13.671	0.003152245	-2.50138
12	6	12.2449	1440	14.327	0.001344579	-2.871414

DC =	6
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	31.31688261	31.31688
Percent Silt	64.02343173	64.02343
Percent Sand	4.659685662	4.659686
Percent Gravel	0	0
Total		100

Regression Output

Constant	159.3268
Std. Error of Y Est.	5.9649
R Squared	0.95165
No. of Observations	7
X Coefficients	53.13964
Std. Error of Coeffic.	5.356652

RF 5/13/03

Grain Size Calculations

ASI #: 20030350
Sample: PJ2AU-21

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
47	41	84.53608	2	8.587	0.027931588	-1.553904
41	35	72.16495	5	9.571	0.018650202	-1.729316
36	30	61.85567	15	10.391	0.011219485	-1.950027
28	22	45.36082	30	11.703	0.008419336	-2.074722
19	13	26.80412	60	13.179	0.006317649	-2.199445
14	8	16.49485	250	13.999	0.003189836	-2.496232
11	5	10.30928	1440	14.491	0.001352253	-2.868942

DC =	6
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	28.0042537	28.00425
Percent Silt	71.9957463	71.99575
Percent Sand	0	0
Percent Gravel	0	0
Total		100

Regression Output

Constant	175.0808
Std. Error of Y Est.	9.066959
R Squared	0.916647
No. of Observations	7
X Coefficients	61.05459
Std. Error of Coeffic.	8.233635

RJ 5/13/03

HYDROMETRIC READINGS FOR GRAIN SIZE ANALYSIS

Job #: 23-037 Client: ACOE

Balance: Sartorius Calibration: Yes ✓ No ___

Sample: 20030338 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:36	0	XXXX	5/7/03
9:38	2	31	
9:41	5	26	
9:51	15	~~28~~ 23	
10:06	30	20	
10:36	60	18	
1:46	250	12	
9:36	1440	10	5/8/03

Sample: 20030341 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:48	0	XXXX	5/7/03
9:50	2	40	
9:53	5	35	
10:03	15	30	
10:18	30	25	
10:48	60	18	
1:58	250	12	
9:48	1440	9	5/8/03

Sample: 20030339 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:40	0	XXXX	5/7/03
9:42	2	38	
9:45	5	33	
9:55	15	30	
10:10	30	27	
10:40	60	21	
1:50	250	14	
9:40	1440	~~9~~ 10	5/8/03

Sample: 20030342 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:52	0	XXXX	5/7/03
9:54	2	45	
9:57	5	40	
10:07	15	34	
10:22	30	28	
10:52	60	20	
2:02	250	13	
9:52	1440	9	5/8/03

Sample: 20030340 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:44	0	XXXX	5/7/03
9:46	2	32	
9:49	5	28	
9:59	15	24	
10:14	30	20	
10:44	60	16	
1:54	250	12	
9:44	1440	8	5/8/03

DC= Dispersant Constant T= Time in minutes after initial mixing R_h= Hydrometer Reading

Hydrometer = Blue

Grain Size Calculations

ASI #: 20030338
Sample: PJ2AU-32

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
31	27	55.10204	2	11.211	0.031915	-1.496003
26	22	44.89796	5	12.031	0.02091	-1.679644
23	19	38.77551	15	12.523	0.012317	-1.909502
20	16	32.65306	30	13.015	0.008879	-2.051649
12	8	16.32653	60	14.327	0.006587	-2.181308
12	8	16.32653	250	14.327	0.003227	-2.491202
10	6	12.2449	1440	14.655	0.00136	-2.866498

DC =	4
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	20.71873	20.71873
Percent Silt	39.28124	39.28124
Percent Sand	40.00003	40.00003
Percent Gravel	0	0
Total		100

Regression Output

Constant	99.25854
Std. Error of Y Est.	6.461185
R Squared	0.871117
No. of Observations	7
X Coefficients	32.60354
Std. Error of Coeffic.	5.608411

5/13/03

Grain Size Calculations

ASI #: 20030339
Sample: PJ2AU-30

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
38	34	69.38776	2	10.063	0.030237	-1.519461
33	29	59.18367	5	10.883	0.019887	-1.701421
30	26	53.06122	15	11.375	0.011739	-1.93038
27	23	46.93878	30	11.867	0.008478	-2.0717
21	17	34.69388	60	12.851	0.006239	-2.204917
14	10	20.40816	250	13.999	0.00319	-2.496232
10	6	12.2449	1440	14.655	0.00136	-2.866498

DC =	4
HMCF=	0.98
K =	0.01348
% Gravel	0.05

	Hydrometer	Corrected for % Gravel
Percent Clay	29.11014	29.09558
Percent Silt	53.58304	53.55624
Percent Sand	17.30683	17.29817
Percent Gravel	0.05	0.05
Total		100

Regression Output

Constant	136.2453
Std. Error of Y Est.	3.609227
R Squared	0.974916
No. of Observations	7
X Coefficients	44.47408
Std. Error of Coeffic.	3.190365

5/13/03

Grain Size Calculations

ASI #: 20030340
Sample: PJ2AU-31

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
32	28	57.14286	2	11.047	0.031681	-1.499203
28	24	48.97959	5	11.703	0.020623	-1.685647
24	20	40.81633	15	12.359	0.012236	-1.912364
20	16	32.65306	30	13.015	0.008879	-2.051649
16	12	24.4898	60	13.671	0.006434	-2.191486
12	8	16.32653	250	14.327	0.003227	-2.491202
8	4	8.163265	1440	14.983	0.001375	-2.861692

DC =	4
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	21.12482	21.12482
Percent Silt	44.81892	44.81892
Percent Sand	34.05627	34.05627
Percent Gravel	0	0
Total		100

Regression Output

Constant	110.7368
Std. Error of Y Est.	3.182084
R Squared	0.972866
No. of Observations	7
X Coefficients	37.19983
Std. Error of Coeffic.	2.778326

RF 5/13/03

Grain Size Calculations

ASI #: 20030341
Sample: PJ2AU-29

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
40	36	74.2268	2	9.735	0.02974	-1.526657
35	31	63.91753	5	10.555	0.019585	-1.708066
30	26	53.60825	15	11.375	0.011739	-1.93038
25	21	43.29897	30	12.195	0.008594	-2.06578
18	14	28.86598	60	13.343	0.006357	-2.196759
12	8	16.49485	250	14.327	0.003227	-2.491202
9	5	10.30928	1440	14.819	0.001367	-2.864082

DC =	4
HMCF=	0.97
K =	0.01348
% Gravel	0.39

	Hydrometer	Corrected for % Gravel
Percent Clay	26.29244	26.1899
Percent Silt	61.80131	61.56028
Percent Sand	11.90625	11.85982
Percent Gravel	0.39	0.39
Total		100

Regression Output

Constant	149.8594
Std. Error of Y Est.	5.871656
R Squared	0.950482
No. of Observations	7
X Coefficients	51.29527
Std. Error of Coeffic.	5.236049

AF 5/13/03

Grain Size Calculations

ASI #: 20030342
Sample: PJ2AU-16

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
45	41	84.53608	2	8.915	0.02846	-1.545764
40	36	74.2268	5	9.735	0.018809	-1.725627
34	30	61.85567	15	10.719	0.011395	-1.943279
28	24	49.48454	30	11.703	0.008419	-2.074722
20	16	32.98969	60	13.015	0.006278	-2.202164
13	9	18.5567	250	14.163	0.003208	-2.493702
9	5	10.30928	1440	14.819	0.001367	-2.864082

DC =	4
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	29.93092	29.93092
Percent Silt	70.06908	70.06908
Percent Sand	0	0
Percent Gravel	0	0
Total		100

Regression Output

Constant	176.4414
Std. Error of Y Est.	6.629195
R Squared	0.95352
No. of Observations	7
X Coefficients	60.81961
Std. Error of Coeffic.	6.005221

RF 5/12/03

HYDROMETRIC READINGS FOR GRAIN SIZE ANALYSIS

Job #: 23-037 Client: ACOE

Balance: Sartorius Calibration: Yes ✓ No ___

Sample: 20030351 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:36	0	XXXX	5/9/03
9:38	2	27	
9:41	5	23	
9:51	15	21	
10:06	30	19	
10:36	60	15	
1:46	250	10	
9:36	1440	8	5/10/03

Sample: 20030354 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:48	0	XXXX	5/9/03
9:50	2	45	
9:53	5	40	
10:03	15	35	
10:18	30	30	
10:48	60	23	
1:58	250	15	
9:48	1440	10	5/10/03

Sample: 20030352 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:40	0	XXXX	5/9/03
9:42	2	45	
9:45	5	40	
9:55	15	35	
10:10	30	25	
10:40	60	17	
1:50	250	12	
9:40	1440	9	5/10/03

Sample: 20030355 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:52	0	XXXX	5/9/03
9:54	2	31	
9:57	5	27	
10:07	15	24	
10:22	30	21	
10:52	60	18	
2:02	250	12	
9:52	1440	9	5/10/03

Sample: 20030353 Grams Used: 50g DC: 4

Clock Time	T	R_h	Initials/Date
9:44	0	XXXX	5/9/03
9:46	2	46	
9:49	5	41	
9:59	15	36	
10:14	30	27	
10:44	60	18	
1:54	250	12	
9:44	1440	9	5/10/03

DC= Dispersant Constant T= Time in minutes after initial mixing R_h= Hydrometer Reading

Hydrometer: Blue

Grain Size Calculations

ASI #: 20030351
Sample : PJ2AU-17

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
27	23	46.93878	2	11.867	0.032835631	-1.483655
23	19	38.77551	5	12.523	0.021333351	-1.670941
21	17	34.69388	15	12.851	0.012477073	-1.903887
19	15	30.61224	30	13.179	0.008934505	-2.04893
15	11	22.44898	60	13.835	0.006472974	-2.188896
10	6	12.2449	250	14.655	0.003263719	-2.486287
8	4	8.163265	1440	14.983	0.001375017	-2.861692

DC =	4
HMCF=	0.98
K =	0.01348
% Gravel	2.89

	Hydrometer	Corrected for % Gravel
Percent Clay	18.3809409	17.84973
Percent Silt	35.41841009	34.39482
Percent Sand	46.20064901	44.86545
Percent Gravel	2.89	2.89
Total		100

Regression Output

Constant	89.19733
Std. Error of Y Est.	2.779846
R Squared	0.967757
No. of Observations	7
X Coefficients	29.39738
Std. Error of Coeffic.	2.399726

RF 5/13/03

Grain Size Calculations

ASI #: 20030352
Sample : PJ2AU-1

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
45	41	84.53608	2	8.915	0.028460044	-1.545764
40	36	74.2268	5	9.735	0.01880931	-1.725627
35	31	63.91753	15	10.555	0.011307677	-1.946627
25	21	43.29897	30	12.195	0.008594491	-2.06578
17	13	26.80412	60	13.507	0.006395783	-2.194106
12	8	16.49485	250	14.327	0.003226989	-2.491202
9	5	10.30928	1440	14.819	0.001367471	-2.864082

DC =	4
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	27.72597849	27.72598
Percent Silt	72.27402151	72.27402
Percent Sand	0	0
Percent Gravel	0	0
Total		100

Regression Output

Constant	176.7068
Std. Error of Y Est.	9.738522
R Squared	0.907423
No. of Observations	7
X Coefficients	61.84512
Std. Error of Coeffic.	8.834207

RF 5/13/03

Grain Size Calculations

ASI #: 20030353
Sample: PJ2Au-2

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
46	42	86.59794	2	8.751	0.028197054	-1.549796
41	37	76.28866	5	9.571	0.018650202	-1.729316
36	32	65.97938	15	10.391	0.011219485	-1.950027
27	23	47.42268	30	11.867	0.008478123	-2.0717
18	14	28.86598	60	13.343	0.006356836	-2.196759
12	8	16.49485	250	14.327	0.003226989	-2.491202
9	5	10.30928	1440	14.819	0.001367471	-2.864082

DC =	4
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	29.0281345	29.02813
Percent Silt	70.9718655	70.97187
Percent Sand	0	0
Percent Gravel	0	0
Total		100

Regression Output

Constant	183.372
Std. Error of Y Est.	9.365041
R Squared	0.918651
No. of Observations	7
X Coefficients	64.0714
Std. Error of Coeffic.	8.526695

RF 5/13/03

Grain Size Calculations

AS#: 20030354
Sample: PJ2AU-5

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
45	41	84.53608	2	8.915	0.028460044	-1.545764
40	36	74.2268	5	9.735	0.01880931	-1.725627
35	31	63.91753	15	10.555	0.011307677	-1.946627
30	26	53.60825	30	11.375	0.008300514	-2.080895
23	19	39.17526	60	12.523	0.006158408	-2.210532
15	11	22.68041	250	13.835	0.003171097	-2.498791
10	6	12.37113	1440	14.655	0.001359883	-2.866498

DC =	4
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	33.53958429	33.53958
Percent Silt	66.46041571	66.46042
Percent Sand	0	0
Percent Gravel	0	0
Total		100

Regression Output

Constant	173.7975
Std. Error of Y Est.	4.709438
R Squared	0.974004
No. of Observations	7
X Coefficients	58.22403
Std. Error of Coeffic.	4.253922

5/13/03

Grain Size Calculations

ASI #: 20030355
PJ2AU-25

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
31	27	55.10204	2	11.211	0.031915163	-1.496003
27	23	46.93878	5	11.867	0.020767076	-1.682625
24	20	40.81633	15	12.359	0.0122359	-1.912364
21	17	34.69388	30	12.851	0.008822623	-2.054402
18	14	28.57143	60	13.343	0.006356836	-2.196759
12	8	16.32653	250	14.327	0.003226989	-2.491202
9	5	10.20408	1440	14.819	0.001367471	-2.864082

DC =	4
HMCF=	0.98
K =	0.01348
% Gravel	0.45

	Hydrometer	Corrected for % Gravel
Percent Clay	22.69327614	22.59116
Percent Silt	41.06747255	40.88267
Percent Sand	36.23925131	36.07617
Percent Gravel	0.45	0.45
Total		100

Regression Output

Constant	104.8045
Std. Error of Y Est.	2.325625
R Squared	0.982705
No. of Observations	7
X Coefficients	34.08612
Std. Error of Coeffic.	2.022265

RF 5/13/03

HYDROMETRIC READINGS FOR GRAIN SIZE ANALYSIS

Job #: 23-037 Client: ACOE

Balance: Sartorius Calibration: Yes ✓ No ___

Sample: 20030343 Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:12	0	XXXX	7/5/7/03
10:14	2	45	
10:17	5	40	
10:27	15	35	
10:42	30	27	
11:12	60	20	
2:22	250	13	
10:12	1440	11	7/5/8/03

Sample: 20030345 dup Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:24	0	XXXX	7/5/7/03
10:26	2	37	
10:29	5	32	
10:39	15	28	
10:54	30	25	
11:24	60	21	
2:34	250	15	
10:24	1440	10	7/5/8/03

Sample: 20030344 Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:16	0	XXXX	7/5/7/03
10:18	2	44	
10:21	5	39	
10:31	15	35	
10:46	30	29	
11:16	60	22	
2:26	250	15	
10:16	1440	10	7/5/8/03

Sample: 20030345 trp Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:28	0	XXXX	7/5/7/03
10:30	2	37	
10:33	5	32	
10:43	15	27	
10:58	30	24	
11:28	60	20	
2:38	250	14	
10:28	1440	10	7/5/8/03

Sample: 20030345 Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:20	0	XXXX	7/5/7/03
10:22	2	36	
10:25	5	32	
10:35	15	~~28~~ 27	
10:50	30	23	
11:20	60	20	
2:30	250	14	
10:20	1440	10	7/5/8/03

DC= Dispersant Constant T= Time in minutes after initial mixing R_h= Hydrometer Reading

Hydrometer = yellow

Grain Size Calculations		ASI #:	20030343		Client ID:	ACOE-Port Jersey
		Sample:	PJ2AU-19		Job #:	23-037
R-obs	R-corr.	P	T	L	D	log D
45	40	82.47423	2	8.915	0.028460044	-1.545764
40	35	72.16495	5	9.735	0.01880931	-1.725627
35	30	61.85567	15	10.555	0.011307677	-1.946627
27	22	45.36082	30	11.867	0.008478123	-2.0717
20	15	30.92784	60	13.015	0.006278217	-2.202164
13	8	16.49485	250	14.163	0.003208467	-2.493702
11	6	12.37113	1440	14.491	0.001352253	-2.868942

DC =	5
HMCF=	0.97
K =	0.01348
% Gravel	0.04

	Hydrometer	Corrected for % Gravel
Percent Clay	29.22212637	29.21044
Percent Silt	70.25699625	70.22889
Percent Sand	0.520877382	0.520669
Percent Gravel	0.04	0.04
Total		100

Regression Output

Constant	169.6956
Std. Error of Y Est.	8.123667
R Squared	0.926598
No. of Observations	7
X Coefficients	58.31351
Std. Error of Coeffic.	7.339929

RF 5/13/03

Grain Size Calculations

ASI #: 20030344
Sample: PJ2AU-20

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
44	39	80.41237	2	9.079	0.028720626	-1.541806
39	34	70.10309	5	9.899	0.018967083	-1.721999
35	30	61.85567	15	10.555	0.011307677	-1.946627
29	24	49.48454	30	11.539	0.008360136	-2.077787
22	17	35.05155	60	12.687	0.006198602	-2.207706
15	10	20.61856	250	13.835	0.003171097	-2.498791
10	5	10.30928	1440	14.655	0.001359883	-2.866498

DC = 5
HMCF= 0.97
K = 0.01348
% Gravel 0

	Hydrometer	Corrected for % Gravel
Percent Clay	25.08141498	25.08141
Percent Silt	50.32559844	50.3256
Percent Sand	24.59298658	24.59299
Percent Gravel	0	0
Total		100

Regression Output

Constant	125.7036
Std. Error of Y Est.	3.051135
R Squared	0.979743
No. of Observations	7
X Coefficients	41.77039
Std. Error of Coeffic.	2.686043

RF 5/13/03

Grain Size Calculations

ASI #: 20030345
Sample: PJ2AU-13

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
36	31	63.26531	2	10.391	0.030725826	-1.512496
32	27	55.10204	5	11.047	0.02003674	-1.698173
27	22	44.89796	15	11.867	0.011989877	-1.921185
23	18	36.73469	30	12.523	0.008709304	-2.060017
20	15	30.61224	60	13.015	0.006278217	-2.202164
14	9	18.36735	250	13.999	0.003189836	-2.496232
10	5	10.20408	1440	14.655	0.001359883	-2.866498

DC =	5
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	24.78533186	24.78533
Percent Silt	49.0251565	49.02516
Percent Sand	26.18951164	26.18951
Percent Gravel	0	0
Total		100

Regression Output

Constant	122.8074
Std. Error of Y Est.	2.908264
R Squared	0.980654
No. of Observations	7
X Coefficients	40.69102
Std. Error of Coeffic.	2.555937

RF 5/13/03

Grain Size Calculations		ASI #:	20030345		Client ID:	ACOE-Port Jersey
		Sample:	PJ2AU-13 Duplicate		Job #:	23-037
R-obs	R-corr.	P	T	L	D	log D
37	32	65.30612	2	10.227	0.03048239	-1.515951
32	27	55.10204	5	11.047	0.02003674	-1.698173
28	23	46.93878	15	11.703	0.01190674	-1.924207
25	20	40.81633	30	12.195	0.008594491	-2.06578
21	16	32.65306	60	12.851	0.006238537	-2.204917
15	10	20.40816	250	13.835	0.003171097	-2.498791
10	5	10.20408	1440	14.655	0.001359883	-2.866498

DC =	5
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	26.43378595	26.43379
Percent Silt	49.84439805	49.8444
Percent Sand	23.721816	23.72182
Percent Gravel	0	0
Total		100

Regression Output

Constant	126.0938
Std. Error of Y Est.	2.100139
R Squared	0.990121
No. of Observations	7
X Coefficients	41.371
Std. Error of Coeffic.	1.848049

KF 5/13/03

Grain Size Calculations

ASI #: 20030345
Sample: PJ2AU-13 Triplicate

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
37	32	65.30612	2	10.227	0.03048239	-1.515951
32	27	55.10204	5	11.047	0.02003674	-1.698173
27	22	44.89796	15	11.867	0.011989877	-1.921185
24	19	38.77551	30	12.359	0.008652088	-2.062879
20	15	30.61224	60	13.015	0.006278217	-2.202164
14	9	18.36735	250	13.999	0.003189836	-2.496232
10	5	10.20408	1440	14.655	0.001359883	-2.866498

DC =	5
HMCF=	0.98
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	25.08141498	25.08141
Percent Silt	50.32559844	50.3256
Percent Sand	24.59298658	24.59299
Percent Gravel	0	0
Total		100

Regression Output

Constant	125.7036
Std. Error of Y Est.	3.051135
R Squared	0.979743
No. of Observations	7
X Coefficients	41.77039
Std. Error of Coeffic.	2.686043

AF 5/13/03

HYDROMETRIC READINGS FOR GRAIN SIZE ANALYSIS

Job #: 23-037 Client: ACOE

Balance: Sartorius Calibration: Yes ✓ No ___

Sample: 20030356 Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:12	0	XXXX	5/9/03
10:14	2	38	
10:17	5	32	
10:27	15	28	
10:42	30	25	
11:12	60	20	
2:22	250	14	
10:12	1440	11	5/10/03

Sample: 20030358 dip Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:24	0	XXXX	5/9/03
10:26	2	43	
10:29	5	38	
10:39	15	~~34~~ 33	
10:54	30	29	
11:24	60	22	
2:34	250	15	
10:24	1440	11	5/10/03

Sample: 20030357 Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:16	0	XXXX	5/9/03
10:18	2	43	
10:21	5	38	
10:31	15	33	
10:46	30	26.5	
11:16	60	18	
2:26	250	13	
10:16	1440	10	5/10/03

Sample: 20030358 top Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:28	0	XXXX	5/9/03
10:30	2	43.5	
10:33	5	38	
10:43	15	34	
10:58	30	28	
11:28	60	21	
2:38	250	15	
10:28	1440	11	5/10/03

Sample: 20030358 Grams Used: 50g DC: 5

Clock Time	T	R_h	Initials/Date
10:20	0	XXXX	5/9/03
10:22	2	43	
10:25	5	38	
10:35	15	34	
10:50	30	28	
11:20	60	21	
2:30	250	15	
10:20	1440	~~18~~ 11	5/10/03

DC= Dispersant Constant T= Time in minutes after initial mixing R_h= Hydrometer Reading

Hydrometer: yellow

Grain Size Calculations

ASI #: 20030356
Sample: PJ2AU-26

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
38	33	67.34694	2	10.063	0.030236995	-1.519461
32	27	55.10204	5	11.047	0.02003674	-1.698173
28	23	46.93878	15	11.703	0.01190674	-1.924207
25	20	40.81633	30	12.195	0.008594491	-2.06578
20	15	30.61224	60	13.015	0.006278217	-2.202164
14	9	18.36735	250	13.999	0.003189836	-2.496232
11	6	12.2449	1440	14.491	0.001352253	-2.868942

DC =	5
HMCF=	0.98
K =	0.01348
% Gravel	0.23

	Hydrometer	Corrected for % Gravel
Percent Clay	26.28303676	26.22259
Percent Silt	73.71696324	73.54741
Percent Sand	0	0
Percent Gravel	0.23	0.23
Total		100

Regression Output

Constant	127.1914
Std. Error of Y Est.	3.995145
R Squared	0.965905
No. of Observations	7
X Coefficients	41.8892
Std. Error of Coeffic.	3.519616

5/13/07

Grain Size Calculations

ASI #: 20030357
Sample: PJ2AU-27

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
43	38	78.35052	2	9.243	0.028978865	-1.537919
38	33	68.04124	5	10.063	0.019123555	-1.718431
33	28	57.73196	15	10.883	0.011482027	-1.939981
26.5	21.5	44.3299	30	11.949	0.008507365	-2.070205
18	13	26.80412	60	13.343	0.006356836	-2.196759
13	8	16.49485	250	14.163	0.003208467	-2.493702
10	5	10.30928	1440	14.655	0.001359883	-2.866498

DC =	5
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	26.93641267	26.93641
Percent Silt	67.06798923	67.06799
Percent Sand	5.995598106	5.995598
Percent Gravel	0	0
Total		100

Regression Output

Constant	161.0337
Std. Error of Y Est.	7.660708
R Squared	0.928932
No. of Observations	7
X Coefficients	55.66663
Std. Error of Coeffic.	6.885828

RF 5/13/03

Grain Size Calculations

ASI #: 20030358
Sample: PJ2AU-8

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
43	38	78.35052	2	9.243	0.028978865	-1.537919
38	33	68.04124	5	10.063	0.019123555	-1.718431
34	29	59.79381	15	10.719	0.011395185	-1.943279
28	23	47.42268	30	11.703	0.008419336	-2.074722
21	16	32.98969	60	12.851	0.006238537	-2.204917
15	10	20.61856	250	13.835	0.003171097	-2.498791
11	6	12.37113	1440	14.491	0.001352253	-2.868942

DC =	5
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	30.37082794	30.37083
Percent Silt	63.95561069	63.95561
Percent Sand	5.673561377	5.673561
Percent Gravel	0	0
Total		100

Regression Output

Constant	158.2452
Std. Error of Y Est.	5.659121
R Squared	0.956347
No. of Observations	7
X Coefficients	53.08335
Std. Error of Coeffic.	5.071912

5/30/03

Grain Size Calculations

ASI #: 20030358
Sample: PJ2AU-8-Dup

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
43	38	78.35052	2	9.243	0.028978865	-1.537919
38	33	68.04124	5	10.063	0.019123555	-1.718431
33	28	57.73196	15	10.883	0.011482027	-1.939981
29	24	49.48454	30	11.539	0.008360136	-2.077787
22	17	35.05155	60	12.687	0.006198602	-2.207706
15	10	20.61856	250	13.835	0.003171097	-2.498791
11	6	12.37113	1440	14.491	0.001352253	-2.868942

DC =	5
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	30.79068677	30.79069
Percent Silt	63.51183289	63.51183
Percent Sand	5.69748034	5.69748
Percent Gravel	0	0
Total		100

Regression Output

Constant	157.7777
Std. Error of Y Est.	4.768663
R Squared	0.968214
No. of Observations	7
X Coefficients	52.71501
Std. Error of Coeffic.	4.271478

RS 5/27/07

Grain Size Calculations

ASI #: 20030358
Sample: PJ2AU-8-Trip

Client ID: ACOE-Port Jersey
Job #: 23-037

R-obs	R-corr.	P	T	L	D	log D
43.5	38.5	79.38144	2	9.161	0.028850034	-1.539854
38	33	68.04124	5	10.063	0.019123555	-1.718431
34	29	59.79381	15	10.719	0.011395185	-1.943279
28	23	47.42268	30	11.703	0.008419336	-2.074722
21	16	32.98969	60	12.851	0.006238537	-2.204917
15	10	20.61856	250	13.835	0.003171097	-2.498791
11	6	12.37113	1440	14.491	0.001352253	-2.868942

DC =	5
HMCF=	0.97
K =	0.01348
% Gravel	0

	Hydrometer	Corrected for % Gravel
Percent Clay	30.3809847	30.38098
Percent Silt	64.59137185	64.59137
Percent Sand	5.027643457	5.027643
Percent Gravel	0	0
Total		100

Regression Output

Constant	159.5265
Std. Error of Y Est.	5.74171
R Squared	0.955885
No. of Observations	7
X Coefficients	53.61103
Std. Error of Coeffic.	5.150595

5/27/03

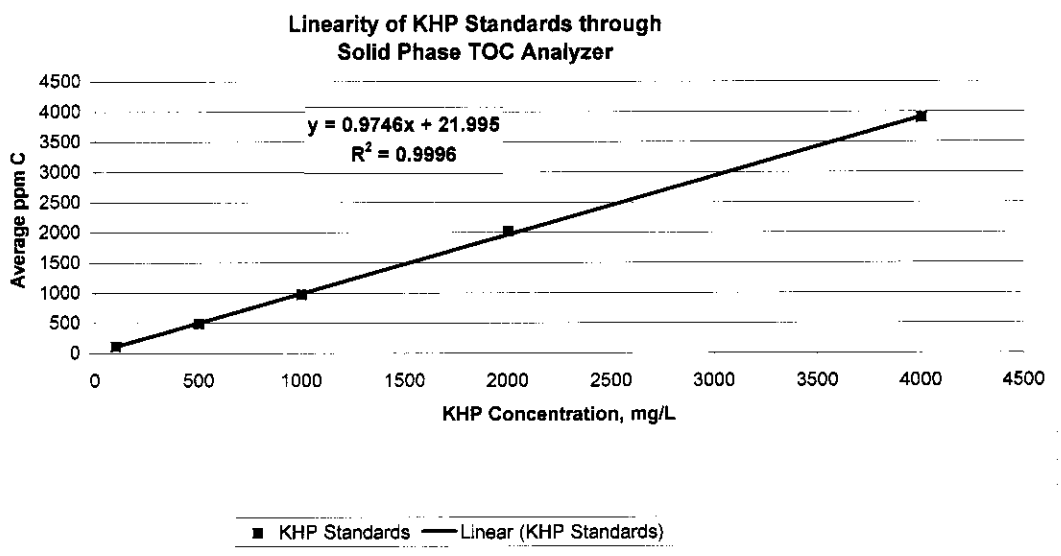
Total Organic Carbon
and Standard Reference Material

WORKSHEET FOR SOLID-PHASE TOC ANALYSIS
ACOE PORT JERSEY UPLAND DISPOSAL 23-037

Samples analyzed on 7 April 03. Data analyzed using linear regression curve. Samples were nitric acid digested in the boats.

Sample ID	Mass Injected (g)	TOC Value	Calculated µg C	Calculated ppm C	% RSD	Average ppm C	% TOC of Dry Weight	Comments
4000 ppm KHP Std.-a	0.0400	3736	149.4	3,811				40.0 µl injected
4000 ppm KHP Std.-b	0.0400	4013	160.5	4,095	3.74	3,979		40.0 µl injected
4000 ppm KHP Std.-c	0.0400	3951	158.0	4,031				40.0 µl injected
2000 ppm KHP Std.-a	0.0400	2025	81.00	2,055	0.07	2,054		40.0 µl injected
2000 ppm KHP Std.-b	0.0400	2023	80.92	2,053				40.0 µl injected
1000 ppm KHP Std.-a	0.0400	976.8	39.07	979.7	0.33	982		40.0 µl injected
1000 ppm KHP Std-b	0.0400	981.3	39.25	984.3				40.0 µl injected
500 ppm KHP Std.-a	0.0400	503.1	20.12	493.6	2.39	485.4		40.0 µl injected
500 ppm KHP Std.-b	0.0400	487.1	19.48	477.2				40.0 µl injected
100 ppm KHP Std-a	0.0400	123.7	4.948	104.36	7.63	99.0		
100 ppm KHP Std-b	0.0400	113.3	4.532	93.68				
20030303-a	0.01048	3078	125.43	11,969				* This sample is not for 23-037, used for QC purposes only
20030303-b	0.00988	2655	108.07	10,938	8.61	10,995	1.10	
20030303-c	0.01047	2593	105.52	10,078				
20030303-a spike	0.00977	3590	146.44	14,989				* This sample is not for 23-037, used for QC purposes only
20030303-b spike	0.00964	3693	150.67	15,630	2.70	15,463		
20030303-c spike	0.00965	3730	152.19	15,771				
USGS QC SDO-1 Std.	0.00048	1032	41.45	86,354				
USGS QC SDO-2 Std.	0.00056	1171	47.16	84,214	6.85	88,741		
USGS QC SDO-3 Std.	0.00052	1234	49.74	95,654				**Measured range of std.: 89,800 - 104,000 ppm C**
20030333-a	0.00518	4010	163.68	31,598				
20030333-b	0.00495	3729	152.14	30,735	4.41	30,432	3.04	
20030333-c	0.00509	3614	147.42	28,963				
20030334-a	0.01839	3471	141.56	7,698				
20030334-b	0.01936	3791	154.69	7,990	11.63	7,357	0.74	
20030334-c	0.01982	3105	126.53	6,384				
20030335-a	0.00481	2999	122.18	25,401				
20030335-b	0.005	2444	99.41	19,882	12.43	23,098	2.31	
20030335-c	0.00513	3023	123.17	24,010				
20030336-a	0.00478	3200	130.43	27,287				
20030336-b	0.00452	3156	128.63	28,458	4.22	28,479	2.85	
20030336-c	0.00465	3386	138.07	29,692				

KHP Conc.	Ave. ppm C
4000	**3900**
2000	**2024**
1000	**979.1**
500	**495.1**
100	**118.5**



23-037A

From Page No.

.84160 .85192 3587 23

STD	TOC	Strip
4000	3736	1
	4013	2
	3951	3
2000	2025	4
	2023	5
1000	976.8	6
	981.3	7
500	503.1	8
	487.1	9
100	123.7	10
	113.3	11

Sample	Tare	+Sample	TOC	Strip
20030305	.75282	.76315	3803	24
PJ2B 1-15	.52342	.53401	3634	25
	.84175	.85228	3544	26
20030306	.75294	.76322	3271	27
PJ2B 1-20	.52380	.53421	3370	28
	.84247	.85299	3439	29
23-037				
20030333	.75336	.76072	to high rerun	30
PJ2AU-36	.52408	.53162	to high rerun	31
	.84310	.85273	to high rerun	32
20030333	.75347	.75891	VOID	33
	.52424	.52942	4010	34
	.84307	.84802	3729	35
	.75326	.75835	3614	36

Sample	Tare	+Sample	TOC	Strip
20030303	.75329	.76377	3078	12
PJ2B 1-10	.52335	.53323	2655	13
	.84209	.85256	2593	14

Sample	Tare	+Sample	TOC	Strip
20030334	.52485	.54324	3471	37
PJ2AU-35.	.84316	.86252	3791	38
	.75336	.77318	3105	39

Spk	Tare	+Sample	+USGS	TOC	Strip
20030303	.75337	.76314	.76362	3590	15
PJ2B 1-10	.52339	.53303	.53359	3693	16
	.84233	.85198	.85257	3730	17

Sample	Tare	+Sample	TOC	Strip
20030335	.52479	.52960	2999	40
PJ2AU-33.	.84329	.84829	2444	41
	.75352	.75865	3023	42
20030336				
PJ2AU-37	.52477	.52955	3200	43
	.84340	.84792	3156	44
	.75351	.75816	3386	45

USGS	Tare	+Sample	TOC	Strip
	.75316	.75364	1032	18
	.52340	.52396	1171	19
	.84179	.84231	1234	20
20030304	.75305	.76347	3867	21
PJ2B 1-12	.52344	.53391	3929	22

To Page No.

Witnessed & Understood by me, Date 4/7/03 Invented by C.A.K Date Recorded by

4/7/03
C.A.K

20	TOC	1234
21	TOC	3867
22	TOC	3929
23	TOC	3587
24	TOC	3803
25	TOC	3634
26	TOC	3544
27	TOC	3271
28	TOC	3370
29	TOC	3439
30	TOC	1270
31	TOC	2822
32	TOC	3553
33	TOC	133.6 VOID
34	TOC	4010
35	TOC	3729
36	TOC	3614
37	TOC	3471
38	TOC	3791
39	TOC	3105
40	TOC	2999
41	TOC	2444
42	TOC	3023
43	TOC	3200
44	TOC	3156
45	TOC	3386

to high

SELFTEST
NO ERRORS

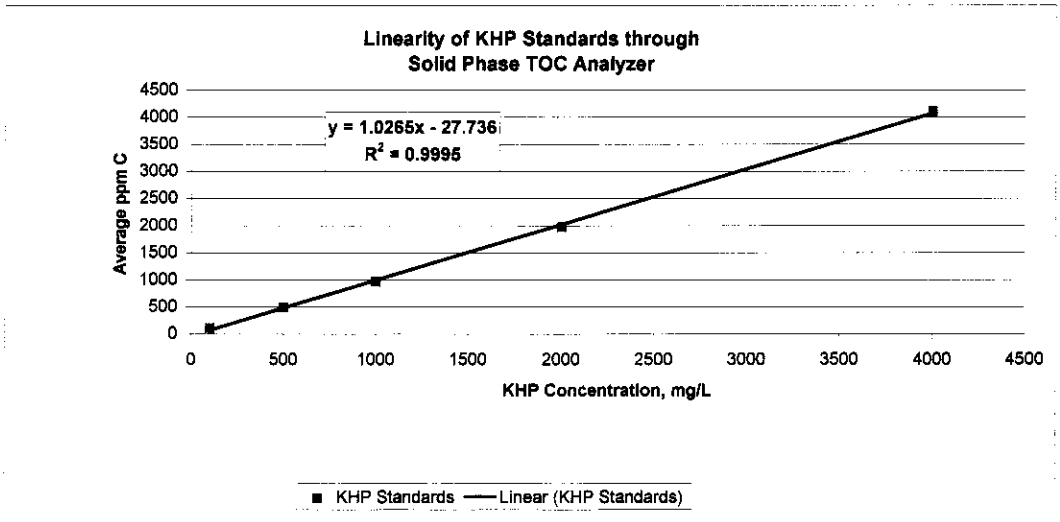
1	TOC	3736
2	TOC	4013
3	TOC	3951
4	TOC	2025
5	TOC	2023
6	TOC	976.8
7	TOC	981.3
8	TOC	503.1
9	TOC	487.1
10	TOC	123.7
11	TOC	113.3
12	TOC	3078
13	TOC	2655
14	TOC	2593
15	TOC	3590
16	TOC	3693
17	TOC	3730
18	TOC	1032
19	TOC	1171

WORKSHEET FOR SOLID-PHASE TOC ANALYSIS
ACOE PORT JERSEY UPLAND DISPOSAL 23-037

Samples analyzed on 8 April 03. Data analyzed using linear regression curve. Samples were nitric acid digested in the boats.

Sample ID	Mass Injected (g)	TOC Value	Calculated µg C	Calculated ppm C	% RSD	Average ppm C	% TOC of Dry Weight	Comments
4000 ppm KHP Std.-a	0.0400	4104	164.2	4,025	0.09	4,028		40.0 µl injected
4000 ppm KHP Std.-b	0.0400	4109	164.4	4,030				40.0 µl injected
2000 ppm KHP Std.-a	0.0400	2001	80.04	1,976	1.59	1,954		40.0 µl injected
2000 ppm KHP Std.-b	0.0400	1955	78.20	1,932				40.0 µl injected
1000 ppm KHP Std.-a	0.0400	987.9	39.52	989.4	2.56	972		40.0 µl injected
1000 ppm KHP Std-b	0.0400	951.7	38.07	954.2				40.0 µl injected
500 ppm KHP Std.-a	0.0400	472.2	18.89	487.0	5.95	508.4		40.0 µl injected
500 ppm KHP Std.-b	0.0400	516.1	20.64	529.8				40.0 µl injected
100 ppm KHP Std-a	0.0400	110.7	4.428	134.9	2.83	137.7		40.0 µl injected
100 ppm KHP Std-b	0.0400	116.4	4.656	140.4				40.0 µl injected
20030337-a	0.00526	3822	150.0	28,517				
20030337-b	0.00504	3757	147.5	29,266	1.80	28,686	2.87	
20030337-c	0.00504	3629	142.5	28,274				
20030337-a spike	0.00413	3991	156.6	37,918				
20030337-b spike	0.00431	3987	156.4	36,288	5.24	36,118		
20030337-c spike	0.00434	3775	148.2	34,147				
USGS QC SDO-1 Std.	0.00050	1018	40.75	81,500				
USGS QC SDO-2 Std.	0.00048	1043	41.72	86,917	6.10	86,836		**Calculated value of std.: 96,800 ± 4,500 ppm C**
USGS QC SDO-3 Std.	0.00055	1272	50.65	92,091				**Measured range of std.: 89,800 - 104,000 ppm C**
20030338-a	0.00494	3034	119.3	24,150				
20030338-b	0.00508	3173	124.7	24,547	0.87	24,308	2.43	
20030338-c	0.00499	3075	120.9	24,228				
20030339-a	0.00234	1983	78.35	33,483				
20030339-b	0.00262	2145	84.67	32,317	3.09	32,430	3.24	
20030339-c	0.00279	2227	87.86	31,491				
20030340-a	0.00357	2969	116.8	32,717				
20030340-b	0.00365	3153	123.9	33,945	3.30	32,817	3.28	
20030340-c	0.00358	2893	113.8	31,788				
20030341-a	0.00443	4085	160.3	36,185				
20030341-b	0.00394	3810	149.5	37,944	3.52	36,524	3.65	
20030341-c	0.00384	3466	136.1	35,443				
20030369-a	0.0046	3074	120.9	26,283				
20030369-b	0.00408	2671	105.2	25,784	2.06	25,763	2.58	
20030369-c	0.0045	2885	113.5	25,222				
20030368-a	0.00408	3279	128.9	31,593				
20030368-b	0.00386	2758	108.6	28,135	6.19	30,283	3.03	
20030368-c	0.00393	3112	122.3	31,120				
20030367-a	0.004	3663	143.8	35,950				
20030367-b	0.00384	3632	142.6	37,135	2.30	36,203	3.62	
20030367-c	0.004	3619	142.1	35,525				
20030393-a	0.00947	3156	124.1	13,105				
20030393-b	0.00963	2797	110.1	11,433	6.92	12,201	1.22	
20030393-c	0.00954	2925	115.1	12,065				

KHP Conc.	Ave. ppm C
4000	**4107**
2000	**1978**
1000	**969.8**
500	**494.2**
100	**113.6**



KF 6/18/03

23-037-B

TITLE TOC's 23-037. 4/8/03 Project No._____ Book No._____ PJ. Upland. 42

From Page No.___

STD	TOC	Strip
4000	4104	1
	4109	2
2000	2001	3
	1955	4
1000	987.9	5
	951.7	6
500	472.2	7
	516.1	8
100	110.7	9
	116.4	10

Sample	Tare	+Sample	TOC	Strip
2003 0337	.75423	.75949	3822	11
PJ2AU-38	.52501	.53005	3757	12
	.84328	.84832	3629	13

Spk	Tare	+Sample	+USGS	TOC	Strip
2003 0337	.75411	.75824	.75881	3991	14
	.52506	.52937	.52982	3987	15
	.84359	.84793	.84838	3775	16

USGS	Tare	+Sample	TOC	Strip
	.75396	.75446	1018	17
	.52505	.52553	1043	18
	.84340	.84395	1272	19
2003 0338	.75379	.75873	3034	20
PJ2AU-32	.52480	.52988	3173	21
	.84308	.84807	3075	22

Sample	Tare	+Sample	TOC	Strip
2003 0339	.75383	.75930	VOID	23
PJ2AU-30	.52486	.53015	↓	24
	.84313	.84834	VOID	25
	.75393	.75627	1983	26
	.52507	.52769	2145	27
	.84322	.84601	2227	28
2003 0340	.75387	.75744	2969	29
PJ2AU-31	.52506	.52871	3153	30
	.84337	.84695	2893	31
2003 0341	.75426	.75869	4085	32
PJ2AU-29	.52520	.52914	3810	33
	.84350	.84734	3466	34

Sample	Tare	+Sample	TOC	Strip
2003 0369	.75409	.75869	3074	35
PJ2AU	.52555	.52963	2671	36
comp A	.84374	.84824	2885	37
2003 0368	.75412	.75820	3279	38
PJ2AU	.52576	.52962	2758	39
comp K	.84372	.84765	3112	40

Sample	Tare	+Sample	TOC	Strip
2003 0367	.75471	.75871	3663	41
PJ2AU	.52524	.52908	3632	42
comp J	.84377	.84777	3619	43
2003 0393	.75432	.77164	to high	44
PJ2A	.52525	.54231	↓	45
comp. K	.84378	.86124	to high	46
	.75446	.76393	3156	47
	.52518	.53481	2797	48
	.84396	.85350	2925	49

To Page No.____

Witnessed & Understood by me,	Date	Invented by	Date
	4/8/03	C.A.K	
		Recorded by	

20	TOC	3034
21	TOC	3173
22	TOC	3075
23	TOC	202.0
24	TOC	63.98
25	TOC	46.18
26	TOC	1983
27	TOC	2145
28	TOC	2227
29	TOC	2969
30	TOC	3153
31	TOC	2893
32	TOC	4085
33	TOC	3810
34	TOC	3466
35	TOC	3074
36	TOC	2671
37	TOC	2885
38	TOC	3279
39	TOC	2758
40	TOC	3112
41	TOC	3663
42	TOC	3632
43	TOC	3619
44	TOC	960.3
45	TOC	988.3
46	TOC	628.0
47	TOC	3156

VOID

to high

4/8/03

C.A.K

SELFTEST
NO ERRORS

1	TOC	4164
2	TOC	4109
3	TOC	2001
4	TOC	1955
5	TOC	987.9
6	TOC	951.7
7	TOC	472.8
8	TOC	516.1
9	TOC	110.7
10	TOC	116.4
11	TOC	3822
12	TOC	3757
13	TOC	3629
14	TOC	3991
15	TOC	3987
16	TOC	3775
17	TOC	1018
18	TOC	1043
19	TOC	1272

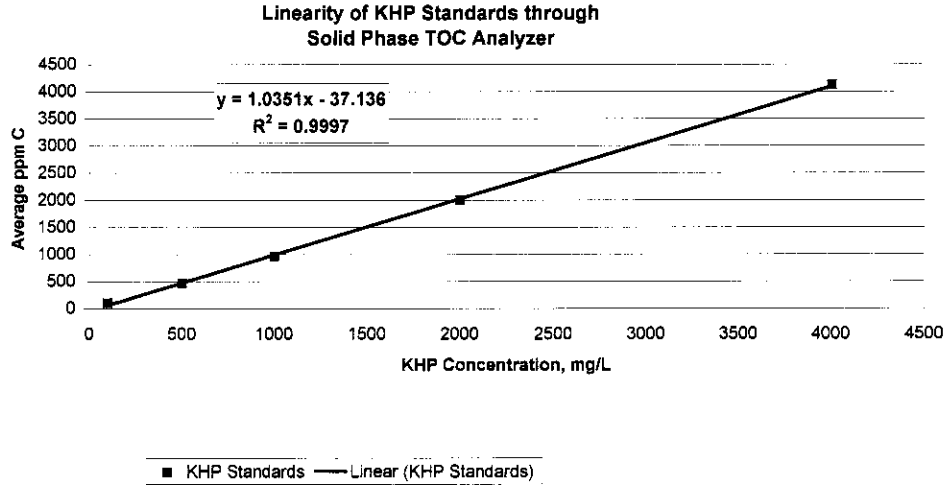
1.19 survey

WORKSHEET FOR SOLID-PHASE TOC ANALYSIS
ACOE PORT JERSEY UPLAND DISPOSAL 23-037

Samples analyzed on 9 April 03. Data analyzed using linear regression curve. Samples were nitric acid digested in the boats.

Sample ID	Mass Injected (g)	TOC Value	Calculated µg C	Calculated ppm C	% RSD	Average ppm C	% TOC of Dry Weight	Comments
4000 ppm KHP Std.-a	0.0400	4150	166.0	4,045	0.90	4,020		40.0 µl injected
4000 ppm KHP Std.-b	0.0400	4097	163.9	3,994				40.0 µl injected
2000 ppm KHP Std.-a	0.0400	2015	80.60	1,983	0.62	1,974		40.0 µl injected
2000 ppm KHP Std.-b	0.0400	1997	79.88	1,965				40.0 µl injected
1000 ppm KHP Std.-a	0.0400	965.6	38.62	968.7	0.51	972.2		40.0 µl injected
1000 ppm KHP Std-b	0.0400	972.8	38.91	975.7				40.0 µl injected
500 ppm KHP Std.-a	0.0400	479.8	19.19	499.4	1.09	495.6		40.0 µl injected
500 ppm KHP Std.-b	0.0400	471.9	18.88	491.8				40.0 µl injected
100 ppm KHP Std-a	0.0400	106.7	4.268	138.96	0.25	138.72		
100 ppm KHP Std-b	0.0400	106.2	4.248	138.48				
20030342-a	0.00384	2962	115.90	30,182				
20030342-b	0.00366	2808	109.95	30,040	1.73	29,816	2.98	
20030342-c	0.00377	2814	110.18	29,225				
20030342-a spike	0.00378	3739	145.92	38,604				
20030342-b spike	0.00387	3906	152.38	39,374	3.97	39,875		
20030342-c spike	0.00385	4112	160.34	41,646				
USGS QC SDO-1 Std.	0.00051	1230	48.97	96,013				
USGS QC SDO-2 Std.	0.00055	1271	50.55	91,911	3.62	92,433		
USGS QC SDO-3 Std.	0.00048	1073	42.90	89,374				**Measured range of std.: 89,800 - 104,000 ppm C**
20030343-a	0.00392	3816	148.90	37,984				
20030343-b	0.004	3971	154.89	38,722	1.44	38,593	3.86	
20030343-c	0.00398	3987	155.51	39,072				
20030344-a	0.00377	3059	119.65	31,736				
20030344-b	0.00396	3120	122.00	30,809	1.65	31,404	3.14	
20030344-c	0.00386	3126	122.23	31,667				
20030345-a	0.00406	2730	106.93	26,338				
20030345-b	0.00427	2965	116.01	27,169	1.73	26,875	2.69	
20030345-c	0.00419	2903	113.62	27,116				
20030346-a	0.00433	3548	138.54	31,996				
20030346-b	0.00409	3380	132.05	32,286	1.09	31,958	3.20	
20030346-c	0.00429	3470	135.53	31,592				
20030347-a	0.00634	3099	121.19	19,115				
20030347-b	0.0064	3136	122.62	19,160	2.43	18,873	1.89	
20030347-c	0.00644	3020	118.14	18,345				
20030348-a	0.00667	3937	153.57	23,025				
20030348-b	0.00616	4031	157.21	25,521	16.44	22,284	2.23	
20030348-c	0.00617	2886	112.96	18,308				
20030349-a	0.00363	2693	105.50	29,064				
20030349-b	0.00355	2691	105.43	29,697	4.47	28,664	2.87	
20030349-c	0.00391	2718	106.47	27,230				

KHP Conc.	Ave. ppm C
4000	4124
2000	2006
1000	969.2
500	475.9
100	106.5



KF 4/29/03

TITLE TOC's 23-037 4/9/03 Project No. Book No.

From Page No.

STD	TOC	strip
4000	4150	1
	4097	2
2000	2015	3
	1997	4
1000	965.6	5
	972.8	6
500	479.8	7
	471.9	8
100	106.7	9
	106.2	10

Sample	Tare	+Sample	TOC	Strip
2003 0344 PJ 2AU-20	.75521	.75898	3059	23
	.52541	.52937	3120	24
	.84396	.84782	3126	25
2003 0345 PJ 2AU-13	.75510	.75916	2730	26
	.52562	.52989	2965	27
	.84364	.84783	2903	28
2003 0346 PJ 2AU-14	.75530	.75963	3548	29
	.52582	.52991	3380	30
	.84403	.84832	3470	31
2003 0347 PJ 2AU-15	.75530	.76164	3099	32
	.52605	.53245	3136	33
	.84415	.85059	3020	34

Sample	Tare	+Sample	TOC	Strip
2003 0348 PJ 2AU-18	.75583	.76250	3937	35
	.52637	.53253	4031	36
	.84454	.85071	2886	37
2003 0349 PJ 2AU-19	.75573	.76189	VOID	38
	.52647	.53010	2693	39
	.84437	.84792	2691	40
	.75545	.75936	2718	41

Sample	Tare	+Sample	TOC	Strip
2003 0342 PJ 2AU-16	.75588	.75972	2962	11
	.52537	.52903	2808	12
	.84385	.84762	2814	13

Spk	Tare	+Sample	+USGS	TOC	Strip
2003 0342	.75592	.75970	.76016	3779	14
	.52543	.52930	.52975	3906	15
	.84399	.84784	.84840	4112	16

USGS	Tare	+Sample	TOC	Strip
	.75573	.75624	1230	17
	.52534	.52589	1271	18
	.84428	.84476	1073	19
2003 0343 PJ 2AU-19	.75558	.75950	3816	20
	.52536	.52936	3971	21
	.84431	.84829	3987	22

To Page No.

Witnessed & Understood by me,	Date	Invented by	Date
	4/9/03	C.A.K	
		Recorded by	

4/9/03
C.A.K

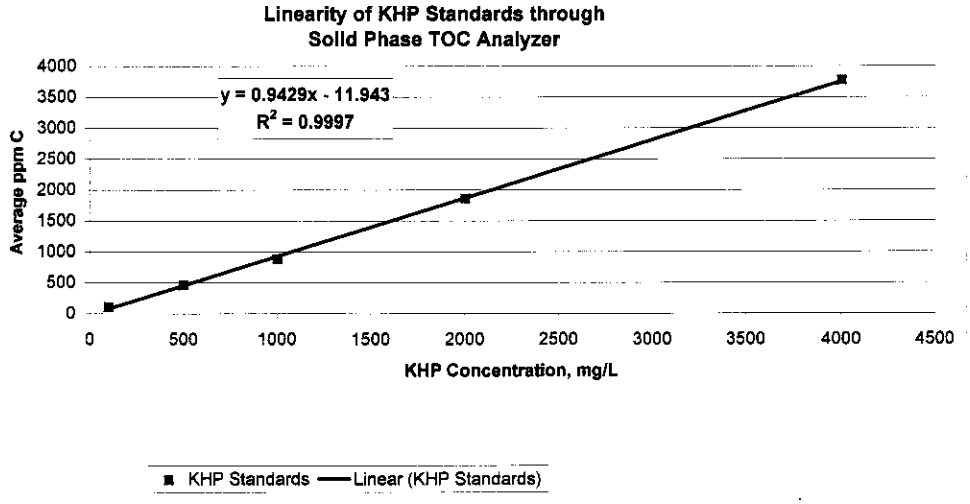
1	TOC	4150
2	TOC	4097
3	TOC	2015
4	TOC	1997
5	TOC	965.6
6	TOC	972.8
7	TOC	479.8
8	TOC	471.9
9	TOC	106.7
10	TOC	106.2
11	TOC	2962
12	TOC	2808
13	TOC	2814
14	TOC	3739
15	TOC	3906
16	TOC	4112
17	TOC	1230
18	TOC	1271
19	TOC	1073
20	TOC	3016
21	TOC	3971
22	TOC	3987
23	TOC	2059
24	TOC	3130
25	TOC	3126
26	TOC	2730
27	TOC	2965
28	TOC	2903
29	TOC	3548
30	TOC	3380
31	TOC	3470
32	TOC	3099
33	TOC	3136
34	TOC	3020
35	TOC	3937
36	TOC	4031
37	TOC	2986
38	TOC	270.0
39	TOC	2693
40	TOC	2691
41	TOC	2718

WORKSHEET FOR SOLID-PHASE TOC ANALYSIS
ACOE PORT JERSEY UPLAND DISPOSAL 23-037

Samples analyzed on 10 April 03. Data analyzed using linear regression curve. Samples were nitric acid digested in the boats.

Sample ID	Mass Injected (g)	TOC Value	Calculated µg C	Calculated ppm C	% RSD	Average ppm C	% TOC of Dry Weight	Comments
4000 ppm KHP Std.-a	0.0400	3777	151.1	4,018	0.11	4,015		40.0 µl injected
4000 ppm KHP Std.-b	0.0400	3771	150.8	4,012				40.0 µl injected
2000 ppm KHP Std.-a	0.0400	1761	70.44	1,880				40.0 µl injected
2000 ppm KHP Std.-b	0.0400	1962	78.48	2,093	5.36	1,987		40.0 µl injected
2000 ppm KHP Std.-b	0.0400	1863	74.52	1,988				40.0 µl injected
1000 ppm KHP Std.-a	0.0400	908.9	36.36	976.6	2.76	957.9		40.0 µl injected
1000 ppm KHP Std-b	0.0400	873.7	34.95	939.3				40.0 µl injected
500 ppm KHP Std.-a	0.0400	464.9	18.60	505.7	0.04	505.9		40.0 µl injected
500 ppm KHP Std.-b	0.0400	465.2	18.61	506.0				40.0 µl injected
100 ppm KHP Std-a	0.0400	112.5	4.500	131.98	1.63	133.52		
100 ppm KHP Std-b	0.0400	115.4	4.616	135.05				
20030350-a	0.00399	2741	116.79	29,270				
20030350-b	0.00383	2728	116.23	30,348	2.41	30,090	3.01	
20030350-c	0.00377	2712	115.56	30,651				
20030350-a spike	0.00394	3638	154.8	39,299				
20030350-b spike	0.00363	3391	144.4	39,769	7.24	41,253		
20030350-c spike	0.00346	3633	154.6	44,690				
USGS QC SDO-1 Std.	0.00045	909.4	39.09	86,857				
USGS QC SDO-2 Std.	0.00045	877.0	37.71	83,802	2.45	86,171		
USGS QC SDO-3 Std.	0.00047	961.4	41.29	87,854				Measured range of std.: 89,800 - 104,000 ppm C
20030351-a	0.00374	2382	101.6	27,154				
20030351-b	0.00383	2488	106.1	27,690	6.11	26,501	2.65	
20030351-c	0.00379	2191	93.45	24,658				
20030352-a	0.00453	2926	124.6	27,513				
20030352-b	0.00443	3031	129.1	29,140	2.92	28,250	2.82	
20030352-c	0.00451	2975	126.7	28,096				
20030353-a	0.00463	3254	138.5	29,924				
20030353-b	0.00472	3367	143.3	30,369	0.76	30,116	3.01	
20030353-c	0.0047	3318	141.3	30,056				
20030364-a	0.00456	2686	114.5	25,099				
20030364-b	0.00472	2741	116.8	24,743	3.00	25,347	2.53	
20030364-c	0.00426	2619	111.6	26,200				
20030365-a	0.00485	3029	129.0	26,599				
20030365-b	0.00468	2689	114.6	24,483	4.40	25,336	2.53	
20030365-c	0.00419	2450	104.4	24,926				
20030366-a	0.00424	3421	145.6	34,347				
20030366-b	0.00426	3527	150.1	35,242	1.31	34,750	3.48	
20030366-c	0.0041	3338	142.1	34,662				
20030391-a	0.00356	2648	112.8	31,697				
20030391-b	0.00368	2736	116.6	31,678	0.49	31,777	3.18	
20030391-c	0.00381	2858	121.7	31,955				

KHP Conc.	Ave. ppm C
4000	3774
2000	1862
1000	891.3
500	465.1
100	114.0



TITLE TOC's 23-037 4/10/03 Project No. ACOE Upland Book No.

From Page No.

STD	TOC	Strip
4000	3777	1
	3771	2
2000	1761	3
	1962	4
	1863	5
1000	908.9	6
	873.7	7
500	464.9	8
	465.2	9
100	112.5	10
	115.4	11

Sample	Tare	+Sample	TOC	Strip
2003 0352	.75620	.76073	2926	24
PJ 2AU-1	.52663	.53106	3031	25
	.84475	.84926	2975	26
2003 0353	.75603	.76066	3254	27
PJ 2AU-2	.52685	.53157	3367	28
	.84488	.84958	3318	29
2003 0364	.75677	.76133	2686	30
PJ 2AU comp E	.52686	.53158	2741	31
	.84509	.84996	Cancel	32
	.84525	.84951	2619	33
2003 0365	.75682	.76167	3029	34
PJ 2AU comp F.	.52729	.53197	2689	35
	.84531	.84950	2450	36

Sample	Tare	+Sample	TOC	Strip
2003 0350	.75626	.76025	2741	12
PJ 2AU-21	.52644	.53027	2728	13
	.84433	.84810	2712	14

Spk	Tare	+Sample	+USGS	TOC	Strip
2003 0350	.75643	.76037	.76083	3638	15
	.52657	.53020	.53065	3391	16
	.84514	.84860	.84918	3633	17

USGS	Tare	+Sample	TOC	Strip
	.75610	.75655	909.4	18
	.52690	.52735	877.0	19
	.84488	.84535	961.4	20
2003 0351	.75604	.75978	2382	21
PJ 2AU-17.	.52659	.53042	2488	22
	.84461	.84840	2191	23

Sample	Tare	+Sample	TOC	Strip
2003 0366	.75687	.76111	3421	37
PJ 2AU G.	.52723	.53149	3527	38
comp	.84533	.84943	3338	39
2003 0391	.75653	.76009	2648	40
PJ 2AU comp H.	.52719	.53087	2736	41
	.84493	.84874	2858	42

To Page No.

Witnessed & Understood by me,	Date 4/10/03	Invented by C.A.K	Date
		Recorded by	

4/10/03
C.A.K

21	TOC	2382
22	TOC	2488
23	TOC	2191
24	TOC	2926
25	TOC	3031
26	TOC	2975
27	TOC	3254
28	TOC	3367
29	TOC	3318
30	TOC	2686
31	TOC	2741
32	TOC	2924
32	CANCELLED	

TIMEOUT ERROR< 100%

33	TOC	2619
34	TOC	3029
35	TOC	2689
36	TOC	2450
37	TOC	3421
38	TOC	3527
39	TOC	3338
40	TOC	2648
41	TOC	2736
42	TOC	2858

SELFTEST
NO ERRORS

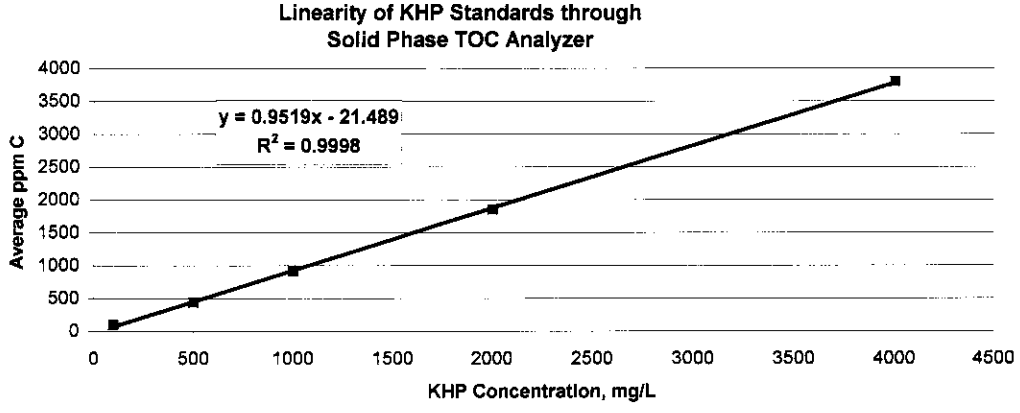
1	TOC	3777
2	TOC	3771
3	TOC	1761
4	TOC	1962
5	TOC	1863
6	TOC	908.9
7	TOC	873.7
8	TOC	464.9
9	TOC	485.2
10	TOC	112.5
11	TOC	[illegible]
12	TOC	2741
13	TOC	2728
14	TOC	2712
15	TOC	3638
16	TOC	3391
17	TOC	3633
18	TOC	909.4
19	TOC	877.0
20	TOC	961.4

WORKSHEET FOR SOLID-PHASE TOC ANALYSIS
ACOE PORT JERSEY UPLAND DISPOSAL 23-037

Samples analyzed on 11 April 03. Data analyzed using linear regression curve. Samples were nitric acid digested in the boats.

Sample ID	Mass Injected (g)	TOC Value	Calculated µg C	Calculated ppm C	% RSD	Average ppm C	% TOC of Dry Weight	Comments
4000 ppm KHP Std.-a	0.0400	3631	145.2	3,837				40.0 µl injected
4000 ppm KHP Std.-b	0.0400	3909	156.4	4,129	3.91	4,017		40.0 µl injected
4000 ppm KHP Std.-c	0.0400	3866	154.6	4,084				40.0 µl injected
2000 ppm KHP Std.-a	0.0400	1849	73.96	1,965	0.50	1,972		40.0 µl injected
2000 ppm KHP Std.-b	0.0400	1862	74.48	1,979				40.0 µl injected
1000 ppm KHP Std.-a	0.0400	911.9	36.48	980.6	1.37	990.2		40.0 µl injected
1000 ppm KHP Std-b	0.0400	930.2	37.21	999.8				40.0 µl injected
500 ppm KHP Std.-a	0.0400	441.4	17.66	486.3	1.23	490.6		40.0 µl injected
500 ppm KHP Std.-b	0.0400	449.5	17.98	494.8				40.0 µl injected
100 ppm KHP Std-a	0.0400	109.1	4.364	137.19	7.67	130.1		
100 ppm KHP Std-b	0.0400	95.67	3.827	123.08				
20030354-a	0.00368	2565	108.7	29,538				
20030354-b	0.00352	2395	101.5	28,835	5.67	30,153	3.02	
20030354-c	0.00355	2689	113.9	32,085				
20030354-a spike	0.00382	3423	144.7	37,880				
20030354-b spike	0.00376	3253	137.6	36,596	3.66	37,949		
20030354-c spike	0.00366	3408	144.1	39,372				
USGS QC SDO-1 Std.	0.00057	1213	51.87	91,000				
USGS QC SDO-2 Std.	0.00048	947.6	40.72	84,833	4.19	86,803		
USGS QC SDO-3 Std.	0.00059	1166	49.90	84,576				**Measured range of std.: 89,800 - 104,000 ppm C**
20030355-a	0.00452	2591	109.8	24,292				
20030355-b	0.0046	3108	131.5	28,587	8.70	26,988	2.70	
20030355-c	0.00444	2946	124.7	28,086				
20030356-a	0.00406	2465	104.5	25,739				
20030356-b	0.00439	2806	118.8	27,062	3.13	26,123	2.61	
20030356-c	0.00449	2711	114.8	25,568				
20030357-a	0.0035	3107	131.5	37,571				
20030357-b	0.00392	3686	155.8	39,745	3.06	38,402	3.84	
20030357-c	0.0036	3225	136.4	37,889				
20030358-a	0.00378	2524	107.0	28,307				
20030358-b	0.00368	2317	98.27	26,704	3.58	27,188	2.72	
20030358-c	0.00377	2361	100.1	26,552				
20030359-a	0.00398	3584	151.5	38,065				
20030359-b	0.00366	3335	141.0	38,525	0.79	38,182	3.82	
20030359-c	0.00352	3158	133.6	37,955				
20030360-a	0.00391	2553	108.2	27,673				
20030360-b	0.00388	2652	112.3	28,943	4.48	27,693	2.77	
20030360-c	0.00341	2126	90.24	26,463				

KHP Conc.	Ave. ppm C
4000	3802
2000	1856
1000	921.1
500	445.5
100	102.4



23-037E

Ft 5/5/03

Project No. _____ ACOE - Upland

TITLE TOC's 23-037 4/11/03 Book No. _____ 45

From Page No. ___

STD	TOC	Strip
4000	3691	1
	3909	2
	3866	3
2000	1849	4
	1862	5
1000	911.9	6
	930.42	7
500	441.4	8
	449.5	9
100	109.1	10
	95.67	11

Sample	Tare	+Sample	TOC	Strip
2003 0356	.75757	.76163	2465	~~23~~ 24
PJ 2AU-26	.52778	.53217	2806	25
	.84572	.85021	2711	26
2003 0357	.75745	.76222	VOID	27
PJ 2AU-27	.52783	.53243	4056 rerun	28
	.84590	.84940	3107	29
	.75769	.76161	3686	30
	.52813	.53173	3225	31
2003 0358	.75771	.76149	2524	32
PJ 2AU-28	.84641	.85009	2317	33
	.52820	.53197	2361	34
2003 0359	.75761	.76159	3584	35
PJ 2AU-29	.84594	.84960	3335	36
	.52810	.53162	3158	37

Sample	Tare	+Sample	TOC	Strip
2003 0354	.75745	.76113	2565	12
PJ 2AU-5	.52738	.53090	2395	13
	.84532	.84887	2689	14

Sample	Tare	+Sample	TOC	Strip
2003 0360	.75788	.76179	2553	38
PJ 2AU-10	.84609	.84997	2652	39
	.52818	.53159	2126	40

Spk	Tare	+Sample	+USGS	TOC	Strip
2003 0354	.75756	.76138	.76188	3423	15
	.52787	.53163	.53211	3253	16
	.84555	.84921	.84971	3408	17

USGS	Tare	+Sample	TOC	Strip
	.75774	.75831	1213	18
	.52777	.52825	947.6	19
	.84549	.84608	1166	20
2003 0355	.75757	.76209	2591	21
PJ 2AU-25	.52767	.53227	3108	22
	.84551	.84995	2946	23

To Page No. ___

Witnessed & Understood by me,	Date 4/11/03	Invented by C.A.K	Date
		Recorded by	

4/11/03
C.A.K

17	TOC	3408
18	TOC	1813
19	TOC	947.6
20	TOC	1166
21	TOC	2591
22	TOC	3108
23	TOC	2946
24	TOC	2465
25	TOC	2806
26	TOC	2711
27	TOC	238.9 VOID
28	TOC	4056 to high
29	TOC	3107
30	TOC	3686
31	TOC	3225
32	TOC	2524
33	TOC	2317
34	TOC	2361
35	TOC	3584
36	TOC	3335
37	TOC	3158
38	TOC	2553
39	TOC	2652
40	TOC	2126

SELFTEST
NO ERRORS

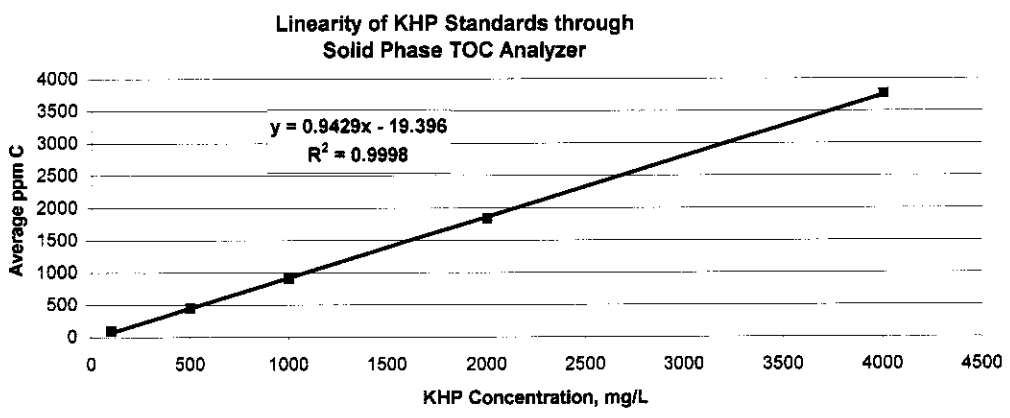
1	TOC	3631
2	TOC	3909
3	TOC	3666
4	TOC	1849
5	TOC	1862
6	TOC	911.9
7	TOC	930.2
8	TOC	441.4
9	TOC	449.5
10	TOC	109.1
11	TOC	95.67
12	TOC	2565
13	TOC	2395
14	TOC	2689
15	TOC	3423
16	TOC	3353

WORKSHEET FOR SOLID-PHASE TOC ANALYSIS
ACOE PORT JERSEY UPLAND DISPOSAL 23-037

Samples analyzed on 14 April 03. Data analyzed using linear regression curve. Samples were nitric acid digested in the boats.

Sample ID	Mass Injected (g)	TOC Value	Calculated µg C	Calculated ppm C	% RSD	Average ppm C	% TOC of Dry Weight	Comments
4000 ppm KHP Std.-a	0.0400	3650	146.0	3,891				40.0 µl injected
4000 ppm KHP Std.-b	0.0400	3832	153.3	4,084	2.70	4,016		40.0 µl injected
4000 ppm KHP Std.-c	0.0400	3821	152.8	4,073				40.0 µl injected
2000 ppm KHP Std.-a	0.0400	1838	73.52	1,970	0.14	1,972		40.0 µl injected
2000 ppm KHP Std.-b	0.0400	1842	73.68	1,974				40.0 µl injected
1000 ppm KHP Std.-a	0.0400	896.4	35.86	971.2	2.07	985.6		40.0 µl injected
1000 ppm KHP Std-b	0.0400	923.7	36.95	1,000				40.0 µl injected
500 ppm KHP Std.-a	0.0400	450.0	18.00	497.8	0.34	499.0		40.0 µl injected
500 ppm KHP Std.-b	0.0400	452.3	18.09	500.2				40.0 µl injected
100 ppm KHP Std-a	0.0400	102.1	4.084	128.8	3.26	125.9		
100 ppm KHP Std-b	0.0400	96.61	3.864	123.0				
20030361-a	0.00389	2293	98.10	25,219				
20030361-b	0.00396	2433	104.0	26,263	3.56	26,187	2.62	
20030361-c	0.00380	2407	102.9	27,079				
20030361-a spike	0.00386	3361	143.4	37,150				
20030361-b spike	0.00376	3008	128.4	34,149	4.66	36,088		
20030361-c spike	0.00379	3284	140.1	36,966				
USGS QC SDO-1 Std.	0.00053	1007	43.54	82,151				
USGS QC SDO-2 Std.	0.00059	1159	49.99	84,729	1.85	83,942		
USGS QC SDO-3 Std.	0.00055	1082	46.72	84,945				**Measured range of std.: 89,800 - 104,000 ppm C**
20030362-a	0.01789	1305	56.18	3,140				
20030362-b	0.01929	1232	53.09	2,752	8.88	2,852	0.29	
20030362-c	0.01781	1099	47.44	2,664				
20030387-a	0.00388	1924	82.44	21,247				
20030387-b	0.00393	1962	84.06	21,389	0.56	21,262	2.13	
20030387-c	0.00391	1930	82.70	21,151				
20030388-a	0.00437	1825	78.24	17,904				
20030388-b	0.00497	2386	102.0	20,523	10.82	18,351	1.84	
20030388-c	0.00467	1811	77.65	16,627				
20030389-a	0.00396	2533	108.3	27,348				
20030389-b	0.00382	2466	105.4	27,592	9.43	29,050	2.91	
20030389-c	0.00362	2728	116.6	32,210				
20030390-a	0.00421	2781	118.8	28,219				
20030390-b	0.0046	3112	132.8	28,870	4.56	29,293	2.93	
20030390-c	0.00469	3384	144.4	30,789				
20030392-a	0.00459	3252	138.8	30,240				
20030392-b	0.0046	3692	157.4	34,217	7.04	31,648	3.16	
20030392-c	0.00472	3373	143.9	30,487				

KHP Conc.	Ave. ppm C
4000	3768
2000	1840
1000	910.1
500	461.2
100	99.4



23-037-F

5/5/03

ACOE - Upland

Project No.

TITLE TOC's 23037 4/14/03 Book No.

From Page No.

STD	TOC	strip
4000	3650	1
	3832	2
	3821	3
2000	1838	4
	1842	5
1000	896.4	6
	923.7	7
500	450.0	8
	452.3	9
100	102.1	10
	96.61	11

Sample	Tare	+Sample	TOC	Strip
2003 080387	.75826	.76224	1924	24
PJ 2AU comp A	.52830	.53223	1962	25
	.84669	.85060	1930	26
2003 0388	.75828	.76265	1825	27
PJ 2AU comp B	.52839	.53336	2386	28
	.84679	.85146	1811	29
2003 0389	.75863	.76259	2533	30
PJ 2AU comp C	.52860	.53242	2466	31
	.84672	.85034	2728	32
2003 0390	.75835	.76256	2781	33
PJ 2AU comp D	.52871	.53331	3112	34
	.84721	.85190	3384	35

Sample	Tare	+Sample	TOC	Strip
20030361	.75882	.76271	2293	12
PJ 2AU-9	.52836	.53232	2433	13
	.84628	.85008	2407	14

Sample	Tare	+Sample	TOC	Strip
2003 0392	.75865	.76324	3252	36
PJ 2AU comp I	.52881	.53341	3692	37
	.84704	.85176	3373	38

Spk	Tare	+Sample	+USGS	TOC	Strip
20030361	.75865	.76251	.76307	3361	15
	.52852	.53228	.53273	3008	16
	.84641	.85020	.85067	3284	17

USGS	Tare	+Sample	TOC	Strip
	.75849	.75902	1007	18
	.52829	.52888	1159	19
	.84651	.84706	1082	20
20030362	.75847	.77636	1305	21
PJ 2AU -34	.52826	.54755	1232	22
	.84654	.86435	1099	23

To Page No.

Witnessed & Understood by me, | Date 4/14/03 | Invented by C.A.K | Recorded by | Date

4/14/03
C.A.K

17	TOC	3234
18	TOC	1007
19	TOC	1159
20	TOC	1082
21	TOC	1305
22	TOC	1232
23	TOC	1099
24	TOC	1924
25	TOC	1982
26	TOC	1930
27	TOC	1825
28	TOC	2386
29	TOC	1811
30	TOC	2533
31	TOC	2466
32	TOC	2728
33	TOC	2781
34	TOC	3112
35	TOC	3384
36	TOC	3252
37	TOC	3692
38	TOC	3373

SELFTEST
NO ERRORS

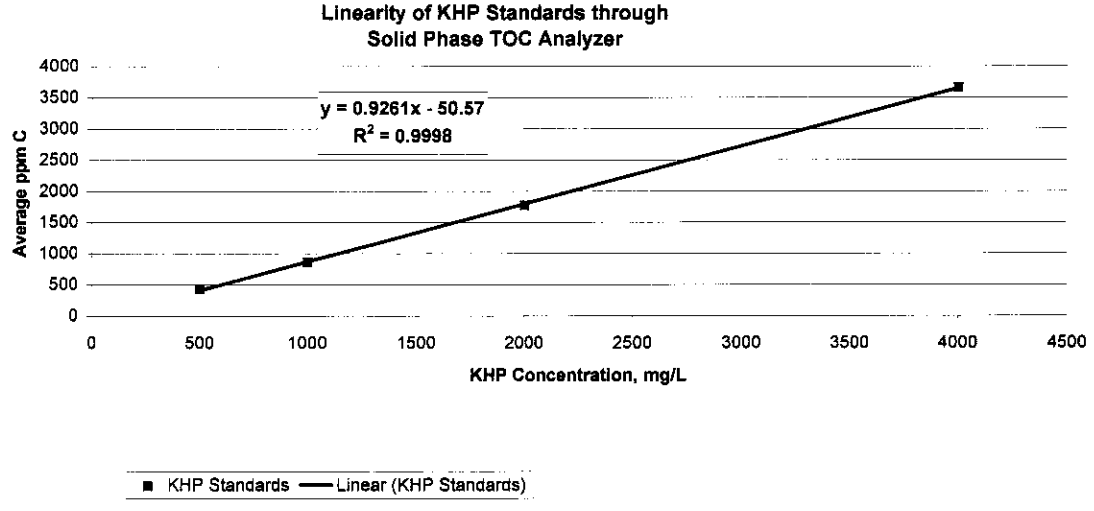
1	TOC	3650
2	TOC	3832
3	TOC	3821
4	TOC	1838
5	TOC	1842
6	TOC	896.4
7	TOC	583.7
8	TOC	450.0
9	TOC	452.3
10	TOC	102.1
11	TOC	96.61
12	TOC	2293
13	TOC	2433
14	TOC	2407
15	TOC	3361
16	TOC	3008

WORKSHEET FOR SOLID-PHASE TOC ANALYSIS
ACOE PORT JERSEY UPLAND DISPOSAL 23-037

Samples analyzed on 15 April 03. Data analyzed using linear regression curve. Samples were nitric acid digested in the boats.

Sample ID	Mass Injected (g)	TOC Value	Calculated µg C	Calculated ppm C	% RSD	Average ppm C		% TOC of Dry Weight	Comments
4000 ppm KHP Std.-a	0.0400	3664	146.6	4,011	0.09	4,014			40.0 µl injected
4000 ppm KHP Std.-c	0.0400	3669	146.8	4,016					40.0 µl injected
2000 ppm KHP Std.-a	0.0400	1769	70.76	1,965	0.29	1,969			40.0 µl injected
2000 ppm KHP Std.-b	0.0400	1777	71.08	1,973					40.0 µl injected
1000 ppm KHP Std.-a	0.0400	862.1	34.48	985.5	1.03	992.8			40.0 µl injected
1000 ppm KHP Std-b	0.0400	875.6	35.02	1,000					40.0 µl injected
500 ppm KHP Std.-a	0.0400	431.3	17.25	520.3	0.92	523.7			40.0 µl injected
500 ppm KHP Std.-b	0.0400	437.6	17.50	527.1					40.0 µl injected
20030377-a	0.00357	1707	75.91	21,263					
20030377-b	0.00372	1994	86.31	23,739	5.87	22,258		2.23	
20030377-c	0.00382	1875	83.17	21,772					
20030377-a spike	0.00386	2808	123.5	31,995					
20030377-b spike	0.00402	2726	119.9	29,826	8.49	32,369			
20030377-c spike	0.00367	2947	129.5	35,286					
USGS QC SDO-1 Std.	0.00047	1528	68.18	145,064					
USGS QC SDO-2 Std.	0.00045	1539	68.66	152,578	28.45	127,919			
USGS QC SDO-3 Std.	0.00052	986.1	44.78	86,115					**Measured range of std.: 89,800 - 104,000 ppm C**
20030378-a	0.00422	3079	135.2	32,038					
20030378-b	0.00446	3216	141.1	31,637	0.66	31,804		3.18	
20030378-c	0.00426	3079	135.2	31,737					
20030379-a	0.00478	3277	143.7	30,063					
20030379-b	0.00461	3147	138.1	29,957	3.25	29,458		2.95	
20030379-c	0.00462	2982	131.0	28,355					
20030380-a	0.00452	3837	167.9	37,146					
20030380-b	0.0049	4177	182.6	37,265	5.20	38,357		3.84	
20030380-c	0.00439	4081	178.5	40,661					
20030381-a	0.00386	2669	117.5	30,440					
20030381-b	0.00381	2606	114.7	30,105	0.84	30,385		3.04	
20030381-c	0.00361	2508	110.5	30,609					
20030382-a	0.00405	1114	50.3	12,420					
20030382-b	0.00481	1357	60.8	12,640	3.01	12,326		1.23	
20030382-c	0.00459	1217	54.7	11,917					
20030383-a	0.00572	1638	72.9	12,745					
20030383-b	0.00551	1634	72.8	13,212	9.60	12,310		1.23	
20030383-c	0.00597	1466	65.5	10,972					
20030384-a	0.00479	1576	70.25	14,666					
20030384-b	0.00481	1529	68.22	14,183	2.39	14,570		1.46	
20030384-c	0.00485	1618	72.07	14,860					

KHP Conc.	Ave. ppm C
4000	3667
2000	1773
1000	868.9
500	434.5



6/2/03

23-037-G

TITLE TOC's 23-037 4/15/03 Project No. Book No.

From Page No.

STD	TOC	Strip
4000	3664	1
	3669	2
2000	1769	3
	1777	4
1000	862.1	5
	875.6	6
500	431.3	7
	437.6	8
100	93.71	9
	111.1	10
	119.4	11

Sample	Tare	+Sample	TOC	Strip
2003 0379	.75920	.76398	3277	24
	.52861	.53322	3147	25
	.84727	.85189	2982	26
2003 0380	.75930	.76382	3837	27
	.52877	.53367	4177	28
	.84752	.85191	4081	29
2003 0381	.75930	.76316	2669	30
	.52867	.53248	2606	31
	.84789	.85150	2508	32
2003 0382	.75945	.76350	1114	33
	.52885	.53366	1357	34
	.84797	.85256	1217	35

Sample	Tare	+Sample	TOC	Strip
2003 0377	.75949	.76306	1707	12
PS.2MU.12	.52894	.53266	1994	13
	.84735	.85117	1875	14

Sample	Tare	+Sample	TOC	Strip
2003 0383	.75920	.76492	1638	36
	.52898	.53449	1634	37
	.84805	.85402	1466	38

Spk	Tare	+Sample	~~+USGS TOC~~	~~Strip~~ C.A.K. TOC	Strip
2003 0377	.75951	.76337	.76390	2808	15
	.52878	.53238	.53283	2726	16
	.84752	.85119	.85168	2947	17

Sample	Tare	+Sample	TOC	Strip
2003 0384	.75949	.76428	1576	39
	.52909	.53390	1529	40
	.84797	.85282	1618	41

USGS	Tare	+Sample	TOC	Strip
	.75974	.76021	1528	18
	.52878	.52923	1539	19
	.84736	.84788	986.1	20
2003 0378	.75928	.76350	3079	21
	.52859	.53305	3216	22
	.84739	.85165	3079	23

To Page No.

Witnessed & Understood by me,	Date	Invented by	Date
	4/15/03	C.A.K.	
		Recorded by	

4/15/03
C.A.K

20	TOC	986.1
21	TOC	3079
22	TOC	3216
23	TOC	3097
24	TOC	3277
25	TOC	3147
26	TOC	2982
27	TOC	3837
28	TOC	4177
29	TOC	4081
30	TOC	2669
31	TOC	2606
32	TOC	2508
33	TOC	1114
34	TOC	1357
35	TOC	1217
36	TOC	1638
37	TOC	1634
38	TOC	1466
39	TOC	1575
40	TOC	1529
41	TOC	1618

SELFTEST
NO ERRORS

1	TOC	3664
2	TOC	3669
3	TOC	1769
4	TOC	1777
5	TOC	862.1
6	TOC	875.6
7	TOC	431.3
8	TOC	437.6
9	TOC	93.71
10	TOC	111.1
11	TOC	119.4
12	TOC	1707
13	TOC	1994
14	TOC	1875
15	TOC	2808
16	TOC	2726
17	TOC	2947
18	TOC	1528
19	TOC	1539

Table 1. Summary of constituent concentrations for USGS SDO-1 (CONTINUED)

	Average: percent in sample, as received		Average: ppm in sample, as received		Range: ppm in sample as received
LOI	21.7 ± 0.90	B	128 ± 11	Ag	0.094 - 0.17
S	5.35 ± 0.44	Be	3.3 ± 0.57	Au	0.002 - 0.0035
CO_2	1.01 ± 0.21	Cs	6.9 ± 1.2	Bi	2 - <10
C_{TOT}	9.95 ± 0.44	Cu	60.2 ± 9.6	Br	5
C_{org} measured	(range 8.98-10.4)	Er	3.6 ± 0.55	Cd	<2 - <10
C_{org} calculated	9.68 ± 0.45	F	697 ± 88.5	Ge	1.3
H_2O^- moisture	1.21 ± 0.50	Gd	7.4 ± 1.9	In	<0.2
H_{TOT}	1.34 ± 0.06	Hf	4.7 ± 0.75	Sb	4.1 - 4.8
N_{TOT}	0.347 ± 0.043	Hg	0.19 ± 0.08	Se	1.9 - 6.8
		Ho	1.2 ± 0.11	Tl	8.3
		Li	28.6 ± 5.5	W	3.3
		Lu	0.54 ± 0.14		
		Pb	27.9 ± 5.2		
		Sn	3.7 ± 1.2		
		Ta	1.1 ± 0.13		
		Tb	1.2 ± 0.24		
		Tm	0.45 ± 0.08		

Reference

Kane, J.S., Arbogast, B.F., and Leventhal, J.S., 1990, Characterization of Devonian Ohio Shale SDO-1 as a USGS geochemical reference sample: Geostandards Newsletter, v. 14, p. 169-196.

TOC Analysis USGS Shale

USGS shale SDO-1 (9.68%±0.45 TOC)

Run #	Weight	Reading	ppmc*	Counts Base	Counts Base	Counts Peak
1.	0.00170g	4100	96471	0.0249	0.0251	0.2170
2.	0.00114g	2774	97333	0.0249	0.0249	0.1562
3.	0.00066g	1554	94182	0.0248	0.0249	0.0962
4.	0.00145g	3544	97766	0.0248	0.0248	est 0.1673
5.	0.00160g	3881	97025	0.0248	0.0248	0.2078
6.	0.00134g	3170	94627	0.0247	0.0249	
7.	0.00096g	2297	95708	0.0247	0.0248	0.1337
8.	0.00137g	3239	94569	0.0247	0.0249	
9.	0.00167g	3936	94275	0.0244	0.0248	0.2087
10.	0.00115g	2814	97878	0.0246	0.0249	0.1582

Mean 95983 ± 1490.4
%CV 1.55

- ppmc Calculation

$$(40\mu l \text{ injected})(2000 ng\ C/\mu l) = 80\mu g\ C$$

$$\frac{80\mu g}{2000 \text{ ppmc C}} = \frac{X\ \mu g\ C}{\text{reading}}$$

$$\frac{X\ \mu g\ C}{\text{Sample wt.}} = \frac{\mu g\ C}{g} \text{ or ppmC}$$

Table 18 Volatiles	Action Level		Action Level		Field Blank		Field Blank	
ASI ID #	Soil		Leachate		20030385		20030363	
STL ID #	ug/kg	*	ug/L	*		Q		Q
Chloromethane (Methyl Chloride)	520000	10	30	10				
Bromomethane	79000	10	10	10				
Vinyl chloride	2000	10	5	10				
Chloroethane	NA	10	NA	10				
Methylene chloride (Dichloromethane)	49000	10	3	10				
Acetone	1,000,000	10	700	10				
Carbon disulfide	NA	10	NA	10				
1,1-Dichloroethene	8000	10	2	10				
1,1-Dichloroethane	570000	10	50	10				
1,2-Dichloroethene (total)	NA	10	10	10				
Chloroform	19000	10	6	10				
1,2-Dichloroethane	NA	10	NA	10				
2-Butanone (MEK)	1000000	10	300	10				
1,1,1-Trichloroethane	210000	10	30	10				
Carbon tetrachloride	2000	10	2	10				
Bromodichloromethane	11000	10	1	10				
1,2-Dichloropropane	10000	10	1	10				
cis-1,3-Dichloropropene	NA	10	NA	10				
Trichloroethene	23000	10	1	10				
Dibromochloromethane	110000	10	10	10				
1,1,2-Trichloroethane	22000	10	3	10				
Benzene	3000	10	1	10				
trans-1,3-dichloropropene	NA	10	NA	10				
Bromoform	86000	10	4	10				
4-Methyl-2-pentanone (MIBK)	1000000	10	400	10				
2-Hexanone	NA	10	NA	10				
Tetrachloroethene	4000	10	1	10				
1,1,2,2-Tetrachloroethane	NA	10	NA	10				
Toluene	1000000	10	1000	10				
Chlorobenzene	37000	10	50	10				
Ethyl benzene	1000000	10	700	10				
Styrene	23000	10	100	10				
Xylenes(Total)	410000	10	1000	10				

Table 18 Semivolatiles	Action Level		Action Level		Field Blank		Field Blank	
ASI ID #	Soil		Leachate		20030385		20030363	
STL ID #	ug/kg	*	ug/L	*		Q		Q
Phenol	10,000,000	660	4,000	10				
bis(2-Chloroethyl)ether	660	660	10	10				
2-Chlorophenol	2000	660	5	10				
1,3-Dichlorobenzene	5100000	660	600	10	16.12	B	12.12	B
1,4-Dichlorobenzene	570000	660	75	10				
1,2-Dichlorobenzene	5100000	660	600	10				
2-Methylphenol	2800000	660	NA	10				
1-Chloropropane-2,2'-oxybis	2300000	660	300	10				
4-Methylphenol	2800000	660	NA	10				
N-Nitroso-Di-N-Propylamine	660	660	20	10				
Hexachloroethane	6000	660	10	10				
Nitrobenzene	28000	660	10	10				
Isophorone	1100000	660	100	10				
2-Nitrophenol	NA	660	NA	10				
2,4-Dimethylphenol	1100000	660	100	10				
bis(2-Chloroethoxy)methane	NA	660	NA	10				
2,4-Dichlorophenol	170000	660	20	10				
1,2,4-Trichlorobenzene	68000	660	9	10				
Naphthalene	230000	660	300	10	14.25	B	8.66	B
4-Chloroaniline	230000	1300	NA	20				
Hexachloro-1,3-butadiene	NA	660	NA	10				
4-Chloro-3-methylphenol	10,000,000	1300	NA	20				
2-Methylnaphthalene	NA	660	NA	10				
Hexachlorocyclopentadiene	400000	660	50	10				
2,4,6-Trichlorophenol	62000	660	20	10				
2,4,5-Trichlorophenol	5600000	660	700	10				
2-Chloronaphthalene	NA	660	NA	10				
2-Nitroaniline	NA	3,300	NA	50				
Dimethylphthalate	10,000,000	660	NA	10				
Acenaphthylene	NA	660	NA	10	0.96	ND	0.96	ND
2,6-Dinitrotoluene	1000	660	10	10				
3-Nitroaniline	NA	3300	NA	50				

B= Analyte detected in the PB at level >3xMDL
ND = Not detected

Table 18 Semivolatiles continued	Action Level		Action Level		Field Blank ng/L		Field Blank ng/L	
ASI ID #	Soil		Leachate		20030385		20030363	
STL ID #	ug/kg	*	ug/L	*		Q		Q
Acenaphthene	3400000	660	400	10	1.02	ND	0.63	J
2,4-Dinitrophenol	110000	3300	40	50				
4-Nitrophenol	NA	3300	NA	50				
Dibenzofuran	NA	660	NA	10				
2,4-Dinitrotoluene	1000	660	10	10				
Diethylphthalate	10,000,000	660	5,000	10				
4-Chlorophenyl-phenylether	NA	660	NA	10				
Fluorene	2300000	660	300	10	0.93	ND	0.85	ND
4-Nitroaniline	NA	830	NA	20				
4,6-Dinitro-2-methylphenol	NA	3300	NA	50				
N-Nitrosodiphenylamine	140000	660	20	10				
4-Bromophenyl-phenylether	NA	660	NA	10				
Hexachlorobenzene	660	660	10	10				
Pentachlorophenol	6000	3300	1	50				
Phenanthrene	NA	6600	NA	10	2.15		4.43	
Anthracene	10000000	6600	2000	10	0.22	J	1.3	
Carbazole	NA	330	NA	10				
Di-n-butylphthalate	5700000	330	900	10				
Fluoranthene	2300000	660	300	10	2.26		5.24	
Pyrene	1700000	660	200	10	3.81		6.99	
Butylbenzylphthalate	1100000	660	100	10				

3,3'-Dichlorobenzidine	2000	1300	60	20				
Benzo(a)anthracene	900	660	NA	10	0.78	J	2.05	
Chrysene	9000	660	NA	10	1.06		2.63	
bis(2-Ethylhexyl)phthalate	49000	660	30	10				
DI-n-octylphthalate	1100000	660	100	10				
Benzo(b)fluoranthene	900	660	NA	10	1.58	ND	1.28	J
Benzo(k)fluoranthene	900	660	NA	10	1.79	ND	1.80	
Benzo(a)pyrene	660	660	NA	10	1.37	ND	1.84	
Indeno(1,2,3-cd)pyrene	900	660	NA	10	1.35	ND	1.28	J
Dibenzo(a,h))anthracene	660	660	NA	10	1.14	ND	1.14	ND
Benzo(ghi)perylene	NA	660	NA	10	0.95	J	1.23	J

Table 18 Pesticides/Arochlors	Action Level		Action Level		Field Blank ng/L		Field Blank ng/L	
ASI ID #	Soil		Leachate		20030385		20030363	
STL ID #	ug/kg	*	ug/L	*		Q		Q
alpha-BHC	NA	1.9	0.02	0.05				
beta-BHC	NA	3.3	0.2	0.05				
delta-BHC	NA	1.7	NA	0.05				
gamma-BHC (Lindane)	520	2	0.2	0.05				
Heptachlor	150	2.1	0.4	0.05	1.33	ND	1.33	ND
Aldrin	40	2	0.04	0.05	3.21	ND	3.21	ND
Heptachlor epoxide	NA	2.1	0.2	0.05	1.08	ND	1.08	ND
Endosulfan I		2.1	0.4	0.05	1.26	ND	1.26	ND
Dieldrin	42	3.3	0.03	0.10	1.11	ND	1.11	ND
4,4'-DDE	2000	4.2	0.1	0.10	0.95	ND	0.95	ND
Endrin	17000	3.6	2	0.10				
Endosulfan II		3.3	0.4	0.10	0.58	ND	0.58	ND
4,4'-DDD	381000	4.2	0.1	0.10	0.68	ND	0.68	ND
Endosulfan sulfate	NA	3.6	0.4	0.10	0.64	ND	0.64	ND
4,4'-DDT	2000	3.6	0.1	0.10	0.63	ND	0.63	ND
Methoxychlor	280000	17	40	0.50				
Endrin ketone	NA	3.3	NA	0.10				
Endrin aldehyde	NA	3.3	NA	0.10				
alpha-Chlordane	500	1.7	NA	0.05				
gamma-Chlordane	NA	1.7	0.5	0.05				
Toxaphene	100	170	3	5.00				
Arochlor-1016 *		33		1.00				
Arochlor-1221 *		67		2.00				
Arochlor-1232 *		33		1.00				
Arochlor-1242 *		33		1.00				
Arochlor-1248 *		33		1.00				
Arochlor-1254 *		33		1.00				
Arochlor-1260 *		33		1.00				
Total Arochlor(SUM)	490		0.5					
Combined endosulfans(SUM) Endosulfan I + II + sulfate	340000		NA					

* Reported as units = ppm

J = Less than ss MDL

ND = Not detected

Table 18 Metals	Action Level		Action Level		Field Blank ug/L		Field Blank ug/L	
ASI ID #	Soil		Leachate		20030385		20030363	
STL ID #	ug/kg	*	ug/L	*		Q		Q
Aluminum	NA	40	200	200				
Antimony	14000	12	20	60				
Arsenic	20000	2	8	10	0.051	ND	0.051	ND
Barium	700000	40	2,000	200				
Beryllium	1000	1	20	5				
Cadmium	1000	1	4	5	0.15		0.116	
Calcium	NA	1000	NA	5000				
Chromium	NA	2	100	10	0.278	J	0.278	J
Cobalt	NA	10	NA	50				
Copper	600000	5	1000	25	1.58		0.876	
Iron	NA	20	300	1000				
Lead	400000	0.6	10	3	0.262	J	0.239	J
Magnesium	NA	1000	NA	5000				
Manganese	NA	3	50	15				
Mercury	14000	0.1	2	0.2				
Nickel	250000	8	100	40	0.829		1.2	
Potassium	NA	1000	NA	5000				
Selenium	63000	1	50	5				
Silver	110000	2	NA	10	0.0367	J	0.0412	J
Sodium	NA	1000	50,000	5,000				
Thallium	2000	2	10	10				
Vanadium	370000	10	NA	50				
Zinc	1500000	4	5000	20	19.6		28.2	
Cyanide, total	1100000	0.5	200	10				
%Solids								

Table 18 Dioxins	Action Level		Action Level		Field Blank		Field Blank	
ASI ID #	Soil		Leachate		20030385		20030363	
STL ID #	ug/kg		ug/L					
2,3,7,8-TCDD								
1,2,3,7,8-PeCDD								
1,2,3,4,7,8-HxCDD								
1,2,3,6,7,8-HxCDD								
1,2,3,7,8,9-HxCDD								
1,2,3,4,6,7,8-HpCDD								
OCDD								
2,3,7,8-TCDF								
1,2,3,7,8-PeCDF								
2,3,4,7,8-PeCDF								
1,2,3,4,7,8-HxCDF								
1,2,3,6,7,8-HxCDF								
2,3,4,6,7,8-HxCDF								
1,2,3,7,8,9-HxCDF								
1,2,3,4,6,7,8-HpCDF								
1,2,3,4,7,8,9-HpCDF								
OCDF								

* = NJDEP Required detection limit
# = value from 2nd column confirmation
ND = Not detected
B = Indicates analyte detected in method blank as well as associated field sample
J = Analyte detected above the achieved MDL, but below the target MDL
E = Estimated value

Please note that only the data above was provided by Battelle for the field-blank