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Memorandum

M8141-SLF-05-326

To: S. J. Trent A0-21 Date: July 26, 2005

From: S. L. Fitzgerald, Manager
WSCF Analytical Chemistry

cc:

w/Attachments		w/o Attachments	
T. F. Dale	S3-30	D. J. Hart	S3-30
H. K. Meznarich	S3-30	M. A. Neely	S3-30
P. D. Mix	S3-30	H. S. Rich	S3-28
J. E. Trechter	S3-30	L. C. Swanson	E6-35
		File/LB	

Subject: FINAL RESULTS FOR 216-A-8 CRIB CHARACTERIZATION BOREHOLE SAMPLE – SAMPLE DELIVERY GROUP WSCF20051295 – SAF NUMBER F05-023

Reference:
(1) Groundwater Protection Program-Letter of Instruction, FH-EIS-2003-MEM-001, October 31, 2002

(2) HNF-SD-CD-QAPP-017, Rev. 7, Waste Sampling & Characterization Facility Quality Assurance Plan

This letter contains a narrative (Attachment 1) for sample delivery group WSCF20051295, the analytical results (Attachment 2), and the sample receipt information (Attachment 3).

SLF/grf

Attachments 3

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M8141-SLF-05-326

ATTACHMENT 1

NARRATIVE

Consisting of 6 pages
Including cover page

Sample Delivery Group	**WSCF20051295**
Sample Matrix	**Soil**
Sample Visual	**N/A**
SAF Number	**F05-023**
Data Deliverable	**Summary Report**

Introduction

One (1) 216-A-8 Crib Characterization Borehole sample/I-5 (B1D992) was received at the WSCF Laboratory on June 23, 2005. The sample was analyzed for the analytes indicated on the attached copy of the chain of custody (COC) form in accordance with the *Groundwater Remediation Program – Letter of Instruction*, referenced in the cover letter.

The narrative (Attachment 1) will address sample characteristics, analyses requested and general information in performance of the analytical methods. A Data Summary Report (Attachment 2) includes analytical results, a comment report detailing method abnormalities, tentatively identified peaks if applicable, method references, and Laboratory QC information. Copies of the chain of custody and sample receipt are included as Attachment 3.

Analytical Methodology for Requested Analyses

Refer to *WSCF Method References Report*, pages 44 through 45, for a complete listing of approved analytical methods.

Inorganic Comments

Ammonia - The hold time for this analysis was met. A Blank, Duplicate, Laboratory Control Sample, Matrix Spike and Matrix Spike Duplicate were analyzed with each delivery group per GRP Letter of Instruction. See page 28 for QC details. Analytical Note:

- Duplicate, Matrix Spike and Matrix Spike Duplicate QC samples were analyzed on sample# B1D7D0 (SDG# 20051234, F05-023).

All QC controls are within the established limits.

Anions - The hold times for this analysis were met. A Blank, Duplicate, Laboratory Control Sample, Matrix Spike and Matrix Spiked Duplicate were analyzed with each delivery group per GRP Letter of Instruction. See pages 29 through 30 for QC details. Analytical Notes:

- Preparation Date: 27-jun-2005.
- Duplicate, Matrix Spike and Matrix Spike Duplicate QC samples were analyzed on sample# B1D7D0 (SDG# 20051234, F05-023).

All QC controls are within the established limits.

ICP-AES Metals (Bismuth and Phosphorus) – The hold time for this analysis was met. A Blank, Laboratory Control Sample, Matrix Spike and Matrix Spiked Duplicate were analyzed with each delivery group per GRP Letter of Instruction. See page 31 for QC details. Analytical Notes:

- Preparation Date: 12-jul-2005.
- Matrix Spike and Matrix Spike Duplicate QC samples were analyzed on sample# B1D7D0 (SDG# 20051234, F05-023).
- Phosphorus: insufficient spike concentration. Sample concentration was greater than four times the spike concentration.
- Phosphorus: The analyte detected in the associated preparation Blank sample was evaluated and there was no significant effect on the sample result.

All other QC controls are within the established limits.

ICP-MS Metals – The hold time for this analysis was met. A Laboratory Control Sample, Matrix Spike and Matrix Spiked Duplicate were analyzed with each delivery group per the GRP Letter of Instruction. See pages 32 through 33 for QC details. Analytical Notes:

- Preparation Date: 28-jun-2005.
- Matrix Spike and Matrix Spike Duplicate QC samples were analyzed on sample# B1DCK1 (SDG# 20051304, SAF# F05-026).

All QC controls are within the established limits.

Percent Solids – analyzed for organic moisture correction.

pH - See page 34 for QC details.

Organic Comments

- Sample results are moisture corrected and reported on dry weight basis.

PCBs – The hold time for this analysis was met. A Blank, Laboratory Control Sample, Matrix Spike and Matrix Spiked Duplicate were analyzed with each delivery group per the GRP Letter of Instruction. See pages 15 for QC details. Analytical Notes:

- Preparation Date: 24-jun-2005.
- Matrix Spike and Matrix Spike Duplicate QC samples were analyzed on sample# B1D7D0 (SDG# 20051234, F05-023).

All QC controls are within the established limits.

Semi-VOA – Holding time for this analysis was met. However, during the course of analyzing the sample, the sample was inadvertently concentrated to a larger volume of extract (5 ml) which resulted in higher Matrix Spike, Matrix Spike Duplicate and Surrogate QC recoveries for many of the compounds. It should be noted that the higher QC recoveries have no impact on quality or usability of data. See pages 17 through 22 for QC details. Analytical Notes:

- Preparation Date: 24-jun-2005.
- Matrix Spike and Matrix Spike Duplicate QC samples were analyzed on sample# B1D7D0 (SDG# 20051234, F05-023).
- Decane - Sample result was J-flagged; the analyte was less than the reportable detection limits, but greater than or equal to the method detection limit.
- 2-Fluorophenol – The Blank QC sample result slightly exceeded established laboratory control limits.
- 2-Fluorophenol and Phenol – Laboratory Control Sample (LCS) QC results exceeded established laboratory control limits. All other LCS QC results are within the established limits.

TPHD-WA - The hold time for this analysis was met. A Blank, Laboratory Control Sample, Matrix Spike and Matrix Spiked Duplicate were analyzed with each delivery group per GRP Letter of Instruction. See page 23 for QC details. Analytical Notes:

- Preparation Date: 24-jun-2005.
- Matrix Spike and Matrix Spike Duplicate QC samples were analyzed on sample# B1D7D0 (SDG# 20051234, F05-023).

All QC controls are within the established limits.

VOA – The hold time for this analysis was met. A Blank, Laboratory Control Sample, Matrix Spike and Matrix Spiked Duplicate were analyzed with each delivery group per the GRP Letter of Instruction. See pages 24 through 26 for QC details. Analytical Note:

All QC controls are within the established limits.

Radiochemistry Comments

RadChem – There are no hold times associated with WSCF's radiochemical methods. A Blank, Laboratory Control Sample and Duplicate were analyzed with each delivery group per the GRP Letter of Instruction. See pages 36 through 40 for QC details. Analytical Notes:

- Strontium-90 – Duplicate QC sample was analyzed on sample# B1D7D0 (SDG# 20051234, F05-023).

- Uranium-235 and Uranium-238– Duplicate Relative Percent Difference (RPD) was above established limits. The RPD criterion does not apply to low level sample activity.

All other QC controls are within the established limits.

Plutonium-242, Americium-243 and Uranium-232 – Radiochemical Tracer Recovery Data are summarized below:

Radiochemical Tracer Percent Recovery			
Sample Number	**Lab Sample ID**	**Isotope**	**Tracer Recovery (Percent)**
Americium-243			
BLANK		Am-243	90.1%
LCS		Am-243	99.6%
B1D992	W050001997	Am-243	90.7%
DUPLICATE	W050001997	Am-243	88.3%
Plutonium-242			
BLANK		Pu-242	81.9%
LCS		Pu-242	89.4%
B1D992	W050001997	Pu-242	78.6%
DUPLICATE	W050001997	Pu-242	83.9%
Strontium-85			
BLANK		Sr-85	107.4%
LCS		Sr-85	106.6%
B1D7C9	W050001782	Sr-85	93.1%
DUPLICATE	W050001782	Sr-85	105.8%
B1D992	W050001997	Sr-85	90.1%
Uranium-232			
BLANK		U-232	64.1%
LCS		U-232	71.3%

Radiochemical Tracer Percent Recovery			
Sample Number	**Lab Sample ID**	**Isotope**	**Tracer Recovery (Percent)**
B1D992	W050001997	U-232	92.1%
DUPLICATE	W050001997	U-232	75.6%

This Summary Report is in compliance with the SOW, both technically and for completeness. Release of the data contained in this hard copy report has been authorized by the WSCF Laboratory Analytical Manager and Client Services, as verified by the following signature.

Pauline D. Mix
WSCF Client Services

Abbreviations

Hg – mercury
IC – ion chromatography
ICP – inductively coupled plasma
ICP/AES – ICP/atomic emission spectroscopy
ICP/MS – ICP/mass spectrometry
Total U – total uranium
AT/TB – total alpha/total beta
AEA – Alpha Energy Analysis
WTPH-G – Total Hydrocarbons-Gasoline
Am – americium
Cm - curium
Pu – plutonium
Np – neptunium
GEA – gamma energy analysis
H3 – Tritium
Sr – Strontium 89, 90
WTPH-D – Total Hydrocarbons-Diesel
TSS – Total Suspended Solids

M8141-SLF-05-326

ATTACHMENT 2

ANALYTICAL RESULTS

Consisting of 40 pages
Including cover page

WSCF
ANALYTICAL RESULTS REPORT

for

Groundwater Remediation Program

Richland, WA 99354

Attention: Steve Trent

Analytical: _____

Client Services: P.O. Mix 7/26/2005

All results are reported on an "as received" basis unless otherwise noted in the comment section.

Confidentiality Notice: The information contained in this report is privileged and confidential information intended only for the use of the addressee. If the reader of this report is not the intended recipient, or the employee or agent responsible to deliver it to the intended recipient, you are hereby notified that any dissemination, distribution or copying of this communication is strictly prohibited. If you have received this communication in error, please notify us immediately by telephone at (509) 373-7020.

Contract#: FH-EIS-2003-MEM-001
Report#: WSCF20051295
Report Date: 20-jul-2005
Report WGPP/ver. 1.1
Groundwater Remediation Program

WSCF
ANALYTICAL RESULTS REPORT

Attention: Steve Trent
Project: F05-023: F05-023

Group #: WSCF20051295

Sample #	Client ID			CAS #	Test Performed	Matrix	WSCF Method	RQ	Result	Unit	DF	MDL	Analyze	Sample	Receive
Organic															
W050001997	B1D992	GRP	TRENT	12674-11-2	Aroclor-1016	SOIL	LA-523-427	U	< 13.0	ug/kg	1.00	13	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	11104-28-2	Aroclor-1221	SOIL	LA-523-427	U	< 25.0	ug/kg	1.00	25	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	11141-16-5	Aroclor-1232	SOIL	LA-523-427	U	< 13.0	ug/kg	1.00	13	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	53469-21-9	Aroclor-1242	SOIL	LA-523-427	U	< 13.0	ug/kg	1.00	13	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	12672-29-6	Aroclor-1248	SOIL	LA-523-427	U	< 13.0	ug/kg	1.00	13	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	11097-69-1	Aroclor-1254	SOIL	LA-523-427	U	< 13.0	ug/kg	1.00	13	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	11096-82-5	Aroclor-1260	SOIL	LA-523-427	U	< 13.0	ug/kg	1.00	13	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	37324-23-5	Aroclor-1262	SOIL	LA-523-427	U	< 13.0	ug/kg	1.00	13	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	11100-14-4	Aroclor-1268	SOIL	LA-523-427	U	< 13.0	ug/kg	1.00	13	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	100-02-7	4-Nitrophenol	SOIL	LA-523-456	U	< 360	ug/kg	1.00	3.6e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	106-46-7	1,4-Dichlorobenzene	SOIL	LA-523-456	U	< 180	ug/kg	1.00	1.8e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	108-95-2	Phenol	SOIL	LA-523-456	U	< 230	ug/kg	1.00	2.3e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	120-82-1	1,2,4-Trichlorobenzene	SOIL	LA-523-456	U	< 150	ug/kg	1.00	1.5e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	121-14-2	2,4-Dinitrotoluene	SOIL	LA-523-456	U	< 130	ug/kg	1.00	1.3e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	129-00-0	Pyrene	SOIL	LA-523-456	U	< 200	ug/kg	1.00	2.0e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	59-50-7	4-Chloro-3-methylphenol	SOIL	LA-523-456	U	< 190	ug/kg	1.00	1.9e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	621-64-7	N-Nitrosodi-n-dipropylamine	SOIL	LA-523-456	U	< 250	ug/kg	1.00	2.5e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	83-32-9	Acenaphthene	SOIL	LA-523-456	U	< 190	ug/kg	1.00	1.9e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	87-86-5	Pentachlorophenol	SOIL	LA-523-456	U	< 280	ug/kg	1.00	2.8e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	95-57-8	2-Chlorophenol	SOIL	LA-523-456	U	< 210	ug/kg	1.00	2.1e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	100-01-6	4-Nitroaniline	SOIL	LA-523-456	U	< 240	ug/kg	1.00	2.4e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	101-55-3	4-Bromophenylphenyl ether	SOIL	LA-523-456	U	< 200	ug/kg	1.00	2.0e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	105-67-9	2,4-Dimethylphenol	SOIL	LA-523-456	U	< 360	ug/kg	1.00	3.6e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	106-47-8	4-Chloroaniline	SOIL	LA-523-456	U	< 190	ug/kg	1.00	1.9e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	108-60-1	Bis(2-chloro-1-methylethyl)eth	SOIL	LA-523-456	U	< 240	ug/kg	1.00	2.4e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	111-44-4	Bis(2-chloroethyl) ether	SOIL	LA-523-456	U	< 190	ug/kg	1.00	1.9e+02	06/29/05	06/23/05	06/23/05

MDL = Minimum Detection Limit J - Analyte is an estimate, has potentially larger errors U - Analyzed for but not detected above limiting criteria.
RQ = Result Qualifier

DF = Dilution Factor

* - Indicates results that have NOT been validated; + - Indicates more than six qualifier symbols

WSCF
ANALYTICAL RESULTS REPORT

Attention: Steve Trent
Project: F05-023: F05-023

Group #: WSCF20051295

Sample #	Client ID			CAS #	Test Performed	Matrix	WSCF Method	RQ	Result		Unit	DF	MDL	Analyze	Sample	Receive
W050001997	B1D992	GRP	TRENT	111-91-1	Bis(2-Chloroethoxy)methane	SOIL	LA-523-456	U	<	160	ug/kg	1.00	1.6e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	117-81-7	Bis(2-ethylhexyl) phthalate	SOIL	LA-523-456	U	<	260	ug/kg	1.00	2.6e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	117-84-0	Di-n-octylphthalate	SOIL	LA-523-456	U	<	300	ug/kg	1.00	3.0e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	118-74-1	Hexachlorobenzene	SOIL	LA-523-456	U	<	150	ug/kg	1.00	1.5e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	120-12-7	Anthracene	SOIL	LA-523-456	U	<	180	ug/kg	1.00	1.8e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	120-83-2	2,4-Dichlorophenol	SOIL	LA-523-456	U	<	150	ug/kg	1.00	1.5e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	131-11-3	Dimethyl phthalate	SOIL	LA-523-456	U	<	130	ug/kg	1.00	1.3e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	132-64-9	Dibenzofuran	SOIL	LA-523-456	U	<	170	ug/kg	1.00	1.7e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	191-24-2	Benzo(ghi)perylene	SOIL	LA-523-456	U	<	280	ug/kg	1.00	2.8e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	193-39-5	Indeno(1,2,3-cd)pyrene	SOIL	LA-523-456	U	<	180	ug/kg	1.00	1.8e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	205-99-2	Benzo(b)fluoranthene	SOIL	LA-523-456	U	<	170	ug/kg	1.00	1.7e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	206-44-0	Fluoranthene	SOIL	LA-523-456	U	<	150	ug/kg	1.00	1.5e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	207-08-9	Benzo(k)fluoranthene	SOIL	LA-523-456	U	<	230	ug/kg	1.00	2.3e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	208-96-8	Acenaphthylene	SOIL	LA-523-456	U	<	150	ug/kg	1.00	1.5e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	218-01-9	Chrysene	SOIL	LA-523-456	U	<	200	ug/kg	1.00	2.0e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	50-32-8	Benzo(a)pyrene	SOIL	LA-523-456	U	<	130	ug/kg	1.00	1.3e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	51-28-5	2,4-Dinitrophenol	SOIL	LA-523-456	U	<	320	ug/kg	1.00	3.2e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	53-70-3	Dibenz[a,h]anthracene	SOIL	LA-523-456	U	<	240	ug/kg	1.00	2.4e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	534-52-1	4,6-Dinitro-2-methylphenol	SOIL	LA-523-456	U	<	310	ug/kg	1.00	3.1e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	541-73-1	1,3-Dichlorobenzene	SOIL	LA-523-456	U	<	120	ug/kg	1.00	1.2e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	56-55-3	Benzo(a)anthracene	SOIL	LA-523-456	U	<	180	ug/kg	1.00	1.8e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	606-20-2	2,6-Dinitrotoluene	SOIL	LA-523-456	U	<	180	ug/kg	1.00	1.8e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	7005-72-3	4-Chlorophenylphenyl ether	SOIL	LA-523-456	U	<	150	ug/kg	1.00	1.5e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	77-47-4	Hexachlorocyclopentadiene	SOIL	LA-523-456	U	<	230	ug/kg	1.00	2.3e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	78-59-1	Isophorone	SOIL	LA-523-456	U	<	180	ug/kg	1.00	1.8e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	84-66-2	Diethylphthalate	SOIL	LA-523-456	U	<	180	ug/kg	1.00	1.8e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	84-74-2	Di-n-butylphthalate	SOIL	LA-523-456	U	<	160	ug/kg	1.00	1.6e+02	06/29/05	06/23/05	06/23/05

MDL=Minimum Detection Limit J - Analyte is an estimate, has potentially larger errors U - Analyzed for but not detected above limiting criteria.
RQ=Result Qualifier

DF=Dilution Factor
* - Indicates results that have NOT been validated; + - Indicates more than six qualifier symbols

WSCF
ANALYTICAL RESULTS REPORT

Attention: Steve Trent
Project: F05-023: F05-023

Group #: WSCF20051295

Sample #	Client ID			CAS #	Test Performed	Matrix	WSCF Method	RQ	Result	Unit	DF	MDL	Analyze	Sample	Receive
W050001997	B1D992	GRP	TRENT	85-01-8	Phenanthrene	SOIL	LA-523-456	U	< 180	ug/kg	1.00	1.8e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	85-68-7	Butylbenzylphthalate	SOIL	LA-523-456	U	< 210	ug/kg	1.00	2.1e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	86-30-6	N-Nitrosodiphenylamine	SOIL	LA-523-456	U	< 160	ug/kg	1.00	1.6e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	86-73-7	Fluorene	SOIL	LA-523-456	U	< 150	ug/kg	1.00	1.5e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	86-74-8	Carbazole	SOIL	LA-523-456	U	< 150	ug/kg	1.00	1.5e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	87-68-3	Hexachlorobutadiene	SOIL	LA-523-456	U	< 180	ug/kg	1.00	1.8e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	88-74-4	2-Nitroaniline	SOIL	LA-523-456	U	< 160	ug/kg	1.00	1.6e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	88-75-5	2-Nitrophenol	SOIL	LA-523-456	U	< 220	ug/kg	1.00	2.2e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	91-20-3	Naphthalene	SOIL	LA-523-456	U	< 160	ug/kg	1.00	1.6e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	91-57-6	2-Methylnaphthalene	SOIL	LA-523-456	U	< 160	ug/kg	1.00	1.6e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	91-58-7	2-Chloronaphthalene	SOIL	LA-523-456	U	< 190	ug/kg	1.00	1.9e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	91-94-1	3,3'-Dichlorobenzidine	SOIL	LA-523-456	U	< 200	ug/kg	1.00	2.0e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	95-48-7	2-Methylphenol (cresol, o-)	SOIL	LA-523-456	U	< 210	ug/kg	1.00	2.1e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	95-50-1	1,2-Dichlorobenzene	SOIL	LA-523-456	U	< 160	ug/kg	1.00	1.6e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	95-95-4	2,4,5-Trichlorophenol	SOIL	LA-523-456	U	< 230	ug/kg	1.00	2.3e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	98-95-3	Nitrobenzene	SOIL	LA-523-456	U	< 170	ug/kg	1.00	1.7e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	99-09-2	3-Nitroaniline	SOIL	LA-523-456	U	< 130	ug/kg	1.00	1.3e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	65794-96-9	3 & 4 Methylphenol Total	SOIL	LA-523-456	U	< 260	ug/kg	1.00	2.6e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	67-72-1	Hexachloroethane	SOIL	LA-523-456	U	< 130	ug/kg	1.00	1.3e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	88-06-2	2,4,6-Trichlorophenol	SOIL	LA-523-456	U	< 140	ug/kg	1.00	1.4e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	124-18-5	Decane	SOIL	LA-523-456	J	500	ug/kg	1.00	3.2e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	100-51-6	Benzyl alcohol	SOIL	LA-523-456	U	< 250	ug/kg	1.00	2.5e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	111-76-2	2-Butoxyethanol	SOIL	LA-523-456	U	< 210	ug/kg	1.00	2.1e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	126-73-8	Tributyl phosphate	SOIL	LA-523-456	U	< 170	ug/kg	1.00	1.7e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	91-59-8	2-Naphthylamine	SOIL	LA-523-456	U	< 180	ug/kg	1.00	1.8e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	108-94-1	Cyclohexanone	SOIL	LA-523-456	U	< 190	ug/kg	1.00	1.9e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	110-86-1	Pyridine	SOIL	LA-523-456	U	< 140	ug/kg	1.00	1.4e+02	06/29/05	06/23/05	06/23/05

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RQ = Result Qualifier

DF = Dilution Factor
* - Indicates results that have NOT been validated; + - Indicates more than six qualifier symbols

WSCF
ANALYTICAL RESULTS REPORT

Attention: Steve Trent
Project: F05-023: F05-023

Group #: WSCF20051295

Sample #	Client ID			CAS #	Test Performed	Matrix	WSCF Method	RQ	Result	Unit	DF	MDL	Analyze	Sample	Receive
W050001997	B1D992	GRP	TRENT	95-63-6	1,2,4-Trimethylbenzene	SOIL	LA-523-456	U	< 120	ug/kg	1.00	1.2e+02	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	75-35-4	1,1-Dichloroethene	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	79-01-6	Trichloroethene	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	71-43-2	Benzene	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	108-88-3	Toluene	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	108-90-7	Chlorobenzene	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	75-34-3	1,1-Dichloroethane	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	100-41-4	Ethylbenzene	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	100-42-5	Styrene	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	10061-01-5	cis-1,3-Dichloropropene	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	10061-02-6	trans-1,3-Dichloropropene	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	107-06-2	1,2-Dichloroethane	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	108-10-1	4-Methyl-2-Pentanone	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	124-48-1	Dibromochloromethane	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	127-18-4	Tetrachloroethene	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	1330-20-7	Xylenes (total)	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	540-59-0	1,2-Dichloroethene(Total)	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	56-23-5	Carbon tetrachloride	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	591-78-6	2-Hexanone	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	67-64-1	Acetone	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	67-66-3	Chloroform	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	71-55-6	1,1,1-Trichloroethane	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	74-83-9	Bromomethane	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	74-87-3	Chloromethane	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	75-00-3	Chloroethane	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	75-01-4	Vinyl chloride	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	75-09-2	Methylenechloride	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05

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RQ=Result Qualifier

DF=Dilution Factor
* - Indicates results that have NOT been validated; + - Indicates more than six qualifier symbols

WSCF
ANALYTICAL RESULTS REPORT

Attention: Steve Trent
Project: F05-023: F05-023

Group #: WSCF20051295

Sample #	Client ID			CAS #	Test Performed	Matrix	WSCF Method	RQ	Result	Unit	DF	MDL	Analyze	Sample	Receive
W050001997	B1D992	GRP	TRENT	75-15-0	Carbon disulfide	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	75-25-2	Bromoform	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	75-27-4	Bromodichloromethane	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	78-87-5	1,2-Dichloropropane	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	78-93-3	2-Butanone	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	79-00-5	1,1,2-Trichloroethane	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	79-34-5	1,1,2,2-Tetrachloroethane	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	71-36-3	1-Butanol	SOIL	LA-523-455	U	< 34.0	ug/kg	1.00	34	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	107-87-9	2-Pentanone	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	110-82-7	Cyclohexane	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	110-54-3	Hexane	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	109-99-9	Tetrahydrofuran	SOIL	LA-523-455	U	< 3.40	ug/kg	1.00	3.4	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	75-69-4	Trichloromonofluoromethane	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	104-51-8	n-Butylbenzene	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	156-60-5	trans-1,2-Dichloroethylene	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	75-05-8	Acetonitrile	SOIL	LA-523-455	U	< 3.40	ug/kg	1.00	3.4	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	156-59-2	cis-1,2-Dichloroethylene	SOIL	LA-523-455	U	< 1.70	ug/kg	1.00	1.7	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	TPHDIESEL	Total Pet. Hydrocarbons Diesel	SOIL	NWTPH	U	< 3.80e+03	ug/kg	1.00	3.8e+03	07/06/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	TPHKEROSENE	Kerosene	SOIL	NWTPH	U	< 3.80e+03	ug/kg	1.00	3.8e+03	07/06/05	06/23/05	06/23/05

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WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: PCBs complete list

SAF Number: F05-023
Sample Date: 06/14/05
Receive Date:06/15/05

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
Lab ID: W050001783									
BATCH QC ASSOCIATED WITH SAMPLE									
MS	Aroclor-1260	11096-82-5	247.73	97.300	% Recov	06/29/05	75.000	125.000	
MS	Decachlorobiphenyl	2051-24-3	244.99	96.200	% Recov	06/29/05	50.000	150.000	
MS	Tetrachloro-m-xylene	877-09-8	218.53	85.800	% Recov	06/29/05	50.000	150.000	
MSD	Aroclor-1260	11096-82-5	273.64	108.000	% Recov	06/29/05	75.000	125.000	
MSD	Decachlorobiphenyl	2051-24-3	266.16	105.000	% Recov	06/29/05	50.000	150.000	
MSD	Tetrachloro-m-xylene	877-09-8	251.34	99.300	% Recov	06/29/05	50.000	150.000	
SPK-RPD	Aroclor-1260	11096-82-5	108.000	10.424	RPD	06/29/05	0.000	25.000	
SPK-RPD	Decachlorobiphenyl	2051-24-3	105.000	8.746	RPD	06/29/05	0.000	20.000	
SPK-RPD	Tetrachloro-m-xylene	877-09-8	99.300	14.587	RPD	06/29/05	0.000	20.000	
Lab ID: W050001997									
BATCH QC ASSOCIATED WITH SAMPLE									
SURR	Decachlorobiphenyl	2051-24-3	247.20	97.100	% Recov	06/29/05	50.000	150.000	
SURR	Tetrachloro-m-xylene	877-09-8	230.58	90.600	% Recov	06/29/05	50.000	150.000	
BATCH QC									
BLANK	Aroclor-1016	12674-11-2	< 12	n/a	UGKG	06/29/05			U
BLANK	Aroclor-1221	11104-28-2	< 25	n/a	ug/Kg	06/29/05			U
BLANK	Aroclor-1232	11141-16-5	< 12	n/a	ug/Kg	06/29/05			U
BLANK	Aroclor-1242	53469-21-9	< 12	n/a	ug/Kg	06/29/05			U
BLANK	Aroclor-1248	12672-29-6	< 12	n/a	ug/Kg	06/29/05			U
BLANK	Aroclor-1254	11097-69-1	< 12	n/a	ug/Kg	06/29/05			U
BLANK	Aroclor-1260	11096-82-5	< 12	n/a	ug/Kg	06/29/05			U
BLANK	Aroclor-1262	37324-23-5	< 12	n/a	ug/Kg	06/29/05			U
BLANK	Aroclor-1268	11100-14-4	< 12	n/a	ug/Kg	06/29/05			U
BLANK	Decachlorobiphenyl	2051-24-3	229.28	91.700	% Recov	06/29/05	50.000	150.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: PCBs complete list

SAF Number: F05-023
Sample Date:
Receive Date:

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
BLANK	Tetrachloro-m-xylene	877-09-8	242.03	96.800	% Recov	06/29/05	50.000	150.000	
LCS	Aroclor-1260	11096-82-5	235.74	94.300	% Recov	06/29/05	70.000	130.000	
LCS	Decachlorobiphenyl	2051-24-3	210.09	84.000	% Recov	06/29/05	50.000	150.000	
LCS	Tetrachloro-m-xylene	877-09-8	225.85	90.300	% Recov	06/29/05	50.000	150.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: SW-846 8270C Semi-Vols

SAF Number: F05-023
Sample Date: 06/14/05
Receive Date:06/15/05

Lab ID: W050001783
BATCH QC ASSOCIATED WITH SAMPLE

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
MS	1,2,4-Trichlorobenzene	120-82-1	1458.4	107.000	% Recov	06/29/05	46.000	107.000	
MS	1,4-Dichlorobenzene	106-46-7	1422.6	104.000	% Recov	06/29/05	30.000	96.000	*
MS	2,4-Dinitrotoluene	121-14-2	1147.4	84.300	% Recov	06/29/05	59.000	106.000	
MS	2-Fluorophenol	367-12-4	1768.1	130.000	% Recov	06/29/05	42.000	105.000	*
MS	Acenaphthene	83-32-9	1440.0	106.000	% Recov	06/29/05	61.000	116.000	
MS	4-Chloro-3-methylphenol	59-50-7	2152.8	105.000	% Recov	06/29/05	61.000	106.000	
MS	2-Chlorophenol	95-57-8	2376.2	116.000	% Recov	06/29/05	66.000	106.000	*
MS	N-Nitrosodi-n-dipropylamine	621-64-7	1485.6	109.000	% Recov	06/29/05	71.000	114.000	
MS	2-Fluorobiphenyl	321-60-8	1318.2	96.800	% Recov	06/29/05	56.000	122.000	
MS	Phenol	108-95-2	2506.7	123.000	% Recov	06/29/05	42.000	111.000	*
MS	Nitrobenzene-d5	4165-60-0	1284.4	94.300	% Recov	06/29/05	64.000	111.000	
MS	4-Nitrophenol	100-02-7	1650.6	80.800	% Recov	06/29/05	32.000	118.000	
MS	Pentachlorophenol	87-86-5	1720.0	84.200	% Recov	06/29/05	62.000	114.000	
MS	Phenol-d5	4165-62-2	1582.6	116.000	% Recov	06/29/05	54.000	120.000	
MS	Pyrene	129-00-0	1457.4	107.000	% Recov	06/29/05	66.000	118.000	
MS	2,4,6-Tribromophenol	118-79-6	1237.9	90.900	% Recov	06/29/05	24.000	122.000	
MS	Terphenyl-d14 (7Cl)	98904-43-9	1287.6	94.600	% Recov	06/29/05	35.000	150.000	
MSD	1,2,4-Trichlorobenzene	120-82-1	1499.7	110.000	% Recov	06/29/05	46.000	107.000	*
MSD	1,4-Dichlorobenzene	106-46-7	1446.8	106.000	% Recov	06/29/05	30.000	96.000	*
MSD	2,4-Dinitrotoluene	121-14-2	1207.6	88.600	% Recov	06/29/05	59.000	106.000	
MSD	2-Fluorophenol	367-12-4	1767.0	130.000	% Recov	06/29/05	42.000	105.000	*
MSD	Acenaphthene	83-32-9	1502.0	110.000	% Recov	06/29/05	61.000	116.000	
MSD	4-Chloro-3-methylphenol	59-50-7	2218.3	108.000	% Recov	06/29/05	61.000	106.000	*
MSD	2-Chlorophenol	95-57-8	2318.8	113.000	% Recov	06/29/05	66.000	106.000	*
MSD	N-Nitrosodi-n-dipropylamine	621-64-7	1448.9	106.000	% Recov	06/29/05	71.000	114.000	
MSD	2-Fluorobiphenyl	321-60-8	1370.7	101.000	% Recov	06/29/05	56.000	122.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: SW-846 8270C Semi-Vols

SAF Number: F05-023
Sample Date: 06/14/05
Receive Date:06/15/05

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
MSD	Phenol	108-95-2	2390.2	117.000	% Recov	06/29/05	42.000	111.000	*
MSD	Nitrobenzene-d5	4165-60-0	1392.4	102.000	% Recov	06/29/05	64.000	111.000	
MSD	4-Nitrophenol	100-02-7	1677.0	82.000	% Recov	06/29/05	32.000	118.000	
MSD	Pentachlorophenol	87-86-5	1768.1	86.500	% Recov	06/29/05	62.000	114.000	
MSD	Phenol-d5	4165-62-2	1540.6	113.000	% Recov	06/29/05	54.000	120.000	
MSD	Pyrene	129-00-0	1500.6	110.000	% Recov	06/29/05	66.000	118.000	
MSD	2,4,6-Tribromophenol	118-79-6	1226.9	90.000	% Recov	06/29/05	24.000	122.000	
MSD	Terphenyl-d14 (7Cl)	98904-43-9	1334.4	97.900	% Recov	06/29/05	35.000	150.000	
SPK-RPD	1,2,4-Trichlorobenzene	120-82-1	110.000	2.765	RPD	06/29/05	0.000	20.000	
SPK-RPD	1,4-Dichlorobenzene	106-46-7	106.000	1.905	RPD	06/29/05	0.000	20.000	
SPK-RPD	2,4-Dinitrotoluene	121-14-2	88.600	4.974	RPD	06/29/05	0.000	20.000	
SPK-RPD	2-Fluorophenol	367-12-4	130.000	0.000	RPD	06/29/05	0.000	20.000	
SPK-RPD	Acenaphthene	83-32-9	110.000	3.704	RPD	06/29/05	0.000	20.000	
SPK-RPD	4-Chloro-3-methylphenol	59-50-7	108.000	2.817	RPD	06/29/05	0.000	20.000	
SPK-RPD	2-Chlorophenol	95-57-8	113.000	2.620	RPD	06/29/05	0.000	20.000	
SPK-RPD	N-Nitrosodi-n-dipropylamine	621-64-7	106.000	2.791	RPD	06/29/05	0.000	20.000	
SPK-RPD	2-Fluorobiphenyl	321-60-8	101.000	4.247	RPD	06/29/05	0.000	20.000	
SPK-RPD	Phenol	108-95-2	117.000	6.000	RPD	06/29/05	0.000	20.000	
SPK-RPD	Nitrobenzene-d5	4165-60-0	102.000	7.845	RPD	06/29/05	0.000	20.000	
SPK-RPD	4-Nitrophenol	100-02-7	82.000	1.474	RPD	06/29/05	0.000	20.000	
SPK-RPD	Pentachlorophenol	87-86-5	86.500	2.695	RPD	06/29/05	0.000	20.000	
SPK-RPD	Phenol-d5	4165-62-2	113.000	2.620	RPD	06/29/05	0.000	20.000	
SPK-RPD	Pyrene	129-00-0	110.000	2.765	RPD	06/29/05	0.000	20.000	
SPK-RPD	2,4,6-Tribromophenol	118-79-6	90.000	0.995	RPD	06/29/05	0.000	20.000	
SPK-RPD	Terphenyl-d14 (7Cl)	98904-43-9	97.900	3.429	RPD	06/29/05	0.000	20.000	

Lab ID: W050001997
BATCH QC ASSOCIATED WITH SAMPLE

SURR	2-Fluorophenol	367-12-4	1458.3	107.000	% Recov	06/29/05	42.000	105.000	*
SURR	2-Fluorobiphenyl	321-60-8	1267.6	93.400	% Recov	06/29/05	56.000	122.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: SW-846 8270C Semi-Vols

SAF Number: F05-023
Sample Date: 06/23/05
Receive Date:06/23/05

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
SURR	Nitrobenzene-d5	4165-60-0	1246.4	91.900	% Recov	06/29/05	64.000	111.000	
SURR	Phenol-d5	4165-62-2	1348.5	99.400	% Recov	06/29/05	54.000	120.000	
SURR	2,4,6-Tribromophenol	118-79-6	881.16	64.900	% Recov	06/29/05	24.000	122.000	
SURR	Terphenyl-d14 (7Cl)	98904-43-9	1245.1	91.800	% Recov	06/29/05	35.000	150.000	
BATCH QC									
BLANK	1,2-Dichlorobenzene	95-50-1	< 150	n/a	ug/Kg	06/29/05			U
BLANK	1,2,4-Trimethylbenzene	95-63-6	< 110	n/a	ug/Kg	06/29/05			U
BLANK	1,2,4-Trichlorobenzene	120-82-1	< 160	n/a	ug/Kg	06/29/05			U
BLANK	1,3-Dichlorobenzene	541-73-1	< 120	n/a	ug/Kg	06/29/05			U
BLANK	1,4-Dichlorobenzene	106-46-7	< 180	n/a	ug/Kg	06/29/05			U
BLANK	2-Naphthylamine	91-59-8	< 170	n/a	ug/Kg	06/29/05			U
BLANK	2,4-Dichlorophenol	120-83-2	< 150	n/a	ug/Kg	06/29/05			U
BLANK	2,4-Dinitrotoluene	121-14-2	< 120	n/a	ug/Kg	06/29/05			U
BLANK	2,4,5-Trichlorophenol	95-95-4	< 230	n/a	ug/Kg	06/29/05			U
BLANK	2,4,6-Trichlorophenol	88-06-2	< 140	n/a	ug/Kg	06/29/05			U
BLANK	2,4-Dimethylphenol	105-67-9	< 350	n/a	ug/Kg	06/29/05			U
BLANK	2,6-Dinitrotoluene	606-20-2	< 180	n/a	ug/Kg	06/29/05			U
BLANK	2-Butoxyethanol	111-76-2	< 210	n/a	ug/Kg	06/29/05			U
BLANK	2-Chloronaphthalene	91-58-7	< 190	n/a	ug/Kg	06/29/05			U
BLANK	2-Fluorophenol	367-12-4	1506.8	113.000	% Recov	06/29/05	42.000	105.000	*
BLANK	2-Methylnaphthalene	91-57-6	< 160	n/a	ug/Kg	06/29/05			U
BLANK	2-Methylphenol (cresol, o-)	95-48-7	< 200	n/a	ug/Kg	06/29/05			U
BLANK	2-Nitroaniline	88-74-4	< 160	n/a	ug/Kg	06/29/05			U
BLANK	2-Nitrophenol	88-75-5	< 220	n/a	ug/Kg	06/29/05			U
BLANK	3 & 4 Methylphenol Total	65794-96-9	< 260	n/a	ug/Kg	06/29/05			U
BLANK	3-Nitroaniline	99-09-2	< 130	n/a	ug/Kg	06/29/05			U
BLANK	4,6-Dinitro-2-methylphenol	534-52-1	< 300	n/a	ug/Kg	06/29/05			U
BLANK	4-Bromophenylphenyl ether	101-55-3	< 200	n/a	ug/Kg	06/29/05			U
BLANK	4-Chlorophenylphenyl ether	7005-72-3	< 150	n/a	ug/Kg	06/29/05			U

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: SW-846 8270C Semi-Vols

SAF Number: F05-023
Sample Date:
Receive Date:

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
BLANK	Acenaphthene	83-32-9	< 190	n/a	ug/Kg	06/29/05			U
BLANK	Acenaphthylene	208-96-8	< 140	n/a	ug/Kg	06/29/05			U
BLANK	Anthracene	120-12-7	< 170	n/a	ug/Kg	06/29/05			U
BLANK	Bis(2-chloroethyl) ether	111-44-4	< 190	n/a	ug/Kg	06/29/05			U
BLANK	Benzo(a)anthracene	56-55-3	< 180	n/a	ug/Kg	06/29/05			U
BLANK	Benzo(b)fluoranthene	205-99-2	< 160	n/a	ug/Kg	06/29/05			U
BLANK	Benzo(ghi)perylene	191-24-2	< 270	n/a	ug/Kg	06/29/05			U
BLANK	Benzo(a)pyrene	50-32-8	< 130	n/a	ug/Kg	06/29/05			U
BLANK	Bis(2-Chloroethoxy)methane	111-91-1	< 160	n/a	ug/Kg	06/29/05			U
BLANK	Bis(2-ethylhexyl) phthalate	117-81-7	< 250	n/a	ug/Kg	06/29/05			U
BLANK	Bis(2-chloro-1-methylethyl)eth	108-60-1	< 230	n/a	ug/Kg	06/29/05			U
BLANK	Benzyl alcohol	100-51-6	< 240	n/a	ug/Kg	06/29/05			U
BLANK	Benzo(k)fluoranthene	207-08-9	< 230	n/a	ug/Kg	06/29/05			U
BLANK	Butylbenzylphthalate	85-68-7	< 210	n/a	ug/Kg	06/29/05			U
BLANK	Carbazole	86-74-8	< 150	n/a	ug/Kg	06/29/05			U
BLANK	4-Chloroaniline	106-47-8	< 190	n/a	ug/Kg	06/29/05			U
BLANK	4-Chloro-3-methylphenol	59-50-7	< 190	n/a	ug/Kg	06/29/05			U
BLANK	2-Chlorophenol	95-57-8	< 210	n/a	ug/Kg	06/29/05			U
BLANK	Chrysene	218-01-9	< 200	n/a	ug/Kg	06/29/05			U
BLANK	Cyclohexanone	108-94-1	< 190	n/a	ug/Kg	06/29/05			U
BLANK	3,3'-Dichlorobenzidine	91-94-1	< 190	n/a	ug/Kg	06/29/05			U
BLANK	Decane	124-18-5	< 320	n/a	ug/Kg	06/29/05			U
BLANK	Dibenz(a,h)anthracene	53-70-3	< 230	n/a	ug/Kg	06/29/05			U
BLANK	Dibenzofuran	132-64-9	< 160	n/a	ug/Kg	06/29/05			U
BLANK	Di-n-butylphthalate	84-74-2	< 150	n/a	ug/Kg	06/29/05			U
BLANK	Diethylphthalate	84-66-2	< 180	n/a	ug/Kg	06/29/05			U
BLANK	Dimethyl phthalate	131-11-3	< 130	n/a	ug/Kg	06/29/05			U
BLANK	2,4-Dinitrophenol	51-28-5	< 320	n/a	ug/Kg	06/29/05			U
BLANK	Di-n-octylphthalate	117-84-0	< 290	n/a	ug/Kg	06/29/05			U
BLANK	N-Nitrosodi-n-dipropylamine	621-64-7	< 240	n/a	ug/Kg	06/29/05			U

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: SW-846 8270C Semi-Vols

SAF Number: F05-023
Sample Date:
Receive Date:

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
BLANK	2-Fluorobiphenyl	321-60-8	1166.1	87.500	% Recov	06/29/05	56.000	122.000	
BLANK	Fluorene	86-73-7	< 150	n/a	ug/Kg	06/29/05			U
BLANK	Fluoranthene	206-44-0	< 150	n/a	ug/Kg	06/29/05			U
BLANK	Hexachlorobenzene	118-74-1	< 150	n/a	ug/Kg	06/29/05			U
BLANK	Hexachlorobutadiene	87-68-3	< 180	n/a	ug/Kg	06/29/05			U
BLANK	Hexachlorocyclopentadiene	77-47-4	< 230	n/a	ug/Kg	06/29/05			U
BLANK	Hexachloroethane	67-72-1	< 130	n/a	ug/Kg	06/29/05			U
BLANK	Indeno(1,2,3-cd)pyrene	193-39-5	< 180	n/a	ug/Kg	06/29/05			U
BLANK	Isophorone	78-59-1	< 180	n/a	ug/Kg	06/29/05			U
BLANK	Phenol	108-95-2	< 220	n/a	ug/Kg	06/29/05			U
BLANK	Naphthalene	91-20-3	< 160	n/a	ug/Kg	06/29/05			U
BLANK	Nitrobenzene-d5	4165-60-0	1127.1	84.500	% Recov	06/29/05	64.000	111.000	
BLANK	Nitrobenzene	98-95-3	< 160	n/a	ug/Kg	06/29/05			U
BLANK	4-Nitrophenol	100-02-7	< 350	n/a	ug/Kg	06/29/05			U
BLANK	4-Nitroaniline	100-01-6	< 230	n/a	ug/Kg	06/29/05			U
BLANK	N-Nitrosodiphenylamine	86-30-6	< 160	n/a	ug/Kg	06/29/05			U
BLANK	Pentachlorophenol	87-86-5	< 270	n/a	ug/Kg	06/29/05			U
BLANK	Phenanthrene	85-01-8	< 170	n/a	ug/Kg	06/29/05			U
BLANK	Phenol-d5	4165-62-2	1330.8	99.800	% Recov	06/29/05	54.000	120.000	
BLANK	Pyrene	129-00-0	< 200	n/a	ug/Kg	06/29/05			U
BLANK	Pyridine	110-86-1	< 130	n/a	ug/Kg	06/29/05			U
BLANK	Tributyl phosphate	126-73-8	< 170	n/a	ug/Kg	06/29/05			U
BLANK	2,4,6-Tribromophenol	118-79-6	971.80	72.900	% Recov	06/29/05	24.000	122.000	
BLANK	Terphenyl-d14 (7Cl)	98904-43-9	1089.6	81.700	% Recov	06/29/05	35.000	150.000	
LCS	1,2,4-Trichlorobenzene	120-82-1	1350.7	101.000	% Recov	06/29/05	46.000	107.000	
LCS	1,4-Dichlorobenzene	106-46-7	1287.8	96.600	% Recov	06/29/05	42.000	111.000	
LCS	2,4-Dinitrotoluene	121-14-2	997.58	74.800	% Recov	06/29/05	59.000	106.000	
LCS	2-Fluorophenol	367-12-4	1534.9	115.000	% Recov	06/29/05	50.000	110.000	
LCS	Acenaphthene	83-32-9	1291.8	96.900	% Recov	06/29/05	61.000	116.000	
LCS	4-Chloro-3-methylphenol	59-50-7	1902.6	95.100	% Recov	06/29/05	61.000	106.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: SW-846 8270C Semi-Vols

SAF Number: F05-023
Sample Date:
Receive Date:

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
LCS	2-Chlorophenol	95-57-8	2052.2	103.000	% Recov	06/29/05	66.000	106.000	
LCS	N-Nitrosodi-n-dipropylamine	621-64-7	1257.4	94.300	% Recov	06/29/05	71.000	114.000	
LCS	2-Fluorobiphenyl	321-60-8	1217.6	91.300	% Recov	06/29/05	58.000	109.000	
LCS	Phenol	108-95-2	2143.4	107.000	% Recov	06/29/05	67.000	105.000	
LCS	Nitrobenzene-d5	4165-60-0	1190.6	89.300	% Recov	06/29/05	60.000	118.000	
LCS	4-Nitrophenol	100-02-7	1424.8	71.200	% Recov	06/29/05	32.000	118.000	
LCS	Pentachlorophenol	87-86-5	1659.4	83.000	% Recov	06/29/05	62.000	114.000	
LCS	Phenol-d5	4165-62-2	1331.4	99.900	% Recov	06/29/05	59.000	116.000	
LCS	Pyrene	129-00-0	1381.4	104.000	% Recov	06/29/05	66.000	118.000	
LCS	2,4,6-Tribromophenol	118-79-6	1075.0	80.600	% Recov	06/29/05	60.000	120.000	
LCS	Terphenyl-d14 (7Cl)	98904-43-9	1199.8	90.000	% Recov	06/29/05	60.000	120.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: WTPH-D TPH Diesel Range (Wa)

SAF Number: F05-023
Sample Date: 06/14/05
Receive Date:06/15/05

QC Type	Analyte		CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
Lab ID: W050001783										
BATCH QC ASSOCIATED WITH SAMPLE										
MS	Kerosene		TPHKEROSENE	123620	96.900	% Recov	07/06/05	70.000	130.000	
MS	ortho-Terphenyl	Surr	84-15-1	24936	97.800	% Recov	07/06/05	70.000	130.000	
MSD	Kerosene		TPHKEROSENE	130690	102.000	% Recov	07/06/05	70.000	130.000	
MSD	ortho-Terphenyl	Surr	84-15-1	26331	103.000	% Recov	07/06/05	70.000	130.000	
SPK-RPD	ortho-Terphenyl	Surr	84-15-1	103.000	5.179	RPD	07/06/05	0.000	20.000	
Lab ID: W050001997										
BATCH QC ASSOCIATED WITH SAMPLE										
SURR	ortho-Terphenyl	Surr	84-15-1	24572	96.700	% Recov	07/06/05	70.000	130.000	
BATCH QC										
BLANK	Kerosene		TPHKEROSENE	< 3800	n/a	ug/Kg	07/06/05			U
BLANK	ortho-Terphenyl	Surr	84-15-1	22827	91.300	% Recov	07/06/05	70.000	130.000	
BLANK	Total Pet. Hydrocarbons Diesel		TPHDIESEL	< 3800	n/a	ug/Kg	07/06/05			U
LCS	ortho-Terphenyl	Surr	84-15-1	25528	102.000	% Recov	07/06/05	70.000	130.000	
LCS	Total Pet. Hydrocarbons Diesel		TPHDIESEL	129240	103.000	% Recov	07/06/05	80.000	120.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: VOA Ground Water Protection

SAF Number: F05-023
Sample Date: 06/23/05
Receive Date:06/23/05

Lab ID: W050001997
BATCH QC ASSOCIATED WITH SAMPLE

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
MS	1,1-Dichloroethene	75-35-4	23.090	92.400	% Recov	07/06/05	63.000	117.000	
MS	Benzene	71-43-2	22.310	89.200	% Recov	07/06/05	75.000	129.000	
MS	4-Bromofluorobenzene	460-00-4	52.070	104.000	% Recov	07/06/05	84.000	116.000	
MS	Chlorobenzene	108-90-7	24.190	96.800	% Recov	07/06/05	79.000	119.000	
MS	1,2-Dichloroethane-d4	17060-07-0	48.900	97.800	% Recov	07/06/05	82.000	136.000	
MS	Toluene-d8	2037-26-5	53.520	107.000	% Recov	07/06/05	89.000	119.000	
MS	Toluene	108-88-3	24.630	98.500	% Recov	07/06/05	76.000	120.000	
MS	Trichloroethene	79-01-6	24.260	97.000	% Recov	07/06/05	73.000	123.000	
MSD	1,1-Dichloroethene	75-35-4	38.950	87.100	% Recov	07/06/05	63.000	117.000	
MSD	Benzene	71-43-2	40.740	96.000	% Recov	07/06/05	75.000	129.000	
MSD	4-Bromofluorobenzene	460-00-4	86.860	102.000	% Recov	07/06/05	84.000	116.000	
MSD	Chlorobenzene	108-90-7	41.540	97.900	% Recov	07/06/05	79.000	119.000	
MSD	1,2-Dichloroethane-d4	17060-07-0	83.950	98.900	% Recov	07/06/05	82.000	136.000	
MSD	Toluene-d8	2037-26-5	92.820	109.000	% Recov	07/06/05	89.000	119.000	
MSD	Toluene	108-88-3	44.180	104.000	% Recov	07/06/05	76.000	120.000	
MSD	Trichloroethene	79-01-6	40.440	95.300	% Recov	07/06/05	73.000	123.000	
SPK-RPD	1,1-Dichloroethene	75-35-4	87.100	5.905	RPD	07/06/05	0.000	20.000	
SPK-RPD	Benzene	71-43-2	96.000	7.343	RPD	07/06/05	0.000	20.000	
SPK-RPD	4-Bromofluorobenzene	460-00-4	102.000	1.942	RPD	07/06/05	0.000	20.000	
SPK-RPD	Chlorobenzene	108-90-7	97.900	1.130	RPD	07/06/05	0.000	20.000	
SPK-RPD	1,2-Dichloroethane-d4	17060-07-0	98.900	1.118	RPD	07/06/05	0.000	20.000	
SPK-RPD	Toluene-d8	2037-26-5	109.000	1.852	RPD	07/06/05	0.000	20.000	
SPK-RPD	Toluene	108-88-3	104.000	5.432	RPD	07/06/05	0.000	20.000	
SPK-RPD	Trichloroethene	79-01-6	95.300	1.768	RPD	07/06/05	0.000	20.000	
SURR	4-Bromofluorobenzene	460-00-4	53.390	107.000	% Recov	07/06/05	71.000	125.000	
SURR	1,2-Dichloroethane-d4	17060-07-0	48.510	97.000	% Recov	07/06/05	80.000	134.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: VOA Ground Water Protection

SAF Number: F05-023
Sample Date: 06/23/05
Receive Date:06/23/05

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
SURR	Toluene-d8	2037-26-5	54.520	109.000	% Recov	07/06/05	80.000	126.000	
BATCH QC									
BLANK	1,1-Dichloroethane	75-34-3	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	1,1,1-Trichloroethane	71-55-6	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	1,1,2-Trichloroethane	79-00-5	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	1,1,2,2-Tetrachloroethane	79-34-5	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	1,1-Dichloroethene	75-35-4	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	1,2-Dichloroethane	107-06-2	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	1,2-Dichloroethene(Total)	540-59-0	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	1-Butanol	71-36-3	< 40	n/a	ug/Kg	07/06/05			U
BLANK	2-Hexanone	591-78-6	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	2-Pentanone	107-87-9	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	4-Methyl-2-Pentanone	108-10-1	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Acetone	67-64-1	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Bromodichloromethane	75-27-4	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Benzene	71-43-2	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	4-Bromofluorobenzene	460-00-4	52.910	106.000	% Recov	07/06/05	71.000	125.000	
BLANK	Bromoform	75-25-2	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	n-Butylbenzene	104-51-8	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Carbon disulfide	75-15-0	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Carbon totrachloride	56-23-5	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Dibromochloromethane	124-48-1	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Cyclohexane	110-82-7	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Chloroform	67-66-3	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Chlorobenzene	108-90-7	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	cis-1,2-Dichloroethylene	156-59-2	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	cis-1,3-Dichloropropene	10061-01-5	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Chloroethane	75-00-3	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	1,2-Dichloroethane-d4	17060-07-0	49.420	98.800	% Recov	07/06/05	80.000	134.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: VOA Ground Water Protection

SAF Number: F05-023
Sample Date:
Receive Date:

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
BLANK	trans-1,2-Dichloroethylene	156-60-5	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	1,2-Dichloropropane	78-87-5	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Ethylbenzene	100-41-4	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Hexane	110-54-3	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Bromomethane	74-83-9	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Chloromethane	74-87-3	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	2-Butanone	78-93-3	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Methylenechloride	75-09-2	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Tetrachloroethene	127-18-4	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Styrene	100-42-5	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Xylenes (total)	1330-20-7	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Tetrahydrofuran	109-99-9	< 4.0	n/a	ug/Kg	07/06/05			U
BLANK	Toluene-d8	2037-26-5	52.360	105.000	% Recov	07/06/05	80.000	126.000	
BLANK	Toluene	108-88-3	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	trans-1,3-Dichloropropene	10061-02-6	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Trichloromonofluoromethane	75-69-4	< 2.0	n/a	ug/Kg	07/06/05	0.000	5.000	U
BLANK	Trichloroethene	79-01-6	< 2.0	n/a	ug/Kg	07/06/05			U
BLANK	Vinyl chloride	75-01-4	< 2.0	n/a	ug/Kg	07/06/05			U
LCS	1,1-Dichloroethene	75-35-4	23.510	94.000	% Recov	07/06/05	70.000	130.000	
LCS	Benzene	71-43-2	24.730	98.900	% Recov	07/06/05	70.000	130.000	
LCS	4-Bromofluorobenzene	460-00-4	51.220	102.000	% Recov	07/06/05	71.000	125.000	
LCS	Chlorobenzene	108-90-7	25.360	101.000	% Recov	07/06/05	70.000	130.000	
LCS	1,2-Dichloroethane-d4	17060-07-0	53.280	107.000	% Recov	07/06/05	80.000	134.000	
LCS	Toluene-d8	2037-26-5	53.280	107.000	% Recov	07/06/05	80.000	126.000	
LCS	Toluene	108-88-3	27.010	108.000	% Recov	07/06/05	70.000	130.000	
LCS	Trichloroethene	79-01-6	25.570	102.000	% Recov	07/06/05	70.000	130.000	

WSCF
ANALYTICAL RESULTS REPORT

Attention: Steve Trent
Project: F05-023: F05-023

Group #: WSCF20051295

Sample #	Client ID			CAS #	Test Performed	Matrix	WSCF Method	RQ	Result	Unit	DF	MDL	Analyze	Sample	Receive
Inorganic															
W050001997	B1D992	GRP	TRENT	NH4-N	Nitrogen in ammonium	SOIL	LA-503-401	U	< 0.200	mg/kg	50.00	0.20	06/28/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	TS	Total solids	SOIL	LA-519-412		98.2	%	1.00	0.0	07/07/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	PH	pH Measurement	SOIL	LA-212-411		9.11	pH	1.00	0.010	06/27/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	16984-48-8	Fluoride	SOIL	LA-533-410	U	< 1.15	mg/kg	50.00	1.2	06/27/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	16887-00-6	Chloride	SOIL	LA-533-410	U	< 2.60	mg/kg	50.00	2.6	06/27/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	NO2-N	Nitrogen in Nitrite	SOIL	LA-533-410	U	< 0.950	mg/kg	50.00	0.95	06/27/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	NO3-N	Nitrogen in Nitrate	SOIL	LA-533-410	U	< 0.650	mg/kg	50.00	0.65	06/27/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	PO4-P	Phosphate (P) by IC	SOIL	LA-533-410	U	< 2.70	mg/kg	50.00	2.7	06/27/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	14808-79-8	Sulfate	SOIL	LA-533-410	U	< 5.00	mg/kg	50.00	5.0	06/27/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	7440-69-9	Bismuth	SOIL	LA-505-411	U	< 1.09	mg/kg	49.65	1.1	07/18/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	7723-14-0	Phosphorus	SOIL	LA-505-411		508	mg/kg	49.65	2.4	07/18/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	7440-02-0	Nickel	SOIL	LA-505-412		7.11	mg/kg	1.02	0.10	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	7440-22-4	Silver	SOIL	LA-505-412	U	< 0.102	mg/kg	1.02	0.10	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	7440-39-3	Barium	SOIL	LA-505-412		44.8	mg/kg	1.02	4.1	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	7440-43-9	Cadmium	SOIL	LA-505-412		0.240	mg/kg	1.02	0.10	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	7440-47-3	Chromium	SOIL	LA-505-412		6.06	mg/kg	1.02	4.1	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	7440-50-8	Copper	SOIL	LA-505-412		6.63	mg/kg	1.02	2.0	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	7439-92-1	Lead	SOIL	LA-505-412		3.10	mg/kg	1.02	0.20	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	7439-97-6	Mercury	SOIL	LA-505-412	U	< 0.102	mg/kg	1.02	0.10	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	7440-61-1	Uranium	SOIL	LA-505-412		0.400	mg/kg	1.02	0.10	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	7440-38-2	Arsenic	SOIL	LA-505-412		2.10	mg/kg	1.02	0.41	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	7782-49-2	Selenium	SOIL	LA-505-412	U	< 0.408	mg/kg	1.02	0.41	06/29/05	06/23/05	06/23/05

MDL = Minimum Detection Limit J - Analyte is an estimate, has potentially larger errors U - Analyzed for but not detected above limiting criteria.
RQ = Result Qualifier

DF = Dilution Factor
* - Indicates results that have NOT been validated; + - Indicates more than six qualifier symbols

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: Ammonia (N) by IC

SAF Number: F05-023
Sample Date: 06/14/05
Receive Date:06/15/05

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
Lab ID: W050001783									
BATCH QC ASSOCIATED WITH SAMPLE									
DUP	Ammonia (N) by IC	7664-41-7	<1.96e-1	n/a	RPD	06/28/05	0.000	20.000	U
MS	Ammonia (N) by IC	7664-41-7	3.65e-01	88.592	% Recov	06/28/05	75.000	125.000	
MSD	Ammonia (N) by IC	7664-41-7	3.49e-01	84.709	% Recov	06/28/05	75.000	125.000	
BATCH QC									
BLANK	Ammonia (N) by IC	7664-41-7	<4.00e-3	n/a	mg/L	06/28/05	0.000	30.000	U
BLANK	Ammonia (N) by IC	7664-41-7	<4.00e-3	n/a	mg/L	06/28/05	0.000	30.000	U
LCS	Ammonia (N) by IC	7664-41-7	8.59e+01	104.756	% Recov	06/28/05	80.000	120.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: Anions by Ion Chromatography

SAF Number: F05-023
Sample Date: 06/14/05
Receive Date:06/15/05

Lab ID: W050001783

BATCH QC ASSOCIATED WITH SAMPLE

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
DUP	Chloride	16887-00-6	<2.60e0	n/a	RPD	06/27/05	0.000	20.000	U
DUP	Fluoride	16984-48-8	<1.15e0	n/a	RPD	06/27/05	0.000	20.000	U
DUP	Nitrogen in Nitrite	NO2-N	<9.50e-1	n/a	RPD	06/27/05	0.000	20.000	U
DUP	Nitrogen in Nitrate	NO3-N	<6.50e-1	n/a	RPD	06/27/05	0.000	20.000	U
DUP	Phosphate (P) by IC	PO4-P	<2.70e0	n/a	RPD	06/27/05	0.000	20.000	U
DUP	Sulfate	14808-79-8	<5.00e0	n/a	RPD	06/27/05	0.000	20.000	U
MS	Chloride	16887-00-6	1.00e+00	100.000	% Recov	06/27/05	75.000	125.000	
MS	Fluoride	16984-48-8	4.56e-01	92.308	% Recov	06/27/05	75.000	125.000	
MS	Nitrogen in Nitrite	NO2-N	4.78e-01	95.600	% Recov	06/27/05	75.000	125.000	
MS	Nitrogen in Nitrate	NO3-N	4.23e-01	93.792	% Recov	06/27/05	75.000	125.000	
MS	Phosphate (P) by IC	PO4-P	7.74e-01	78.876	% Recov	06/27/05	75.000	125.000	
MS	Sulfate	14808-79-8	1.97e+00	98.500	% Recov	06/27/05	75.000	125.000	
MSD	Chloride	16887-00-6	1.04e+00	104.000	% Recov	06/27/05	75.000	125.000	
MSD	Fluoride	16984-48-8	4.57e-01	92.510	% Recov	06/27/05	75.000	125.000	
MSD	Nitrogen in Nitrite	NO2-N	5.20e-01	104.000	% Recov	06/27/05	75.000	125.000	
MSD	Nitrogen in Nitrate	NO3-N	4.70e-01	104.213	% Recov	06/27/05	75.000	125.000	
MSD	Phosphate (P) by IC	PO4-P	7.64e-01	78.844	% Recov	06/27/05	75.000	125.000	
MSD	Sulfate	14808-79-8	1.94e+00	97.000	% Recov	06/27/05	75.000	125.000	

BATCH QC

BLANK	Chloride	16887-00-6	<5.20e-2	n/a	mg/L	06/27/05	0.000	300.000	U
BLANK	Chloride	16887-00-6	<5.20e-2	n/a	mg/L	06/27/05	0.000	300.000	U
BLANK	Fluoride	16984-48-8	<2.30e-2	n/a	mg/L	06/27/05	0.000	300.000	U
BLANK	Fluoride	16984-48-8	<2.30e-2	n/a	mg/L	06/27/05	0.000	300.000	U
BLANK	Nitrogen in Nitrite	NO2-N	<1.90e-2	n/a	mg/L	06/27/05	0.000	300.000	U
BLANK	Nitrogen in Nitrite	NO2-N	<1.90e-2	n/a	mg/L	06/27/05	0.000	300.000	U

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: Anions by Ion Chromatography

SAF Number: F05-023
Sample Date:
Receive Date:

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
BLANK	Nitrogen in Nitrate	NO3-N	<1.30e-2	n/a	mg/L	06/27/05	0.000	300.000	U
BLANK	Nitrogen in Nitrate	NO3-N	<1.30e-2	n/a	mg/L	06/27/05	0.000	300.000	U
BLANK	Phosphate (P) by IC	PO4-P	<5.40e-2	n/a	mg/L	06/27/05	0.000	300.000	U
BLANK	Phosphate (P) by IC	PO4-P	<5.40e-2	n/a	mg/L	06/27/05	0.000	300.000	U
BLANK	Sulfate	14808-79-8	<1.00e-1	n/a	mg/L	06/27/05	0.000	300.000	U
BLANK	Sulfate	14808-79-8	<1.00e-1	n/a	mg/L	06/27/05	0.000	300.000	U
LCS	Chloride	16887-00-6	1.99e+02	99.500	% Recov	06/27/05	80.000	120.000	
LCS	Fluoride	16984-48-8	9.25e+01	92.500	% Recov	06/27/05	80.000	120.000	
LCS	Nitrogen in Nitrite	NO2-N	9.60e+01	96.000	% Recov	06/27/05	80.000	120.000	
LCS	Nitrogen in Nitrate	NO3-N	8.74e+01	96.256	% Recov	06/27/05	80.000	120.000	
LCS	Phosphate (P) by IC	PO4-P	1.80e+02	92.879	% Recov	06/27/05	80.000	120.000	
LCS	Sulfate	14808-79-8	3.70e+02	92.732	% Recov	06/27/05	80.000	120.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: ICP Metals Analysis, Grd H20 P

SAF Number: F05-023
Sample Date: 06/14/05
Receive Date:06/15/05

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
Lab ID: W050001783									
BATCH QC ASSOCIATED WITH SAMPLE									
MS	Bismuth	7440-69-9	83.1	83.939	% Recov	07/18/05	75.000	125.000	
MS	Phosphorus	7723-14-0	145	n/a	% Recov	07/18/05	70.000	130.000	
MSD	Bismuth	7440-69-9	83.5	84.343	% Recov	07/18/05	75.000	125.000	
MSD	Phosphorus	7723-14-0	147	n/a	% Recov	07/18/05	75.000	125.000	
SPK-RPD	Bismuth	7440-69-9	84.343	0.480	RPD	07/18/05	0.000	20.000	
SPK-RPD	Phosphorus	7723-14-0		n/a	RPD	07/18/05	0.000	20.000	
BATCH QC									
BLANK	Bismuth	7440-69-9	2.2	2.200	ug/L	07/18/05			
BLANK	Phosphorus	7723-14-0	<4.8e-2	n/a	ug/L	07/18/05			U
LCS	Bismuth	7440-69-9	181	91.414	% Recov	07/18/05	80.000	120.000	
LCS	Phosphorus	7723-14-0	709	110.781	% Recov	07/18/05	78.000	123.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: ICP-2008 MS All possible metal

SAF Number: F05-023
Sample Date: 06/24/05
Receive Date:06/24/05

Lab ID: W050002009

BATCH QC ASSOCIATED WITH SAMPLE

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
MS	Silver	7440-22-4	197.2	98.600	% Recov	06/29/05	70.000	130.000	
MS	Arsenic	7440-38-2	191.14	95.570	% Recov	06/29/05	70.000	130.000	
MS	Barium	7440-39-3	188.6	94.300	% Recov	06/29/05	70.000	130.000	
MS	Cadmium	7440-43-9	199.9	99.950	% Recov	06/29/05	70.000	130.000	
MS	Nickel	7440-02-0	190.21	95.105	% Recov	06/29/05	70.000	130.000	
MS	Lead	7439-92-1	208.9	104.450	% Recov	06/29/05	70.000	130.000	
MS	Selenium	7782-49-2	196.97	98.485	% Recov	06/29/05	70.000	130.000	
MSD	Silver	7440-22-4	203.2	101.600	% Recov	06/29/05	70.000	130.000	
MSD	Arsenic	7440-38-2	204.64	102.320	% Recov	06/29/05	70.000	130.000	
MSD	Barium	7440-39-3	192.6	96.300	% Recov	06/29/05	70.000	130.000	
MSD	Cadmium	7440-43-9	207.8	103.900	% Recov	06/29/05	70.000	130.000	
MSD	Nickel	7440-02-0	199.11	99.555	% Recov	06/29/05	70.000	130.000	
MSD	Lead	7439-92-1	215.7	107.850	% Recov	06/29/05	70.000	130.000	
MSD	Selenium	7782-49-2	208.17	104.085	% Recov	06/29/05	70.000	130.000	
SPK-RPD	Silver	7440-22-4	101.600	2.997	RPD	06/29/05	0.000	20.000	
SPK-RPD	Arsenic	7440-38-2	102.320	6.822	RPD	06/29/05	0.000	20.000	
SPK-RPD	Barium	7440-39-3	96.300	2.099	RPD	06/29/05	0.000	20.000	
SPK-RPD	Cadmium	7440-43-9	103.900	3.875	RPD	06/29/05	0.000	20.000	
SPK-RPD	Nickel	7440-02-0	99.555	4.572	RPD	06/29/05	0.000	20.000	
SPK-RPD	Lead	7439-92-1	107.850	3.203	RPD	06/29/05	0.000	20.000	
SPK-RPD	Selenium	7782-49-2	104.085	5.529	RPD	06/29/05	0.000	20.000	

BATCH QC

BLANK	Silver	7440-22-4	<0.2	n/a	ug/L	06/29/05			U
BLANK	Arsenic	7440-38-2	<0.3	n/a	ug/L	06/29/05			U
BLANK	Barium	7440-39-3	<0.1	n/a	ug/L	06/29/05			U

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: ICP-2008 MS All possible metal

SAF Number: F05-023
Sample Date:
Receive Date:

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
BLANK	Cadmium	7440-43-9	<0.1	n/a	ug/L	06/29/05			U
BLANK	Chromium	7440-47-3	<0.3	n/a	ug/L	06/29/05			U
BLANK	Copper	7440-50-8	<0.5	n/a	ug/L	06/29/05			U
BLANK	Mercury	7439-97-6	<0.1	n/a	ug/L	06/29/05			U
BLANK	Nickel	7440-02-0	<0.5	n/a	ug/L	06/29/05			U
BLANK	Lead	7439-92-1	<1.2	n/a	ug/L	06/29/05			U
BLANK	Selenium	7782-49-2	<0.3	n/a	ug/L	06/29/05			U
BLANK	Uranium	7440-61-1	<0.1	n/a	ug/L	06/29/05			U
LCS	Silver	7440-22-4	151.4	116.462	% Recov	06/29/05	110.000	170.000	
LCS	Arsenic	7440-38-2	143.9	89.379	% Recov	06/29/05	82.000	142.000	
LCS	Barium	7440-39-3	246	97.619	% Recov	06/29/05	79.000	123.000	
LCS	Cadmium	7440-43-9	135.5	105.859	% Recov	06/29/05	88.000	127.000	
LCS	Chromium	7440-47-3	65.44	94.158	% Recov	06/29/05	50.000	126.000	
LCS	Copper	7440-50-8	139.2	94.054	% Recov	06/29/05	81.000	134.000	
LCS	Mercury	7439-97-6	15	88.757	% Recov	06/29/05	75.000	114.000	
LCS	Nickel	7440-02-0	147.8	100.544	% Recov	06/29/05	84.000	125.000	
LCS	Lead	7439-92-1	151.6	106.761	% Recov	06/29/05	87.000	120.000	
LCS	Selenium	7782-49-2	60.87	94.813	% Recov	06/29/05	83.000	145.000	
LCS	Uranium	7440-61-1	425	106.250	% Recov	06/29/05	89.000	107.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: pH Soil and Waste Measurement

SAF Number: F05-023
Sample Date: 06/23/05
Receive Date:06/23/05

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
Lab ID: W050001997									
BATCH QC ASSOCIATED WITH SAMPLE									
DUP	pH Soil and Waste Measurement	PH	9.081	0.275	RPD	06/27/05	0.000	3.000	

WSCF
ANALYTICAL RESULTS REPORT

Attention: Steve Trent
Project: F05-023: F05-023

Group #: WSCF20051295

Sample #	Client ID			CAS #	Test Performed	Matrix	WSCF Method	RQ	Result	Unit	DF	MDL	Analyze	Sample	Receive
Radiochemistry															
W050001997	B1D992	GRP	TRENT	14596-10-2	Americium-241	SOIL	LA-508-471	U	8.90e-03	pCi/g	1.00	0.060	07/18/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	E,T,C	Am-241 by AEA Total Cntg Error	SOIL	LA-508-471		+- 0.035	pCi/g	1.00	0.0	07/18/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	10198-40-0	Cobalt-60	SOIL	LA-508-481	U	-4.94e-03	pCi/g	1.00	9.4e-03	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	E,T,C	Co-60 Rel. Count Error (GEA)	SOIL	LA-508-481		+- 5.7e-03	pCi/g	1.00	0.0	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	10045-97-3	Cesium-137	SOIL	LA-508-481	U	-1.37e-03	pCi/g	1.00	0.010	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	E,T,C	Cs-137 Rel. Count Error (GEA)	SOIL	LA-508-481		+- 6.1e-03	pCi/g	1.00	0.0	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	14683-23-9	Europium-152	SOIL	LA-508-481	U	-5.66e-03	pCi/g	1.00	0.029	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	E,T,C	Eu-152 Rel. Count Error (GEA)	SOIL	LA-508-481		+- 0.020	pCi/g	1.00	0.0	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	15585-10-1	Europium-154	SOIL	LA-508-481	U	5.82e-03	pCi/g	1.00	0.032	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	E,T,C	Eu-154 Rel. Count Error (GEA)	SOIL	LA-508-481		+- 0.018	pCi/g	1.00	0.0	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	14391-16-3	Europium-155	SOIL	LA-508-481		0.0445	pCi/g	1.00	0.041	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	E,T,C	Eu-155 Rel. Count Error (GEA)	SOIL	LA-508-481		+- 0.036	pCi/g	1.00	0.0	06/29/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	13981-16-3	Plutonium-238	SOIL	LA-508-471	U	0.0460	pCi/g	1.00	0.056	07/18/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	E,T,C	Pu-238 by AEA Total Cntg Error	SOIL	LA-508-471		+- 0.038	pCi/g	1.00	0.0	07/18/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	PU-239/240	Pu-239/240 by AEA	SOIL	LA-508-471	U	0.0130	pCi/g	1.00	0.014	07/18/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	E,T,C	Pu-239/240 AEA Total Cntg Err	SOIL	LA-508-471		+- 0.012	pCi/g	1.00	0.0	07/18/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	SR-RAD	Strontium-89/90	SOIL	LA-508-415	U	0.250	pCi/g	1.00	0.30	07/12/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	E,T,C	Sr-89/90 Rel. Count Error	SOIL	LA-508-415		+- 0.42	pCi/g	1.00	0.0	07/12/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	U-233/234	Uranium-233/234	SOIL	LA-508-471		0.160	pCi/g	1.00	0.014	07/18/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	E,T,C	U-233/234 AEA Total Cntg Error	SOIL	LA-508-471		+- 0.054	pCi/g	1.00	0.0	07/18/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	15117-96-1	Uranium-235	SOIL	LA-508-471	U	4.00e-03	pCi/g	1.00	0.015	07/18/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	E,T,C	U-235 by AEA Total Cntg Error	SOIL	LA-508-471		+- 8.0e-03	pCi/g	1.00	0.0	07/18/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	U-238	Uranium-238	SOIL	LA-508-471		0.150	pCi/g	1.00	0.014	07/18/05	06/23/05	06/23/05
W050001997	B1D992	GRP	TRENT	E,T,C	U-238 by AEA Total Cntg Error	SOIL	LA-508-471		+- 0.051	pCi/g	1.00	0.10	07/18/05	06/23/05	06/23/05

MDL=Minimum Detection Limit J - Analyte is an estimate, has potentially larger errors U - Analyzed for but not detected above limiting criteria.
RQ=Result Qualifier

DF=Dilution Factor
* - Indicates results that have NOT been validated; + - Indicates more than six qualifier symbols

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: Gamma Energy Analysis-grd H2O

SAF Number: F05-023
Sample Date: 06/23/05
Receive Date:06/23/05

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
Lab ID: W050001997									
BATCH QC ASSOCIATED WITH SAMPLE									
DUP	Cobalt-60	10198-40-0	U-1.3e-3	n/a	RPD	06/29/05	0.000	20.000	
DUP	Cesium-137	10045-97-3	U-1.2e-3	n/a	RPD	06/29/05	0.000	20.000	
DUP	Europium-152	14683-23-9	U-9.0e-3	n/a	RPD	06/29/05	0.000	20.000	
DUP	Europium-154	15585-10-1	U-1.5e-2	n/a	RPD	06/29/05	0.000	20.000	
DUP	Europium-155	14391-16-3	U2.10e-2	n/a	RPD	06/29/05	0.000	20.000	
BATCH QC									
BLANK	Cobalt-60	10198-40-0	U-1.4e-4	n/a	pCi/g	06/27/05	-10.000	1000.000	
BLANK	Cesium-137	10045-97-3	U1.27e-3	n/a	pCi/g	06/27/05	-10.000	1000.000	
BLANK	Europium-152	14683-23-9	U1.85e-3	n/a	pCi/g	06/27/05	-10.000	1000.000	
BLANK	Europium-154	15585-10-1	U8.68e-3	n/a	pCi/g	06/27/05	-10.000	1000.000	
BLANK	Europium-155	14391-16-3	U-5.1e-3	n/a	pCi/g	06/27/05	-10.000	1000.000	
LCS	Cobalt-60	10198-40-0	4.48e+03	106.921	% Recov	07/05/05	80.000	120.000	
LCS	Cesium-137	10045-97-3	3.97e+03	110.894	% Recov	07/05/05	80.000	120.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: Americium by AEA

SAF Number: F05-023
Sample Date: 06/23/05
Receive Date:06/23/05

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
Lab ID: W050001997									
BATCH QC ASSOCIATED WITH SAMPLE									
DUP	Americium-241	14596-10-2	U-6.9e-03	n/a	RPD	07/18/05	0.000	20.000	
BATCH QC									
BLANK	Americium-241	14596-10-2	U1.4e-02	n/a	pCi/g	07/18/05	-10.000	1000.000	
LCS	Americium-241	14596-10-2	4.7e+01	105.665	% Recov	07/18/05	75.000	125.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: Plutonium Isotopics by AEA

SAF Number: F05-023
Sample Date: 06/23/05
Receive Date:06/23/05

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
Lab ID: W050001997									
BATCH QC ASSOCIATED WITH SAMPLE									
DUP	Plutonium-238	13981-16-3	U-2.3e-02	n/a	RPD	07/18/05	0.000	20.000	
DUP	Pu-239/240 by AEA	PU-239/240	U1.9E-03	n/a	RPD	07/18/05	0.000	20.000	
BATCH QC									
BLANK	Plutonium-238	13981-16-3	U-1.3e-02	n/a	PCT	07/18/05	0.000	1000.000	
BLANK	Pu-239/240 by AEA	PU-239/240	U5.5e-03	n/a	pCi/g	07/18/05	-10.000	1000.000	
LCS	Pu-239/240 by AEA	PU-239/240	4.8e+01	93.422	% Recov	07/18/05	75.000	125.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: Strontium 89/90

SAF Number: F05-023
Sample Date: 06/14/05
Receive Date:06/15/05

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
Lab ID: W050001782									
BATCH QC ASSOCIATED WITH SAMPLE									
DUP	Strontium-89/90	SR-RAD	U-1.5E-01	n/a	RPD	07/12/05	0.000	20.000	
BATCH QC									
BLANK	Strontium-89/90	10098-97-2	1.3E-01	0.130	pCi/g	07/12/05	-10.000	300.000	
LCS	Strontium-89/90	10098-97-2	69.8	98.172	% Recov	07/12/05	80.000	120.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20051295
Matrix: SOLID
Test: Uranium Isotopics by AEA

SAF Number: F05-023
Sample Date: 06/23/05
Receive Date:06/23/05

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
Lab ID: W050001997									
BATCH QC ASSOCIATED WITH SAMPLE									
DUP	Uranium-233/234	U-233/234	1.2e-01	28.571	RPD	07/18/05	0.000	20.000	*
DUP	Uranium-235	15117-96-1	1.1e-02	n/a	RPD	07/18/05	0.000	20.000	
DUP	Uranium-238	U-238	1.2e-01	22.222	RPD	07/18/05	0.000	20.000	*
BATCH QC									
BLANK	Uranium-233/234	13966-29-5	U1.2e-02	n/a	pCi/g	07/18/05	-10.000	1000.000	
BLANK	Uranium-235	15117-96-1	U7.8e-03	n/a	pCi/g	07/18/05	-10.000	1000.000	
BLANK	Uranium-238	24678-82-8	7.1e-03	0.007	pCi/g	07/18/05	-10.000	1000.000	
LCS	Uranium-238	24678-82-8	3.3e+01	97.059	% Recov	07/18/05	75.000	125.000	

WSCF
ANALYTICAL COMMENT REPORT

Attention: Steve Trent
Project Number F05-023

Group #: WSCF20051295

Sample #	Client ID	Lab Area	Test	Comment
		VALGROUP		ORGANICS: Sample concentrations are corrected for moisture and reported on a dry weight basis. gar SVOA: The samples were extracted and concentrated down to 5 ml final volume. This resulted in the matrix spike and spike dup. having a number of compounds out high.The control limits need to be changed to a defalt limit until enough data is collected for statistical limits using the new 5 ml extract volume. Tha Phenol compounds have recoveries on the high side. A J-flag is used for target compounds which heve concentrations which are less than the lowest calibration standard but greater than the detection limit. den ICP-AES: Insufficient spiking level Phosphorus MS/MSD, -results NA. U234& U238 batch sample and dup are not homogeneous. lmh

Lab Areas: VALGROUP - Group Validation; LOGSAMP - Login for Sample; VALTEST - Test Validation; LOGTEST - Login for Tests; TESTDATA - Test Data Entry

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WSCF
TENTATIVELY IDENTIFIED PEAK REPORT

Attention: Steve Trent
Project Number F05-023 :F05-023

Group #: WSCF20051295

Sample #	Client ID			Test Name	Peak Name	CAS#	RT	RQ	Result	Units
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	K-40 Count Error				13	%
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	PB-212 Count Error				14	%
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	PB-214 Count Error				15	%
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	TL-208 Count Error				17	%
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	BI-214 Count Error				17	%
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	RA-226 Count Error				17	%
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	AC-228 Count Error				17	%
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	RA-228 Count Error				17	%
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	SN-126 Count Error				24	%
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	BI-212 Count Error				28	%
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	U-235 Count Error				29	%
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	CS-134 Count Error				43	%
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	CS-134				0.024	pCi/g
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	U-235				0.061	pCi/g
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	SN-126				0.14	pCi/g
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	TL-208				0.18	pCi/g
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	BI-214				0.34	pCi/g
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	RA-226				0.34	pCi/g
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	PB-214				0.40	pCi/g
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	BI-212				0.40	pCi/g
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	PB-212				0.61	pCi/g
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	AC-228				0.62	pCi/g
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	RA-228				0.62	pCi/g
W050001997	B1D992	GRP	TRENT	Gamma Energy Analysis-grd H2O	K-40				17	pCi/g
W050001997	B1D992	GRP	TRENT	SW-846 8270C Semi-Vols	SMP 25.370 Nonadecane	629-92-5	25.37048	J	1.6e+03	ug/kg

RQ=Result Qualifier J - Analyte is an estimate, has potentially larger errors

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WSCF
TENTATIVELY IDENTIFIED PEAK REPORT

Attention: Steve Trent
Project Number F05-023 :F05-023

Group #: WSCF20051295

Sample #	Client ID	Test Name	Peak Name	CAS#	RT	RQ	Result	Units

RQ=Result Qualifier J - Analyte is an estimate, has potentially larger errors

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WSCF
METHOD REFERENCES REPORT

The results provided in this report were generated using the following WSCF Laboratory procedures. For your convenience, this table provides a listing of the regulatory or industry methods that are referenced by each of these WSCF procedures. Please note that the most recent version of the regulatory or industry method is listed here even though the WSCF procedure may reference an older version of the method. Also, a reference to a regulatory or industry method here does not necessarily indicate a verbatim implementation of that method.

LA-212-411 Determination of Soil pH Measurement
EPA SW-846 9045C SOIL AND WASTE pH

LA-503-401 LA-503-401: ANALYSIS OF CATIONS BY ION CHROMATOGRAPHY
EPA-600/4-86-024 300.7 Dissolved Sodium, Ammonium, Potassium, and Calcium in Wet Deposition by Chemical

LA-505-411 LA-505-411: ELEMENTAL ANALYSIS BY INDUCTIVELY COUPLED PLASMA ATOMIC EMISSION SPE
EPA SW-846 6010B INDUCTIVELY COUPLED PLASMA-ATOMIC EMISSION SPECTROMETRY

LA-505-412 LA-505-412: DETERMINATION OF TRACE ELEMENTS IN WATERS AND WASTES BY INDUCTIVELY
EPA-600/R-94-111 200.8 DETERMINATION OF TRACE ELEMENTS IN WATERS AND WASTES BY INDUCTIVELY COUPLED PLAS

LA-508-415 LA-508-415: OPERATION OF THE PROTEAN 2-INCH ALPHA/BETA COUNTING SYSTEM FOR GROSS
None No reference to any industry method.

LA-508-471 LA-508-471: ALPHA ENERGY ANALYZER DATA ACQUISITION AND SYSTEM CHECKOUT USING ALP
None No reference to any industry method.

LA-508-481 LA-508-481: GAMMA ENERGY ANALYSIS USING PROCOUNT SOFTWARE
None No reference to any industry method.

LA-519-412 LA-519-412: TOTAL RESIDUE/% SOLIDS DRIED AT 103 - 105 C
EPA-600/4-79-020 160.3 RESIDUE, TOTAL
Standard Methods 2540B Total Solids Dried at 103-105 C

Note: A complete list of WSCF analytical procedures and referenced regulatory or industry methods is available online at \\ap006\aspdocs\WSCF\Sample Mgmt\ProcedureMethodCrossReference.pdf. This document includes on-line links to full-text versions of the procedures and methods, where available.

WSCF
METHOD REFERENCES REPORT

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LA-523-427	LA-523-427: POLYCHLORINATED BIPHENYLS (PCBs) BY GAS CHROMATOGRAPHY	
	EPA SW-846 3510C	SEPARATORY FUNNEL LIQUID-LIQUID EXTRACTION
	EPA SW-846 3545	PRESSURIZED FLUID EXTRACTION (PFE)
	EPA SW-846 3665A	SULFURIC ACID/PERMANGANATE CLEANUP
	EPA SW-846 8000B	DETERMINATIVE CHROMATOGRAPHIC SEPARATIONS
	EPA SW-846 8082	POLYCHLORINATED BIPHENYLS (PCBs) BY GAS CHROMATOGRAPHY
LA-523-455	LA-523-455: VOLATILE SAMPLE ANALYSIS BY SW-846	
	EPA SW-846 8000B	DETERMINATIVE CHROMATOGRAPHIC SEPARATIONS
	EPA SW-846 8260B	VOLATILE ORGANIC COMPOUNDS BY GAS CHROMATOGRAPHY/MASS SPECTROMETRY (GC/MS)
LA-523-456	LA-523-456: SEMIVOLATILE SAMPLE ANALYSIS BY SW-846, METHOD 8270C	
	EPA SW-846 8000B	DETERMINATIVE CHROMATOGRAPHIC SEPARATIONS
	EPA SW-846 8270C	SEMIVOLATILE ORGANIC COMPOUNDS BY GAS CHROMATOGRAPHY/MASS SPECTROMETRY (GC/MS)
LA-533-410	LA-533-410: ANION ANALYSIS BY ION CHROMATOGRAPHY	
	EPA-600/R-94-111 300.0	DETERMINATION OF INORGANIC ANIONS BY ION CHROMATOGRAPHY
NWTPH	NWTPH-Diesel and/or Gasoline	
	WDOE NWTPH-Dx/Gx	Total Petroleum Hydrocarbons - Diesel/Gasoline

Note: A complete list of WSCF analytical procedures and referenced regulatory or industry methods is available online at \\ap006\aspdocs\WSCF\Sample Mgmt\ProcedureMethodCrossReference.pdf. This document includes on-line links to full-text versions of the procedures and methods, where available.

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W13q Worklist/Batch/QC Report for Group# WSCF20051295

WL#	S#	Batch	QC#	Tray Type	Sample#	Test
				SAMPLE	W050001997	Percent Solids
			30269	DUP	W050001997	pH Soil and Waste Measurement
			30269	SAMPLE	W050001997	pH Soil and Waste Measurement
26379	2	26752	30308	BLANK		Anions by Ion Chromatography
26379	11	26752	30308	BLANK		Anions by Ion Chromatography
26379	3	26752	30308	LCS		Anions by Ion Chromatography
26379	5	26752	30308	DUP	W050001783	Anions by Ion Chromatography
26379	6	26752	30308	MS	W050001783	Anions by Ion Chromatography
26379	7	26752	30308	MSD	W050001783	Anions by Ion Chromatography
26379	10	26752	30308	SAMPLE	W050001997	Anions by Ion Chromatography
26405	1	26777	30330	BLANK		ICP-2008 MS All possible metal
26405	2	26777	30330	LCS		ICP-2008 MS All possible metal
26405	6	26777	30330	SAMPLE	W050001997	ICP-2008 MS All possible metal
26405	4	26777	30330	MS	W050002009	ICP-2008 MS All possible metal
26405	5	26777	30330	MSD	W050002009	ICP-2008 MS All possible metal
26405	5	26777	30330	SPK-RPD	W050002009	ICP-2008 MS All possible metal
26395	2	26768	30338	BLANK		Ammonia (N) by IC
26395	11	26768	30338	BLANK		Ammonia (N) by IC
26395	3	26768	30338	LCS		Ammonia (N) by IC
26395	5	26768	30338	DUP	W050001783	Ammonia (N) by IC
26395	6	26768	30338	MS	W050001783	Ammonia (N) by IC
26395	7	26768	30338	MSD	W050001783	Ammonia (N) by IC
26395	10	26768	30338	SAMPLE	W050001997	Ammonia (N) by IC
			30358	BLANK		PCBs complete list
			30358	LCS		PCBs complete list
			30358	MS	W050001783	PCBs complete list
			30358	MSD	W050001783	PCBs complete list
			30358	SPK-RPD	W050001783	PCBs complete list
			30358	SAMPLE	W050001997	PCBs complete list
			30358	SURR	W050001997	PCBs complete list
			30364	BLANK		SW-846 8270C Semi-Vols
			30364	LCS		SW-846 8270C Semi-Vols
			30364	MS	W050001783	SW-846 8270C Semi-Vols
			30364	MSD	W050001783	SW-846 8270C Semi-Vols
			30364	SPK-RPD	W050001783	SW-846 8270C Semi-Vols
			30364	SAMPLE	W050001997	SW-846 8270C Semi-Vols
			30364	SURR	W050001997	SW-846 8270C Semi-Vols
			30381	BLANK		WTPH-D TPH Diesel Range (Wa)
			30381	LCS		WTPH-D TPH Diesel Range (Wa)
			30381	MS	W050001783	WTPH-D TPH Diesel Range (Wa)
			30381	MSD	W050001783	WTPH-D TPH Diesel Range (Wa)
			30381	SPK-RPD	W050001783	WTPH-D TPH Diesel Range (Wa)
			30381	SAMPLE	W050001997	WTPH-D TPH Diesel Range (Wa)
			30381	SURR	W050001997	WTPH-D TPH Diesel Range (Wa)
26373	1	26746	30385	BLANK		Gamma Energy Analysis-grd H2O
26373	2	26746	30385	LCS		Gamma Energy Analysis-grd H2O

26373	3	26746	30385	DUP	W050001997	Gamma Energy Analysis-grd H2O
26373	4	26746	30385	SAMPLE	W050001997	Gamma Energy Analysis-grd H2O
26451	1	26823	30473	BLANK		Strontium 89/90
26451	2	26823	30473	LCS		Strontium 89/90
26451	3	26823	30473	DUP	W050001782	Strontium 89/90
26451	7	26823	30473	SAMPLE	W050001997	Strontium 89/90
			30488	BLANK		VOA Ground Water Protection
			30488	LCS		VOA Ground Water Protection
			30488	MS	W050001997	VOA Ground Water Protection
			30488	MSD	W050001997	VOA Ground Water Protection
			30488	SAMPLE	W050001997	VOA Ground Water Protection
			30488	SPK-RPD	W050001997	VOA Ground Water Protection
			30488	SURR	W050001997	VOA Ground Water Protection
26516	1	26889	30515	BLANK		ICP Metals Analysis, Grd H20 P
26516	2	26889	30515	LCS		ICP Metals Analysis, Grd H20 P
26516	4	26889	30515	MS	W050001783	ICP Metals Analysis, Grd H20 P
26516	5	26889	30515	MSD	W050001783	ICP Metals Analysis, Grd H20 P
26516	5	26889	30515	SPK-RPD	W050001783	ICP Metals Analysis, Grd H20 P
26516	8	26889	30515	SAMPLE	W050001997	ICP Metals Analysis, Grd H20 P
26557	1	26930	30526	BLANK		Uranium Isotopics by AEA
26557	2	26930	30526	LCS		Uranium Isotopics by AEA
26557	3	26930	30526	DUP	W050001997	Uranium Isotopics by AEA
26557	4	26930	30526	SAMPLE	W050001997	Uranium Isotopics by AEA
26559	1	26932	30546	BLANK		Plutonium Isotopics by AEA
26559	2	26932	30546	LCS		Plutonium Isotopics by AEA
26559	3	26932	30546	DUP	W050001997	Plutonium Isotopics by AEA
26559	4	26932	30546	SAMPLE	W050001997	Plutonium Isotopics by AEA
26561	1	26934	30547	BLANK		Americium by AEA
26561	2	26934	30547	LCS		Americium by AEA
26561	3	26934	30547	DUP	W050001997	Americium by AEA
26561	4	26934	30547	SAMPLE	W050001997	Americium by AEA

M8141-SLF-05-326

ATTACHMENT 3

SAMPLE RECEIPT INFORMATION

Consisting of 4 pages
Including cover page

Waste Sampling and Characterization Facility
P.O. BOX 1970 S3-30, Richland, WA 99352
PHONE: (509) 373-7004/FAX: (509) 373-7134

File
DTB
6 7/22/05

ACKNOWLEDGMENT OF SAMPLES RECEIVED

Groundwater Remediation Program
Richland, WA 99354
Attn: Steve Trent

Customer Code: GPP
PO#: 119152/ES10
Group#: 20051295
Project#: F05-023
Proj Mgr: Steve Trent A0-21
Phone: 373-5869

The following samples were received from you on 06/23/05. They have been scheduled for the tests listed beside each sample. If this information is incorrect, please contact your service representative. Thank you for using Waste Sampling and Characterization Facility.

Sample#	Sample Id	Matrix	Sample Date
W050001997	B1D992	GRP TRENT Solid, or handle as if solid	06/23/05

Tests Scheduled

@2008	@AEA-30	@AEA-31	@AEA-32	@GEA-GPP
@GPP6010	@IC-30	@PCBGPP	@SR89_90	@SVOCGPP @TPHD
@VOA-GPP	NH4-IC	PERSOLID	PH-30	

Test Acronym Description

Test Acronym	Description
@2008	ICP-2008 MS All possible metal
@AEA-30	Plutonium Isotopics by AEA
@AEA-31	Americium by AEA
@AEA-32	Uranium Isotopics by AEA
@GEA-GPP	Gamma Energy Analysis-grd H2O
@GPP6010	ICP Metals Analysis, Grd H20 P
@IC-30	Anions by Ion Chromatography
@PCBGPP	PCBs complete list
@SR89_90	Strontium 89/90
@SVOCGPP	SW-846 8270B Semi-Vols
@TPHD-WA	WTPH-D TPH Diesel Range (Wa)
@VOA-GPP	VOA Ground Water Protection
NH4-IC	Ammonia (N) by IC
PERSOLID	Percent Solids
PH-30	pH Soil and Waste Measurement

^[[23~^[[23~

7/22/05

Fluor Hanford Inc.	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST	F05-023-025	PAGE 1 OF 2

COLLECTOR Pope/Pfister/Mokler/Weis/Tyra	COMPANY CONTACT TRENT, SJ	TELEPHONE NO. 373-5869	PROJECT COORDINATOR TRENT, SJ	PRICE CODE 8N	DATA TURNAROUND
SAMPLING LOCATION 216-A-8, I-5	PROJECT DESIGNATION 216-A-8 Crib Characterization Borehole		SAF NO. F05-023	AIR QUALITY ☐	45 Days / ~~45 Days~~ 6-7-05
ICE CHEST NO.	FIELD LOGBOOK NO. HNF-N-336-1	COA 119152ES10	METHOD OF SHIPMENT GOVERNMENT VEHICLE		
SHIPPED TO Waste Sampling & Characterization	OFFSITE PROPERTY NO.		BILL OF LADING/AIR BILL NO.		

MATRIX*: A=Air, DL=Drum Liquids, DS=Drum Solids, L=Liquid, O=Oil, S=Soil, SE=Sediment, T=Tissue, V=Vegitation, W=Water, WI=Wipe, X=Other

POSSIBLE SAMPLE HAZARDS/ REMARKS

SPECIAL HANDLING AND/OR STORAGE: 20051295

PRESERVATION	Cool 4C	Cool 4C	Cool 4C	Cool 4C	Cool 4C	None			
TYPE OF CONTAINER	aGs*	aG	G/P	aG	G/P	Square Bottle - Poly			
NO. OF CONTAINER(S)	3	1	1	1	1	1			
VOLUME	40mL	120mL	120mL	120mL	120mL	500mL			
SAMPLE ANALYSIS	SEE ITEM (1) IN SPECIAL INSTRUCTIONS	SEE ITEM (2) IN SPECIAL INSTRUCTIONS	SEE ITEM (3) IN SPECIAL INSTRUCTIONS	PCBs - 8082;	SEE ITEM (4) IN SPECIAL INSTRUCTIONS	SEE ITEM (5) IN SPECIAL INSTRUCTIONS			

SAMPLE NO.	MATRIX*	SAMPLE DATE	SAMPLE TIME									
B1D992 WOS 001997	SOIL	6/23/05	1340	X	X	X	X	X	X			

CHAIN OF POSSESSION / SIGN/ PRINT NAMES

RELINQUISHED BY/REMOVED FROM	DATE/TIME	RECEIVED BY/STORED IN	DATE/TIME
M RUEIL / [illegible]	6/23/05 1430	[illegible]	6/23/05 1430

SPECIAL INSTRUCTIONS

SEE PAGE 2 FOR ALL SPECIAL INSTRUCTIONS

THIS CHAIN ASSOCIATED WITH B1D987

LABORATORY SECTION	RECEIVED BY	TITLE	DATE/TIME
FINAL SAMPLE DISPOSITION	DISPOSAL METHOD	DISPOSED BY	DATE/TIME

A-6003-618(03/03)

Fluor Hanford Inc.	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST			F05-023-025	PAGE 2 OF 2
COLLECTOR Pope/Pfister/Mokler/Weis/Tyra	**COMPANY CONTACT** TRENT, SJ	**TELEPHONE NO.** 373-5869	**PROJECT COORDINATOR** TRENT, SJ	**PRICE CODE** 8N **AIR QUALITY** ☐	**DATA TURNAROUND** 45 Days
SAMPLING LOCATION 216-A-8, I-5	**PROJECT DESIGNATION** 216-A-8 Crib Characterization Borehole		**SAF NO.** F05-023		
ICE CHEST NO.	**FIELD LOGBOOK NO.** HNF-N-336-1	**COA** 119152ES10	**METHOD OF SHIPMENT** GOVERNMENT VEHICLE		
SHIPPED TO Waste Sampling & Characterization	**OFFSITE PROPERTY NO.**		**BILL OF LADING/AIR BILL NO.**		

PDH P.D.M. 6/24/2005 PDH P.D.M. 6/24/2005

SPECIAL INSTRUCTIONS

(1)VOA - 8260B (TCL); VOA - 8260B (Add-On) {1-Butanol, 1-Propanol, 2-Pentanone, Acetonitrile, Cyclohexane, Ethanol, Hexane, Tetrahydrofuran, Trichloromonofluoromethane, cis-1,2-Dichloroethylene, n-Butylbenzene, trans-1,2-Dichloroethylene}
(2)Semi-VOA - 8270A (TCL); Semi-VOA - 8270B (Add-On) {1,2,4-Trimethylbenzene, 2-Butoxyethanol, 2-Naphthylamine, 3+4 Methylphenol (cresol, m+p), Benzyl alcohol, Cyclohexanone, Decane, Pyridine, Tributyl phosphate} TPH-Diesel Range - WTPH-D {Total petroleum hydrocarbons - diesel range, Total petroleum hydrocarbons - kerosene range}
(3)ICP/MS - 200.8 (TAL) {Barium, Cadmium, Chromium, Copper, Nickel, Silver} ICP/MS - 200.8 (Add-on) {Arsenic, Lead, Selenium, Uranium} 200.8_HG - ICPMS; ICP Metals - 6010B (Add-On) {Bismuth, Phosphorus}
(4)IC Anions - 300.0 {Chloride, Fluoride, Nitrogen in Nitrate, Nitrogen in Nitrite, Phosphorous in phosphate, Sulfate} Cations (IC) - 300.7 {Nitrogen in ammonium} pH - 150.1;
(5)Gamma Spectroscopy {Cesium-137, Cobalt-60, Europium-152, Europium-154, Europium-155} ~~Gamma Spec - Add-on {Antimony-125, Cesium-134} Gross Alpha; Gross Beta~~; Isotopic Plutonium; Isotopic Uranium; Americium-241; Strontium-89,90 -- Total Sr;

MAB 6/6/05

-6003-618(03/03)