0096320

SAF-RC-075
100-D/DR Burial Grounds & Remaining Sites – Soil Full Protocol
FINAL DATA PACKAGE

COMPLETE COPY OF DATA PACKAGE TO:

Kathy Wendt H4-21 KW 3/31/11
INITIAL/DATE

RECEIVED
APR 18 2011
EDMC

COMMENTS:

SDG JP0124 SAF RC-075

Rad only Chem only ☑ Rad & Chem

☑ Complete Partial

Waste Site: 116-D-5 Outfall Deep Zone Re-Verification

Analytical Data Package Prepared For

Washington Closure Hanford

RECEIVED
JAN 2011

Radiochemical Analysis By

TestAmerica

2800 G.W. Way, Richland Wa, 99354, (509)-375-3131.

Assigned Laboratory Code: TARL

Data Package Contains 89 *Pages*

Report No.: 46065

Results in this report relate only to the sample(s) analyzed.

SDG No.	Order No.	Client Sample ID (List Order)	Lot-Sa No.	Work Order	Report DB ID	Batch No.
JP0124	RC-075	J1F1J3	J1C170587-1	MFTLF1AH	9MFTLF10	1076374
		J1F1J3	J1C170587-1	MFTLF1AD	9MFTLF10	1076377
		J1F1J3	J1C170587-1	MFTLF1AF	9MFTLF10	1076379
		J1F1J3	J1C170587-1	MFTLF1AC	9MFTLF10	1076380
		J1F1J3	J1C170587-1	MFTLF1AJ	9MFTLF10	1076382
		J1F1J3	J1C170587-1	MFTLF1AE	9MFTLF10	1076384
		J1F1J3	J1C170587-1	MFTLF1AG	9MFTLF10	1076385
		J1F1J3	J1C170587-1	MFTLF1AA	9MFTLF10	1076431
		J1F1J4	J1C170587-2	MFTLQ1AH	9MFTLQ10	1076374
		J1F1J4	J1C170587-2	MFTLQ1AD	9MFTLQ10	1076377
		J1F1J4	J1C170587-2	MFTLQ1AF	9MFTLQ10	1076379
		J1F1J4	J1C170587-2	MFTLQ1AC	9MFTLQ10	1076380
		J1F1J4	J1C170587-2	MFTLQ1AJ	9MFTLQ10	1076382
		J1F1J4	J1C170587-2	MFTLQ1AE	9MFTLQ10	1076384
		J1F1J4	J1C170587-2	MFTLQ1AG	9MFTLQ10	1076385
		J1F1J4	J1C170587-2	MFTLQ1AA	9MFTLQ10	1076431
		J1F1J5	J1C170587-3	MFTLR1AH	9MFTLR10	1076374
		J1F1J5	J1C170587-3	MFTLR1AD	9MFTLR10	1076377
		J1F1J5	J1C170587-3	MFTLR1AF	9MFTLR10	1076379
		J1F1J5	J1C170587-3	MFTLR1AC	9MFTLR10	1076380
		J1F1J5	J1C170587-3	MFTLR1AJ	9MFTLR10	1076382
		J1F1J5	J1C170587-3	MFTLR1AE	9MFTLR10	1076384
		J1F1J5	J1C170587-3	MFTLR1AG	9MFTLR10	1076385
		J1F1J5	J1C170587-3	MFTLR1AA	9MFTLR10	1076431
		J1F1J6	J1C170587-4	MFTLT1AH	9MFTLT10	1076374
		J1F1J6	J1C170587-4	MFTLT1AD	9MFTLT10	1076377

Report No.: 46065

Results in this report relate only to the sample(s) analyzed.

SDG No.	Order No.	Client Sample ID (List Order)	Lot-Sa No.	Work Order	Report DB ID	Batch No.
JP0124	RC-075	J1F1J6	J1C170587-4	MFTLT1AF	9MFTLT10	1076379
		J1F1J6	J1C170587-4	MFTLT1AC	9MFTLT10	1076380
		J1F1J6	J1C170587-4	MFTLT1AJ	9MFTLT10	1076382
		J1F1J6	J1C170587-4	MFTLT1AE	9MFTLT10	1076384
		J1F1J6	J1C170587-4	MFTLT1AG	9MFTLT10	1076385
		J1F1J6	J1C170587-4	MFTLT1AA	9MFTLT10	1076431
		J1F1J7	J1C170587-5	MFTLW1AH	9MFTLW10	1076374
		J1F1J7	J1C170587-5	MFTLW1AD	9MFTLW10	1076377
		J1F1J7	J1C170587-5	MFTLW1AF	9MFTLW10	1076379
		J1F1J7	J1C170587-5	MFTLW1AC	9MFTLW10	1076380
		J1F1J7	J1C170587-5	MFTLW1AJ	9MFTLW10	1076382
		J1F1J7	J1C170587-5	MFTLW1AE	9MFTLW10	1076384
		J1F1J7	J1C170587-5	MFTLW1AG	9MFTLW10	1076385
		J1F1J7	J1C170587-5	MFTLW1AA	9MFTLW10	1076431
		J1F1J8	J1C170587-6	MFTL01AH	9MFTL010	1076374
		J1F1J8	J1C170587-6	MFTL01AD	9MFTL010	1076377
		J1F1J8	J1C170587-6	MFTL01AF	9MFTL010	1076379
		J1F1J8	J1C170587-6	MFTL01AC	9MFTL010	1076380
		J1F1J8	J1C170587-6	MFTL01AJ	9MFTL010	1076382
		J1F1J8	J1C170587-6	MFTL01AE	9MFTL010	1076384
		J1F1J8	J1C170587-6	MFTL01AG	9MFTL010	1076385
		J1F1J8	J1C170587-6	MFTL01AA	9MFTL010	1076431

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Certificate of Analysis

Washington Hanford Closure
2620 Fermi Avenue
Richland, WA 99354

TestAmerica Laboratories, Inc.

March 28, 2011

Attention: Joan Kessner

SAF Number	:	RC-075
Date SDG Closed	:	March 17, 2011
Number of Samples	:	Six (6)
Sample Type	:	Soil
SDG Number	:	JP0124
Data Deliverable	:	7– Day / Summary

CASE NARRATIVE

I. Introduction

On March 17, 2011 six samples were received at TestAmerica for radiochemical analysis. Upon receipt, the samples were assigned the following laboratory ID number to correspond with the Washington Closure Hanford (WCH) specific ID:

WCH ID#	TARL ID#	MATRIX	DATE OF RECEIPT
J1F1J3	MFTLF	SOIL	3/17/11
J1F1J4	MFTLQ	SOIL	3/17/11
J1F1J5	MFTLR	SOIL	3/17/11
J1F1J6	MFTLT	SOIL	3/17/11
J1F1J7	MFTLW	SOIL	3/17/11
J1F1J8	MFTL0	SOIL	3/17/11

II. Sample Receipt

The samples were received in good condition and no anomalies were noted during check-in.

III. Analytical Results/Methodology

The analytical results for this report are presented by laboratory sample ID. Each set of data includes sample identification information, analytical results and the appropriate associated statistical errors.

The requested analyses were:

Alpha Spectroscopy
Plutonium-238, -239/240 by method RL-ALP-002

Uranium 234, 235 and 238 by method RL-ALP-015
Gas Proportional Counting
Strontium-90 by method RL-GPC-003
Gamma Spectroscopy
Gamma Spec by method RL-GAM-001
Liquid Scintillation Counting
Tritium by method RL-LSC-005
Carbon-14 by method RL-LSC-008
Nickel-63 by method RL-LCS-017
Chemical Analysis
Hexavalent Chromium by EPA method 7196A

IV. Quality Control

The analytical results for each analysis performed includes a minimum of one laboratory control sample (LCS), one method (reagent) blank, and one duplicate sample analysis. Any exceptions have been noted in the "Comments" section.

QC and sample results are reported in the same units.

V. Comments

Alpha Spectroscopy
Plutonium-238, -239/240 by method RL-ALP-002 :
The LCS, batch blank, samples and sample duplicate (J1F1J3) results are within contractual requirements.

Uranium 234, 235 and 238 by method RL-ALP-015:
The LCS, batch blank, samples and sample duplicate (J1F1J4) results are within contractual requirements.

Gas Proportional Counting
Strontium-90 by method RL-GPC-003 :
The LCS, batch blank, samples and sample duplicate (J1F1J8) results are within contractual requirements.

Gamma Spectroscopy
Gamma Spec by method RL-GAM-001 :
There was insufficient volume for a duplicate. Sample J1F1J7 was recounted on a different detector for the duplicate (J1F1J7 DUP). The CRDL was not met on some analytes due to reduced count time. The count time was reduced to meet the priority turn around time. Except as noted, the LCS, batch blank, samples and sample duplicate (J1F1J7) results are within contractual requirements.

Liquid Scintillation Counting
Tritium by method RL-LSC-005 :
The LCS, batch blank, samples and sample duplicate (J1F1J5) results are within contractual requirements.

Carbon-14 by method RL-LSC-008 :
The LCS, batch blank, samples and sample duplicate (J1F1J5) results are within contractual requirements.

Nickel-63 by method RL-LCS-017 :
The LCS, batch blank, samples and sample duplicate (J1F1J6) results are within contractual requirements.

Chemical Analysis
Hexavalent Chromium by EPA method 7196A
The LCS, batch blank, samples, sample duplicate (J1F1J3) and the sample matrix spike (J1F1J3) results are within contractual requirements.

I certify that this Certificate of Analysis is in compliance with the SOW, both technically and for completeness, for other than the conditions detailed above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager, or a designee as verified by the following signature.

Reviewed and approved:

Rhonda Wagar
Project Manager

Drinking Water Method Cross References

	DRINKING WATER ASTM METHOD CROSS REFERENCES	
Referenced Method	**Isotope(s)**	**TestAmerica Richland's SOP No.**
EPA 901.1	Cs-134, I-131	RL-GAM-001
EPA 900.0	Alpha & Beta	RL-GPC-001
EPA 00-02	Gross Alpha (Coprecipitation)	RL-GPC-002
EPA 903.0	Total Alpha Radium (Ra-226)	RL-RA-002
EPA 903.1	Ra-226	RL-RA-001
EPA 904.0	Ra-228	RL-RA-001
EPA 905.0	Sr-89/90	RL-GPC-003
ASTM D5174	Uranium	RL-KPA-003
EPA 906.0	Tritium	RL-LSC-005

Results in this report relate only to the sample(s) analyzed.

Uncertainty Estimation

TestAmerica Richland has adopted the internationally accepted approach to estimating uncertainties described in "NIST Technical Note 1297, 1994 Edition". The approach, "Law of Propagation of Errors", involves the identification of all variables in an analytical method which are used to derive a result. These variables are related to the analytical result (R) by some functional relationship, R = constants * f(x,y,z,...). The components (x,y,z) are evaluated to determine their contribution to the overall method uncertainty. The individual component uncertainties (u_i) are then combined using a statistical model that provides the most probable overall uncertainty value. All component uncertainties are categorized as type A, evaluated by statistical methods, or type B, evaluated by other means. Uncertainties not included in the components, such as sample homogeneity, are combined with the component uncertainty as the square root of the sum-of-the-squares of the individual uncertainties. The uncertainty associated with the derived result is the combined uncertainty (u_c) multiplied by the coverage factor (1,2, or 3).

When three or more sample replicates are used to derive the analytical result, the type A uncertainty is the standard deviation of the mean value (S/?n), where S is the standard deviation of the derived results. The type B uncertainties are all other random or non-random components that are not included in the standard deviation.

The derivation of the general "Law of Propagation of Errors" equations and specific example are available on request.

Report Definitions

Action Lev	An agreed upon activity level used to trigger some action when the final result is greater than or equal to the Action Level. Often the Action Level is related to the Decision Limit.
Batch	The QC preparation batch number that relates laboratory samples to QC samples that were prepared and analyzed together.
Bias	Defined by the equation (Result/Expected)-1 as defined by ANSI N13.30.
COC No	Chain of Custody Number assigned by the Client or TestAmerica.
Count Error (#s)	Poisson counting statistics of the gross sample count and background. The uncertainty is absolute and in the same units as the result. For Liquid Scintillation Counting (LSC) the batch blank count is the background.
Total Uncert (#s) ***u_c - Combined Uncertainty.***	All known uncertainties associated with the preparation and analysis of the sample are propagated to give a measure of the uncertainty associated with the result, ***u_c the combined uncertainty.*** The uncertainty is absolute and in the same units as the result.
(#s), Coverage Factor	The coverage factor defines the width of the confidence interval, 1, 2 or 3 standard deviations.
CRDL (RL)	Contractual Required Detection Limit as defined in the Client's Statement Of Work or TestAmerica "default" nominal detection limit. Often referred to the reporting level (RL)
Lc	Decision Level based on instrument background or blank, adjusted by the Efficiency, Chemical Yield, and Volume associated with the sample. The Type I error probability is approximately 5%. Lc=(1.645 * Sqrt(2*(BkgrndCnt/BkgrndCntMin)/SCntMin)) * (ConvFct/(Eff*Yld*Abn*Vol) * IngrFct). For LSC methods the batch blank is used as a measure of the background variability. Lc cannot be calculated when the background count is zero.
Lot-Sample No	The number assigned by the LIMS software to track samples received on the same day for a given client. The sample number is a sequential number assigned to each sample in the Lot.
MDC|MDA	Detection Level based on instrument background or blank, adjusted by the Efficiency, Chemical Yield, and Volume with a Type I and II error probability of approximately 5%. MDC = (4.65 * Sqrt((BkgrndCnt/BkgrndCntMin)/SCntMin) + 2.71/SCntMin) * (ConvFct/(Eff * Yld * Abn * Vol) * IngrFct). For LSC methods the batch blank is used as a measure of the background variability.
Primary Detector	The instrument identifier associated with the analysis of the sample aliquot.
Ratio U-234/U-238	The U-234 result divided by the U-238 result. The U-234/U-238 ratio for natural uranium in NIST SRM 4321C is 1.038.
Rst/MDC	Ratio of the Result to the MDC. A value greater than 1 may indicate activity above background at a high level of confidence. Caution should be used when applying this factor and it should be used in concert with the qualifiers associated with the result.
Rst/TotUcert	Ratio of the Result to the Total Uncertainty. If the uncertainty has a coverage factor of 2 a value greater than 1 may indicate activity above background at approximately the 95% level of confidence assuming a two-sided confidence interval. Caution should be used when applying this factor and it should be used in concert with the qualifiers associated with the result.
Report DB No	Sample Identifier used by the report system. The number is based upon the first five digits of the **Work Order** Number.
RER	The equation Replicate Error Ratio = (S-D)/[sqrt($TPUs^2$ + $TPUd^2$)] as defined by ICPT BOA where S is the original sample result, D is the result of the duplicate, TPUs is the total uncertainty of the original sample and TPUd is the total uncertainty of the duplicate sample.
SDG	Sample Delivery Group Number assigned by the Client or assigned by TestAmerica upon sample receipt.
Sum Rpt Alpha Spec Rst(s)	The sum of the reported alpha spec results for tests derived from the same sample excluding duplicate result where the results are in the same units.
Work Order	The LIMS software assign test specific identifier.
Yield	The recovery of the tracer added to the sample such as Pu-242 used to trace a Pu-239/40 method.

Sample Results Summary

Date: 28-Mar-11

TestAmerica TARL

Ordered by Method, Batch No., Client Sample ID.

Report No. : 46065

SDG No: JP0124

Batch	Client Id / Work Order	Parameter	Result +- Uncertainty (2s)	Qual	Units	Tracer Yield	MDC or MDA	CRDL	RPD
1076379 PUISO_PLATE_AEA									
J1F1J3									
	MFTLF1AF	PU-238	-4.09E-03 +- 8.2E-02	U	pCi/g	62%	1.71E-01	1.00E+00	
		PU239/40	3.68E-02 +- 8.2E-02	U	pCi/g	62%	1.71E-01	1.00E+00	
J1F1J3 DUP									
	MFTLF1AK	PU-238	-2.36E-03 +- 9.4E-02	U	pCi/g	53%	1.77E-01	1.00E+00	-53.7
		PU239/40	-2.36E-03 +- 9.4E-02	U	pCi/g	53%	1.77E-01	1.00E+00	227.4
J1F1J4									
	MFTLQ1AF	PU-238	-1.83E-03 +- 7.3E-02	U	pCi/g	75%	1.37E-01	1.00E+00	
		PU239/40	-1.83E-03 +- 7.3E-02	U	pCi/g	75%	1.37E-01	1.00E+00	
J1F1J5									
	MFTLR1AF	PU-238	-4.88E-03 +- 6.5E-02	U	pCi/g	73%	1.46E-01	1.00E+00	
		PU239/40	2.91E-02 +- 6.5E-02	U	pCi/g	73%	1.36E-01	1.00E+00	
J1F1J6									
	MFTLT1AF	PU-238	0.00E+00 +- 7.6E-02	U	pCi/g	74%	1.41E-01	1.00E+00	
		PU239/40	0.00E+00 +- 7.5E-02	U	pCi/g	74%	1.41E-01	1.00E+00	
J1F1J7									
	MFTLW1AF	PU-238	0.00E+00 +- 1.1E-01	U	pCi/g	46%	2.02E-01	1.00E+00	
		PU239/40	4.84E-02 +- 1.1E-01	U	pCi/g	46%	2.25E-01	1.00E+00	
J1F1J8									
	MFTL01AF	PU-238	-2.52E-03 +- 1.0E-01	U	pCi/g	53%	1.88E-01	1.00E+00	
		PU239/40	5.02E-02 +- 1.0E-01	U	pCi/g	53%	1.88E-01	1.00E+00	
1076380 UISO_IE_PLATE_AEA									
J1F1J3									
	MFTLF1AC	U-234	1.82E-01 +- 1.5E-01		pCi/g	91%	1.69E-01	1.00E+00	
		U-235	-1.13E-02 +- 5.1E-02	U	pCi/g	91%	1.46E-01	1.00E+00	
		U-238	1.99E-01 +- 1.6E-01		pCi/g	91%	1.87E-01	1.00E+00	
J1F1J4									
	MFTLQ1AC	U-234	1.86E-01 +- 1.6E-01	U	pCi/g	83%	1.95E-01	1.00E+00	
		U-235	-5.90E-03 +- 5.9E-02	U	pCi/g	83%	1.41E-01	1.00E+00	
		U-238	2.52E-01 +- 1.9E-01		pCi/g	83%	1.72E-01	1.00E+00	
J1F1J4 DUP									
	MFTLQ1AK	U-234	1.59E-01 +- 1.3E-01		pCi/g	96%	1.12E-01	1.00E+00	15.8
		U-235	0.00E+00 +- 4.7E-02	U	pCi/g	96%	8.76E-02	1.00E+00	-200.0
		U-238	2.32E-01 +- 1.5E-01		pCi/g	96%	8.76E-02	1.00E+00	8.3
J1F1J5									
	MFTLR1AC	U-234	1.45E-01 +- 1.2E-01		pCi/g	98%	8.80E-02	1.00E+00	
		U-235	2.00E-02 +- 4.2E-02	U	pCi/g	98%	7.90E-02	1.00E+00	
		U-238	1.86E-01 +- 1.3E-01		pCi/g	98%	9.50E-02	1.00E+00	

TestAmerica

rptSTLRchSaSummary2 V5.2.12
A2002

RPD - Relative Percent Difference.

U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

Sample Results Summary

Date: 28-Mar-11

TestAmerica TARL

Ordered by Method, Batch No., Client Sample ID.

Report No. : 46065

SDG No: JP0124

Batch	Client Id Work Order	Parameter	Result +- Uncertainty (2s)	Qual	Units	Tracer Yield	MDC or MDA	CRDL	RPD
1076380 UISO_IE_PLATE_AEA									
J1F1J6									
	MFTLT1AC	U-234	1.56E-01 +- 1.2E-01		pCi/g	101%	8.38E-02	1.00E+00	
		U-235	-1.12E-03 +- 4.5E-02	U	pCi/g	101%	8.38E-02	1.00E+00	
		U-238	1.77E-01 +- 1.3E-01		pCi/g	101%	9.34E-02	1.00E+00	
J1F1J7									
	MFTLW1AC	U-234	3.28E-01 +- 2.0E-01		pCi/g	84%	1.23E-01	1.00E+00	
		U-235	-1.67E-03 +- 5.5E-02	U	pCi/g	84%	1.07E-01	1.00E+00	
		U-238	2.19E-01 +- 1.6E-01		pCi/g	84%	1.11E-01	1.00E+00	
J1F1J8									
	MFTL01AC	U-234	1.74E-01 +- 1.5E-01		pCi/g	86%	1.51E-01	1.00E+00	
		U-235	-1.83E-03 +- 6.1E-02	U	pCi/g	86%	1.17E-01	1.00E+00	
		U-238	2.04E-01 +- 1.7E-01		pCi/g	86%	1.54E-01	1.00E+00	
1076374 GAMMA_GS									
J1F1J3									
	MFTLF1AH	AMERICIUM 241	1.75E-02 +- 1.4E-01	U	pCi/g		2.42E-01		
		CO-60	1.85E-02 +- 3.3E-02	U	pCi/g		6.41E-02	5.00E-02	
		CS-137	2.38E-01 +- 6.6E-02		pCi/g		5.52E-02	1.00E-01	
		EU-152	2.71E-01 +- 9.3E-02	U	pCi/g		1.58E-01	1.00E-01	
		EU-154	1.17E-01 +- 1.0E-01	U	pCi/g		2.00E-01	1.00E-01	
		EU-155	-1.34E-02 +- 5.8E-02	U	pCi/g		9.97E-02	1.00E-01	
J1F1J4									
	MFTLQ1AH	AMERICIUM 241	-3.97E-04 +- 1.2E-01	U	pCi/g		2.05E-01		
		CO-60	4.53E-04 +- 2.8E-02	U	pCi/g		5.16E-02	5.00E-02	
		CS-137	1.72E+00 +- 2.5E-01		pCi/g		4.82E-02	1.00E-01	
		EU-152	5.36E-02 +- 7.0E-02	U	pCi/g		1.23E-01	1.00E-01	
		EU-154	2.98E-02 +- 8.4E-02	U	pCi/g		1.57E-01	1.00E-01	
		EU-155	5.03E-02 +- 5.1E-02	U	pCi/g		9.32E-02	1.00E-01	
J1F1J5									
	MFTLR1AH	AMERICIUM 241	2.06E-02 +- 9.4E-02	U	pCi/g		1.61E-01		
		CO-60	5.02E-02 +- 4.3E-02	U	pCi/g		8.55E-02	5.00E-02	
		CS-137	1.33E+00 +- 2.2E-01		pCi/g		7.03E-02	1.00E-01	
		EU-152	3.53E-01 +- 1.8E-01	U	pCi/g		2.28E-01	1.00E-01	
		EU-154	9.37E-02 +- 1.3E-01	U	pCi/g		2.54E-01	1.00E-01	
		EU-155	4.46E-02 +- 8.0E-02	U	pCi/g		1.41E-01	1.00E-01	
J1F1J6									
	MFTLT1AH	AMERICIUM 241	5.50E-02 +- 8.8E-02	U	pCi/g		1.50E-01		
		CO-60	3.51E-02 +- 2.0E-02	U	pCi/g		3.79E-02	5.00E-02	
		CS-137	8.86E-01 +- 1.2E-01		pCi/g		3.17E-02	1.00E-01	

TestAmerica

rptSTLRchSaSummary2 V5.2.12 A2002

RPD - Relative Percent Difference.

U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

Sample Results Summary

TestAmerica TARL

Ordered by Method, Batch No., Client Sample ID.

Date: 28-Mar-11

Report No. : 46065

SDG No: JP0124

Batch	Client Id Work Order	Parameter	Result +- Uncertainty (2s)	Qual	Units	Tracer Yield	MDC or MDA	CRDL	RPD
1076374 GAMMA_GS									
J1F1J6									
	MFTLT1AH	EU-152	7.88E-01 +- 1.5E-01		pCi/g		1.03E-01	1.00E-01	
		EU-154	1.02E-01 +- 6.2E-02	U	pCi/g		1.15E-01	1.00E-01	
		EU-155	4.95E-02 +- 6.7E-02	U	pCi/g		1.13E-01	1.00E-01	
J1F1J7									
	MFTLW1AH	AMERICIUM 241	-5.08E-02 +- 1.0E-01	U	pCi/g		1.71E-01		
		CO-60	1.26E-02 +- 1.7E-02	U	pCi/g		3.13E-02	5.00E-02	
		CS-137	1.10E+00 +- 1.5E-01		pCi/g		2.78E-02	1.00E-01	
		EU-152	4.55E-01 +- 9.9E-02		pCi/g		7.14E-02	1.00E-01	
		EU-154	-8.40E-03 +- 5.5E-02	U	pCi/g		9.35E-02	1.00E-01	
		EU-155	-8.67E-03 +- 4.7E-02	U	pCi/g		7.89E-02	1.00E-01	
J1F1J7 DUP									
	MFTLW1AK	AMERICIUM 241	-3.48E-02 +- 8.6E-02	U	pCi/g		1.44E-01		-37.2
		CO-60	3.41E-02 +- 1.9E-02	U	pCi/g		3.60E-02	5.00E-02	91.9
		CS-137	1.08E+00 +- 1.5E-01		pCi/g		3.42E-02	1.00E-01	2.4
		EU-152	4.97E-01 +- 1.1E-01	U	pCi/g		1.38E-01	1.00E-01	8.8
		EU-154	-8.24E-03 +- 5.7E-02	U	pCi/g		9.75E-02	1.00E-01	-1.9
		EU-155	3.26E-02 +- 6.9E-02	U	pCi/g		1.17E-01	1.00E-01	344.7
J1F1J8									
	MFTL01AH	AMERICIUM 241	-6.21E-02 +- 7.4E-02	U	pCi/g		1.22E-01		
		CO-60	-5.57E-03 +- 1.7E-02	U	pCi/g		2.93E-02	5.00E-02	
		CS-137	1.92E-01 +- 4.3E-02		pCi/g		2.76E-02	1.00E-01	
		EU-152	2.58E-01 +- 7.7E-02	U	pCi/g		1.03E-01	1.00E-01	
		EU-154	3.46E-02 +- 5.6E-02	U	pCi/g		1.01E-01	1.00E-01	
		EU-155	3.22E-03 +- 5.7E-02	U	pCi/g		9.54E-02	1.00E-01	
1076377 SRTOT_SEP_PRECIP_GPC									
J1F1J3									
	MFTLF1AD	STRONTIUM	1.34E-01 +- 1.0E-01	U	pCi/g	56%	1.93E-01		
J1F1J4									
	MFTLQ1AD	STRONTIUM	2.80E-01 +- 1.4E-01		pCi/g	53%	2.05E-01		
J1F1J5									
	MFTLR1AD	STRONTIUM	7.83E-02 +- 9.1E-02	U	pCi/g	56%	1.89E-01		
J1F1J6									
	MFTLT1AD	STRONTIUM	1.54E-01 +- 1.2E-01	U	pCi/g	51%	2.29E-01		
J1F1J7									
	MFTLW1AD	STRONTIUM	2.00E-02 +- 9.7E-02	U	pCi/g	52%	2.24E-01		
J1F1J8									
	MFTL01AD	STRONTIUM	1.59E-01 +- 1.1E-01	U	pCi/g	54%	1.99E-01		

TestAmerica

rptSTLRchSaSummary2 V5.2.12 A2002

RPD - Relative Percent Difference.

U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

Sample Results Summary

Date: 28-Mar-11

TestAmerica TARL

Ordered by Method, Batch No., Client Sample ID.

Report No. : 46065

SDG No: JP0124

Batch	Client Id Work Order	Parameter	Result +- Uncertainty (2s)	Qual	Units	Tracer Yield	MDC or MDA	CRDL	RPD
1076377 SRTOT_SEP_PRECIP_GPC									
J1F1J8 DUP									
	MFTL01AK	STRONTIUM	1.29E-01 +- 9.9E-02	U	pCi/g	56%	1.86E-01		20.7
1076382 C14_CHEM_LSC									
J1F1J3									
	MFTLF1AJ	C-14	-2.61E-02 +- 2.2E-01	U	pCi/g	100%	4.68E-01	5.00E+01	
J1F1J4									
	MFTLQ1AJ	C-14	-1.13E-01 +- 2.2E-01	U	pCi/g	100%	4.70E-01	5.00E+01	
J1F1J5									
	MFTLR1AJ	C-14	-1.08E-01 +- 2.2E-01	U	pCi/g	100%	4.68E-01	5.00E+01	
J1F1J5 DUP									
	MFTLR1AK	C-14	-1.29E-01 +- 2.1E-01	U	pCi/g	100%	4.71E-01	5.00E+01	-17.6
J1F1J6									
	MFTLT1AJ	C-14	-8.87E-02 +- 2.2E-01	U	pCi/g	100%	4.68E-01	5.00E+01	
J1F1J7									
	MFTLW1AJ	C-14	-1.23E-01 +- 2.1E-01	U	pCi/g	100%	4.68E-01	5.00E+01	
J1F1J8									
	MFTL01AJ	C-14	-1.72E-01 +- 2.1E-01	U	pCi/g	100%	4.68E-01	5.00E+01	
1076384 NI63_LSC									
J1F1J3									
	MFTLF1AE	NI-63	5.72E+00 +- 6.9E+00	U	pCi/g	91%	1.33E+01	3.00E+01	
J1F1J4									
	MFTLQ1AE	NI-63	5.44E+00 +- 6.2E+00	U	pCi/g	95%	1.19E+01	3.00E+01	
J1F1J5									
	MFTLR1AE	NI-63	4.61E+00 +- 6.8E+00	U	pCi/g	92%	1.33E+01	3.00E+01	
J1F1J6									
	MFTLT1AE	NI-63	8.64E-01 +- 6.6E+00	U	pCi/g	99%	1.34E+01	3.00E+01	
J1F1J6 DUP									
	MFTLT1AK	NI-63	6.11E+00 +- 6.8E+00	U	pCi/g	94%	1.30E+01	3.00E+01	150.5
J1F1J7									
	MFTLW1AE	NI-63	-8.26E-01 +- 5.8E+00	U	pCi/g	99%	1.19E+01	3.00E+01	
J1F1J8									
	MFTL01AE	NI-63	2.32E+00 +- 5.9E+00	U	pCi/g	99%	1.18E+01	3.00E+01	
1076385 906.0_H3_LSC									
J1F1J3									
	MFTLF1AG	H-3	3.05E-03 +- 1.1E-02	U	pCi/g	100%	2.46E-02	4.00E+02	
J1F1J4									
	MFTLQ1AG	H-3	1.67E-03 +- 8.3E-03	U	pCi/g	100%	1.77E-02	4.00E+02	
J1F1J5									
	MFTLR1AG	H-3	8.63E-03 +- 1.4E-02	U	pCi/g	100%	2.89E-02	4.00E+02	

TestAmerica **RPD** - **Relative Percent Difference.**

rptSTLRchSaSummary2 V5.2.12 A2002

U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

Sample Results Summary

Date: 28-Mar-11

TestAmerica TARL

Ordered by Method, Batch No., Client Sample ID.

Report No. : 46065

SDG No: JP0124

Batch	Client Id Work Order	Parameter	Result +- Uncertainty (2s)	Qual	Units	Tracer Yield	MDC or MDA	CRDL	RPD
1076385	**906.0_H3_LSC**								
	J1F1J5 DUP								
	MFTLR1AL	H-3	4.92E-03 +- 1.4E-02	U	pCi/g	100%	2.97E-02	4.00E+02	54.7
	J1F1J6								
	MFTLT1AG	H-3	7.03E-04 +- 1.5E-02	U	pCi/g	100%	3.19E-02	4.00E+02	
	J1F1J7								
	MFTLW1AG	H-3	2.22E-02 +- 1.7E-02	U	pCi/g	100%	3.48E-02	4.00E+02	
	J1F1J8								
	MFTL01AG	H-3	1.59E-02 +- 1.2E-02	U	pCi/g	100%	2.49E-02	4.00E+02	
1076431	**7196_CR6**								
	J1F1J3								
	MFTLF1AA	HEXCHROME	2.20E-01 +- 0.0E+00		mg/kg	N/A	1.50E-01	1.55E-01	
	MFTLF1AM	HEXCHROME	1.75E-01 +- 0.0E+00		mg/kg	N/A	1.49E-01	3.50E-01	22.8
	J1F1J4								
	MFTLQ1AA	HEXCHROME	4.54E-01 +- 0.0E+00		mg/kg	N/A	1.50E-01	1.55E-01	
	J1F1J5								
	MFTLR1AA	HEXCHROME	2.41E-01 +- 0.0E+00		mg/kg	N/A	1.49E-01	1.55E-01	
	J1F1J6								
	MFTLT1AA	HEXCHROME	7.00E-01 +- 0.0E+00		mg/kg	N/A	1.54E-01	1.55E-01	
	J1F1J7								
	MFTLW1AA	HEXCHROME	3.02E-01 +- 0.0E+00		mg/kg	N/A	1.55E-01	1.55E-01	
	J1F1J8								
	MFTL01AA	HEXCHROME	1.91E-01 +- 0.0E+00		mg/kg	N/A	1.45E-01	1.55E-01	

No. of Results: 112

TestAmerica

rptSTLRchSaSummary2 V5.2.12 A2002

RPD - Relative Percent Difference.

U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

QC Results Summary

Date: 28-Mar-11

TestAmerica TARL

Ordered by Method, Batch No, QC Type,.

Report No. : 46065

SDG No.: JP0124

Batch Work Order	Parameter	Result +- Uncertainty (2s)	Qual	Units	Tracer Yield	LCS Recovery	Bias	MDC|MDA
PUISO_PLATE_AEA								
1076379 BLANK QC,								
MFTPT1AA	PU-238	-1.88E-03 +- 7.5E-02	U	pCi/g	71%			1.41E-01
	PU239/40	-3.76E-03 +- 7.5E-02	U	pCi/g	71%			1.57E-01
1076379 LCS,								
MFTPT1AC	PU239/40	5.31E+00 +- 1.5E+00		pCi/g	72%	82%	-0.2	1.25E-01
UISO_IE_PLATE_AEA								
1076380 BLANK QC,								
MFTPX1AA	U-234	1.10E-02 +- 5.0E-02	U	pCi/g	100%			1.52E-01
	U-235	1.35E-02 +- 5.0E-02	U	pCi/g	100%			1.44E-01
	U-238	2.41E-03 +- 5.0E-02	U	pCi/g	100%			1.75E-01
1076380 LCS,								
MFTPX1AC	U-234	2.91E+00 +- 8.1E-01		pCi/g	89%	94%	-0.1	1.51E-01
	U-238	2.57E+00 +- 7.4E-01		pCi/g	89%	79%	-0.2	1.51E-01
GAMMA_GS								
1076374 BLANK QC,								
MFTPK1AA	AMERICIUM 241	5.86E-03 +- 4.8E-02	U	pCi/g				7.76E-02
	CO-60	-4.73E-03 +- 1.7E-02	U	pCi/g				2.94E-02
	CS-137	3.91E-05 +- 1.6E-02	U	pCi/g				2.77E-02
	EU-152	-1.48E-02 +- 4.0E-02	U	pCi/g				6.75E-02
	EU-154	-2.51E-03 +- 4.1E-02	U	pCi/g				7.56E-02
	EU-155	4.03E-03 +- 3.6E-02	U	pCi/g				6.25E-02
1076374 LCS,								
MFTPK1AC	CS-137	1.20E+00 +- 1.7E-01		pCi/g		110%	0.1	3.81E-02
SRTOT_SEP_PRECIP_GPC								
1076377 BLANK QC,								
MFTPM1AA	STRONTIUM	-1.41E-03 +- 5.2E-02	U	pCi/g	86%			1.26E-01
1076377 LCS,								
MFTPM1AC	STRONTIUM	9.72E-01 +- 2.8E-01		pCi/g	92%	86%	-0.1	1.24E-01
C14_CHEM_LSC								
1076382 BLANK QC,								
MFTP11AA	C-14	-4.81E-03 +- 5.3E-03	U	pCi/g	100%			1.18E-02
1076382 LCS,								
MFTP11AC	C-14	7.48E+00 +- 5.4E-01		pCi/g	100%	100%	0.0	4.74E-01
NI63_LSC								
1076384 BLANK QC,								
MFTP31AA	NI-63	-2.18E-01 +- 5.8E+00	U	pCi/g	96%			1.18E+01
1076384 LCS,								
MFTP31AC	NI-63	4.72E+02 +- 4.5E+01		pCi/g	95%	84%	-0.2	1.24E+01
906.0_H3_LSC								
1076385 BLANK QC,								
MFTP51AA	H-3	1.27E-02 +- 2.2E-02	U	pCi/g	100%			4.58E-02
1076385 LCS,								

TestAmerica

rptSTLRchQcSummary V5.2.12
A2002

Bias - (Result/Expected)-1 as defined by ANSI N13.30.

U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

QC Results Summary

Date: 28-Mar-11

TestAmerica TARL

Ordered by Method, Batch No, QC Type,.

Report No. : 46065

SDG No.: JP0124

Batch Work Order	Parameter	Result +- Uncertainty (2s)	Qual	Units	Tracer Yield	LCS Recovery	Bias	MDC|MDA
MFTP51AC	H-3	2.94E-01 +- 3.0E-02		pCi/g	100%	92%	-0.1	4.19E-02
7196_CR6								
1076431 MATRIX SPIKE, J1F1J3								
MFTLF1AL	HEXCHROME	9.23E+00 +- 0.0E+00		mg/kg	N/A	85%	-0.2	1.54E-01
1076431 LCS,								
MFTXW1AC	HEXCHROME	1.89E+01 +- 0.0E+00		mg/kg	N/A	95%	-0.1	1.55E-01
1076431 BLANK QC,								
MFTXW1AA	HEXCHROME	1.55E-01 +- 0.0E+00	U	mg/kg	N/A			1.55E-01

No. of Results: 26

TestAmerica
rptSTLRchQcSummary V5.2.12
A2002

Bias - (Result/Expected)-1 as defined by ANSI N13.30.

U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM I

SAMPLE RESULTS

Date: 28-Mar-11

Lab Name:	TestAmerica	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:30:00 AM
Lot-Sample No.:	J1C170587-1	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	J1F1J3	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Ordered by Client Sample ID, Batch No.

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, Lc	Yield CRDL(RL)	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
Batch: 1076374	GAMMA_GS			**Work Order:** MFTLF1AH			**Report DB ID:** 9MFTLF10					
AMERICIUM 241	***1.75E-02***	U	1.4E-01	1.4E-01	2.42E-01	pCi/g		*0.07*	3/19/11 07:24 a		66.6	GER11$1
								0.25			g	
CO-60	***1.85E-02***	U	3.3E-02	3.3E-02	6.41E-02	pCi/g		*0.29*	3/19/11 07:24 a		66.6	GER11$1
							5.00E-02	*(1.1)*			g	
CS-137	***2.38E-01***		6.6E-02	6.6E-02	5.52E-02	pCi/g		*(4.3)*	3/19/11 07:24 a		66.6	GER11$1
							1.00E-01	*(7.2)*			g	
EU-152	***2.71E-01***	U	9.3E-02	9.3E-02	1.58E-01	pCi/g		*(1.7)*	3/19/11 07:24 a		66.6	GER11$1
							1.00E-01	*(5.8)*			g	
EU-154	***1.17E-01***	U	1.0E-01	1.0E-01	2.00E-01	pCi/g		*0.58*	3/19/11 07:24 a		66.6	GER11$1
							1.00E-01	*(2.3)*			g	
EU-155	***-1.34E-02***	U	5.8E-02	5.8E-02	9.97E-02	pCi/g		*-0.13*	3/19/11 07:24 a		66.6	GER11$1
							1.00E-01	*-0.46*			g	
Batch: 1076377	SRTOT_SEP_PRECIP_GPC			**Work Order:** MFTLF1AD			**Report DB ID:** 9MFTLF10					
STRONTIUM	***1.34E-01***	U	9.6E-02	1.0E-01	1.93E-01	pCi/g	56%	*0.7*	3/25/11 07:22 p		5.99	GPC32A
						8.97E-02		*(2.6)*			g	
Batch: 1076379	PUISO_PLATE_AEA			**Work Order:** MFTLF1AF			**Report DB ID:** 9MFTLF10					
PU-238	***-4.09E-03***	U	8.2E-02	8.2E-02	1.71E-01	pCi/g	62%	*-0.02*	3/23/11 04:48 p		1.02	ALP38
						3.01E-02	1.00E+00	*-0.1*			g	
PU239/40	***3.68E-02***	U	8.2E-02	8.2E-02	1.71E-01	pCi/g	62%	*0.22*	3/23/11 04:48 p		1.02	ALP38
						3.01E-02	1.00E+00	*0.89*			g	
Batch: 1076380	UISO_IE_PLATE_AEA			**Work Order:** MFTLF1AC			**Report DB ID:** 9MFTLF10					

TestAmerica
rptSTLRchSample
V5.2.12 A2002

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

TestAmerica Laboratories, Inc.

FORM I

SAMPLE RESULTS

Date: 28-Mar-11

Lab Name:	TestAmerica	SDG:	JP0124	Collection Date:	3/16/2011 9:30:00 AM
Lot-Sample No.:	J1C170587-1	Report No. :	46065	Received Date:	3/17/2011 11:40:00 AM
Client Sample ID:	J1F1J3	COC No. :	RC-075-215	Matrix:	SOIL

Ordered by Client Sample ID, Batch No.

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, Lc	Yield CRDL(RL)	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
U-234	***1.82E-01***		1.4E-01	1.5E-01	1.69E-01	pCi/g	91%	*(1.1)*	3/24/11 11:46 a		1.07	ALP3
						5.05E-02	1.00E+00	*(2.5)*			g	
U-235	***-1.13E-02***	U	5.1E-02	5.1E-02	1.46E-01	pCi/g	91%	*-0.08*	3/24/11 11:46 a		1.07	ALP3
						3.92E-02	1.00E+00	*-0.45*			g	
U-238	***1.99E-01***		1.5E-01	1.6E-01	1.87E-01	pCi/g	91%	*(1.1)*	3/24/11 11:46 a		1.07	ALP3
						5.98E-02	1.00E+00	*(2.5)*			g	
							Ratio U-234/238 = 0.9					
Batch: 1076382	C14_CHEM_LSC			**Work Order:** MFTLF1AJ			**Report DB ID:** 9MFTLF10					
C-14	***-2.61E-02***	U	1.9E-01	2.2E-01	4.68E-01	pCi/g	100%	*-0.06*	3/23/11 01:53 a		5.042	LSC3
						2.21E-01	5.00E+01	*-0.24*			g	
Batch: 1076384	NI63_LSC			**Work Order:** MFTLF1AE			**Report DB ID:** 9MFTLF10					
NI-63	***5.72E+00***	U	5.7E+00	6.9E+00	1.33E+01	pCi/g	91%	*0.43*	3/24/11 11:21 p		0.26	LSC3
						6.22E+00	3.00E+01	*(1.7)*			g	
Batch: 1076385	906.0_H3_LSC			**Work Order:** MFTLF1AG			**Report DB ID:** 9MFTLF10					
H-3	***3.05E-03***	U	1.0E-02	1.1E-02	2.46E-02	pCi/g	100%	*0.12*	3/23/11 07:27 a		116.1	LSC3
						1.17E-02	4.00E+02	*0.53*			g	
Batch: 1076431	7196_CR6			**Work Order:** MFTLF1AA			**Report DB ID:** 9MFTLF10					
HEXCHROME	***2.20E-01***			0.0E+00	1.50E-01	mg/kg	N/A	*(1.5)*	3/23/11 10:00 a		2.5	
							1.55E-01	*N/A*			g	

No. of Results: 16 **Comments:**

TestAmerica
rptSTLRchSample
V5.2.12 A2002

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM I

SAMPLE RESULTS

Date: 28-Mar-11

Lab Name:	TestAmerica	SDG:	JP0124	Collection Date:	3/16/2011 9:35:00 AM
Lot-Sample No.:	J1C170587-2	Report No. :	46065	Received Date:	3/17/2011 11:40:00 AM
Client Sample ID:	J1F1J4	COC No. :	RC-075-215	Matrix:	SOIL

Ordered by Client Sample ID, Batch No.

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, Lc	Yield CRDL(RL)	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
Batch: 1076374	GAMMA_GS			**Work Order:** MFTLQ1AH			**Report DB ID:** 9MFTLQ10					
AMERICIUM 241	***-3.97E-04***	U	1.2E-01	1.2E-01	2.05E-01	pCi/g		*0.*	3/19/11 10:49 a		70.1	GER11$1
								-0.01			g	
CO-60	***4.53E-04***	U	2.8E-02	2.8E-02	5.16E-02	pCi/g		*0.01*	3/19/11 10:49 a		70.1	GER11$1
							5.00E-02	*0.03*			g	
CS-137	***1.72E+00***		2.5E-01	2.5E-01	4.82E-02	pCi/g		*(35.6)*	3/19/11 10:49 a		70.1	GER11$1
							1.00E-01	*(13.6)*			g	
EU-152	***5.36E-02***	U	7.0E-02	7.0E-02	1.23E-01	pCi/g		*0.43*	3/19/11 10:49 a		70.1	GER11$1
							1.00E-01	*(1.5)*			g	
EU-154	***2.98E-02***	U	8.4E-02	8.4E-02	1.57E-01	pCi/g		*0.19*	3/19/11 10:49 a		70.1	GER11$1
							1.00E-01	*0.71*			g	
EU-155	***5.03E-02***	U	5.1E-02	5.1E-02	9.32E-02	pCi/g		*0.54*	3/19/11 10:49 a		70.1	GER11$1
							1.00E-01	*(2.)*			g	
Batch: 1076377	SRTOT_SEP_PRECIP_GPC			**Work Order:** MFTLQ1AD			**Report DB ID:** 9MFTLQ10					
STRONTIUM	***2.80E-01***		1.2E-01	1.4E-01	2.05E-01	pCi/g	53%	*(1.4)*	3/25/11 07:22 p		6.01	GPC32B
						9.55E-02		*(4.1)*			g	
Batch: 1076379	PUISO_PLATE_AEA			**Work Order:** MFTLQ1AF			**Report DB ID:** 9MFTLQ10					
PU-238	***-1.83E-03***	U	7.3E-02	7.3E-02	1.37E-01	pCi/g	75%	*-0.01*	3/23/11 04:49 p		0.98	ALP40
						1.90E-02	1.00E+00	*-0.05*			g	
PU239/40	***-1.83E-03***	U	7.3E-02	7.3E-02	1.37E-01	pCi/g	75%	*-0.01*	3/23/11 04:49 p		0.98	ALP40
						1.90E-02	1.00E+00	*-0.05*			g	
Batch: 1076380	UISO_IE_PLATE_AEA			**Work Order:** MFTLQ1AC			**Report DB ID:** 9MFTLQ10					

TestAmerica
rptSTLRchSample
V5.2.12 A2002

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM I

SAMPLE RESULTS

Date: 28-Mar-11

Lab Name:	TestAmerica	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:35:00 AM
Lot-Sample No.:	J1C170587-2	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	J1F1J4	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Ordered by Client Sample ID, Batch No.

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, Lc	Yield CRDL(RL)	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
U-234	***1.86E-01***	U	1.6E-01	1.6E-01	1.95E-01	pCi/g	83%	*0.95*	3/24/11 11:46 a		0.98	ALP4
						5.75E-02	1.00E+00	*(2.3)*			g	
U-235	***-5.90E-03***	U	5.9E-02	5.9E-02	1.41E-01	pCi/g	83%	*-0.04*	3/24/11 11:46 a		0.98	ALP4
						3.07E-02	1.00E+00	*-0.2*			g	
U-238	***2.52E-01***		1.8E-01	1.9E-01	1.72E-01	pCi/g	83%	*(1.5)*	3/24/11 11:46 a		0.98	ALP4
						4.61E-02	1.00E+00	*(2.7)*			g	
							Ratio U-234/238 = 0.7					
Batch: 1076382	C14_CHEM_LSC			**Work Order:**	MFTLQ1AJ		**Report DB ID:**	9MFTLQ10				
C-14	***-1.13E-01***	U	1.9E-01	2.2E-01	4.70E-01	pCi/g	100%	*-0.24*	3/23/11 02:16 a		5.022	LSC3
						2.22E-01	5.00E+01	*-(1.)*			g	
Batch: 1076384	NI63_LSC			**Work Order:**	MFTLQ1AE		**Report DB ID:**	9MFTLQ10				
NI-63	***5.44E+00***	U	5.1E+00	6.2E+00	1.19E+01	pCi/g	95%	*0.46*	3/24/11 11:45 p		0.28	LSC3
						5.58E+00	3.00E+01	*(1.7)*			g	
Batch: 1076385	906.0_H3_LSC			**Work Order:**	MFTLQ1AG		**Report DB ID:**	9MFTLQ10				
H-3	***1.67E-03***	U	7.4E-03	8.3E-03	1.77E-02	pCi/g	100%	*0.09*	3/23/11 08:50 a		124.6	LSC3
						8.44E-03	4.00E+02	*0.4*			g	
Batch: 1076431	7196_CR6			**Work Order:**	MFTLQ1AA		**Report DB ID:**	9MFTLQ10				
HEXCHROME	***4.54E-01***			0.0E+00	1.50E-01	mg/kg	N/A	*(3.)*	3/23/11 10:00 a		2.5	
							1.55E-01	*N/A*			g	

No. of Results: 16 **Comments:**

TestAmerica
rptSTLRchSample
V5.2.12 A2002

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM I

SAMPLE RESULTS

Date: 28-Mar-11

Lab Name:	TestAmerica	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:40:00 AM
Lot-Sample No.:	J1C170587-3	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	J1F1J5	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Ordered by Client Sample ID, Batch No.

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, Lc	Yield CRDL(RL)	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
Batch: 1076374	GAMMA_GS			**Work Order:** MFTLR1AH			**Report DB ID:** 9MFTLR10					
AMERICIUM 241	***2.06E-02***	U	9.4E-02	9.4E-02	1.61E-01	pCi/g		*0.13*	3/19/11 10:49 a		73.8	GER7$1
								0.44			g	
CO-60	***5.02E-02***	U	4.3E-02	4.3E-02	8.55E-02	pCi/g		*0.59*	3/19/11 10:49 a		73.8	GER7$1
							5.00E-02	*(2.3)*			g	
CS-137	***1.33E+00***		2.2E-01	2.2E-01	7.03E-02	pCi/g		*(18.9)*	3/19/11 10:49 a		73.8	GER7$1
							1.00E-01	*(12.2)*			g	
EU-152	***3.53E-01***	U	1.8E-01	1.8E-01	2.28E-01	pCi/g		*(1.5)*	3/19/11 10:49 a		73.8	GER7$1
							1.00E-01	*(3.9)*			g	
EU-154	***9.37E-02***	U	1.3E-01	1.3E-01	2.54E-01	pCi/g		*0.37*	3/19/11 10:49 a		73.8	GER7$1
							1.00E-01	*(1.4)*			g	
EU-155	***4.46E-02***	U	8.0E-02	8.0E-02	1.41E-01	pCi/g		*0.32*	3/19/11 10:49 a		73.8	GER7$1
							1.00E-01	*(1.1)*			g	
Batch: 1076377	SRTOT_SEP_PRECIP_GPC			**Work Order:** MFTLR1AD			**Report DB ID:** 9MFTLR10					
STRONTIUM	***7.83E-02***	U	8.8E-02	9.1E-02	1.89E-01	pCi/g	56%	*0.41*	3/25/11 07:22 p		5.97	GPC32C
						8.77E-02		*(1.7)*			g	
Batch: 1076379	PUISO_PLATE_AEA			**Work Order:** MFTLR1AF			**Report DB ID:** 9MFTLR10					
PU-238	***-4.88E-03***	U	6.5E-02	6.5E-02	1.46E-01	pCi/g	73%	*-0.03*	3/23/11 04:49 p		1.07	ALP41
						2.93E-02	1.00E+00	*-0.15*			g	
PU239/40	***2.91E-02***	U	6.5E-02	6.5E-02	1.36E-01	pCi/g	73%	*0.22*	3/23/11 04:49 p		1.07	ALP41
						2.39E-02	1.00E+00	*0.89*			g	
Batch: 1076380	UISO_IE_PLATE_AEA			**Work Order:** MFTLR1AC			**Report DB ID:** 9MFTLR10					

TestAmerica
rptSTLRchSample
V5.2.12 A2002

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM I

SAMPLE RESULTS

Date: 28-Mar-11

Lab Name:	TestAmerica	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:40:00 AM
Lot-Sample No.:	J1C170587-3	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	J1F1J5	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Ordered by Client Sample ID, Batch No.

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, Lc	Yield CRDL(RL)	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
U-234	***1.45E-01***		1.1E-01	1.2E-01	8.80E-02	pCi/g	98%	*(1.6)*	3/24/11 11:46 a		1.07	ALP11
						1.55E-02	1.00E+00	*(2.5)*			g	
U-235	***2.00E-02***	U	4.2E-02	4.2E-02	7.90E-02	pCi/g	98%	*0.25*	3/24/11 11:46 a		1.07	ALP11
						1.10E-02	1.00E+00	*0.94*			g	
U-238	***1.86E-01***		1.3E-01	1.3E-01	9.50E-02	pCi/g	98%	*(2.)*	3/24/11 11:46 a		1.07	ALP11
						1.90E-02	1.00E+00	*(2.8)*			g	
							Ratio U-234/238 = 0.8					
Batch: 1076382	C14_CHEM_LSC			**Work Order:**	MFTLR1AJ		**Report DB ID:**	9MFTLR10				
C-14	***-1.08E-01***	U	1.8E-01	2.2E-01	4.68E-01	pCi/g	100%	*-0.23*	3/23/11 02:38 a		5.04	LSC3
						2.21E-01	5.00E+01	*-(1.)*			g	
Batch: 1076384	NI63_LSC			**Work Order:**	MFTLR1AE		**Report DB ID:**	9MFTLR10				
NI-63	***4.61E+00***	U	5.6E+00	6.8E+00	1.33E+01	pCi/g	92%	*0.35*	3/25/11 12:08 a		0.26	LSC3
						6.21E+00	3.00E+01	*(1.4)*			g	
Batch: 1076385	906.0_H3_LSC			**Work Order:**	MFTLR1AG		**Report DB ID:**	9MFTLR10				
H-3	***8.63E-03***	U	1.2E-02	1.4E-02	2.89E-02	pCi/g	100%	*0.3*	3/23/11 10:13 a		76.7	LSC3
						1.37E-02	4.00E+02	*(1.3)*			g	
Batch: 1076431	7196_CR6			**Work Order:**	MFTLR1AA		**Report DB ID:**	9MFTLR10				
HEXCHROME	***2.41E-01***			0.0E+00	1.49E-01	mg/kg	N/A	*(1.6)*	3/23/11 10:00 a		2.5	
							1.55E-01	*N/A*			g	

No. of Results: 16 **Comments:**

TestAmerica
rptSTLRchSample
V5.2.12 A2002

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM I

SAMPLE RESULTS

Date: 28-Mar-11

Lab Name:	TestAmerica	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:45:00 AM
Lot-Sample No.:	J1C170587-4	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	J1F1J6	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Ordered by Client Sample ID, Batch No.

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, Lc	Yield CRDL(RL)	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
Batch: 1076374	GAMMA_GS			**Work Order:** MFTLT1AH			**Report DB ID:** 9MFTLT10					
AMERICIUM 241	***5.50E-02***	U	8.8E-02	8.8E-02	1.50E-01	pCi/g		*0.37*	3/19/11 10:49 a		357.7	GER10$1
								(1.2)			g	
CO-60	***3.51E-02***	U	2.0E-02	2.0E-02	3.79E-02	pCi/g		*0.93*	3/19/11 10:49 a		357.7	GER10$1
							5.00E-02	*(3.5)*			g	
CS-137	***8.86E-01***		1.2E-01	1.2E-01	3.17E-02	pCi/g		*(27.9)*	3/19/11 10:49 a		357.7	GER10$1
							1.00E-01	*(14.3)*			g	
EU-152	***7.88E-01***		1.5E-01	1.5E-01	1.03E-01	pCi/g		*(7.7)*	3/19/11 10:49 a		357.7	GER10$1
							1.00E-01	*(10.7)*			g	
EU-154	***1.02E-01***	U	6.2E-02	6.2E-02	1.15E-01	pCi/g		*0.89*	3/19/11 10:49 a		357.7	GER10$1
							1.00E-01	*(3.3)*			g	
EU-155	***4.95E-02***	U	6.7E-02	6.7E-02	1.13E-01	pCi/g		*0.44*	3/19/11 10:49 a		357.7	GER10$1
							1.00E-01	*(1.5)*			g	
Batch: 1076377	SRTOT_SEP_PRECIP_GPC			**Work Order:** MFTLT1AD			**Report DB ID:** 9MFTLT10					
STRONTIUM	***1.54E-01***	U	1.1E-01	1.2E-01	2.29E-01	pCi/g	51%	*0.67*	3/25/11 07:22 p		6.01	GPC32D
						1.07E-01		*(2.6)*			g	
Batch: 1076379	PUISO_PLATE_AEA			**Work Order:** MFTLT1AF			**Report DB ID:** 9MFTLT10					
PU-238	***0.00E+00***	U	0.0E+00	7.6E-02	1.41E-01	pCi/g	74%	*0.*	3/23/11 04:49 p		0.99	ALP42
						1.97E-02	1.00E+00	*0.*			g	
PU239/40	***0.00E+00***	U	0.0E+00	7.5E-02	1.41E-01	pCi/g	74%	*0.*	3/23/11 04:49 p		0.99	ALP42
						1.97E-02	1.00E+00	*0.*			g	
Batch: 1076380	UISO_IE_PLATE_AEA			**Work Order:** MFTLT1AC			**Report DB ID:** 9MFTLT10					

TestAmerica
rptSTLRchSample
V5.2.12 A2002

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM I

SAMPLE RESULTS

Date: 28-Mar-11

Lab Name:	TestAmerica	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:45:00 AM
Lot-Sample No.:	J1C170587-4	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	J1F1J6	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Ordered by Client Sample ID, Batch No.

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, Lc	Yield CRDL(RL)	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
U-234	***1.56E-01***		1.2E-01	1.2E-01	8.38E-02	pCi/g	101%	*(1.9)*	3/24/11 11:46 a		1.03	ALP12
						1.16E-02	1.00E+00	*(2.6)*			g	
U-235	***-1.12E-03***	U	4.5E-02	4.5E-02	8.38E-02	pCi/g	101%	*-0.01*	3/24/11 11:46 a		1.03	ALP12
						1.16E-02	1.00E+00	*-0.05*			g	
U-238	***1.77E-01***		1.3E-01	1.3E-01	9.34E-02	pCi/g	101%	*(1.9)*	3/24/11 11:46 a		1.03	ALP12
						1.64E-02	1.00E+00	*(2.7)*			g	
							Ratio U-234/238 = 0.9					
Batch: 1076382	C14_CHEM_LSC			**Work Order:**	MFTLT1AJ		**Report DB ID:**	9MFTLT10				
C-14	***-8.87E-02***	U	1.9E-01	2.2E-01	4.68E-01	pCi/g	100%	*-0.19*	3/23/11 03:24 a		5.042	LSC3
						2.21E-01	5.00E+01	*-0.82*			g	
Batch: 1076384	NI63_LSC			**Work Order:**	MFTLT1AE		**Report DB ID:**	9MFTLT10				
NI-63	***8.64E-01***	U	5.4E+00	6.6E+00	1.34E+01	pCi/g	99%	*0.06*	3/25/11 12:30 a		0.24	LSC3
						6.26E+00	3.00E+01	*0.26*			g	
Batch: 1076385	906.0_H3_LSC			**Work Order:**	MFTLT1AG		**Report DB ID:**	9MFTLT10				
H-3	***7.03E-04***	U	1.3E-02	1.5E-02	3.19E-02	pCi/g	100%	*0.02*	3/23/11 12:59 p		98.3	LSC3
						1.52E-02	4.00E+02	*0.1*			g	
Batch: 1076431	7196_CR6			**Work Order:**	MFTLT1AA		**Report DB ID:**	9MFTLT10				
HEXCHROME	***7.00E-01***			0.0E+00	1.54E-01	mg/kg	N/A	*(4.5)*	3/23/11 10:00 a		2.5	
							1.55E-01	*N/A*			g	

No. of Results: 16 **Comments:**

TestAmerica
rptSTLRchSample
V5.2.12 A2002

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM I

SAMPLE RESULTS

Date: 28-Mar-11

Lab Name: TestAmerica
Lot-Sample No.: J1C170587-5
Client Sample ID: J1F1J7

SDG: JP0124
Report No. : 46065
COC No. : RC-075-215

Collection Date: 3/16/2011 9:50:00 AM
Received Date: 3/17/2011 11:40:00 AM
Matrix: SOIL

Ordered by Client Sample ID, Batch No.

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, Lc	Yield CRDL(RL)	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
Batch: 1076374	GAMMA_GS			**Work Order:** MFTLW1AH			**Report DB ID:** 9MFTLW10					
AMERICIUM 241	***-5.08E-02***	U	1.0E-01	1.0E-01	1.71E-01	pCi/g		*-0.3*	3/19/11 02:22 p		353.9	GER11$1
								-0.97			g	
CO-60	***1.26E-02***	U	1.7E-02	1.7E-02	3.13E-02	pCi/g		*0.4*	3/19/11 02:22 p		353.9	GER11$1
							5.00E-02	*(1.5)*			g	
CS-137	***1.10E+00***		1.5E-01	1.5E-01	2.78E-02	pCi/g		*(39.7)*	3/19/11 02:22 p		353.9	GER11$1
							1.00E-01	*(15.)*			g	
EU-152	***4.55E-01***		9.9E-02	9.9E-02	7.14E-02	pCi/g		*(6.4)*	3/19/11 02:22 p		353.9	GER11$1
							1.00E-01	*(9.2)*			g	
EU-154	***-8.40E-03***	U	5.5E-02	5.5E-02	9.35E-02	pCi/g		*-0.09*	3/19/11 02:22 p		353.9	GER11$1
							1.00E-01	*-0.31*			g	
EU-155	***-8.67E-03***	U	4.7E-02	4.7E-02	7.89E-02	pCi/g		*-0.11*	3/19/11 02:22 p		353.9	GER11$1
							1.00E-01	*-0.37*			g	
Batch: 1076377	SRTOT_SEP_PRECIP_GPC			**Work Order:** MFTLW1AD			**Report DB ID:** 9MFTLW10					
STRONTIUM	***2.00E-02***	U	9.7E-02	9.7E-02	2.24E-01	pCi/g	52%	*0.09*	3/25/11 07:22 p		6.04	GPC26A
						1.05E-01		*0.41*			g	
Batch: 1076379	PUISO_PLATE_AEA			**Work Order:** MFTLW1AF			**Report DB ID:** 9MFTLW10					
PU-238	***0.00E+00***	U	0.0E+00	1.1E-01	2.02E-01	pCi/g	46%	*0.*	3/23/11 04:50 p		1.02	ALP43
						2.80E-02	1.00E+00	*0.*			g	
PU239/40	***4.84E-02***	U	1.1E-01	1.1E-01	2.25E-01	pCi/g	46%	*0.22*	3/23/11 04:50 p		1.02	ALP43
						3.96E-02	1.00E+00	*0.89*			g	
Batch: 1076380	UISO_IE_PLATE_AEA			**Work Order:** MFTLW1AC			**Report DB ID:** 9MFTLW10					

TestAmerica
rptSTLRchSample
V5.2.12 A2002

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM I

SAMPLE RESULTS

Date: 28-Mar-11

Lab Name:	TestAmerica	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:50:00 AM
Lot-Sample No.:	J1C170587-5	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	J1F1J7	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Ordered by Client Sample ID, Batch No.

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, Lc	Yield CRDL(RL)	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
U-234	***3.28E-01***		1.9E-01	2.0E-01	1.23E-01	pCi/g	84%	*(2.7)*	3/24/11 11:47 a		1.04	ALP71
						2.41E-02	1.00E+00	*(3.2)*			g	
U-235	***-1.67E-03***	U	5.5E-02	5.5E-02	1.07E-01	pCi/g	84%	*-0.02*	3/24/11 11:47 a		1.04	ALP71
						1.58E-02	1.00E+00	*-0.06*			g	
U-238	***2.19E-01***		1.6E-01	1.6E-01	1.11E-01	pCi/g	84%	*(2.)*	3/24/11 11:47 a		1.04	ALP71
						1.82E-02	1.00E+00	*(2.7)*			g	
							Ratio U-234/238 = 1.5					
Batch: 1076382	C14_CHEM_LSC			**Work Order:**	MFTLW1AJ		**Report DB ID:**	9MFTLW10				
C-14	***-1.23E-01***	U	1.8E-01	2.1E-01	4.68E-01	pCi/g	100%	*-0.26*	3/23/11 03:47 a		5.042	LSC3
						2.21E-01	5.00E+01	*-(1.1)*			g	
Batch: 1076384	NI63_LSC			**Work Order:**	MFTLW1AE		**Report DB ID:**	9MFTLW10				
NI-63	***-8.26E-01***	U	4.7E+00	5.8E+00	1.19E+01	pCi/g	99%	*-0.07*	3/25/11 01:16 a		0.27	LSC3
						5.56E+00	3.00E+01	*-0.29*			g	
Batch: 1076385	906.0_H3_LSC			**Work Order:**	MFTLW1AG		**Report DB ID:**	9MFTLW10				
H-3	***2.22E-02***	U	1.5E-02	1.7E-02	3.48E-02	pCi/g	100%	*0.64*	3/23/11 02:23 p		105.3	LSC3
						1.66E-02	4.00E+02	*(2.6)*			g	
Batch: 1076431	7196_CR6			**Work Order:**	MFTLW1AA		**Report DB ID:**	9MFTLW10				
HEXCHROME	***3.02E-01***			0.0E+00	1.55E-01	mg/kg	N/A	*(1.9)*	3/23/11 10:00 a		2.5	
							1.55E-01	*N/A*			g	

No. of Results: 16 **Comments:**

TestAmerica
rptSTLRchSample
V5.2.12 A2002

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM I

SAMPLE RESULTS

Date: 28-Mar-11

Lab Name:	TestAmerica	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:30:00 AM
Lot-Sample No.:	J1C170587-6	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	J1F1J8	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Ordered by Client Sample ID, Batch No.

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC | MDA, Action Lev	Rpt Unit, Lc	Yield CRDL(RL)	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
Batch: 1076374	GAMMA_GS			**Work Order:** MFTL01AH			**Report DB ID:** 9MFTL010					
AMERICIUM 241	***-6.21E-02***	U	7.4E-02	7.4E-02	1.22E-01	pCi/g		*-0.51*	3/19/11 02:23 p		363.5	GER10$1
								-(1.7)			g	
CO-60	***-5.57E-03***	U	1.7E-02	1.7E-02	2.93E-02	pCi/g		*-0.19*	3/19/11 02:23 p		363.5	GER10$1
							5.00E-02	*-0.65*			g	
CS-137	***1.92E-01***		4.3E-02	4.3E-02	2.76E-02	pCi/g		*(6.9)*	3/19/11 02:23 p		363.5	GER10$1
							1.00E-01	*(9.)*			g	
EU-152	***2.58E-01***	U	7.7E-02	7.7E-02	1.03E-01	pCi/g		*(2.5)*	3/19/11 02:23 p		363.5	GER10$1
							1.00E-01	*(6.7)*			g	
EU-154	***3.46E-02***	U	5.6E-02	5.6E-02	1.01E-01	pCi/g		*0.34*	3/19/11 02:23 p		363.5	GER10$1
							1.00E-01	*(1.2)*			g	
EU-155	***3.22E-03***	U	5.7E-02	5.7E-02	9.54E-02	pCi/g		*0.03*	3/19/11 02:23 p		363.5	GER10$1
							1.00E-01	*0.11*			g	
Batch: 1076377	SRTOT_SEP_PRECIP_GPC			**Work Order:** MFTL01AD			**Report DB ID:** 9MFTL010					
STRONTIUM	***1.59E-01***	U	1.0E-01	1.1E-01	1.99E-01	pCi/g	54%	*0.8*	3/25/11 07:22 p		6.02	GPC26B
						9.29E-02		*(2.9)*			g	
Batch: 1076379	PUISO_PLATE_AEA			**Work Order:** MFTL01AF			**Report DB ID:** 9MFTL010					
PU-238	***-2.52E-03***	U	1.0E-01	1.0E-01	1.88E-01	pCi/g	53%	*-0.01*	3/23/11 04:50 p		1.03	ALP44
						2.61E-02	1.00E+00	*-0.05*			g	
PU239/40	***5.02E-02***	U	1.0E-01	1.0E-01	1.88E-01	pCi/g	53%	*0.27*	3/23/11 04:50 p		1.03	ALP44
						2.61E-02	1.00E+00	*0.99*			g	
Batch: 1076380	UISO_IE_PLATE_AEA			**Work Order:** MFTL01AC			**Report DB ID:** 9MFTL010					

TestAmerica
rptSTLRchSample
V5.2.12 A2002

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM I

SAMPLE RESULTS

Date: 28-Mar-11

Lab Name:	TestAmerica	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:30:00 AM
Lot-Sample No.:	J1C170587-6	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	J1F1J8	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Ordered by Client Sample ID, Batch No.

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, Lc	Yield CRDL(RL)	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
U-234	***1.74E-01***		1.5E-01	1.5E-01	1.51E-01	pCi/g	86%	*(1.2)*	3/24/11 11:47 a		1.07	ALP84
						3.46E-02	1.00E+00	*(2.3)*			g	
U-235	***-1.83E-03***	U	6.1E-02	6.1E-02	1.17E-01	pCi/g	86%	*-0.02*	3/24/11 11:47 a		1.07	ALP84
						1.73E-02	1.00E+00	*-0.06*			g	
U-238	***2.04E-01***		1.6E-01	1.7E-01	1.54E-01	pCi/g	86%	*(1.3)*	3/24/11 11:47 a		1.07	ALP84
						3.60E-02	1.00E+00	*(2.5)*			g	
							Ratio U-234/238 = 0.9					
Batch: 1076382	C14_CHEM_LSC			**Work Order:**	MFTL01AJ		**Report DB ID:**	9MFTL010				
C-14	***-1.72E-01***	U	1.8E-01	2.1E-01	4.68E-01	pCi/g	100%	*-0.37*	3/23/11 04:09 a		5.043	LSC3
						2.21E-01	5.00E+01	*-(1.6)*			g	
Batch: 1076384	NI63_LSC			**Work Order:**	MFTL01AE		**Report DB ID:**	9MFTL010				
NI-63	***2.32E+00***	U	4.9E+00	5.9E+00	1.18E+01	pCi/g	99%	*0.2*	3/25/11 01:39 a		0.27	LSC3
						5.54E+00	3.00E+01	*0.78*			g	
Batch: 1076385	906.0_H3_LSC			**Work Order:**	MFTL01AG		**Report DB ID:**	9MFTL010				
H-3	***1.59E-02***	U	1.1E-02	1.2E-02	2.49E-02	pCi/g	100%	*0.64*	3/23/11 03:46 p		106.6	LSC3
						1.19E-02	4.00E+02	*(2.6)*			g	
Batch: 1076431	7196_CR6			**Work Order:**	MFTL01AA		**Report DB ID:**	9MFTL010				
HEXCHROME	***1.91E-01***			0.0E+00	1.45E-01	mg/kg	N/A	*(1.3)*	3/23/11 10:00 a		2.5	
							1.55E-01	*N/A*			g	

No. of Results: 16 **Comments:**

TestAmerica
rptSTLRchSample
V5.2.12 A2002

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM II

Date: 28-Mar-11

DUPLICATE RESULTS

Lab Name:	**TestAmerica**	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:30:00 AM
Lot-Sample No.:	**J1C170587-1**	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	**J1F1J3**	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Parameter	Result, Orig Rst	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, CRDL	Yield	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
Batch: 1076431	7196_CR6			**Work Order:** MFTLF1AM		**Report DB ID:** MFTLF1ER			**Orig Sa DB ID:** 9MFTLF10			
HEXCHROME	1.75E-01			0.0E+00	1.49E-01	mg/kg	N/A	(1.2)	3/23/11 10:00 a		2.5	
	2.20E-01		**RPD**	**22.8**		3.50E-01		N/A			g	

No. of Results: 1 **Comments:**

TestAmerica **RPD** - **Relative Percent Difference.**

rptSTLRchDupV5.2 .12 A2002 **MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.**

FORM II

Date: 28-Mar-11

DUPLICATE RESULTS

Lab Name:	**TestAmerica**	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:30:00 AM
Lot-Sample No.:	**J1C170587-1**	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	**J1F1J3 DUP**	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Parameter	Result, Orig Rst	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, CRDL	Yield	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
Batch: 1076379	PUISO_PLATE_AEA			**Work Order:** MFTLF1AK		**Report DB ID:** MFTLF1KR			**Orig Sa DB ID:** 9MFTLF10			
PU-238	-2.36E-03	U	9.4E-02	9.4E-02	1.77E-01	pCi/g	53%	-0.01	3/23/11 04:48 p		1.05	ALP39
	-4.09E-03	U	**RPD**	**-53.7**		1.00E+00		-0.05			g	
PU239/40	-2.36E-03	U	9.4E-02	9.4E-02	1.77E-01	pCi/g	53%	-0.01	3/23/11 04:48 p		1.05	ALP39
	3.68E-02	U	**RPD**	**227.4**		1.00E+00		-0.05			g	

No. of Results: 2 **Comments:**

RPD - Relative Percent Difference.

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.

U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM II

Date: 28-Mar-11

DUPLICATE RESULTS

Lab Name:	**TestAmerica**	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:35:00 AM
Lot-Sample No.:	**J1C170587-2**	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	**J1F1J4 DUP**	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Parameter	Result, Orig Rst	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, CRDL	Yield	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
Batch: 1076380	UISO_IE_PLATE_AEA			**Work Order:** MFTLQ1AK		**Report DB ID:** MFTLQ1KR			**Orig Sa DB ID:** 9MFTLQ10			
U-234	1.59E-01		1.2E-01	1.3E-01	1.12E-01	pCi/g	96%	(1.4)	3/24/11 11:46 a		1.01	ALP9
	1.86E-01	U	**RPD**	**15.8**		1.00E+00		(2.5)			g	
U-235	0.00E+00	U	0.0E+00	4.7E-02	8.76E-02	pCi/g	96%	0.	3/24/11 11:46 a		1.01	ALP9
	-5.90E-03	U	**RPD**	**-200.0**		1.00E+00		0.			g	
U-238	2.32E-01		1.5E-01	1.5E-01	8.76E-02	pCi/g	96%	(2.7)	3/24/11 11:46 a		1.01	ALP9
	2.52E-01		**RPD**	**8.3**		1.00E+00		(3.)			g	

Ratio U-234/238 = 0.7 ***Alpha Spec Result Sum = 3.9E-01***

No. of Results: 3 **Comments:**

TestAmerica Laboratories, Inc.

29

TestAmerica rptSTLRchDupV5.2 .12 A2002

RPD - Relative Percent Difference.

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.

U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM II

Date: 28-Mar-11

DUPLICATE RESULTS

Lab Name:	**TestAmerica**	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:40:00 AM
Lot-Sample No.:	**J1C170587-3**	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	**J1F1J5 DUP**	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Parameter	Result, Orig Rst	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, CRDL	Yield	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
Batch: 1076382	C14_CHEM_LSC			**Work Order:** MFTLR1AK		**Report DB ID:** MFTLR1KR			**Orig Sa DB ID:** 9MFTLR10			
C-14	-1.29E-01	U	1.8E-01	2.1E-01	4.71E-01	pCi/g	100%	-0.27	3/23/11 03:01 a		5.015	LSC3
	-1.08E-01	U	**RPD**	**-17.6**		5.00E+01		-(1.2)			g	
Batch: 1076385	906.0_H3_LSC			**Work Order:** MFTLR1AL		**Report DB ID:** MFTLR1LR			**Orig Sa DB ID:** 9MFTLR10			
H-3	4.92E-03	U	1.2E-02	1.4E-02	2.97E-02	pCi/g	100%	0.17	3/23/11 11:36 a		67.1	LSC3
	8.63E-03	U	**RPD**	**54.7**		4.00E+02		0.71			g	

No. of Results: 2 **Comments:**

TestAmerica
rptSTLRchDupV5.2
.12 A2002

RPD - Relative Percent Difference.
MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM II

Date: 28-Mar-11

DUPLICATE RESULTS

Lab Name:	**TestAmerica**	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:45:00 AM
Lot-Sample No.:	**J1C170587-4**	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	**J1F1J6 DUP**	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Parameter	Result, Orig Rst	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, CRDL	Yield	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
Batch: 1076384	NI63_LSC			**Work Order:** MFTLT1AK		**Report DB ID:** MFTLT1KR			**Orig Sa DB ID:** 9MFTLT10			
NI-63	6.11E+00	U	5.6E+00	6.8E+00	1.30E+01	pCi/g	94%	0.47	3/25/11 12:53 a		0.26	LSC3
	8.64E-01	U	**RPD**	**150.5**		3.00E+01		(1.8)			g	

No. of Results: 1 **Comments:**

TestAmerica
rptSTLRchDupV5.2
.12 A2002

RPD - Relative Percent Difference.
MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM II

Date: 28-Mar-11

DUPLICATE RESULTS

Lab Name:	**TestAmerica**	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:50:00 AM
Lot-Sample No.:	**J1C170587-5**	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	**J1F1J7 DUP**	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Parameter	Result, Orig Rst	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, CRDL	Yield	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
Batch: 1076374	GAMMA_GS			**Work Order:** MFTLW1AK		**Report DB ID:** MFTLW1KR			**Orig Sa DB ID:** 9MFTLW10			
AMERICIUM 241	-3.48E-02	U	8.6E-02	8.6E-02	1.44E-01	pCi/g		-0.24	3/19/11 05:50 p		353.9	GER10$1
	-5.08E-02	U	**RPD**	**-37.2**				-0.81			g	
CO-60	3.41E-02	U	1.9E-02	1.9E-02	3.60E-02	pCi/g		0.95	3/19/11 05:50 p		353.9	GER10$1
	1.26E-02	U	**RPD**	**91.9**		5.00E-02		(3.7)			g	
CS-137	1.08E+00		1.5E-01	1.5E-01	3.42E-02	pCi/g		(31.4)	3/19/11 05:50 p		353.9	GER10$1
	1.10E+00		**RPD**	**2.4**		1.00E-01		(14.5)			g	
EU-152	4.97E-01	U	1.1E-01	1.1E-01	1.38E-01	pCi/g		(3.6)	3/19/11 05:50 p		353.9	GER10$1
	4.55E-01		**RPD**	**8.8**		1.00E-01		(9.2)			g	
EU-154	-8.24E-03	U	5.7E-02	5.7E-02	9.75E-02	pCi/g		-0.08	3/19/11 05:50 p		353.9	GER10$1
	-8.40E-03	U	**RPD**	**-1.9**		1.00E-01		-0.29			g	
EU-155	3.26E-02	U	6.9E-02	6.9E-02	1.17E-01	pCi/g		0.28	3/19/11 05:50 p		353.9	GER10$1
	-8.67E-03	U	**RPD**	**344.7**		1.00E-01		0.94			g	

No. of Results: 6 **Comments:**

TestAmerica
rptSTLRchDupV5.2
.12 A2002

RPD - Relative Percent Difference.
MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM II

Date: 28-Mar-11

DUPLICATE RESULTS

Lab Name:	**TestAmerica**	**SDG:**	JP0124	**Collection Date:**	3/16/2011 9:30:00 AM
Lot-Sample No.:	**J1C170587-6**	**Report No. :**	46065	**Received Date:**	3/17/2011 11:40:00 AM
Client Sample ID:	**J1F1J8 DUP**	**COC No. :**	RC-075-215	**Matrix:**	SOIL

Parameter	Result, Orig Rst	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA, Action Lev	Rpt Unit, CRDL	Yield	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
Batch: 1076377	SRTOT_SEP_PRECIP_GPC			**Work Order:** MFTL01AK		**Report DB ID:** MFTL01KR			**Orig Sa DB ID:** 9MFTL010			
STRONTIUM	1.29E-01	U	9.3E-02	9.9E-02	1.86E-01	pCi/g	56%	0.69	3/25/11 07:22 p		6.01	GPC26C
	1.59E-01	U	**RPD**	**20.7**				(2.6)			g	

No. of Results: 1 **Comments:**

TestAmerica
rptSTLRchDupV5.2
.12 A2002

RPD - Relative Percent Difference.
MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM II

BLANK RESULTS

Date: 28-Mar-11

Lab Name: TestAmerica

Matrix: SOIL

SDG: JP0124

Report No. : 46065

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA ,	Rpt Unit, CRDL	Yield	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
Batch: 1076431	7196_CR6			**Work Order:**	MFTXW1AA		**Report DB ID:**	MFTXW1AB				
HEXCHROME	1.55E-01	U		0.0E+00	1.55E-01	mg/kg	N/A	1.	3/23/11 10:00 a		2.5	
						1.55E-01		N/A			g	
Batch: 1076382	C14_CHEM_LSC			**Work Order:**	MFTP11AA		**Report DB ID:**	MFTP11AB				
C-14	-4.81E-03	U	4.5E-03	5.3E-03	1.18E-02	pCi/g	100%	-0.41	3/23/11 04:32 a		200.0	LSC3
					5.57E-03	5.00E+01		-(1.8)			g	
Batch: 1076379	PUISO_PLATE_AEA			**Work Order:**	MFTPT1AA		**Report DB ID:**	MFTPT1AB				
PU-238	-1.88E-03	U	7.5E-02	7.5E-02	1.41E-01	pCi/g	71%	-0.01	3/23/11 04:50 p		1.03	ALP46
					1.95E-02	1.00E+00		-0.05			g	
PU239/40	-3.76E-03	U	7.5E-02	7.5E-02	1.57E-01	pCi/g	71%	-0.02	3/23/11 04:50 p		1.03	ALP46
					2.76E-02	1.00E+00		-0.1			g	
Batch: 1076380	UISO_IE_PLATE_AEA			**Work Order:**	MFTPX1AA		**Report DB ID:**	MFTPX1AB				
U-234	1.10E-02	U	5.0E-02	5.0E-02	1.52E-01	pCi/g	100%	0.07	3/24/11 12:52 p		0.99	ALP3
					4.25E-02	1.00E+00		0.44			g	
U-235	1.35E-02	U	5.0E-02	5.0E-02	1.44E-01	pCi/g	100%	0.09	3/24/11 12:52 p		0.99	ALP3
					3.85E-02	1.00E+00		0.54			g	
U-238	2.41E-03	U	5.0E-02	5.0E-02	1.75E-01	pCi/g	100%	0.01	3/24/11 12:52 p		0.99	ALP3
					5.44E-02	1.00E+00		0.1			g	
							Ratio U-234/238 = 4.6					
Batch: 1076384	NI63_LSC			**Work Order:**	MFTP31AA		**Report DB ID:**	MFTP31AB				
NI-63	-2.18E-01	U	4.7E+00	5.8E+00	1.18E+01	pCi/g	96%	-0.02	3/25/11 02:02 a		0.28	LSC3
					5.53E+00	3.00E+01		-0.08			g	
Batch: 1076385	906.0_H3_LSC			**Work Order:**	MFTP51AA		**Report DB ID:**	MFTP51AB				

TestAmerica
rptSTLRchBlank
V5.2.12 A2002

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM II

BLANK RESULTS

Date: 28-Mar-11

Lab Name: TestAmerica
Matrix: SOIL

SDG: JP0124
Report No. : 46065

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA ,	Rpt Unit, CRDL	Yield	Rst/MDC, Rst/TotUcert	Analysis, Prep Date	Total Sa Size	Aliquot Size	Primary Detector
H-3	1.27E-02	U	1.9E-02	2.2E-02	4.58E-02	pCi/g	100%	0.28	3/23/11 05:09 p		77.4	LSC3
					2.18E-02	4.00E+02		(1.2)			g	
Batch: 1076374	GAMMA_GS			**Work Order:**	MFTPK1AA		**Report DB ID:**	MFTPK1AB				
AMERICIUM 241	5.86E-03	U	4.8E-02	4.8E-02	7.76E-02	pCi/g		0.08	3/19/11 02:24 p		348.0	GER7$1
								0.25			g	
CO-60	-4.73E-03	U	1.7E-02	1.7E-02	2.94E-02	pCi/g		-0.16	3/19/11 02:24 p		348.0	GER7$1
						5.00E-02		-0.56			g	
CS-137	3.91E-05	U	1.6E-02	1.6E-02	2.77E-02	pCi/g		0.	3/19/11 02:24 p		348.0	GER7$1
						1.00E-01		0.01			g	
EU-152	-1.48E-02	U	4.0E-02	4.0E-02	6.75E-02	pCi/g		-0.22	3/19/11 02:24 p		348.0	GER7$1
						1.00E-01		-0.73			g	
EU-154	-2.51E-03	U	4.1E-02	4.1E-02	7.56E-02	pCi/g		-0.03	3/19/11 02:24 p		348.0	GER7$1
						1.00E-01		-0.12			g	
EU-155	4.03E-03	U	3.6E-02	3.6E-02	6.25E-02	pCi/g		0.06	3/19/11 02:24 p		348.0	GER7$1
						1.00E-01		0.23			g	
Batch: 1076377	SRTOT_SEP_PRECIP_GPC			**Work Order:**	MFTPM1AA		**Report DB ID:**	MFTPM1AB				
STRONTIUM	-1.41E-03	U	5.2E-02	5.2E-02	1.26E-01	pCi/g	86%	-0.01	3/25/11 07:22 p		6.03	GPC26D
					5.80E-02			-0.05			g	

No. of Results: 16 **Comments:**

TestAmerica
rptSTLRchBlank
V5.2.12 A2002

MDC|MDA,Lc - Detection, Decision Level based on instrument background or blank, adjusted by the sample Efficiency, Yield, and Volume.
U Qual - Analyzed for but not detected above limiting criteria. Limit criteria is less than the Mdc/Mda/Mdl, Total Uncert, CRDL, RDL or not identified by gamma scan software.

FORM II

LCS RESULTS

Date: 28-Mar-11

Lab Name: TestAmerica

Matrix: SOIL

SDG: JP0124

Report No. : 46065

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA	Report Unit	Yield	Expected	Expected Uncert	Recovery, Bias	Analysis, Prep Date	Aliquot Size	Primary Detector
Batch: 1076431	7196_CR6			**Work Order:**	MFTXW1AC		**Report DB ID:**	MFTXW1AS					
HEXCHROME	1.89E+01			0.0E+00	1.55E-01	mg/kg	N/A	2.00E+01		95%	3/23/11 10:00 a	2.5	
							Rec Limits:	80	120	-0.1		g	
Batch: 1076382	C14_CHEM_LSC			**Work Order:**	MFTP11AC		**Report DB ID:**	MFTP11CS					
C-14	7.48E+00		4.3E-01	5.4E-01	4.74E-01	pCi/g	100%	7.45E+00	1.2E-01	100%	3/23/11 04:55 a	5.0	LSC3
							Rec Limits:	70	130	0.0		g	
Batch: 1076379	PUISO_PLATE_AEA			**Work Order:**	MFTPT1AC		**Report DB ID:**	MFTPT1CS					
PU239/40	5.31E+00		8.4E-01	1.5E+00	1.25E-01	pCi/g	72%	6.45E+00	1.9E-01	82%	3/23/11 04:51 p	1.06	ALP121
							Rec Limits:	70	130	-0.2		g	
Batch: 1076380	UISO_IE_PLATE_AEA			**Work Order:**	MFTPX1AC		**Report DB ID:**	MFTPX1CS					
U-234	2.91E+00		5.5E-01	8.1E-01	1.51E-01	pCi/g	89%	3.11E+00	9.6E-02	94%	3/24/11 12:52 p	1.05	ALP4
							Rec Limits:	70	130	-0.1		g	
U-238	2.57E+00		5.2E-01	7.4E-01	1.51E-01	pCi/g	89%	3.25E+00	1.0E-01	79%	3/24/11 12:52 p	1.05	ALP4
							Rec Limits:	70	130	-0.2		g	
Batch: 1076384	NI63_LSC			**Work Order:**	MFTP31AC		**Report DB ID:**	MFTP31CS					
NI-63	4.72E+02		1.7E+01	4.5E+01	1.24E+01	pCi/g	95%	5.62E+02	9.5E+00	84%	3/25/11 02:25 a	0.27	LSC3
							Rec Limits:	70	130	-0.2		g	
Batch: 1076385	906.0_H3_LSC			**Work Order:**	MFTP51AC		**Report DB ID:**	MFTP51CS					
H-3	2.94E-01		2.7E-02	3.0E-02	4.19E-02	pCi/g	100%	3.18E-01	9.6E-03	92%	3/23/11 06:32 p	86.4	LSC3
							Rec Limits:	70	130	-0.1		g	
Batch: 1076374	GAMMA_GS			**Work Order:**	MFTPK1AC		**Report DB ID:**	MFTPK1CS					
CS-137	1.20E+00		1.7E-01	1.7E-01	3.81E-02	pCi/g		1.09E+00	1.1E-02	110%	3/19/11 05:51 p	350.1	GER7$1
							Rec Limits:	70	130	0.1		g	

TestAmerica **Bias** - (Result/Expected)-1 as defined by ANSI N13.30.

rptSTLRchLcs
V5.2.12 A2002

FORM II

LCS RESULTS

Date: 28-Mar-11

Lab Name: TestAmerica

Matrix: SOIL

SDG: JP0124

Report No. : 46065

Parameter	Result	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA	Report Unit	Yield	Expected	Expected Uncert	Recovery, Bias	Analysis, Prep Date	Aliquot Size	Primary Detector
Batch: 1076377	SRTOT_SEP_PRECIP_GPC			Work Order:	MFTPM1AC		Report DB ID:	MFTPM1CS					
STRONTIUM	9.72E-01		1.2E-01	2.8E-01	1.24E-01	pCi/g	92%	1.13E+00	3.1E-02	86%	3/25/11 07:22 p	6.04	GPC27A
							Rec Limits:	70	130	-0.1		g	

No. of Results: 9 **Comments:**

TestAmerica **Bias** - (Result/Expected)-1 as defined by ANSI N13.30.

rptSTLRchLcs
V5.2.12 A2002

FORM II

MATRIX SPIKE RESULTS

Date: 28-Mar-11

Lab Name: TestAmerica **SDG:** JP0124

Lot-Sample No.: J1C170587-1, J1F1J3 **Report No. :** 46065 **Matrix:** SOIL

Parameter	SpikeResult, Orig Rst	Qual	Count Error (2 s)	Total Uncert(2 s)	MDC|MDA	Rpt Unit, CRDL	Yield	Rec-overy	Expected, Uncert	Analysis, Prep Date	Aliquot Size	Analy Method, Primary Detector
Batch: 1076431	**Work Order:** MFTLF1AL			**Report DB ID:** MFTLF1CW			**Orig Sa DB ID:** 9MFTLF10					
HEXCHROME	9.23E+00			0.0E+00	1.54E-01	mg/kg	N/A	85.01%	1.09E+01	3/23/11 10:00 a	2.5	7196_CR6
	2.20E-01										g	

Number of Results: 1

Comments:

TestAmerica
rptSTLRchMs
V5.2.12 A2002

RER - Replicate Error Ratio = (S-D)/[sqrt(sq(TPUs)+sq(TPUd))] as defined by ICPT BOA.
Bias - (Result/Expected)-1 as defined by ANSI N13.30.

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review/Verification Checklist
RADIOCHEMISTRY, First Level Review

3/24/2011 10:45:29 AM

Lot No., Due Date: J1C170587; 03/24/2011
Client, Site: 127642; S00N063A00 HANFORD
QC Batch No., Method Test: 1076379; RPUISO Pulso by ALP
SDG, Matrix: JP0124; SOIL

	Yes	No	N/A
1.0 COC			
1.1 Is the ICOC page complete; includes all applicable analysis, dates, SOP numbers, and revisions?	✓		
2.0 QC Batch			
2.1 Do the Summary/Detailed Reports include a calculated result for each sample listed on the QC Batch Sheet?	✓		
2.2 Are the QC appropriate for the analysis included in the batch?	✓		
2.3 Is the Analytical Batch Worksheet complete; includes as appropriate, volumes, count times, etc?	✓		
2.4 Does the Worksheets include a Tracer Vial label for each sample?	✓		
3.0 QC & Samples			
3.1 Is the blank results, yield, and MDA within contract limits?	✓		
3.2 Is the LCS result, yield, and MDA within contract limits?	✓		
3.3 Are the MS/MSD results, yields, and MDA within contract limits?			✓
3.4 Are the duplicate result, yields, and MDAs within contract limits?	✓		
3.5 Are the sample yields and MDAs within contract limits?	✓		
4.0 Raw Data			
4.1 Were results calculated in the correct units?	✓		
4.2 Were analysis volumes entered correctly?	✓		
4.3 Were Yields entered correctly?			✓
4.4 Were spectra reviewed/meet contractual requirements?	✓		
4.5 Were raw counts reviewed for anomalies?	✓		
5.0 Other			
5.1 Are all nonconformances included and noted?			✓
5.2 Are all required forms filled out?	✓		
5.3 Was the correct methodology used?	✓		
5.4 Was transcription checked?	✓		
5.5 Were all calculations checked at a minimum frequency?	✓		
5.6 Are worksheet entries complete and correct?	✓		

6.0 Comments on any No response:

First Level Lisa Quitenson Date 3/24/11

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist

RADIOCHEMISTRY

Second Level Review

Batch Number: 10760379

Review Item	Yes (√)	No (√)	NA (√)
A. Sample Analysis 1. Are the sample yields within acceptance criteria?	✓		
2. Is the sample Minimum Detectable Activity < the Contract Detection Limit?	✓		
3. Are the correct isotopes reported?	✓		
B. QC Samples 1. Is the Minimum Detectable Activity for the blank result ≤ the Contract Detection Limit?	✓		
2. Does the blank result meet the Contract criteria?	✓		
3. Is the blank result < the Contract Detection Limit?	✓		
4. Is the blank result > the Contract Detection Limit but the sample result < the Contract Detection Limit?			✓
5. Is the LCS recovery within contract acceptance criteria?	✓		
6. Is the LCS Minimum Detectable Activity ≤ the Contract Detection Limit?	✓		
7. Do the MS/MSD results and yields meet acceptance criteria?			✓
8. Do the duplicate sample results and yields meet acceptance criteria?	✓		
C. Other 1. Are all Non-conformances included and noted?			✓
2. Are all required forms filled out?	✓		
3. Was the correct methodology used?	✓		
4. Was transcription checked?	✓		
5. Were all calculations checked at a minimum frequency?	✓		
6. Were units checked?	✓		

Comments on any "No" response: CRDL= 1.0pCi/g

Second Level Review: Rhonda [illegible] Date: 3/24/11

LS-038B, Rev. 10, 9/07

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review/Verification Checklist
RADIOCHEMISTRY, First Level Review

3/25/2011 5:04:53 PM

Lot No., Due Date: J1C170587; 03/24/2011
Client, Site: 127642; S00N063A00 HANFORD
QC Batch No., Method Test: 1076380; RUISO Uiso by ALP
SDG, Matrix: JP0124; SOIL

1.0 COC

1.1 Is the ICOC page complete; includes all applicable analysis, dates, SOP numbers, and revisions?	Yes ✓	No	N/A

2.0 QC Batch

2.1 Do the Summary/Detailed Reports include a calculated result for each sample listed on the QC Batch Sheet?	Yes ✓	No	N/A
2.2 Are the QC appropriate for the analysis included in the batch?	Yes ✓	No	N/A
2.3 Is the Analytical Batch Worksheet complete; includes as appropriate, volumes, count times, etc?	Yes ✓	No	N/A
2.4 Does the Worksheets include a Tracer Vial label for each sample?	Yes ✓	No	N/A

3.0 QC & Samples

3.1 Is the blank results, yield, and MDA within contract limits?	Yes ✓	No	N/A
3.2 Is the LCS result, yield, and MDA within contract limits?	Yes ✓	No	N/A
3.3 Are the MS/MSD results, yields, and MDA within contract limits?	Yes	No	N/A ✓
3.4 Are the duplicate result, yields, and MDAs within contract limits?	Yes ✓	No	N/A
3.5 Are the sample yields and MDAs within contract limits?	Yes ✓	No	N/A

4.0 Raw Data

4.1 Were results calculated in the correct units?	Yes ✓	No	N/A
4.2 Were analysis volumes entered correctly?	Yes ✓	No	N/A
4.3 Were Yields entered correctly?	Yes	No	N/A ✓
4.4 Were spectra reviewed/meet contractual requirements?	Yes ✓	No	N/A
4.5 Were raw counts reviewed for anomalies?	Yes ✓	No	N/A

5.0 Other

5.1 Are all nonconformances included and noted?	Yes	No	N/A ✓
5.2 Are all required forms filled out?	Yes ✓	No	N/A
5.3 Was the correct methodology used?	Yes ✓	No	N/A
5.4 Was transcription checked?	Yes ✓	No	N/A
5.5 Were all calculations checked at a minimum frequency?	Yes ✓	No	N/A
5.6 Are worksheet entries complete and correct?	Yes ✓	No	N/A

6.0 Comments on any No response:

First Level [signature] Date 3/25/11

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist

RADIOCHEMISTRY

Second Level Review

Batch Number: 1076380

Review Item	Yes (√)	No (√)	NA (√)
A. Sample Analysis 1. Are the sample yields within acceptance criteria?	✓		
2. Is the sample Minimum Detectable Activity < the Contract Detection Limit?	✓		
3. Are the correct isotopes reported?	✓		
B. QC Samples 1. Is the Minimum Detectable Activity for the blank result ≤ the Contract Detection Limit?	✓		
2. Does the blank result meet the Contract criteria?	✓		
3. Is the blank result < the Contract Detection Limit?	✓		
4. Is the blank result > the Contract Detection Limit but the sample result < the Contract Detection Limit?			✓
5. Is the LCS recovery within contract acceptance criteria?	✓		
6. Is the LCS Minimum Detectable Activity ≤ the Contract Detection Limit?	✓		
7. Do the MS/MSD results and yields meet acceptance criteria?			✓
8. Do the duplicate sample results and yields meet acceptance criteria?	✓		
C. Other 1. Are all Non-conformances included and noted?			✓
2. Are all required forms filled out?	✓		
3. Was the correct methodology used?	✓		
4. Was transcription checked?	✓		
5. Were all calculations checked at a minimum frequency?	✓		
6. Were units checked?	✓		

Comments on any "No" response: CRDL=1.0pci/g

Second Level Review: [signature] Date: 3/25/11

LS-038B, Rev. 10, 9/07

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review/Verification Checklist
RADIOCHEMISTRY, First Level Review

3/28/2011 10:49:54 AM

Lot No., Due Date: J1C170587; 03/24/2011
Client, Site: 127642; S00N063A00 HANFORD
QC Batch No., Method Test: 1076377; RSRTOT SrTot by GPC
SDG, Matrix: JP0124; SOIL

1.0 COC			
1.1 Is the ICOC page complete; includes all applicable analysis, dates, SOP numbers, and revisions?	Yes ✓	No	N/A
2.0 QC Batch			
2.1 Do the Summary/Detailed Reports include a calculated result for each sample listed on the QC Batch Sheet?	Yes ✓	No	N/A
2.2 Are the QC appropriate for the analysis included in the batch?	Yes ✓	No	N/A
2.3 Is the Analytical Batch Worksheet complete; includes as appropriate, volumes, count times, etc?	Yes ✓	No	N/A
2.4 Does the Worksheets include a Tracer Vial label for each sample?	Yes ✓	No	N/A
3.0 QC & Samples			
3.1 Is the blank results, yield, and MDA within contract limits?	Yes ✓	No	N/A
3.2 Is the LCS result, yield, and MDA within contract limits?	Yes ✓	No	N/A
3.3 Are the MS/MSD results, yields, and MDA within contract limits?	Yes	No	N/A ✓
3.4 Are the duplicate result, yields, and MDAs within contract limits?	Yes ✓	No	N/A
3.5 Are the sample yields and MDAs within contract limits?	Yes ✓	No	N/A
4.0 Raw Data			
4.1 Were results calculated in the correct units?	Yes ✓	No	N/A
4.2 Were analysis volumes entered correctly?	Yes ✓	No	N/A
4.3 Were Yields entered correctly?	Yes ✓	No	N/A
4.4 Were spectra reviewed/meet contractual requirements?	Yes	No	N/A ✓
4.5 Were raw counts reviewed for anomalies?	Yes ✓	No	N/A
5.0 Other			
5.1 Are all nonconformances included and noted?	Yes	No	N/A ✓
5.2 Are all required forms filled out?	Yes ✓	No	N/A
5.3 Was the correct methodology used?	Yes ✓	No	N/A
5.4 Was transcription checked?	Yes ✓	No	N/A
5.5 Were all calculations checked at a minimum frequency?	Yes ✓	No	N/A
5.6 Are worksheet entries complete and correct?	Yes ✓	No	N/A

6.0 Comments on any No response:

First Level Lee Anderson Date 3/28/11

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist

RADIOCHEMISTRY

Second Level Review

Batch Number: 1076377

Review Item	Yes (√)	No (√)	NA (√)
A. Sample Analysis 1. Are the sample yields within acceptance criteria?	✓		
2. Is the sample Minimum Detectable Activity < the Contract Detection Limit?	✓		
3. Are the correct isotopes reported?	✓		
B. QC Samples 1. Is the Minimum Detectable Activity for the blank result ≤ the Contract Detection Limit?	✓		
2. Does the blank result meet the Contract criteria?	✓		
3. Is the blank result < the Contract Detection Limit?	✓		
4. Is the blank result > the Contract Detection Limit but the sample result < the Contract Detection Limit?			✓
5. Is the LCS recovery within contract acceptance criteria?	✓		
6. Is the LCS Minimum Detectable Activity ≤ the Contract Detection Limit?	✓		
7. Do the MS/MSD results and yields meet acceptance criteria?			✓
8. Do the duplicate sample results and yields meet acceptance criteria?	✓		
C. Other 1. Are all Non-conformances included and noted?			✓
2. Are all required forms filled out?	✓		
3. Was the correct methodology used?	✓		
4. Was transcription checked?	✓		
5. Were all calculations checked at a minimum frequency?	✓		
6. Were units checked?	✓		

Comments on any "No" response: CRDL = 1.0 pCi/g

Second Level Review: [signature] Date: 5/28/11

LS-038B, Rev. 10, 9/07

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review/Verification Checklist
RADIOCHEMISTRY, First Level Review

3/22/2011 2:36:40 PM

Lot No., Due Date: J1C170587; 03/24/2011
Client, Site: 127642; S00N063A00 HANFORD
QC Batch No., Method Test: 1076374; RGAMMA Gamma by GER
SDG, Matrix: JP0124; SOIL

1.0 COC			
1.1 Is the ICOC page complete; includes all applicable analysis, dates, SOP numbers, and revisions?	Yes ✓	No	N/A
2.0 QC Batch			
2.1 Do the Summary/Detailed Reports include a calculated result for each sample listed on the QC Batch Sheet?	Yes ✓	No	N/A
2.2 Are the QC appropriate for the analysis included in the batch?	Yes ✓	No	N/A
2.3 Is the Analytical Batch Worksheet complete; includes as appropriate, volumes, count times, etc?	Yes ✓	No	N/A
2.4 Does the Worksheets include a Tracer Vial label for each sample?	Yes ✓	No	N/A
3.0 QC & Samples			
3.1 Is the blank results, yield, and MDA within contract limits?	Yes ✓	No	N/A
3.2 Is the LCS result, yield, and MDA within contract limits?	Yes ✓	No	N/A
3.3 Are the MS/MSD results, yields, and MDA within contract limits?	Yes	No	N/A ✓
3.4 Are the duplicate result, yields, and MDAs within contract limits?	Yes ✓	No	N/A
3.5 Are the sample yields and MDAs within contract limits?	Yes	No ✓	N/A
4.0 Raw Data			
4.1 Were results calculated in the correct units?	Yes ✓	No	N/A
4.2 Were analysis volumes entered correctly?	Yes ✓	No	N/A
4.3 Were Yields entered correctly?	Yes	No	N/A ✓
4.4 Were spectra reviewed/meet contractual requirements?	Yes ✓	No	N/A
4.5 Were raw counts reviewed for anomalies?	Yes ✓	No	N/A
5.0 Other			
5.1 Are all nonconformances included and noted?	Yes ✓	No	N/A
5.2 Are all required forms filled out?	Yes ✓	No	N/A
5.3 Was the correct methodology used?	Yes ✓	No	N/A
5.4 Was transcription checked?	Yes ✓	No	N/A
5.5 Were all calculations checked at a minimum frequency?	Yes ✓	No	N/A
5.6 Are worksheet entries complete and correct?	Yes ✓	No	N/A

6.0 Comments on any No response:
Elevated MDA's - NCM

First Level [signature] **Date** 3/22/11

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist

RADIOCHEMISTRY

Second Level Review

Batch Number: 1076874

Review Item	Yes (√)	No (√)	NA (√)
A. Sample Analysis 1. Are the sample yields within acceptance criteria?			✓
2. Is the sample Minimum Detectable Activity < the Contract Detection Limit?	✓	✓	
3. Are the correct isotopes reported?	✓		
B. QC Samples 1. Is the Minimum Detectable Activity for the blank result ≤ the Contract Detection Limit?	✓		
2. Does the blank result meet the Contract criteria?	✓		
3. Is the blank result < the Contract Detection Limit?	✓		
4. Is the blank result > the Contract Detection Limit but the sample result < the Contract Detection Limit?			✓
5. Is the LCS recovery within contract acceptance criteria?	✓		
6. Is the LCS Minimum Detectable Activity ≤ the Contract Detection Limit?	✓		
7. Do the MS/MSD results and yields meet acceptance criteria?			✓
8. Do the duplicate sample results and yields meet acceptance criteria?	✓		
C. Other 1. Are all Non-conformances included and noted?	✓		
2. Are all required forms filled out?	✓		
3. Was the correct methodology used?	✓		
4. Was transcription checked?	✓		
5. Were all calculations checked at a minimum frequency?	✓		
6. Were units checked?	✓		

Comments on any "No" response: _____

Second Level Review: [signature] Date: 2/23/11

LS-038B, Rev. 10, 9/07

Clouseau
Nonconformance Memo

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

NCM #: **10-17797**
NCM Initiated By: Steven Wheland
Date Opened: 03/22/2011
Date Closed:

Classification: **Anomaly**
Status: **PMREVIEW**
Production Area: Environmental - Prep
Tests: Gamma by GER
Lot #'s (Sample #'s): J1C170000 (374), J1C170587 (1,2,3,4,5,6),
QC Batches: 1076374,

Nonconformance: MDA not met
Subcategory: Data accepted

Problem Description / Root Cause

Name	Date	Description
Steven Wheland	03/22/2011	Elevated MDA's due to short counting times

Corrective Action

Name	Date	Corrective Action
Steven Wheland	03/22/2011	report data

Client Notification Summary

Client	Project Manager	Notified	Response	How Notified	Note	Response	Response Note

Quality Assurance Verification

Verified By	Due Date	Status	Notes
		This section not yet completed by QA.	

Approval History

Date Approved	Approved By	Position

Date Printed: 3/22/2011

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review/Verification Checklist
RADIOCHEMISTRY, First Level Review

3/25/2011 11:30:04 AM

Lot No., Due Date: J1C170587; 03/24/2011
Client, Site: 127642; S00N063A00 HANFORD
QC Batch No., Method Test: 1076385; RTRITIUM H-3 by LSC
SDG, Matrix: JP0124; SOIL

1.0 COC			
1.1 Is the ICOC page complete; includes all applicable analysis, dates, SOP numbers, and revisions?	Yes ✓	No	N/A
2.0 QC Batch			
2.1 Do the Summary/Detailed Reports include a calculated result for each sample listed on the QC Batch Sheet?	Yes ✓	No	N/A
2.2 Are the QC appropriate for the analysis included in the batch?	Yes ✓	No	N/A
2.3 Is the Analytical Batch Worksheet complete; includes as appropriate, volumes, count times, etc?	Yes ✓	No	N/A
2.4 Does the Worksheets include a Tracer Vial label for each sample?	Yes	No	N/A ✓
3.0 QC & Samples			
3.1 Is the blank results, yield, and MDA within contract limits?	Yes ✓	No	N/A
3.2 Is the LCS result, yield, and MDA within contract limits?	Yes ✓	No	N/A
3.3 Are the MS/MSD results, yields, and MDA within contract limits?	Yes	No	N/A ✓
3.4 Are the duplicate result, yields, and MDAs within contract limits?	Yes ✓	No	N/A
3.5 Are the sample yields and MDAs within contract limits?	Yes ✓	No	N/A
4.0 Raw Data			
4.1 Were results calculated in the correct units?	Yes ✓	No	N/A
4.2 Were analysis volumes entered correctly?	Yes ✓	No	N/A
4.3 Were Yields entered correctly?	Yes	No	N/A ✓
4.4 Were spectra reviewed/meet contractual requirements?	Yes	No	N/A ✓
4.5 Were raw counts reviewed for anomalies?	Yes ✓	No	N/A
5.0 Other			
5.1 Are all nonconformances included and noted?	Yes	No	N/A ✓
5.2 Are all required forms filled out?	Yes ✓	No	N/A
5.3 Was the correct methodology used?	Yes ✓	No	N/A
5.4 Was transcription checked?	Yes ✓	No	N/A
5.5 Were all calculations checked at a minimum frequency?	Yes ✓	No	N/A
5.6 Are worksheet entries complete and correct?	Yes ✓	No	N/A

6.0 Comments on any No response:

First Level Lisa Anderson Date 3/25/11

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist
RADIOCHEMISTRY
Second Level Review

Batch Number: 1076385

Review Item	Yes (√)	No (√)	NA (√)
A. Sample Analysis 1. Are the sample yields within acceptance criteria?			✓
2. Is the sample Minimum Detectable Activity < the Contract Detection Limit?	✓		
3. Are the correct isotopes reported?	✓		
B. QC Samples 1. Is the Minimum Detectable Activity for the blank result ≤ the Contract Detection Limit?	✓		
2. Does the blank result meet the Contract criteria?	✓		
3. Is the blank result < the Contract Detection Limit?	✓		
4. Is the blank result > the Contract Detection Limit but the sample result < the Contract Detection Limit?			✓
5. Is the LCS recovery within contract acceptance criteria?	✓		
6. Is the LCS Minimum Detectable Activity ≤ the Contract Detection Limit?	✓		
7. Do the MS/MSD results and yields meet acceptance criteria?			✓
8. Do the duplicate sample results and yields meet acceptance criteria?	✓		
C. Other 1. Are all Non-conformances included and noted?			✓
2. Are all required forms filled out?	✓		
3. Was the correct methodology used?	✓		
4. Was transcription checked?	✓		
5. Were all calculations checked at a minimum frequency?	✓		
6. Were units checked?	✓		

Comments on any "No" response: CRDL=400pCi/g

Second Level Review: Rhonda W. Fer Date: 5/25/11

LS-038B, Rev. 10, 9/07

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review/Verification Checklist
RADIOCHEMISTRY, First Level Review

3/23/2011 4:08:13 PM

Lot No., Due Date: J1C170587; 03/24/2011
Client, Site: 127642; S00N063A00 HANFORD
QC Batch No., Method Test: 1076382; RC14 C-14 by LSC
SDG, Matrix: JP0124; SOIL

1.0 COC

	Yes	No	N/A
1.1 Is the ICOC page complete; includes all applicable analysis, dates, SOP numbers, and revisions?	✓		

2.0 QC Batch

	Yes	No	N/A
2.1 Do the Summary/Detailed Reports include a calculated result for each sample listed on the QC Batch Sheet?	✓		
2.2 Are the QC appropriate for the analysis included in the batch?	✓		
2.3 Is the Analytical Batch Worksheet complete; includes as appropriate, volumes, count times, etc?	✓		
2.4 Does the Worksheets include a Tracer Vial label for each sample?	✓		

3.0 QC & Samples

	Yes	No	N/A
3.1 Is the blank results, yield, and MDA within contract limits?	✓		
3.2 Is the LCS result, yield, and MDA within contract limits?	✓		
3.3 Are the MS/MSD results, yields, and MDA within contract limits?			✓
3.4 Are the duplicate result, yields, and MDAs within contract limits?	✓		
3.5 Are the sample yields and MDAs within contract limits?	✓		

4.0 Raw Data

	Yes	No	N/A
4.1 Were results calculated in the correct units?	✓		
4.2 Were analysis volumes entered correctly?	✓		
4.3 Were Yields entered correctly?			✓
4.4 Were spectra reviewed/meet contractual requirements?			✓
4.5 Were raw counts reviewed for anomalies?	✓		

5.0 Other

	Yes	No	N/A
5.1 Are all nonconformances included and noted?			✓
5.2 Are all required forms filled out?	✓		
5.3 Was the correct methodology used?	✓		
5.4 Was transcription checked?	✓		
5.5 Were all calculations checked at a minimum frequency?	✓		
5.6 Are worksheet entries complete and correct?	✓		

6.0 Comments on any No response:

First Level [signature] Date 3/23/11

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist
RADIOCHEMISTRY
Second Level Review

Batch Number: 1076382

Review Item	Yes (√)	No (√)	NA (√)
A. Sample Analysis 1. Are the sample yields within acceptance criteria?			✓
2. Is the sample Minimum Detectable Activity < the Contract Detection Limit?	✓		
3. Are the correct isotopes reported?	✓		
B. QC Samples 1. Is the Minimum Detectable Activity for the blank result ≤ the Contract Detection Limit?	✓		
2. Does the blank result meet the Contract criteria?	✓		
3. Is the blank result < the Contract Detection Limit?	✓		
4. Is the blank result > the Contract Detection Limit but the sample result < the Contract Detection Limit?			✓
5. Is the LCS recovery within contract acceptance criteria?	✓		
6. Is the LCS Minimum Detectable Activity ≤ the Contract Detection Limit?	✓		
7. Do the MS/MSD results and yields meet acceptance criteria?			✓
8. Do the duplicate sample results and yields meet acceptance criteria?	✓		
C. Other 1. Are all Non-conformances included and noted?			✓
2. Are all required forms filled out?	✓		
3. Was the correct methodology used?	✓		
4. Was transcription checked?	✓		
5. Were all calculations checked at a minimum frequency?	✓		
6. Were units checked?	✓		

Comments on any "No" response: CRDL = 50 pci/g

Second Level Review: Rhonda [illegible] Date: 3/24/11

LS-038B, Rev. 10, 9/07

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review/Verification Checklist
RADIOCHEMISTRY, First Level Review

3/28/2011 11:05:29 AM

Lot No., Due Date: J1C170587; 03/24/2011
Client, Site: 127642; S00N063A00 HANFORD
QC Batch No., Method Test: 1076384; RNI63 Ni-63 by LSC
SDG, Matrix: JP0124; SOIL

1.0 COC	
1.1 Is the ICOC page complete; includes all applicable analysis, dates, SOP numbers, and revisions?	Yes ✓ No N/A
2.0 QC Batch	
2.1 Do the Summary/Detailed Reports include a calculated result for each sample listed on the QC Batch Sheet?	Yes ✓ No N/A
2.2 Are the QC appropriate for the analysis included in the batch?	Yes ✓ No N/A
2.3 Is the Analytical Batch Worksheet complete; includes as appropriate, volumes, count times, etc?	Yes ✓ No N/A
2.4 Does the Worksheets include a Tracer Vial label for each sample?	Yes ✓ No N/A
3.0 QC & Samples	
3.1 Is the blank results, yield, and MDA within contract limits?	Yes ✓ No N/A
3.2 Is the LCS result, yield, and MDA within contract limits?	Yes ✓ No N/A
3.3 Are the MS/MSD results, yields, and MDA within contract limits?	Yes No ✓ N/A
3.4 Are the duplicate result, yields, and MDAs within contract limits?	Yes ✓ No N/A
3.5 Are the sample yields and MDAs within contract limits?	Yes ✓ No N/A
4.0 Raw Data	
4.1 Were results calculated in the correct units?	Yes ✓ No N/A
4.2 Were analysis volumes entered correctly?	Yes ✓ No N/A
4.3 Were Yields entered correctly?	Yes ✓ No N/A
4.4 Were spectra reviewed/meet contractual requirements?	Yes No ✓ N/A
4.5 Were raw counts reviewed for anomalies?	Yes ✓ No N/A
5.0 Other	
5.1 Are all nonconformances included and noted?	Yes No ✓ N/A
5.2 Are all required forms filled out?	Yes ✓ No N/A
5.3 Was the correct methodology used?	Yes ✓ No N/A
5.4 Was transcription checked?	Yes ✓ No N/A
5.5 Were all calculations checked at a minimum frequency?	Yes ✓ No N/A
5.6 Are worksheet entries complete and correct?	Yes ✓ No N/A
6.0 Comments on any No response:	

First Level [signature] Date 3/28/11

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist

RADIOCHEMISTRY

Second Level Review

Batch Number: 1076384

Review Item	Yes (√)	No (√)	NA (√)
A. Sample Analysis 1. Are the sample yields within acceptance criteria?	✓		
2. Is the sample Minimum Detectable Activity < the Contract Detection Limit?	✓		
3. Are the correct isotopes reported?	✓		
B. QC Samples 1. Is the Minimum Detectable Activity for the blank result ≤ the Contract Detection Limit?	✓		
2. Does the blank result meet the Contract criteria?	✓		
3. Is the blank result < the Contract Detection Limit?	✓		
4. Is the blank result > the Contract Detection Limit but the sample result < the Contract Detection Limit?			✓
5. Is the LCS recovery within contract acceptance criteria?	✓		
6. Is the LCS Minimum Detectable Activity ≤ the Contract Detection Limit?	✓		
7. Do the MS/MSD results and yields meet acceptance criteria?			✓
8. Do the duplicate sample results and yields meet acceptance criteria?	✓		
C. Other 1. Are all Non-conformances included and noted?			✓
2. Are all required forms filled out?	✓		
3. Was the correct methodology used?	✓		
4. Was transcription checked?	✓		
5. Were all calculations checked at a minimum frequency?	✓		
6. Were units checked?	✓		

Comments on any "No" response: CRDL = 30.0 pCi/g

Second Level Review: Rhonda [illegible] Date: 3/28/11

LS-038B, Rev. 10, 9/07

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Richland Laboratory
Data Review Check List
Hexavalent Chromium

Batch Number(s): **1076431**

Lab Sample Numbers or SDG: **JP0124**

Method/Test/Parameter: **Cr+6 in SOLID / RL-WC-004**

Review Item	Yes (✓)	No (✓)	N/A (✓)	2nd Level Review (✓)
A. Initial Calibration				
1. Performed at required frequency with required number of levels?	✓			✓
2. Correlation coefficient within QC limits?	✓			✓
3. Initial calibration verification (ICV) analyzed immediately after calibration and results within QC limits?	✓			✓
4. Initial calibration blank (ICB) analyzed immediately after ICV and concentrations of all parameters ≤ reporting limit?	✓			✓
B. Continuing Calibration				
1. CCV analyzed at required frequency and all parameters within QC limits?	✓			✓
2. CCB analyzed at required frequency and all results ≤ reporting limit?	✓			✓
C. Sample Analysis				
1. Were any samples with concentrations above the linear range for any parameter diluted and reanalyzed?			✓	N/A
2. Were all sample holding times met?	✓			✓
D. QC Samples				
1. All results for the preparation blank below limits?	✓			✓
2. MS or MS/MSD recoveries within QC limits and %RPD (for MSD) acceptable?	✓			✓
3. LCS percent recovery within QC limits and %RPD (for LCSD) acceptable?	✓			✓
4. Analytical spikes within QC limits where applicable?	✓			✓
5. ICP only: One serial dilution performed per SDG?			✓	N/A
6. ICP only: CRDL standard (CRI or CRA) analyzed at required frequency?			✓	N/A
7. ICP only: Interference check samples (ICSA, ICSAB) and HICAL analyzed at the required frequencies and within QC limits?			✓	N/A

Review Item	Yes (✓)	No (✓)	N/A (✓)	2nd Level Review (✓)
E. Other 1. Are all nonconformances included and noted?	✓ 3/28/11		✓	N/A
2. Is the correct date and time of analysis shown?	✓			✓
3. Did the analyst sign and date the front page of the analytical run?	✓			✓
4. Correct methodology used?	✓			✓
5. Transcriptions checked?	✓			✓
6. Calculations checked at minimum frequency?	✓			✓
7. Units checked?	✓			✓

Comments on any "No" response:

Analyst: H. R Date: 3-23-11

Second-Level Review: [signature] Date: 3/23/11

Washington Closure Hanford	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST	RC-075-215	Page 1 of 4

Collector: J Kuepfer	Company Contact: D Woolery	Telephone No.: 509-431-0448	Project Coordinator: KESSNER, JH
Price Code: ~~8L~~ 8B	Data Turnaround: ~~21~~ 7 Days		
Project Designation: 100-D/DR Burial Grounds & Remaining Sites - Soil Full Prot	Sampling Location: 116-D-5 Outfall Deep Zone Re-Verification		SAF No.: RC-075
Ice Chest No.: N/A	Field Logbook No.: EL-1607-09	COA: R116D52000	Method of Shipment: HAND DELIVER
Shipped To: TestAmerica Incorporated, Richland	Offsite Property No.: N/A		Bill of Lading/Air Bill No.: N/A

POSSIBLE SAMPLE HAZARDS/REMARKS

Potential Rad <DOT

SDG# JP0124
Lot# J1C170587
Due 3-24-11

Special Handling and/or Storage

Cool 4 Deg C

Preservation	Cool 4C	Cool 4C	Cool 4C	Cool 4C	Cool 4C	Cool 4C	None	None	None	None
Type of Container	G/P	G/P	G/P	aG	aG	aG	G/P	G/P	G/P	G/P
No. of Container(s)	1	1	1	1	1	1	1	0	0	0
Volume	125mL	125mL	125mL	125mL	125mL	125mL	500mL	500mL	500mL	500mL
SAMPLE ANALYSIS	See item (1) in Special Instructions.	Chromium Hex - 7196	IC Anions - 9056 Modified; NO2/NO3 - 353.2; pH (Soil) - 9045	Semi-VOA - 8270A (TCL)	PAHs - 8310	Pesticides - 8081	See item (2) in Special Instructions.	Carbon-14; Tritium - H3	Nickel-63; Strontium-89,90 – Total Sr	Isotopic Plutonium

Sample No.	Matrix *	Sample Date	Sample Time									
J1F1J3	SOIL	3/16/11	0930		X			MFTLF		X	X	X	X
J1F1J4	SOIL	3/16/11	0935		X			MFTLQ		X	X	X	X
J1F1J5	SOIL	3/16/11	0940		X			MFTLR		X	X	X	X
J1F1J6	SOIL	3/16/11	0945		X			MFTLT		X	X	X	X
J1F1J7	SOIL	3/16/11	0950		X			MFTLW		X	X	X	X

CHAIN OF POSSESSION — **Sign/Print Names**

Relinquished By/Removed From	Date/Time	Received By/Stored In	Date/Time
[signature]	3/16/11 1030	DWOOLERY [signature]	3/16/11 1030
DWOOLERY [signature]	3/16/11 1530	J.E. Bernhard	1530 3-16-11
J.E. Bernhard WCH	1140 3-17-11	TBR ANGEL	1140 3-17-11

SPECIAL INSTRUCTIONS

None

(1) ICP Metals - 6010TR (Close-out List) {Aluminum, Antimony, Arsenic, Barium, Beryllium, Boron, Cadmium, Calcium, Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Molybdenum, Nickel, Potassium, Selenium, Silicon, Silver, Sodium, Vanadium, Zinc}; Mercury - 7471 - (CV) {Mercury}

(2) Gamma Spec (Client List) {Americium-241, Cesium-137, Cobalt-60, Europium-152, Europium-154, Europium-155}

REVIEWED BY JEB DATE 3-17-11

JP0124

Matrix *
S=Soil
SE=Sediment
SO=Solid
SI=Sludge
W = Water
O=Oil
A=Air
DS=Drum Solids
DL=Drum Liquids
T=Tissue
WI=Wipe
L=Liquid
V=Vegetation
X=Other

LABORATORY SECTION	Received By	Date/Time
FINAL SAMPLE DISPOSITION	Disposal Method	Disposed By / Date/Time

REVIEWED BY AJ DATE 3-17-11

WCH-EE-011

Washington Closure Hanford	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST	RC-075-215	Page 2 of 4
Collector: J Kuepfer	Company Contact: D Woolery; Telephone No.: 509-431-0448	Project Coordinator: KESSNER, JH	Price Code: 8L 8B; Data Turnaround: 21 Days
Project Designation: 100-D/DR Burial Grounds & Remaining Sites - Soil Full Prot	Sampling Location: 116-D-5 Outfall Deep Zone Re-Verification	SAF No.: RC-075	
Ice Chest No.: N/A	Field Logbook No.: EL-1607-09; COA: R116D52000	Method of Shipment: HAND DELIVER	
Shipped To: TestAmerica Incorporated, Richland	Offsite Property No.: N/A	Bill of Lading/Air Bill No.: N/A	

POSSIBLE SAMPLE HAZARDS/REMARKS

Potential Rad <DOT

Special Handling and/or Storage

~~Cool 4 Deg C~~
NONE
JEB 3-16-11

SDG#JP0124
Lot#J1CM0587
Due 3-24-11

Preservation	None											
Type of Container	G/P											
No. of Container(s)	0											
Volume	500mL											
SAMPLE ANALYSIS	Isotopic Uranium											

Sample No.	Matrix *	Sample Date	Sample Time	Isotopic Uranium									
J1F1J3	SOIL	3/16/11	0930	X									
J1F1J4	SOIL	3/16/11	0935	X									
J1F1J5	SOIL	3/16/11	0940	X									
J1F1J6	SOIL	3/16/11	0945	X									
J1F1J7	SOIL	3/16/11	0950	X									

CHAIN OF POSSESSION — Sign/Print Names

Relinquished By/Removed From	Date/Time	Received By/Stored In	Date/Time
J Kuepfer	3/16/11 1030	D Woolery	3/16/11 1030
D Woolery	3/16/11 1530	J. E. Bernhard	3-16-11 1530
J. E. Bernhard	3-17-11 1140	TALIR ANGEL	3-17-11 1140

SPECIAL INSTRUCTIONS
None

REVIEWED BY JEB DATE 3-17-11

REVIEWED BY AJ 3-17-11 DATE JP0124

Matrix *
S=Soil
SE=Sediment
SO=Solid
SI=Sludge
W = Water
O=Oil
A=Air
DS=Drum Solids
DL=Drum Liquids
T=Tissue
WI=Wipe
L=Liquid
V=Vegetation
X=Other

LABORATORY SECTION	Received By	Title	Date/Time
FINAL SAMPLE DISPOSITION	Disposal Method	Disposed By	Date/Time

WCH-EE-011

Washington Closure Hanford	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST	RC-075-215	Page 13 of 4

Collector: J Kuepfer	Company Contact: D Woolery	Telephone No.: 509-431-0448	Project Coordinator: KESSNER, JH
Price Code: ~~8L~~ 8B	Data Turnaround: ~~21~~ 7 Days		
Project Designation: 100-D/DR Burial Grounds & Remaining Sites - Soil Full Prot	Sampling Location: 116-D-5 Outfall Deep Zone Re-Verification		SAF No.: RC-075
Ice Chest No.: N/A	Field Logbook No.: EL-1607-09	COA: R116D52000	Method of Shipment: HAND DELIVER
Shipped To: TestAmerica Incorporated, Richland	Offsite Property No.: N/A		Bill of Lading/Air Bill No.: N/A

POSSIBLE SAMPLE HAZARDS/REMARKS

Potential Rad <DOT

SDG #JP0124
Lot #JIC170587
Due 3-24-11

Special Handling and/or Storage

Cool 4 Deg C

Preservation	Cool 4C	Cool 4C	Cool 4C	Cool 4C	Cool 4C	Cool 4C	None	None	None	None
Type of Container	G/P	G/P	G/P	aG	aG	aG	G/P	G/P	G/P	G/P
No. of Container(s)	1	1	1	1	1	1	1	0	0	0
Volume	125mL	125mL	125mL	125mL	125mL	125mL	500mL	500mL	500mL	500mL
SAMPLE ANALYSIS	See item (1) in Special Instructions.	Chromium Hex - 7196	IC Anions - 9056 Modified; NO2/NO3 - 353.2; pH (Soil) - 9045	Semi-VOA - 8270A (TCL)	PAHs - 8310	Pesticides - 8081	See item (2) in Special Instructions.	Carbon-14; Tritium - H3	Nickel-63; Strontium-89,90 -- Total Sr	Isotopic Plutonium

Sample No.	Matrix *	Sample Date	Sample Time									
J1F1J8	SOIL	3/15/11	0930		X			MFTLO		X	X	X	X

CHAIN OF POSSESSION — **Sign/Print Names**

Relinquished By/Removed From	Date/Time	Received By/Stored In	Date/Time
JKuepfer	3/15/11 1030	DWOOLERY	3/15/11 1030
DWOOLERY	3/15/11 1530	J. E. Berk	3-16-11 1530
J. E. Berk	3-17-11 1140	Angela Rice	3-17-11 1140

SPECIAL INSTRUCTIONS

None

(1) ICP Metals - 6010TR (Close-out List) {Aluminum, Antimony, Arsenic, Barium, Beryllium, Boron, Cadmium, Calcium, Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Molybdenum, Nickel, Potassium, Selenium, Silicon, Silver, Sodium, Vanadium, Zinc}; Mercury - 7471 - (CV) {Mercury}

(2) Gamma Spec (Client List) {Americium-241, Cesium-137, Cobalt-60, Europium-152, Europium-154, Europium-155}

REVIEWED BY AJ DATE 3-17-11

REVIEWED BY JEB DATE 3-17-11

JP0124

Matrix *
S=Soil
SE=Sediment
SO=Solid
Sl=Sludge
W = Water
O=Oil
A=Air
DS=Drum Solids
DL=Drum Liquids
T=Tissue
WI=Wipe
L=Liquid
V=Vegetation
X=Other

LABORATORY SECTION	Received By	Title	Date/Time
FINAL SAMPLE DISPOSITION	Disposal Method	Disposed By	Date/Time

WCH-EE-011

Washington Closure Hanford	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST	RC-075-215	Page 4 of 4
Collector: J Kuepfer	Company Contact: D Woolery; Telephone No.: 509-431-0448	Project Coordinator: KESSNER, JH	Price Code: ~~8L~~ 8B; Data Turnaround: ~~21~~ 7 Days
Project Designation: 100-D/DR Burial Grounds & Remaining Sites - Soil Full Prot	Sampling Location: 116-D-5 Outfall Deep Zone Re-Verification	SAF No.: RC-075	2/15/11 2/15/11
Ice Chest No.: N/A	Field Logbook No.: EL-1607-09; COA: R116D52000	Method of Shipment: HAND DELIVER	
Shipped To: TestAmerica Incorporated, Richland	Offsite Property No.: N/A	Bill of Lading/Air Bill No.: N/A	

POSSIBLE SAMPLE HAZARDS/REMARKS

Potential Rad <DOT

SDG#JP0124
Lot#J1C170587
Due 3.24.11

Special Handling and/or Storage

~~Cool 4 Deg C~~
NONE
JBB 3-16-11

Preservation	None											
Type of Container	G/P											
No. of Container(s)	0											
Volume	500mL											
SAMPLE ANALYSIS	Isotopic Uranium											
Sample No.	Matrix *	Sample Date	Sample Time									
J1F1J8	SOIL	3/15/11	0930	X								

CHAIN OF POSSESSION — Sign/Print Names

Relinquished By/Removed From	Date/Time	Received By/Stored In	Date/Time
Kuepfer	3/15/11 1630	DWOOLERY	3/15/11 1030
DWOOLERY	3/15/11 1530	J.E. Bernhard	3-16-11 1530
J.E. Bernhard	3-17-11 1140	AMBREI	3.17.11 1140

SPECIAL INSTRUCTIONS
None

REVIEWED BY AJ DATE 3-17-11

REVIEWED BY 3-17-11 DATE

JP0124

Matrix *
S=Soil
SE=Sediment
SO=Solid
Sl=Sludge
W = Water
O=Oil
A=Air
DS=Drum Solids
DL=Drum Liquids
T=Tissue
WI=Wipe
L=Liquid
V=Vegetation
X=Other

LABORATORY SECTION	Received By	Title	Date/Time
FINAL SAMPLE DISPOSITION	Disposal Method	Disposed By	Date/Time

WCH-EE-011

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Sample Check-in List

Date/Time Received: 3·17·11 1140 GM Screen Result (our) .3 (in) .5 Initials [CK]

Client: WCH SDG #: JP0124 NA [ ] SAF #: RC-075 NA [ ]

Work Order Number: JIC170587 Chain of Custody # RC-075-215

Shipping Container ID: hand delivery NA [ ] Air Bill # NA [CK]

Item 1 through 5 for shipping container only. Initial appropriate response.

1. Custody Seals on shipping container intact? Yes [CK] No [ ] No Custody Seal [ ]
2. Custody Seals dated and signed? Yes [CK] No [ ] No Custody Seal [ ]
3. Chain of Custody record present? Yes [CK] No [ ]
4. Cooler temperature: ON ICE NA [CK] 5. Vermiculite/packing materials is NA [ ] Wet [ ] Dry [ ]

Item 6 through 10 for samples. Initial appropriate response.

6. Number of samples in shipping container (Each sample may contain multiple bottles): 6 samples @ 1 X 8oz MCG + 1 X 500 MCP
7. Sample holding times exceeded? NA [ ] Yes [ ] No [CK]
8. Samples have:
   - ___ tape
   - CK custody seals
   - ___ hazard labels
   - CK appropriate sample labels

   (Soil)
9. Samples:
   - CK are in good condition
   - ___ are broken
   - ___ are leaking
   - ___ have air bubbles (Only for samples requiring no head space)
10. Sample pH appropriate for analysis requested Yes [ ] No [ ] N/A [CK] (Note discrepancies in #13)
    (If acidification necessary, then document sample ID, initial pH, amount of HNO_3 added and pH after addition)

    RPL ID # of preservative used : ___
11. Sample Location, Sample Collector Listed? * Yes [CK] No [ ]
    *For documentation only. No corrective action needed.
12. Were any anomalies identified in sample receipt? Yes [ ] No [CK]
13. Description of anomalies (include sample numbers): NA [CK] ___

See other side for additional comments

Sample Custodian: Camerm J Ryan Date: 3·17·11 1140

Client Informed on ___ by ___ Person contacted ___

[✓] No action necessary, process as is

Project Manager [signature] Date 3/17/11

3/20/2011 9:02:41 AM

127642, Washington Closure Hanford LLC
Bechtel Hanford, Inc.

AnalyDueDate: 03/24/2011 JP0124

Batch: 1076379 SOIL pCi/g
SEQ Batch, Test: None

Sample Preparation/Analysis

6A Pu Prp PRP003/PRP005, Sep ALP002(ALP015)
SO Plutonium-238,239/40 by Alpha Spec
5I CLIENT: HANFORD

PRIORITY

PM, Quote: RW2, 27038

Balance Id:1120373922
Pipet #:
Sep1 DT/Tm Tech:
Sep2 DT/Tm Tech:
Prep Tech: ,WoodT

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
1 MFTLF-1-AF J1C170587-1-SAMP 03/16/2011 09:30	AmtRec: 1X125MLG,1X250MLP	1.02g,in	PUTC12062 03/10/11,pd 01/01/10,r	50	#Containers: 2	Scr:	Alpha:	Beta:
2 MFTLF-1-AK-X J1C170587-1-DUP 03/16/2011 09:30	AmtRec: 1X125MLG,1X250MLP	1.05g,in	PUTC12063 03/10/11,pd 01/01/10,r		#Containers: 2	Scr:	Alpha:	Beta:
3 MFTLQ-1-AF J1C170587-2-SAMP 03/16/2011 09:35	AmtRec: 1X125MLG,1X250MLP	0.98g,in	PUTC12064 03/10/11,pd 01/01/10,r		#Containers: 2	Scr:	Alpha:	Beta:
4 MFTLR-1-AF J1C170587-3-SAMP 03/16/2011 09:40	AmtRec: 1X125MLG,1X250MLP	1.07g,in	PUTC12065 03/10/11,pd 01/01/10,r		#Containers: 2	Scr:	Alpha:	Beta:
5 MFTLT-1-AF J1C170587-4-SAMP 03/16/2011 09:45	AmtRec: 1X125MLG,1X250MLP	0.99g,in	PUTC12066 03/10/11,pd 01/01/10,r		#Containers: 2	Scr:	Alpha:	Beta:
6 MFTLW-1-AF J1C170587-5-SAMP 03/16/2011 09:50	AmtRec: 1X125MLG,1X250MLP	1.02g,in	PUTC12067 03/10/11,pd 01/01/10,r		#Containers: 2	Scr:	Alpha:	Beta:
7 MFTL0-1-AF J1C170587-6-SAMP 03/16/2011 09:30	AmtRec: 1X125MLG,1X250MLP	1.03g,in	PUTC12068 03/10/11,pd 01/01/10,r		#Containers: 2	Scr:	Alpha:	Beta:

3/20/2011 9:02:41 AM

Sample Preparation/Analysis

6A Pu Prp PRP003/PRP005, Sep ALP002(ALP015)
SO Plutonium-238,239/40 by Alpha Spec PRIORITY
5I CLIENT: HANFORD

Balance Id:1120373922
Pipet #: _____

AnalyDueDate: 03/24/2011

Sep1 DT/Tm Tech:

Batch: 1076379 pCi/g
SEQ Batch, Test: None

Sep2 DT/Tm Tech:

Prep Tech: ,WoodT

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
8 MFTPT-1-AA-B		1.03g,in	PUTC12069					
J1C170000-379-BLK			03/10/11,pd 01/01/10 r					
03/17/2011 16:05 pd		AmtRec:	#Containers: 1			Scr:	Alpha:	Beta:
9 MFTPT-1-AC-C		1.06g,in	PUSK0834					
J1C170000-379-LCS			03/10/11,pd 01/01/10 r					
03/17/2011 16:05 pd		AmtRec:	#Containers: 1			Scr:	Alpha:	Beta:

Comments: MFTLW-SAMP "Comments IVS Recount on another detector"

```
All Clients for Batch:
   127642, Washington Closure Hanford LLC          Bechtel Hanford, Inc.        ,  RW2, 27038

MFTLF1AF-SAMP Constituent List:
  PU-238      RDL:1          pCi/g    LCL:       UCL:       RPD:       PU-239     RDL:1      pCi/g    LCL:70     UCL:130    RPD:35
  Pu-242      RDL:           pCi/g    LCL:20     UCL:105    RPD:35
MFTPT1AA-BLK:
  PU-238      RDL:1          pCi/g    LCL:       UCL:       RPD:       PU-239     RDL:1      pCi/g    LCL:       UCL:       RPD:
  Pu-242      RDL:           pCi/g    LCL:20     UCL:105    RPD:35
MFTPT1AC-LCS:
  PU-239      RDL:1          pCi/g    LCL:70     UCL:130    RPD:35     Pu-242     RDL:       pCi/g    LCL:20     UCL:105    RPD:35

MFTLF1AF-SAMP Calc Info:
     Uncert Level (#s).: 2     Decay to SaDt: Y     Blk Subt.: N     Sci.Not.: Y     ODRs: B
MFTPT1AA-BLK:
     Uncert Level (#s).: 2     Decay to SaDt: Y     Blk Subt.: N     Sci.Not.: Y     ODRs: B
MFTPT1AC-LCS:
     Uncert Level (#s).: 2     Decay to SaDt: Y     Blk Subt.: N     Sci.Not.: Y     ODRs: B
```


TestAmerica Laboratories, Inc.

127

62

3/24/2011 10:44:50 AM

ICOC Fraction Transfer/Status Report

ByDate: 3/24/2010, 3/29/2011, Batch: '1076379', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus	Accepting			Comments
1076379						
AC		Rev1C	WoodT	3/20/2011 8:44:45		
SC			MaucieriS	IsBatched	3/17/2011 4:07:16 PM	ICOC_RADCALC v4.8.49
SC			WoodT	InPrep	3/20/2011 8:44:45 AM	RL-PRP-003 REVISION 1
SC			BouslaughP	Prep1C	3/21/2011 9:19:47 AM	RL-PRP-003 REVISION 1
SC			JorgensonD	Sep1C	3/21/2011 6:58:14 PM	RL-ALP-001 REVISION 2
SC			HoganS	Sep2C	3/23/2011 2:11:36 PM	RL-ALP-015 REVISION 1
SC			BlackCL	InCnt1	3/23/2011 2:50:03 PM	RL-CI-008 REVISION 1
SC			DawkinsO	InCnt1	3/23/2011 3:26:43 PM	RL-CI-008 REVISION 1
SC			DawkinsO	CalcC	3/24/2011 12:07:00 AM	RL-CI-008 REVISION 1
SC			antonsonl	Rev1C	3/24/2011 10:44:44 AM	RL-DR-001 Rev 2
AC			BouslaughP	3/21/2011 9:19:47		
AC			JorgensonD	3/21/2011 6:58:14 PM		
AC			HoganS	3/23/2011 2:11:36 PM		
AC			BlackCL	3/23/2011 2:50:03 PM		
AC			DawkinsO	3/23/2011 3:26:43 PM		
AC			DawkinsO	3/24/2011 12:07:00		
AC			antonsonl	3/24/2011 10:44:44		

AC: Accepting Entry; SC: Status Change

TestAmerica Richland

Richland Wa.

Grp Rec Cnt: 8

ICOCFractions v4.8.44

3/20/2011 9:20:00 AM

Sample Preparation/Analysis

127642, Washington Closure Hanford LLC
Bechtel Hanford, Inc.

7S Uiso Prp PRP003/PRP005, Sep ALP009(ALP015)
SR Uranium-234,235,238 by Alpha Spec
5i CLIENT: HANFORD

PRIORITY

Balance Id:1120373922
Pipet #:

AnalyDueDate: 03/24/2011 JP0124

Sep1 DT/Tm Tech:

Batch: 1076380 SOIL pCi/g PM, Quote: RW2, 27038
SEQ Batch, Test: None

Sep2 DT/Tm Tech:

Prep Tech: ,WoodT

TestAmerica Laboratories, Inc.

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
1 MFTLF-1-AC J1C170587-1-SAMP 03/16/2011 09:30		1.07g,in AmtRec: 1X125MLG,1X250MLP #Containers: 2	UITC26217 03/17/11,pd 06/15/01,r	50		Scr:	Alpha:	Beta:
2 MFTLQ-1-AC J1C170587-2-SAMP 03/16/2011 09:35		0.98g,in AmtRec: 1X125MLG,1X250MLP #Containers: 2	UITC26218 03/17/11,pd 06/15/01,r			Scr:	Alpha:	Beta:
3 MFTLQ-1-AK-X J1C170587-2-DUP 03/16/2011 09:35		1.01g,in AmtRec: 1X125MLG,1X250MLP #Containers: 2	UITC26219 03/17/11,pd 06/15/01,r			Scr:	Alpha:	Beta:
4 MFTLR-1-AC J1C170587-3-SAMP 03/16/2011 09:40		1.07g,in AmtRec: 1X125MLG,1X250MLP #Containers: 2	UITC26220 03/17/11,pd 06/15/01,r			Scr:	Alpha:	Beta:
5 MFTLT-1-AC J1C170587-4-SAMP 03/16/2011 09:45		1.03g,in AmtRec: 1X125MLG,1X250MLP #Containers: 2	UITC26221 03/17/11,pd 06/15/01,r			Scr:	Alpha:	Beta:
6 MFTLW-1-AC J1C170587-5-SAMP 03/16/2011 09:50		1.04g,in AmtRec: 1X125MLG,1X250MLP #Containers: 2	UITC26222 03/17/11,pd 06/15/01,r			Scr:	Alpha:	Beta:
7 MFTL0-1-AC J1C170587-6-SAMP 03/16/2011 09:30		1.07g,in AmtRec: 1X125MLG,1X250MLP #Containers: 2	UITC26223 03/17/11,pd 06/15/01,r			Scr:	Alpha:	Beta:

3/20/2011 9:20:00 AM

Sample Preparation/Analysis

7S Uiso Prp PRP003/PRP005, Sep ALP009(ALP015)
SR Uranium-234,235,238 by Alpha Spec
5I CLIENT: HANFORD

PRIORITY

Balance Id:1120373922

Pipet #: _____

AnalyDueDate: 03/24/2011

Sep1 DT/Tm Tech:

Batch: 1076380 pCi/g

SEQ Batch, Test: None

Sep2 DT/Tm Tech:

Prep Tech: ,WoodT

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
8 MFTPX-1-AA-B J1C170000-380-BLK 03/17/2011 16:05 pd		0.99g,in AmtRec:	UITC26224 03/17/11,pd 06/15/01,r #Containers: 1	50		Scr:	Alpha:	Beta:
9 MFTPX-1-AC-C J1C170000-380-LCS 03/17/2011 16:05 pd		1.05g,in AmtRec:	UISH1287 03/03/11,pd 06/15/01,r #Containers: 1			Scr:	Alpha:	Beta:

Comments: MFTLW-SAMP "Comments IVS Recount on another detector"

All Clients for Batch:
127642, Washington Closure Hanford LLC Bechtel Hanford, Inc. , RW2, 27038

MFTLF1AC-SAMP Constituent List:

U-232	RDL:	pCi/g	LCL:20	UCL:105	RPD:35	U-234	RDL:1	pCi/g	LCL:	UCL:	RPD:
U-235	RDL:1	pCi/g	LCL:	UCL:	RPD:	U-238	RDL:1	pCi/g	LCL:	UCL:	RPD:

MFTPX1AA-BLK:

U-232	RDL:	pCi/g	LCL:20	UCL:105	RPD:35	U-234	RDL:1	pCi/g	LCL:	UCL:	RPD:
U-235	RDL:1	pCi/g	LCL:	UCL:	RPD:	U-238	RDL:1	pCi/g	LCL:	UCL:	RPD:

MFTPX1AC-LCS:

U-232	RDL:	pCi/g	LCL:20	UCL:105	RPD:35	Uranium	RDL:	pCi/g	LCL:70	UCL:130	RPD:35

MFTLF1AC-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
MFTPX1AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
MFTPX1AC-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

TestAmerica Laboratories, Inc.

3/20/2011 9:20:01 AM

Sample Preparation/Analysis

7S Ulso Prp PRP003/PRP005, Sep ALP009(ALP015)
SR Uranium-234,235,238 by Alpha Spec
5I CLIENT: HANFORD

PRIORITY

Balance Id:1120373922

Pipet #: _____

AnalyDueDate: 03/24/2011

Sep1 DT/Tm Tech:

Batch: 1076380 pCi/g

SEQ Batch, Test: None

Sep2 DT/Tm Tech:

Prep Tech: ,WoodT

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:

TestAmerica Laboratories, Inc.

3/25/2011 5:04:20 PM

ICOC Fraction Transfer/Status Report

ByDate: 3/25/2010, 3/30/2011, Batch: '1076380', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus	Accepting			Comments
1076380						
AC		**Rev1C**	**WoodT**	3/20/2011 9:10:28		
SC			MaucieriS	IsBatched	3/17/2011 4:07:21 PM	ICOC_RADCALC v4.8.49
SC			WoodT	InPrep	3/20/2011 9:10:28 AM	RL-PRP-003 REVISION 1
SC			BouslaughP	Prep1C	3/21/2011 8:11:51 AM	RL-PRP-003 REVISION 1
SC			HoganH	Sep1C	3/21/2011 11:56:59 AM	ALP-004 REVISION 1
SC			BockT	Sep2C	3/24/2011 10:57:22 AM	RL-ALP-015 REVISION 1
SC			BlackCL	InCnt1	3/24/2011 11:11:46 AM	RL-CI-008 REVISION 1
SC			DawkinsO	CalcC	3/25/2011 1:30:24 AM	RL-CI-008 REVISION 1
SC			antonsonl	Rev1C	3/25/2011 5:03:49 PM	RL-DR-001 Rev 2
AC			**BouslaughP**	3/21/2011 8:11:51		
AC			**HoganH**	3/21/2011 11:56:59		
AC			**BockT**	3/24/2011 10:57:22		RL-ALP-015
AC			**BlackCL**	3/24/2011 11:11:46		
AC			**DawkinsO**	3/25/2011 1:30:24		
AC			**antonsonl**	3/25/2011 5:03:49 PM		

AC: Accepting Entry; SC: Status Change

TestAmerica Richland

Richland Wa.

Page 1

Grp Rec Cnt: 7

ICOCFractions v4.8.44

3/21/2011 3:21:44 AM

Sample Preparation/Analysis

127642, Washington Closure Hanford LLC ,
Bechtel Hanford, Inc.

CH Sr-Total Prp PRP003, Sep GPC003
TH Total Strontium by GPC
5I CLIENT: HANFORD

PRIORITY

Balance Id:1120373922
Pipet #:
Sep1 DT/Tm Tech: 12:45 3/25/11 APA
Sep2 DT/Tm Tech:
Prep Tech: WoodT

AnalyDueDate: 03/24/2011

Batch: 1076377 SOIL pCi/g PM, Quote: RW2, 27038

SEQ Batch, Test: None All Tests: 1076374 AXTA, 1076377 CHTH, 1076379 6ASO, 1076380 7SSR, 1076382 5SS3, 1076384 AFS4, 1076385 ATS6, 1076431 DWEA,

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Dish Size	Ppt or Geometry	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
1 MFTLF-1-AD J1C170587-1-SAMP 03/16/2011 09:30	5.99g,in	AmtRec: 1X125MLG,1X250MLP	SRTA20765 03/16/11	#Containers: 2	1.5 1.4591g -1.4030g 56.1mg	50	32A	1346	3/25/11 CKD	Scr: Alpha: Beta:
2 MFTLQ-1-AD J1C170587-2-SAMP 03/16/2011 09:35	6.01g,in	AmtRec: 1X125MLG,1X250MLP	SRTA20766 03/16/11	#Containers: 2	1.4516g -1.3990g 52.6mg		32B			Scr: Alpha: Beta:
3 MFTLR-1-AD J1C170587-3-SAMP 03/16/2011 09:40	5.97g,in	AmtRec: 1X125MLG,1X250MLP	SRTA20767 03/16/11	#Containers: 2	1.4322g -1.3763g 55.9mg		32C			Scr: Alpha: Beta:
4 MFTLT-1-AD J1C170587-4-SAMP 03/16/2011 09:45	6.01g,in	AmtRec: 1X125MLG,1X250MLP	SRTA20768 03/16/11	#Containers: 2	1.4852g -1.4345g 50.7mg		32D			Scr: Alpha: Beta:
5 MFTLW-1-AD J1C170587-5-SAMP 03/16/2011 09:50	6.04g,in	AmtRec: 1X125MLG,1X250MLP	SRTA20769 03/16/11	#Containers: 2	1.4674g -1.4157g 51.7mg		26A			Scr: Alpha: Beta:
6 MFTL0-1-AD J1C170587-6-SAMP 03/16/2011 09:30	6.02g,in	AmtRec: 1X125MLG,1X250MLP	SRTA20770 03/16/11	#Containers: 2	1.4560g -1.4018g 54.2mg		26B			Scr: Alpha: Beta:
7 MFTL0-1-AK-X J1C170587-6-DUP 03/16/2011 09:30	6.01g,in	AmtRec: 1X125MLG,1X250MLP	SRTA20771 03/16/11	#Containers: 2	1.4667g -1.4105g 56.2mg		26C	n	h	Scr: Alpha: Beta:

TestAmerica Richland Wa.

Key: In - Initial Amt, fi - Final Amt, di - Diluted Amt, s1 - Sep1, s2 - Sep2 Page 1
pd - Prep Dt, dc - Date Chg, r - Reference Dt, ec-Enrichment Cell, ct-Cocktailed Added

ISV - Insufficient Volume for Analysis

WO Cnt: 7
Prep_SamplePrep v4.8.49

TestAmerica Laboratories, Inc.

3/21/2011 3:21:46 AM

Sample Preparation/Analysis

CH Sr-Total Prp PRP003, Sep GPC003
TH Total Strontium by GPC
5I CLIENT: HANFORD

PRIORITY

Balance Id:1120373922

Pipet #:

AnalyDueDate: 03/24/2011

Sep1 DT/Tm Tech:

Batch: 1076377 pCi/g
SEQ Batch, Test: None

Sep2 DT/Tm Tech:

Prep Tech: ,WoodT

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Dish Size	Ppt or Geometry	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
8 MFTPM-1-AA-B J1C170000-377-BLK 03/17/2011 16:05 pd		6.03g,in AmtRec:	SRTA20772 03/16/11 #Containers: 1	1.5	1.49488g -1.40909 85.8 mg	50	26D Scr:	1946 Alpha:	3/25/11 OD Beta:	
9 MFTPM-1-AC-C J1C170000-377-LCS 03/17/2011 16:05 pd		6.04g,in AmtRec:	STSB1576 03/10/11 #Containers: 1		1.48088g -1.38929 91.6 mg		27A Scr:	↓ Alpha:	↓ Beta:	

Comments: MFTLW-SAMP "Comments IVS Recount on another detector"

All Clients for Batch:
127642, Washington Closure Hanford LLC Bechtel Hanford, Inc. , RW2, 27038

MFTLF1AD-SAMP Constituent List:
Sr-90 RDL:1 pCi/g LCL:70 UCL:130 RPD:35
MFTPM1AA-BLK:
Sr-90 RDL:1 pCi/g LCL: UCL: RPD:
MFTPM1AC-LCS:
Sr-90 RDL:1 pCi/g LCL:70 UCL:130 RPD:35

MFTLF1AD-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
MFTPM1AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
MFTPM1AC-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

3/28/2011 10:49:14 AM

ICOC Fraction Transfer/Status Report

ByDate: 3/28/2010, 4/2/2011, Batch: '1076377', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus	Accepting			Comments
1076377						
AC		Rev1C	**WoodT**	3/20/2011 7:40:43		
SC			MaucieriS	IsBatched	3/17/2011 4:07:11 PM	ICOC_RADCALC v4.8.49
SC			WoodT	InPrep	3/20/2011 7:40:43 AM	RL-PRP-003 REVISION 1
SC			BouslaughP	Prep1C	3/21/2011 9:34:55 AM	RL-PRP-003 REVISION 1
SC			AshworthA	Sep2C	3/25/2011 2:59:14 PM	RL-GPC-003 REVISION 1
SC			ClarkR	InCnt1	3/25/2011 3:05:48 PM	RL-CI-006 REVISION 1
SC			BlackCL	CalcC	3/28/2011 9:00:33 AM	RL-CI-006 REVISION 1
SC			antonsonl	Rev1C	3/28/2011 10:48:53 AM	RL-DR-001 Rev 2
AC			**BouslaughP**	3/21/2011 9:34:55		
AC			**AshworthA**	3/25/2011 2:59:14 PM		
AC			**ClarkR**	3/25/2011 3:05:48 PM		
AC			**BlackCL**	3/28/2011 9:00:33		
AC			**antonsonl**	3/28/2011 10:48:53		

AC: Accepting Entry; SC: Status Change

TestAmerica Richland

Richland Wa.

Page 1

Grp Rec Cnt: 6

ICOCFractions v4.8.44

WCH SOIL

3/18/2011 6:03:43 PM

Sample Preparation/Analysis

127642, Washington Closure Hanford LLC ,
Bechtel Hanford, Inc.

AX Gamma Prp PRP003/GAM001
TA Gamma by HPGE
5I CLIENT: HANFORD

Balance Id:1120421763
Pipet #: _____

AnalyDueDate: 03/24/2011

Sep1 DT/Tm Tech:

Batch: 1076374 SOIL pCi/g PM, Quote: RW2, 27038
SEQ Batch, Test: None

Sep2 DT/Tm Tech:

Prep Tech: ,SannohS

TestAmerica Laboratories, Inc.

Work Order, Lot, Sample Date	Total Amt /Unit	Total Acidified/Unit	Initial Aliquot Amt/Unit	Adj Aliq Amt (Un-Acidified)	QC Tracer Prep Date	Ppt or Geometry	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
1 MFTLF-1-AH J1C170587-1-SAMP 03/16/2011 09:30			66.60g,in AmtRec: 1X125MLG,1X250MLP	66.60g #Containers: 2		S25	200min	G11	1044	3/19/11 S	
								Scr:	Alpha:		Beta:
2 MFTLQ-1-AH J1C170587-2-SAMP 03/16/2011 09:35			70.10g,in AmtRec: 1X125MLG,1X250MLP	70.10g #Containers: 2				G11	1409		
								Scr:	Alpha:		Beta:
3 MFTLR-1-AH J1C170587-3-SAMP 03/16/2011 09:40			73.80g,in AmtRec: 1X125MLG,1X250MLP	73.80g #Containers: 2				G7	1409		
								Scr:	Alpha:		Beta:
4 MFTLT-1-AH J1C170587-4-SAMP 03/16/2011 09:45			357.70g,in AmtRec: 1X125MLG,1X250MLP	357.70g #Containers: 2		S200		G10	1409	✓	
								Scr:	Alpha:		Beta:
5 MFTLW-1-AH J1C170587-5-SAMP 03/16/2011 09:50			353.90g,in AmtRec: 1X125MLG,1X250MLP	353.90g #Containers: 2				G11	1742	3/19/11 0102	
								Scr:	Alpha:		Beta:
6 MFTLW-1-AK-X J1C170587-5-DUP 03/16/2011 09:50			AmtRec: 1X125MLG,1X250MLP	#Containers: 2				G10	2110		
								Scr:	Alpha:		Beta:
7 MFTL0-1-AH J1C170587-6-SAMP 03/16/2011 09:30			363.50g,in AmtRec: 1X125MLG,1X250MLP	363.50g #Containers: 2				G10	1743		
								Scr:	Alpha:		Beta:

3/18/2011 6:03:44 PM

Sample Preparation/Analysis

AX Gamma Prp PRP003/GAM001
TA Gamma by HPGE
5I CLIENT: HANFORD

Balance Id:
Pipet #:
Sep1 DT/Tm Tech:
Sep2 DT/Tm Tech:
Prep Tech: ,JorgensonD

AnalyDueDate: 03/24/2011

Batch: 1076374 pCi/g
SEQ Batch, Test: None

Work Order, Lot, Sample Date	Total Amt /Unit	Total Acidified/Unit	Initial Aliquot Amt/Unit	Adj Aliq Amt (Un-Acidified)	QC Tracer Prep Date	Ppt or Geometry	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
8 MFTPK-1-AA-B J1C170000-374-BLK 03/17/2011 16:05 pd			348.00g,in AmtRec:	348.00g #Containers: 1		S200	200 min	G7 Scr:	1743 Alpha:	3/19/11 OKD Beta:	
9 MFTPK-1-AC-C J1C170000-374-LCS 03/17/2011 16:05 pd			350.10g,in AmtRec:	350.10g #Containers: 1	qc20009 08/04/09,pd 09/01/09,r			G7 Scr:	2111 Alpha:	8 Beta:	

Comments: MFTLW-SAMP "Comments IVS Recount on another detector"

All Clients for Batch:
127642, Washington Closure Hanford LLC Bechtel Hanford, Inc. , RW2, 27038

MFTLF1AH-SAMP Constituent List:

Co-60	RDL:5.00E-02	pCi/g	LCL:	UCL:	RPD:	Cs-137	RDL:1.00E-01	pCi/g	LCL:70	UCL:130	RPD:35
Cs-137DA	RDL:1.00E-01	pCi/g	LCL:70	UCL:130	RPD:35	Eu-152	RDL:1.00E-01	pCi/g	LCL:	UCL:	RPD:
Eu-154	RDL:1.00E-01	pCi/g	LCL:	UCL:	RPD:	Eu-155	RDL:1.00E-01	pCi/g	LCL:	UCL:	RPD:

MFTPK1AA-BLK:

Co-60	RDL:5.00E-02	pCi/g	LCL:	UCL:	RPD:	Cs-137	RDL:1.00E-01	pCi/g	LCL:	UCL:	RPD:
Cs-137DA	RDL:1.00E-01	pCi/g	LCL:	UCL:	RPD:	Eu-152	RDL:1.00E-01	pCi/g	LCL:	UCL:	RPD:
Eu-154	RDL:1.00E-01	pCi/g	LCL:	UCL:	RPD:	Eu-155	RDL:1.00E-01	pCi/g	LCL:	UCL:	RPD:

MFTPK1AC-LCS:

Cs-137	RDL:0.1	pCi/g	LCL:70	UCL:130	RPD:35	Cs-137DA	RDL:0.1	pCi/g	LCL:70	UCL:130	RPD:35
K-40	RDL:--	pCi/g	LCL:70	UCL:130	RPD:35	Ra-226	RDL:0.1	pCi/g	LCL:70	UCL:130	RPD:35
RA-228	RDL:0.2	pCi/g	LCL:70	UCL:130	RPD:35	RA-228DA	RDL:0.2	pCi/g	LCL:70	UCL:130	RPD:35
U-238	RDL:	pCi/g	LCL:70	UCL:130	RPD:35						

MFTLF1AH-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

MFTPK1AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

TestAmerica Laboratories, Inc.

3/18/2011 6:03:44 PM

Sample Preparation/Analysis

AX Gamma Prp PRP003/GAM001
TA Gamma by HPGE
5I CLIENT: HANFORD

Balance Id:

Pipet #:

AnalyDueDate: 03/24/2011

Sep1 DT/Tm Tech:

Batch: 1076374 pCi/g
SEQ Batch, Test: None

Sep2 DT/Tm Tech:

Prep Tech: ,JorgensonD

Work Order, Lot, Sample Date	Total Amt /Unit	Total Acidified/Unit	Initial Aliquot Amt/Unit	Adj Aliq Amt (Un-Acidified)	QC Tracer Prep Date	Ppt or Geometry	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:

MFTPK1AC-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

TestAmerica Laboratories, Inc.

73

3/22/2011 2:35:49 PM

ICOC Fraction Transfer/Status Report

ByDate: 3/22/2010, 3/27/2011, Batch: '1076374', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus		Accepting		Comments
1076374						
AC		**Rev1C**	**SannohS**	3/18/2011 12:13:19		
SC			MaucleriS	IsBatched	3/17/2011 4:07:05 PM	ICOC_RADCALC v4.8.49
SC			SannohS	InPrep	3/18/2011 12:13:19 PM	RL-GAM-001 REVISION 1
SC			DawkinsO	InCnt1	3/18/2011 6:37:22 PM	RL-CI-007 REVISION 1
SC			DawkinsO	CalcC	3/19/2011 9:26:17 PM	RL-CI-007 REVISION 1
SC			WhelandS	Rev1C	3/22/2011 2:35:31 PM	RL-DR-001 Rev 2
AC			**DawkinsO**	3/18/2011 6:37:22 PM		
AC			**DawkinsO**	3/19/2011 9:26:17 PM		
AC			**WhelandS**	3/22/2011 2:35:31 PM		

AC: Accepting Entry; SC: Status Change

22

3/17/2011 4:05:37 PM

Sample Preparation/Analysis

27642, Washington Closure Hanford LLC
Bechtel Hanford, Inc.

AT H-3 Prp/Sep LSC002
S6 Tritium by Liquid Scint
5I CLIENT: HANFORD

Balance Id:
Pipet #:

AnalyDueDate: 03/24/2011

Sep1 DT/Tm Tech:

Batch: 1076385 SOIL pCi/g PM, Quote: RW2, 27038

SEQ Batch, Test: None

Sep2 DT/Tm Tech:

Prep Tech:

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
1 MFTLF-1-AG J1C170587-1-SAMP 03/16/2011 09:30	AmtRec: 1X125MLG,1X250MLP	#Containers: 2				Scr:	Alpha:	Beta:
2 MFTLQ-1-AG J1C170587-2-SAMP 03/16/2011 09:35	AmtRec: 1X125MLG,1X250MLP	#Containers: 2				Scr:	Alpha:	Beta:
3 MFTLR-1-AG J1C170587-3-SAMP 03/16/2011 09:40	AmtRec: 1X125MLG,1X250MLP	#Containers: 2				Scr:	Alpha:	Beta:
4 MFTLR-1-AL-X J1C170587-3-DUP 03/16/2011 09:40	AmtRec: 1X125MLG,1X250MLP	#Containers: 2				Scr:	Alpha:	Beta:
5 MFTLT-1-AG J1C170587-4-SAMP 03/16/2011 09:45	AmtRec: 1X125MLG,1X250MLP	#Containers: 2				Scr:	Alpha:	Beta:
6 MFTLW-1-AG J1C170587-5-SAMP 03/16/2011 09:50	AmtRec: 1X125MLG,1X250MLP	#Containers: 2				Scr:	Alpha:	Beta:
7 MFTL0-1-AG J1C170587-6-SAMP 03/16/2011 09:30	AmtRec: 1X125MLG,1X250MLP	#Containers: 2				Scr:	Alpha:	Beta:

Testamerica Laboratories, Inc.

3/17/2011 4:05:38 PM

TestAmerica Laboratories, Inc.

Sample Preparation/Analysis

AT H-3 Prp/Sep LSC002
S6 Tritium by Liquid Scint
5I CLIENT: HANFORD

Balance Id:

Pipet #:

AnalyDueDate: 03/24/2011

Sep1 DT/Tm Tech:

Batch: 1076385 pCi/g

SEQ Batch, Test: None

Sep2 DT/Tm Tech:

Prep Tech:

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
8 MFTP5-1-AA-B J1C170000-385-BLK 03/17/2011 16:05 pd	AmtRec:	#Containers: 1				Scr:	Alpha:	Beta:
9 MFTP5-1-AC-C J1C170000-385-LCS 03/17/2011 16:05 pd	AmtRec:	#Containers: 1				Scr:	Alpha:	Beta:
10 MFTP5-1-AD-BN J1C170000-385-IBLK 03/17/2011 16:05 pd	AmtRec:	#Containers: 1				Scr:	Alpha:	Beta:

Comments:

All Clients for Batch:
127642, Washington Closure Hanford LLC Bechtel Hanford, Inc. , RW2, 27038

MFTLF1AG-SAMP Constituent List:

MFTP51AA-BLK:

MFTP51AC-LCS:

MFTP51AD-IBLK:

MFTLF1AG-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
MFTP51AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
MFTP51AC-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

Sample Preparation/Analysis

AT H-3 Prp/Sep LSC002
S6 Tritium by Liquid Scint
5I CLIENT: HANFORD

Balance Id:
Pipet #:
Sep1 DT/Tm Tech:
Sep2 DT/Tm Tech:
Prep Tech:

AnalyDueDate: 03/24/2011

Batch: 1076385 pCi/g
EQ Batch, Test: None

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:

```
ETP51AD-IBLK:
    Uncert Level (#s).: 2     Decay to SaDt: Y     Blk Subt.: N     Sci.Not.: Y     ODRs: B
```

3/25/2011 11:29:29 AM

ICOC Fraction Transfer/Status Report

ByDate: 3/25/2010, 3/30/2011, Batch: '1076385', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus	Accepting			Comments
1076385						
AC		**Rev1C**	**BlackCL**	3/22/2011 12:14:31		
SC			MaucieriS	IsBatched	3/17/2011 4:07:34 PM	ICOC_RADCALC v4.8.49
SC			BlackCL	InCnt1	3/22/2011 12:14:31 PM	RL-CI-005 REVISION 1
SC			BlackCL	CalcC	3/24/2011 9:57:05 AM	RL-CI-005 REVISION 1
SC			antonsonl	Rev1C	3/25/2011 11:29:21 AM	RL-DR-001 Rev 2
AC			**BlackCL**	3/24/2011 9:57:05		
AC			**antonsonl**	3/25/2011 11:29:21		

AC: Accepting Entry; SC: Status Change

TestAmerica Richland

Richland Wa.

Page 1

Grp Rec Cnt: 3

ICOCFractions v4.8.44

12

3/17/2011 4:05:31 PM

Sample Preparation/Analysis

127642, Washington Closure Hanford LLC
Bechtel Hanford, Inc.

5S C-14 Prp/Sep LSC008
S3 Carbon-14 by Liquid Scint
5I CLIENT: HANFORD

AnalyDueDate: 03/24/2011

Batch: 1076382 SOIL pCi/g PM, Quote: RW2, 27038
SEQ Batch, Test: None

Balance Id:
Pipet #:
Sep1 DT/Tm Tech:
Sep2 DT/Tm Tech:
Prep Tech:

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
1 MFTLF-1-AJ J1C170587-1-SAMP 03/16/2011 09:30	5.042g	AmtRec: 1X125MLG,1X250MLP #Containers: 2				Scr:	Alpha:	Beta:
2 MFTLQ-1-AJ J1C170587-2-SAMP 03/16/2011 09:35	5.022g	AmtRec: 1X125MLG,1X250MLP #Containers: 2				Scr:	Alpha:	Beta:
3 MFTLR-1-AJ J1C170587-3-SAMP 03/16/2011 09:40	5.040g	AmtRec: 1X125MLG,1X250MLP #Containers: 2				Scr:	Alpha:	Beta:
4 MFTLR-1-AK-X J1C170587-3-DUP 03/16/2011 09:40	5.015g	AmtRec: 1X125MLG,1X250MLP #Containers: 2				Scr:	Alpha:	Beta:
5 MFTLT-1-AJ J1C170587-4-SAMP 03/16/2011 09:45	5.042g	AmtRec: 1X125MLG,1X250MLP #Containers: 2				Scr:	Alpha:	Beta:
6 MFTLW-1-AJ J1C170587-5-SAMP 03/16/2011 09:50	5.042g	AmtRec: 1X125MLG,1X250MLP #Containers: 2				Scr:	Alpha:	Beta:
7 MFTL0-1-AJ J1C170587-6-SAMP 03/16/2011 09:30	5.043g	AmtRec: 1X125MLG,1X250MLP #Containers: 2				Scr:	Alpha:	Beta:

TestAmerica Laboratories, Inc.

3/17/2011 4:05:32 PM

TestAmerica Laboratories, Inc.

Sample Preparation/Analysis

5S C-14 Prp/Sep LSC008
S3 Carbon-14 by Liquid Scint
5I CLIENT: HANFORD

Balance Id:
Pipet #:
Sep1 DT/Tm Tech:
Sep2 DT/Tm Tech:
Prep Tech:

AnalyDueDate: 03/24/2011

Batch: 1076382 pCi/g
SEQ Batch, Test: None

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
8 MFTP1-1-AA-B J1C170000-382-BLK 03/17/2011 16:05 pd		AmtRec:	#Containers: 1			Scr:	Alpha:	Beta:
9 MFTP1-1-AC-C J1C170000-382-LCS 03/17/2011 16:05 pd		AmtRec:	#Containers: 1			Scr:	Alpha:	Beta:
10 MFTP1-1-AD-BN J1C170000-382-IBLK 03/17/2011 16:05 pd		AmtRec:	#Containers: 1			Scr:	Alpha:	Beta:

Comments:

All Clients for Batch:
127642, Washington Closure Hanford LLC Bechtel Hanford, Inc. , RW2, 27038

MFTLF1AJ-SAMP Constituent List:

MFTP11AA-BLK:

MFTP11AC-LCS:

MFTP11AD-IBLK:

MFTLF1AJ-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
MFTP11AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
MFTP11AC-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

Sample Preparation/Analysis

5S C-14 Prp/Sep LSC008
S3 Carbon-14 by Liquid Scint
5I CLIENT: HANFORD

Balance Id:
Pipet #:
Sep1 DT/Tm Tech:
Sep2 DT/Tm Tech:
Prep Tech:

AnalyDueDate: 03/24/2011

Batch: 1076382 pCi/g
SEQ Batch, Test: None

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:

FTP11AD-IBLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

3/23/2011 4:27:59 PM

ICOC Fraction Transfer/Status Report

ByDate: 3/23/2010, 3/28/2011, Batch: '1076382', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus	Accepting			Comments
1076382						
AC		**Rev1C**	**BlackCL**	3/22/2011 12:15:03		
SC			MauclerlS	IsBatched	3/17/2011 4:07:25 PM	ICOC_RADCALC v4.8.49
SC			BlackCL	InCnt1	3/22/2011 12:15:03 PM	RL-CI-005 REVISION 1
SC			BlackCL	CalcC	3/23/2011 8:47:52 AM	RL-CI-005 REVISION 1
SC			WhelandS	Rev1C	3/23/2011 4:07:36 PM	RL-DR-001 Rev 2
AC			**BlackCL**	3/23/2011 8:47:52		
AC			**WhelandS**	3/23/2011 4:07:36 PM		

AC: Accepting Entry; SC: Status Change

TestAmerica Richland

Richland Wa.

Page 1

Grp Rec Cnt: 3

ICOCFractions v4.8.44

3/20/2011 8:35:24 AM

Sample Preparation/Analysis

127642, Washington Closure Hanford LLC
Bechtel Hanford, Inc.

AF Ni-63 Prp PRP003/PRP005, Sep LSC017
S4 Nickel by ICP and Nickel-63 by Liquid Scint
5I CLIENT: HANFORD

Balance Id:1120373922
Pipet #:

PRIORITY

AnalyDueDate: 03/24/2011 VP0124

Sep1 DT/Tm Tech:

Batch: 1076384 SOIL pCi/g
SEQ Batch, Test: None

PM, Quote: RW2, 27038

Sep2 DT/Tm Tech:

Prep Tech: ,WoodT

Work Order, Lot, Sample Date	Total Amt /Unit	Total Acidified/Unit	Initial Aliquot Amt/Unit	Adj Aliq Amt (Un-Acidified)	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
1 MFTLF-1-AE J1C170587-1-SAMP 03/16/2011 09:30			0.26g,in	0.26g	NITA3943 03/16/11	20				
			AmtRec: 1X125MLG,1X250MLP	#Containers: 2				Scr:	Alpha:	Beta:
2 MFTLQ-1-AE J1C170587-2-SAMP 03/16/2011 09:35			0.28g,in	0.28g	NITA3944 03/16/11					
			AmtRec: 1X125MLG,1X250MLP	#Containers: 2				Scr:	Alpha:	Beta:
3 MFTLR-1-AE J1C170587-3-SAMP 03/16/2011 09:40			0.26g,in	0.26g	NITA3945 03/16/11					
			AmtRec: 1X125MLG,1X250MLP	#Containers: 2				Scr:	Alpha:	Beta:
4 MFTLT-1-AE J1C170587-4-SAMP 03/16/2011 09:45			0.24g,in	0.24g	NITA3946 03/16/11					
			AmtRec: 1X125MLG,1X250MLP	#Containers: 2				Scr:	Alpha:	Beta:
5 MFTLT-1-AK-X J1C170587-4-DUP 03/16/2011 09:45			0.26g,in	0.26g	NITA3947 03/16/11					
			AmtRec: 1X125MLG,1X250MLP	#Containers: 2				Scr:	Alpha:	Beta:
6 MFTLW-1-AE J1C170587-5-SAMP 03/16/2011 09:50			0.27g,in	0.27g	NITA3948 03/16/11					
			AmtRec: 1X125MLG,1X250MLP	#Containers: 2				Scr:	Alpha:	Beta:
7 MFTL0-1-AE J1C170587-6-SAMP 03/16/2011 09:30			0.27g,in	0.27g	NITA3949 03/16/11					
			AmtRec: 1X125MLG,1X250MLP	#Containers: 2				Scr:	Alpha:	Beta:

3/20/2011 8:35:25 AM

Sample Preparation/Analysis

AF Ni-63 Prp PRP003/PRP005, Sep LSC017
S4 Nickel by ICP and Nickel-63 by Liquid Scint
5I CLIENT: HANFORD

PRIORITY

Balance Id:1120373922
Pipet #:

AnalyDueDate: 03/24/2011

Batch: 1076384 pCi/g
SEQ Batch, Test: None

Sep1 DT/Tm Tech:
Sep2 DT/Tm Tech:
Prep Tech: ,WoodT

Work Order, Lot, Sample Date	Total Amt /Unit	Total Acidified/Unit	Initial Aliquot Amt/Unit	Adj Aliq Amt (Un-Acidified)	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
8 MFTP3-1-AA-B J1C170000-384-BLK 03/17/2011 16:05 pd		AmtRec:	0.28g,in	0.28g #Containers: 1	NITA3950 03/16/11	20		Scr:	Alpha:	Beta:
9 MFTP3-1-AC-C J1C170000-384-LCS 03/17/2011 16:05 pd		AmtRec:	0.27g,in	0.27g #Containers: 1	NISA1388 01/27/11			Scr:	Alpha:	Beta:
10 MFTP3-1-AD-BN J1C170000-384-IBLK 03/17/2011 16:05 pd		AmtRec:		#Containers: 1				Scr:	Alpha:	Beta:

Comments: MFTLW-SAMP "Comments IVS Recount on another detector"

All Clients for Batch:
127642, Washington Closure Hanford LLC Bechtel Hanford, Inc. , RW2, 27038

MFTLF1AE-SAMP Constituent List:
Ni-63 RDL:30 pCi/g LCL:70 UCL:130 RPD:35
MFTP31AA-BLK:
Ni-63 RDL:30 pCi/g LCL: UCL: RPD:
MFTP31AC-LCS:
Ni-63 RDL:30 pCi/g LCL:70 UCL:130 RPD:35
MFTP31AD-IBLK:
Ni-63 RDL:30 pCi/g LCL: UCL: RPD:
MFTLF1AE-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
MFTP31AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
MFTP31AC-LCS:

TestAmerica Laboratories, Inc.

3/20/2011 8:35:25 AM

Sample Preparation/Analysis

AF Ni-63 Prp PRP003/PRP005, Sep LSC017
S4 Nickel by ICP and Nickel-63 by Liquid Scint
5I CLIENT: HANFORD

PRIORITY

Balance Id:
Pipet #:
Sep1 DT/Tm Tech:
Sep2 DT/Tm Tech:
Prep Tech:

AnalyDueDate: 03/24/2011

Batch: 1076384 pCi/g
SEQ Batch, Test: None

Work Order, Lot, Sample Date	Total Amt /Unit	Total Acidified/Unit	Initial Aliquot Amt/Unit	Adj Aliq Amt (Un-Acidified)	QC Tracer Prep Date	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:

Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

MFTP31AD-IBLK:

Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

TestAmerica Laboratories, Inc.

3/28/2011 11:04:59 AM

ICOC Fraction Transfer/Status Report

ByDate: 3/28/2010, 4/2/2011, Batch: '1076384', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus	Accepting			Comments
1076384						
AC		**Rev1C**	**WoodT**	3/20/2011 8:28:25		
SC			MaucieriS	IsBatched	3/17/2011 4:07:30 PM	ICOC_RADCALC v4.8.49
SC			WoodT	InPrep	3/20/2011 8:28:25 AM	RL-PRP-003 REVISION 1
SC			BouslaughP	Prep1C	3/21/2011 9:25:49 AM	RL-PRP-003 REVISION 1
SC			BlackCL	InCnt1	3/23/2011 2:53:13 PM	RL-CI-005 REVISION 1
SC			ClarkR	CalcC	3/25/2011 2:49:49 PM	RL-CI-005 REVISION 1
SC			WhelandS	Rev1C	3/28/2011 11:04:47 AM	RL-DR-001 Rev 2
AC			**BouslaughP**	3/21/2011 9:25:49		
AC			**BlackCL**	3/23/2011 2:53:13 PM		
AC			**ClarkR**	3/25/2011 2:49:49 PM		
AC			**WhelandS**	3/28/2011 11:04:47		

AC: Accepting Entry; SC: Status Change

3/21/2011 10:54:29 AM

Sample Preparation/Analysis

Balance Id:

127642, Washington Closure Hanford LLC , Bechtel Hanford, Inc.

DW Alkaline Digestion by method 3060A
EA Chromium, Hexavalent (7196A)
5I CLIENT: HANFORD

Pipet #: _____

AnalyDueDate: 03/24/2011

Sep1 DT/Tm Tech:

Batch: 1076431 SOIL mg/kg PM, Quote: RW2, 27038

SEQ Batch, Test: None

Sep2 DT/Tm Tech:

Prep Tech:

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Dish Size	Ppt or Geometry	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
1 MFTLF-1-AA J1C170587-1-SAMP 03/16/2011 09:30	AmtRec: 1X125MLG,1X250MLP	#Containers: 2	Scr:	Alpha:	Beta:					
2 MFTLF-1-AL-S J1C170587-1-MS 03/16/2011 09:30	AmtRec: 1X125MLG,1X250MLP	#Containers: 2	Scr:	Alpha:	Beta:					
3 MFTLF-1-AM-X J1C170587-1-DUP 03/16/2011 09:30	AmtRec: 1X125MLG,1X250MLP	#Containers: 2	Scr:	Alpha:	Beta:					
4 MFTLQ-1-AA J1C170587-2-SAMP 03/16/2011 09:35	AmtRec: 1X125MLG,1X250MLP	#Containers: 2	Scr:	Alpha:	Beta:					
5 MFTLR-1-AA J1C170587-3-SAMP 03/16/2011 09:40	AmtRec: 1X125MLG,1X250MLP	#Containers: 2	Scr:	Alpha:	Beta:					
6 MFTLT-1-AA J1C170587-4-SAMP 03/16/2011 09:45	AmtRec: 1X125MLG,1X250MLP	#Containers: 2	Scr:	Alpha:	Beta:					
7 MFTLW-1-AA J1C170587-5-SAMP 03/16/2011 09:50	AmtRec: 1X125MLG,1X250MLP	#Containers: 2	Scr:	Alpha:	Beta:					

3/21/2011 10:54:29 AM

Sample Preparation/Analysis

127642, Washington Closure Hanford LLC , Bechtel Hanford, Inc.

DW Alkaline Digestion by method 3060A
EA Chromium, Hexavalent (7196A)
5I CLIENT: HANFORD

Balance Id:
Pipet #:
Sep1 DT/Tm Tech:
Sep2 DT/Tm Tech:
Prep Tech:

AnalyDueDate: 03/24/2011

Batch: 1076431 SOIL mg/kg PM, Quote: RW2, 27038
SEQ Batch, Test: None

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Dish Size	Ppt or Geometry	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
8 MFTL0-1-AA J1C170587-6-SAMP 03/16/2011 09:30		AmtRec: 1X125MLG,1X250MLP	#Containers: 2					Scr:	Alpha:	Beta:
9 MFTXW-1-AA-B J1C170000-431-BLK 03/21/2011 10:54 pd		AmtRec:	#Containers: 1					Scr:	Alpha:	Beta:
10 MFTXW-1-AC-C J1C170000-431-LCS 03/21/2011 10:54 pd		AmtRec:	#Containers: 1					Scr:	Alpha:	Beta:

Comments: MFTLW-SAMP "Comments IVS Recount on another detector"

All Clients for Batch:
127642, Washington Closure Hanford LLC Bechtel Hanford, Inc. , RW2, 27038

MFTLF1AA-SAMP Constituent List:
HEXCHROME RDL:0.1548 mg/kg LCL:80 UCL:120 RPD:20
MFTLF1AL-MS Constituent List:
HEXCHROME RDL:0.35 mg/kg LCL:75 UCL:125 RPD:20
MFTXW1AA-BLK:
HEXCHROME RDL:0.1548 mg/kg LCL: UCL: RPD:
MFTXW1AC-LCS:
HEXCHROME RDL:0.35 mg/kg LCL:80 UCL:120 RPD:20
MFTLF1AA-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
MFTLF1AL-MS Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
MFTXW1AA-BLK:

Sample Preparation/Analysis

DW Alkaline Digestion by method 3060A
EA Chromium, Hexavalent (7196A)
5I CLIENT: HANFORD

AnalyDueDate: 03/24/2011

Batch: 1076431 mg/kg
SEQ Batch, Test: None

Balance Id:
Pipet #:
Sep1 DT/Tm Tech:
Sep2 DT/Tm Tech:
Prep Tech:

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Dish Size	Ppt or Geometry	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:

Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

HFTXW1AC-LCS:

Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

ANALYTICAL REPORT

Job Number: 280-13666-1

SDG Number: JP0124

Job Description: SAF# RC-075

For:
Washington Closure Hanford
2620 Fermi Avenue
Richland, WA 99354

Attention: Joan H Kessner

RECEIVED
MAR 2011

Approved for release.
Kae E Yoder
Project Manager II
3/30/2011 5:00 PM

Kae E Yoder
Project Manager II
kae.yoder@testamericainc.com
03/30/2011

The test results in this report relate only to the samples in this report and meet all requirements of NELAC, with any exceptions noted. Pursuant to NELAP, this report shall not be reproduced except in full, without the written approval of the laboratory. All questions regarding this report should be directed to the TestAmerica Denver Project Manager.

The Lab Certification ID# is E87667.

Reporting limits are adjusted for sample size used, dilutions and moisture content if applicable.

TestAmerica Laboratories, Inc.
TestAmerica Denver 4955 Yarrow Street, Arvada, CO 80002
Tel (303) 736-0100 Fax (303) 431-7171 www.testamericainc.com

ACCREDITED IN ACCORDANCE WITH nelac

Table of Contents

Cover Title Page 1

Report Narrative 3

Data Qualifiers 5

Method Summary 7

Method / Analyst Summary 8

Sample Summary 9

Sample Results 10

Sample Datasheets 11

QC Results 53

Qc Association Summary 54

Qc Reports 61

Client Chain of Custody 87

Sample Receipt Checklist 89

CASE NARRATIVE

Client: Washington Closure Hanford

Project: WASHINGTON CLOSURE HANFORD

Report Number: 280-13666-1

SDG #: JP0124
SAF#: RC-075

Date SDG Closed: March 18, 2011
Data Deliverable: 7 Day / Summary

CLIENT ID	LAB ID	ANALYSES REQUESTED	ANALYSES PERFORMED
J1F1J3	280-13666-1	6010/7471/9056M/353.2/9045/ 8270A/8310/8081	6010B/7471A/9056M/353.2/9045C/ 8270C/8310/8081A
J1F1J4	280-13666-2	6010/7471/9056M/353.2/9045/ 8270A/8310/8081	6010B/7471A/9056M/353.2/9045C/ 8270C/8310/8081A
J1F1J5	280-13666-3	6010/7471/9056M/353.2/9045/ 8270A/8310/8081	6010B/7471A/9056M/353.2/9045C/ 8270C/8310/8081A
J1F1J6	280-13666-4	6010/7471/9056M/353.2/9045/ 8270A/8310/8081	6010B/7471A/9056M/353.2/9045C/ 8270C/8310/8081A
J1F1J7	280-13666-5	6010/7471/9056M/353.2/9045/ 8270A/8310/8081	6010B/7471A/9056M/353.2/9045C/ 8270C/8310/8081A
J1F1J8	280-13666-6	6010/7471/9056M/353.2/9045/ 8270A/8310/8081	6010B/7471A/9056M/353.2/9045C/ 8270C/8310/8081A

I certify that this data package is in compliance with the SOW, both technically and for completeness, for other than the conditions detailed in this Case Narrative. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or a designee, as verified by the signature on the Report Cover.

With exceptions noted as flags or footnotes, standard analytical protocols were followed in the analysis of the samples and no problems were encountered or anomalies observed. All laboratory quality control samples analyzed in conjunction with the samples in this project were within established control limits, with any exceptions noted. Calculations are performed before rounding to avoid round-off errors in calculated results.

This report includes reporting limits (RLs) less than TestAmerica Denver's practical quantitation limits. These reporting limits are being used specifically at the client's request to meet the needs of this project. Please note that data are not normally reported to these levels without qualification, since they are inherently less reliable and potentially less defensible than required by the current NELAC standards.

The results, RLs and MDLs included in this report have been adjusted for dry weight, as appropriate.

All holding times were met and proper preservation noted for the methods performed on these samples, unless otherwise detailed in the individual sections below.

RECEIPT

The samples were received on 3/18/2011; the samples arrived in good condition, properly preserved and on ice. The temperatures of the coolers at receipt were 2.4 C, 2.7 C, 3.4 C and 4.7 C.

GC/MS SEMIVOLATILES - SW846 8270C

Compounds Benzo(b)fluoranthene and Benzo(k)fluoranthene were unresolved in samples J1F1J5 and J1F1J7 due to matrix interferences. It can be noted that these compounds were adequately resolved in associated standards, indicating the instrument is achieving separation. The combined peak was reported as Benzo(b)fluoranthene, while Benzo(k)fluoranthene was reported as undetected even though it may be present. Associated results have been flagged with a "K".

Low levels of Bis(2-ethylhexyl) phthalate, a common laboratory contaminant, are present in the method blank associated with batch 280-58359. Because the concentration in the method blank is not present at a level greater than the reporting limit, corrective action is deemed unnecessary. Associated sample results present above the MDL and/or RL have been flagged with a "B".

No other anomalies were encountered.

GC SEMIVOLATILES - SW846 8081A - PESTICIDEs
The MS/MSD performed on sample J1F1J3 exhibited percent recoveries outside the control limits for Endrin aldehyde, and the associated sample result has been flagged "N". In addition, the RPD limit was exceeded. The acceptable LCS analysis data indicated that the analytical system was operating within control; therefore, corrective action is deemed unnecessary.

No other anomalies were encountered.

HPLC - SW846 8310 - PAHs
The RPD between the primary and confirmation columns exceeded 40% for analytes in samples J1F1J5 and J1F1J7. The lower of the two values have been reported, as matrix interference is evident. Associated results have been flagged with an "X".

No other anomalies were encountered.

TOTAL METALS - SW846 6010B/7471A
Serial dilution of a digestate in batch 280-58313 indicates that physical and chemical interferences are present for several elements. Results have been flagged with an "X".

Each sample is analyzed to achieve the lowest possible reporting limits within the constraints of the method. Due to high constituent concentration, the Lead analysis of sample J1F1J4 had to be performed at a 5X dilution. The reporting limit has been adjusted relative to the dilution required.

Low levels of Barium, Calcium, Chromium and Magnesium are present in the method blank associated with batch 280-58313. Because the concentrations in the method blank are not present at levels greater than the reporting limits, corrective action is deemed unnecessary.

It can be noted that the sample amount was greater than four times the spike amount for Aluminum, Iron and Manganese in the Matrix Spike performed on sample J1F1J3; therefore, control limits are not applicable.

Silicon was recovered outside the control limits in the SW846 6010B Matrix Spike and Duplicate analysis performed on sample J1F1J3, and the associated sample result has been flagged "N" and "M". There is no indication that the analytical system was operating out of control, and method accuracy has been verified by the acceptable LCS analysis data; therefore, corrective action is deemed unnecessary.

No other anomalies were encountered.

GENERAL CHEMISTRY - MCAWW 353.2 - NITRATE+NITRITE as N
No anomalies were encountered.

GENERAL CHEMISTRY - SW846 9056M - ANIONS
Low levels of Orthophosphate as P are present in the method blank associated with batch 280-58958. Because the concentration in the method blank is not present at a level greater than the reporting limit, corrective action is deemed unnecessary.

No other anomalies were encountered.

GENERAL CHEMISTRY - SW846 9045C - PH
No anomalies were encountered.

DATA REPORTING QUALIFIERS

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Lab Section	Qualifier	Description
GC/MS Semi VOA		
	B	Analyte was found in the associated method blank as well as in the sample.
	U	Analyzed for but not detected.
	K	Benzo (b&k) fluoranthene are unresolved due to matrix, result is reported as Benzo(b)fluoranthene.
	J	Indicates an Estimated Value for TICs
	N	Presumptive evidence of material.
	J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
GC Semi VOA		
	U	Analyzed for but not detected.
	N	MS, MSD: Spike recovery exceeds upper or lower control limits.
	*	MS/MSD RPD exceeded the control limit
	J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
Metals		
	U	Analyzed for but not detected.
	B	Estimated result. Result is less than the RL, but greater than MDL
	4	MS, MSD: The analyte present in the original sample is 4 times greater than the matrix spike concentration; therefore, control limits are not applicable.
	N	Recovery exceeds upper or lower control limits
	M	Sample duplicate precision not met.
	X	Serial dilution in the analytical batch indicates that physical and chemical interferences are present.

DATA REPORTING QUALIFIERS

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Lab Section	Qualifier	Description
General Chemistry		
	U	Analyzed for but not detected.
	B	Estimated result. Result is less than the RL, but greater than MDL
	C	The analyte was detected in both the sample and the assoicated QC blank, and the sample concentration was </= 5X the blank concentration.
HPLC/IC		
	U	Analyzed for but not detected.
	X	More than 40% difference between columns, lower result reported.
	J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

METHOD SUMMARY

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Description	Lab Location	Method	Preparation Method
Matrix: Solid			
Semivolatile Organic Compounds (GC/MS)	TAL DEN	SW846 8270C	
Ultrasonic Extraction	TAL DEN		SW846 3550C
Organochlorine Pesticides (GC)	TAL DEN	SW846 8081A	
Ultrasonic Extraction	TAL DEN		SW846 3550C
PAHs (HPLC)	TAL DEN	SW846 8310	
Ultrasonic Extraction	TAL DEN		SW846 3550C
Metals (ICP)	TAL DEN	SW846 6010B	
Preparation, Metals	TAL DEN		SW846 3050B
Mercury (CVAA)	TAL DEN	SW846 7471A	
Preparation, Mercury	TAL DEN		SW846 7471A
Nitrogen, Nitrate-Nitrite	TAL DEN	MCAWW 353.2	
Deionized Water Leaching Procedure	TAL DEN		ASTM DI Leach
pH	TAL DEN	SW846 9045C	
Deionized Water Leaching Procedure	TAL DEN		ASTM DI Leach
Anions, Ion Chromatography	TAL DEN	SW846 9056M	
Deionized Water Leaching Procedure	TAL DEN		ASTM DI Leach
ASTM D-2216	TAL DEN	ASTM D-2216	

Lab References:

TAL DEN = TestAmerica Denver

Method References:

ASTM = ASTM International

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions.

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

METHOD / ANALYST SUMMARY

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Method	Analyst	Analyst ID
SW846 8270C	Hoffman, Michael G	MGH
SW846 8081A	Ream, Brian E	BER
SW846 6010B	Harre, John K	JKH
SW846 6010B	Trudell, Lynn-Anne	LT
SW846 7471A	Stoltz, Katie	KS
MCAWW 353.2	Stosak, Lara E	LES
SW846 9045C	Taylor, Juli M	JMT
SW846 9056M	Kudla, Ewa	EK
ASTM D-2216	Berry III, Paul B	PBB
SW846 8310	Hall, Koley J	KJH

SAMPLE SUMMARY

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Lab Sample ID	Client Sample ID	Client Matrix	Date/Time Sampled	Date/Time Received
280-13666-1	J1F1J3	Solid	03/16/2011 0930	03/18/2011 0930
280-13666-2	J1F1J4	Solid	03/16/2011 0935	03/18/2011 0930
280-13666-3	J1F1J5	Solid	03/16/2011 0940	03/18/2011 0930
280-13666-4	J1F1J6	Solid	03/16/2011 0945	03/18/2011 0930
280-13666-5	J1F1J7	Solid	03/16/2011 0950	03/18/2011 0930
280-13666-6	J1F1J8	Solid	03/16/2011 0930	03/18/2011 0930

SAMPLE RESULTS

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J3**

Lab Sample ID: 280-13666-1
Client Matrix: Solid

% Moisture: 8.1

Date Sampled: 03/16/2011 0930
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9004.D
Dilution:	1.0			Initial Weight/Volume:	31.4 g
Date Analyzed:	03/21/2011 1152			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
Acenaphthene		11	U	11	340
Acenaphthylene		18	U	18	340
Anthracene		18	U	18	340
Benzo[a]anthracene		21	U	21	340
Benzo[a]pyrene		21	U	21	340
Benzo[b]fluoranthene		27	U	27	340
Benzo[ghi]perylene		17	U	17	340
Benzo[k]fluoranthene		42	U	42	340
Bis(2-chloroethoxy)methane		24	U	24	340
Bis(2-chloroethyl)ether		17	U	17	340
bis (2-chloroisopropyl) ether		24	U	24	340
Bis(2-ethylhexyl) phthalate		110	J B	48	340
4-Bromophenyl phenyl ether		20	U	20	340
Butyl benzyl phthalate		45	U	45	340
Carbazole		37	U	37	340
4-Chloroaniline		85	U	85	340
4-Chloro-3-methylphenol		69	U	69	340
2-Chloronaphthalene		10	U	10	340
2-Chlorophenol		22	U	22	340
4-Chlorophenyl phenyl ether		22	U	22	340
Chrysene		28	U	28	340
Dibenz(a,h)anthracene		20	U	20	340
Dibenzofuran		21	U	21	340
1,2-Dichlorobenzene		23	U	23	340
1,3-Dichlorobenzene		12	U	12	340
1,4-Dichlorobenzene		14	U	14	340
3,3'-Dichlorobenzidine		94	U	94	690
2,4-Dichlorophenol		10	U	10	340
Diethyl phthalate		27	U	27	340
2,4-Dimethylphenol		69	U	69	340
Dimethyl phthalate		24	U	24	340
Di-n-butyl phthalate		30	U	30	340
4,6-Dinitro-2-methylphenol		340	U	340	690
2,4-Dinitrophenol		350	U	350	860
2,4-Dinitrotoluene		69	U	69	340
2,6-Dinitrotoluene		29	U	29	340
Di-n-octyl phthalate		15	U	15	340
Fluoranthene		37	U	37	340
Fluorene		19	U	19	340
Hexachlorobenzene		30	U	30	340
Hexachlorobutadiene		10	U	10	340
Hexachlorocyclopentadiene		52	U	52	340
Hexachloroethane		22	U	22	340
Indeno[1,2,3-cd]pyrene		23	U	23	340
Isophorone		18	U	18	340
2-Methylnaphthalene		20	U	20	340

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J3**

Lab Sample ID: 280-13666-1
Client Matrix: Solid % Moisture: 8.1

Date Sampled: 03/16/2011 0930
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9004.D
Dilution:	1.0			Initial Weight/Volume:	31.4 g
Date Analyzed:	03/21/2011 1152			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
2-Methylphenol		14	U	14	340
3 & 4 Methylphenol		34	U	34	340
Naphthalene		32	U	32	340
2-Nitroaniline		52	U	52	340
3-Nitroaniline		76	U	76	340
4-Nitroaniline		75	U	75	340
Nitrobenzene		23	U	23	340
2-Nitrophenol		10	U	10	340
4-Nitrophenol		100	U	100	690
N-Nitrosodi-n-propylamine		32	U	32	340
N-Nitrosodiphenylamine		22	U	22	340
Pentachlorophenol		340	U	340	690
Phenanthrene		18	U	18	340
Phenol		19	U	19	340
Pyrene		13	U	13	340
1,2,4-Trichlorobenzene		29	U	29	340
2,4,5-Trichlorophenol		10	U	10	340
2,4,6-Trichlorophenol		10	U	10	340

Surrogate	%Rec	Qualifier	Acceptance Limits
2-Fluorobiphenyl	83		50 - 120
2-Fluorophenol	87		53 - 120
Nitrobenzene-d5	85		50 - 120
Phenol-d5	89		52 - 120
Terphenyl-d14	92		55 - 120
2,4,6-Tribromophenol	77		51 - 120

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J3**

Lab Sample ID: 280-13666-1
Client Matrix: Solid

% Moisture: 8.1

Date Sampled: 03/16/2011 0930
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9004.D
Dilution:	1.0			Initial Weight/Volume:	31.4 g
Date Analyzed:	03/21/2011 1152			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Tentatively Identified Compounds **Number TIC's Found:** **4**

Cas Number	Analyte	RT	Est. Result (ug/Kg)	Qualifier
	Unknown	2.82	190	N J
2213-23-2	Heptane, 2,4-dimethyl-	3.06	160	N J
2216-30-0	Heptane, 2,5-dimethyl-	3.17	140	N J
	Unknown	3.25	3900	N J

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J4**

Lab Sample ID: 280-13666-2
Client Matrix: Solid % Moisture: 5.5

Date Sampled: 03/16/2011 0935
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9005.D
Dilution:	1.0			Initial Weight/Volume:	30.2 g
Date Analyzed:	03/21/2011 1212			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
Acenaphthene		11	U	11	350
Acenaphthylene		18	U	18	350
Anthracene		18	U	18	350
Benzo[a]anthracene		21	U	21	350
Benzo[a]pyrene		21	U	21	350
Benzo[b]fluoranthene		28	U	28	350
Benzo[ghi]perylene		17	U	17	350
Benzo[k]fluoranthene		42	U	42	350
Bis(2-chloroethoxy)methane		24	U	24	350
Bis(2-chloroethyl)ether		17	U	17	350
bis (2-chloroisopropyl) ether		24	U	24	350
Bis(2-ethylhexyl) phthalate		120	J B	48	350
4-Bromophenyl phenyl ether		20	U	20	350
Butyl benzyl phthalate		45	U	45	350
Carbazole		38	U	38	350
4-Chloroaniline		86	U	86	350
4-Chloro-3-methylphenol		69	U	69	350
2-Chloronaphthalene		11	U	11	350
2-Chlorophenol		22	U	22	350
4-Chlorophenyl phenyl ether		22	U	22	350
Chrysene		28	U	28	350
Dibenz(a,h)anthracene		20	U	20	350
Dibenzofuran		21	U	21	350
1,2-Dichlorobenzene		23	U	23	350
1,3-Dichlorobenzene		13	U	13	350
1,4-Dichlorobenzene		14	U	14	350
3,3'-Dichlorobenzidine		95	U	95	690
2,4-Dichlorophenol		11	U	11	350
Diethyl phthalate		27	U	27	350
2,4-Dimethylphenol		69	U	69	350
Dimethyl phthalate		24	U	24	350
Di-n-butyl phthalate		31	U	31	350
4,6-Dinitro-2-methylphenol		350	U	350	690
2,4-Dinitrophenol		350	U	350	870
2,4-Dinitrotoluene		69	U	69	350
2,6-Dinitrotoluene		29	U	29	350
Di-n-octyl phthalate		15	U	15	350
Fluoranthene		38	U	38	350
Fluorene		19	U	19	350
Hexachlorobenzene		31	U	31	350
Hexachlorobutadiene		11	U	11	350
Hexachlorocyclopentadiene		53	U	53	350
Hexachloroethane		22	U	22	350
Indeno[1,2,3-cd]pyrene		23	U	23	350
Isophorone		18	U	18	350
2-Methylnaphthalene		20	U	20	350

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J4**

Lab Sample ID: 280-13666-2
Client Matrix: Solid
% Moisture: 5.5

Date Sampled: 03/16/2011 0935
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9005.D
Dilution:	1.0			Initial Weight/Volume:	30.2 g
Date Analyzed:	03/21/2011 1212			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
2-Methylphenol		14	U	14	350
3 & 4 Methylphenol		35	U	35	350
Naphthalene		33	U	33	350
2-Nitroaniline		53	U	53	350
3-Nitroaniline		77	U	77	350
4-Nitroaniline		76	U	76	350
Nitrobenzene		23	U	23	350
2-Nitrophenol		11	U	11	350
4-Nitrophenol		100	U	100	690
N-Nitrosodi-n-propylamine		33	U	33	350
N-Nitrosodiphenylamine		22	U	22	350
Pentachlorophenol		350	U	350	690
Phenanthrene		18	U	18	350
Phenol		19	U	19	350
Pyrene		13	U	13	350
1,2,4-Trichlorobenzene		29	U	29	350
2,4,5-Trichlorophenol		11	U	11	350
2,4,6-Trichlorophenol		11	U	11	350

Surrogate	%Rec	Qualifier	Acceptance Limits
2-Fluorobiphenyl	77		50 - 120
2-Fluorophenol	80		53 - 120
Nitrobenzene-d5	80		50 - 120
Phenol-d5	82		52 - 120
Terphenyl-d14	93		55 - 120
2,4,6-Tribromophenol	72		51 - 120

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J4**

Lab Sample ID: 280-13666-2
Client Matrix: Solid

% Moisture: 5.5

Date Sampled: 03/16/2011 0935
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674	Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359	Lab File ID:	Y9005.D
Dilution:	1.0		Initial Weight/Volume:	30.2 g
Date Analyzed:	03/21/2011 1212		Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849		Injection Volume:	0.5 uL

Tentatively Identified Compounds **Number TIC's Found:** **3**

Cas Number	Analyte	RT	Est. Result (ug/Kg)	Qualifier
	Unknown	3.06	150	N J
2216-30-0	Heptane, 2,5-dimethyl-	3.18	150	N J
	Unknown	3.25	3600	N J

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J5**

Lab Sample ID: 280-13666-3
Client Matrix: Solid

% Moisture: 8.5

Date Sampled: 03/16/2011 0940
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9006.D
Dilution:	1.0			Initial Weight/Volume:	30.8 g
Date Analyzed:	03/21/2011 1233			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
Acenaphthene		11	U	11	350
Acenaphthylene		18	U	18	350
Anthracene		18	U	18	350
Benzo[a]anthracene		70	J	21	350
Benzo[a]pyrene		98	J	21	350
Benzo[b]fluoranthene		130	J K	28	350
Benzo[ghi]perylene		35	J	17	350
Benzo[k]fluoranthene		43	U K	43	350
Bis(2-chloroethoxy)methane		24	U	24	350
Bis(2-chloroethyl)ether		18	U	18	350
bis (2-chloroisopropyl) ether		24	U	24	350
Bis(2-ethylhexyl) phthalate		120	J B	49	350
4-Bromophenyl phenyl ether		20	U	20	350
Butyl benzyl phthalate		46	U	46	350
Carbazole		38	U	38	350
4-Chloroaniline		87	U	87	350
4-Chloro-3-methylphenol		70	U	70	350
2-Chloronaphthalene		11	U	11	350
2-Chlorophenol		22	U	22	350
4-Chlorophenyl phenyl ether		22	U	22	350
Chrysene		78	J	29	350
Dibenz(a,h)anthracene		20	U	20	350
Dibenzofuran		21	U	21	350
1,2-Dichlorobenzene		23	U	23	350
1,3-Dichlorobenzene		13	U	13	350
1,4-Dichlorobenzene		14	U	14	350
3,3'-Dichlorobenzidine		96	U	96	700
2,4-Dichlorophenol		11	U	11	350
Diethyl phthalate		28	U	28	350
2,4-Dimethylphenol		70	U	70	350
Dimethyl phthalate		24	U	24	350
Di-n-butyl phthalate		31	U	31	350
4,6-Dinitro-2-methylphenol		350	U	350	700
2,4-Dinitrophenol		350	U	350	880
2,4-Dinitrotoluene		70	U	70	350
2,6-Dinitrotoluene		30	U	30	350
Di-n-octyl phthalate		15	U	15	350
Fluoranthene		100	J	38	350
Fluorene		19	U	19	350
Hexachlorobenzene		31	U	31	350
Hexachlorobutadiene		11	U	11	350
Hexachlorocyclopentadiene		53	U	53	350
Hexachloroethane		23	U	23	350
Indeno[1,2,3-cd]pyrene		85	J	23	350
Isophorone		18	U	18	350
2-Methylnaphthalene		20	U	20	350

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J5**

Lab Sample ID: 280-13666-3
Client Matrix: Solid
% Moisture: 8.5

Date Sampled: 03/16/2011 0940
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9006.D
Dilution:	1.0			Initial Weight/Volume:	30.8 g
Date Analyzed:	03/21/2011 1233			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
2-Methylphenol		14	U	14	350
3 & 4 Methylphenol		35	U	35	350
Naphthalene		33	U	33	350
2-Nitroaniline		53	U	53	350
3-Nitroaniline		78	U	78	350
4-Nitroaniline		77	U	77	350
Nitrobenzene		23	U	23	350
2-Nitrophenol		11	U	11	350
4-Nitrophenol		100	U	100	700
N-Nitrosodi-n-propylamine		33	U	33	350
N-Nitrosodiphenylamine		22	U	22	350
Pentachlorophenol		350	U	350	700
Phenanthrene		19	J	18	350
Phenol		19	U	19	350
Pyrene		110	J	13	350
1,2,4-Trichlorobenzene		30	U	30	350
2,4,5-Trichlorophenol		11	U	11	350
2,4,6-Trichlorophenol		11	U	11	350

Surrogate	%Rec	Qualifier	Acceptance Limits
2-Fluorobiphenyl	82		50 - 120
2-Fluorophenol	83		53 - 120
Nitrobenzene-d5	82		50 - 120
Phenol-d5	86		52 - 120
Terphenyl-d14	95		55 - 120
2,4,6-Tribromophenol	80		51 - 120

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J5**

Lab Sample ID: 280-13666-3
Client Matrix: Solid

% Moisture: 8.5

Date Sampled: 03/16/2011 0940
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674	Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359	Lab File ID:	Y9006.D
Dilution:	1.0		Initial Weight/Volume:	30.8 g
Date Analyzed:	03/21/2011 1233		Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849		Injection Volume:	0.5 uL

Tentatively Identified Compounds **Number TIC's Found:** **1**

Cas Number	Analyte	RT	Est. Result (ug/Kg)	Qualifier
	Unknown	3.25	3500	N J

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J6**

Lab Sample ID: 280-13666-4
Client Matrix: Solid
% Moisture: 8.9

Date Sampled: 03/16/2011 0945
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9007.D
Dilution:	1.0			Initial Weight/Volume:	30.1 g
Date Analyzed:	03/21/2011 1253			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
Acenaphthene		11	U	11	360
Acenaphthylene		19	U	19	360
Anthracene		19	U	19	360
Benzo[a]anthracene		22	U	22	360
Benzo[a]pyrene		22	U	22	360
Benzo[b]fluoranthene		29	U	29	360
Benzo[ghi]perylene		17	U	17	360
Benzo[k]fluoranthene		44	U	44	360
Bis(2-chloroethoxy)methane		25	U	25	360
Bis(2-chloroethyl)ether		18	U	18	360
bis (2-chloroisopropyl) ether		25	U	25	360
Bis(2-ethylhexyl) phthalate		120	J B	50	360
4-Bromophenyl phenyl ether		21	U	21	360
Butyl benzyl phthalate		47	U	47	360
Carbazole		39	U	39	360
4-Chloroaniline		90	U	90	360
4-Chloro-3-methylphenol		72	U	72	360
2-Chloronaphthalene		11	U	11	360
2-Chlorophenol		23	U	23	360
4-Chlorophenyl phenyl ether		23	U	23	360
Chrysene		30	U	30	360
Dibenz(a,h)anthracene		21	U	21	360
Dibenzofuran		22	U	22	360
1,2-Dichlorobenzene		24	U	24	360
1,3-Dichlorobenzene		13	U	13	360
1,4-Dichlorobenzene		15	U	15	360
3,3'-Dichlorobenzidine		98	U	98	720
2,4-Dichlorophenol		11	U	11	360
Diethyl phthalate		28	U	28	360
2,4-Dimethylphenol		72	U	72	360
Dimethyl phthalate		25	U	25	360
Di-n-butyl phthalate		32	U	32	360
4,6-Dinitro-2-methylphenol		360	U	360	720
2,4-Dinitrophenol		360	U	360	900
2,4-Dinitrotoluene		72	U	72	360
2,6-Dinitrotoluene		31	U	31	360
Di-n-octyl phthalate		16	U	16	360
Fluoranthene		39	U	39	360
Fluorene		20	U	20	360
Hexachlorobenzene		32	U	32	360
Hexachlorobutadiene		11	U	11	360
Hexachlorocyclopentadiene		55	U	55	360
Hexachloroethane		23	U	23	360
Indeno[1,2,3-cd]pyrene		24	U	24	360
Isophorone		19	U	19	360
2-Methylnaphthalene		21	U	21	360

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J6**

Lab Sample ID: 280-13666-4
Client Matrix: Solid

% Moisture: 8.9

Date Sampled: 03/16/2011 0945
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9007.D
Dilution:	1.0			Initial Weight/Volume:	30.1 g
Date Analyzed:	03/21/2011 1253			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
2-Methylphenol		14	U	14	360
3 & 4 Methylphenol		36	U	36	360
Naphthalene		34	U	34	360
2-Nitroaniline		55	U	55	360
3-Nitroaniline		80	U	80	360
4-Nitroaniline		79	U	79	360
Nitrobenzene		24	U	24	360
2-Nitrophenol		11	U	11	360
4-Nitrophenol		110	U	110	720
N-Nitrosodi-n-propylamine		34	U	34	360
N-Nitrosodiphenylamine		23	U	23	360
Pentachlorophenol		360	U	360	720
Phenanthrene		19	U	19	360
Phenol		20	U	20	360
Pyrene		13	U	13	360
1,2,4-Trichlorobenzene		31	U	31	360
2,4,5-Trichlorophenol		11	U	11	360
2,4,6-Trichlorophenol		11	U	11	360

Surrogate	%Rec	Qualifier	Acceptance Limits
2-Fluorobiphenyl	85		50 - 120
2-Fluorophenol	91		53 - 120
Nitrobenzene-d5	90		50 - 120
Phenol-d5	92		52 - 120
Terphenyl-d14	101		55 - 120
2,4,6-Tribromophenol	82		51 - 120

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J6**

Lab Sample ID: 280-13666-4
Client Matrix: Solid

% Moisture: 8.9

Date Sampled: 03/16/2011 0945
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9007.D
Dilution:	1.0			Initial Weight/Volume:	30.1 g
Date Analyzed:	03/21/2011 1253			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Tentatively Identified Compounds **Number TIC's Found:** **3**

Cas Number	Analyte	RT	Est. Result (ug/Kg)	Qualifier
	Unknown	2.81	540	N J
	Unknown	3.06	150	N J
	Unknown	3.25	3900	N J

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J7**

Lab Sample ID: 280-13666-5
Client Matrix: Solid
% Moisture: 10.6

Date Sampled: 03/16/2011 0950
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9008.D
Dilution:	1.0			Initial Weight/Volume:	30.0 g
Date Analyzed:	03/21/2011 1313			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
Acenaphthene		12	U	12	370
Acenaphthylene		19	U	19	370
Anthracene		19	U	19	370
Benzo[a]anthracene		23	J	22	370
Benzo[a]pyrene		72	J	22	370
Benzo[b]fluoranthene		34	J K	29	370
Benzo[ghi]perylene		18	U	18	370
Benzo[k]fluoranthene		45	U K	45	370
Bis(2-chloroethoxy)methane		26	U	26	370
Bis(2-chloroethyl)ether		19	U	19	370
bis (2-chloroisopropyl) ether		26	U	26	370
Bis(2-ethylhexyl) phthalate		120	J B	51	370
4-Bromophenyl phenyl ether		21	U	21	370
Butyl benzyl phthalate		48	U	48	370
Carbazole		40	U	40	370
4-Chloroaniline		92	U	92	370
4-Chloro-3-methylphenol		74	U	74	370
2-Chloronaphthalene		11	U	11	370
2-Chlorophenol		23	U	23	370
4-Chlorophenyl phenyl ether		23	U	23	370
Chrysene		30	U	30	370
Dibenz(a,h)anthracene		72	J	21	370
Dibenzofuran		22	U	22	370
1,2-Dichlorobenzene		25	U	25	370
1,3-Dichlorobenzene		13	U	13	370
1,4-Dichlorobenzene		15	U	15	370
3,3'-Dichlorobenzidine		100	U	100	740
2,4-Dichlorophenol		11	U	11	370
Diethyl phthalate		29	U	29	370
2,4-Dimethylphenol		74	U	74	370
Dimethyl phthalate		26	U	26	370
Di-n-butyl phthalate		32	U	32	370
4,6-Dinitro-2-methylphenol		370	U	370	740
2,4-Dinitrophenol		370	U	370	920
2,4-Dinitrotoluene		74	U	74	370
2,6-Dinitrotoluene		31	U	31	370
Di-n-octyl phthalate		16	U	16	370
Fluoranthene		40	U	40	370
Fluorene		20	U	20	370
Hexachlorobenzene		32	U	32	370
Hexachlorobutadiene		11	U	11	370
Hexachlorocyclopentadiene		56	U	56	370
Hexachloroethane		24	U	24	370
Indeno[1,2,3-cd]pyrene		68	J	25	370
Isophorone		19	U	19	370
2-Methylnaphthalene		21	U	21	370

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J7**

Lab Sample ID: 280-13666-5
Client Matrix: Solid
% Moisture: 10.6

Date Sampled: 03/16/2011 0950
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9008.D
Dilution:	1.0			Initial Weight/Volume:	30.0 g
Date Analyzed:	03/21/2011 1313			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
2-Methylphenol		15	U	15	370
3 & 4 Methylphenol		37	U	37	370
Naphthalene		35	U	35	370
2-Nitroaniline		56	U	56	370
3-Nitroaniline		82	U	82	370
4-Nitroaniline		81	U	81	370
Nitrobenzene		25	U	25	370
2-Nitrophenol		11	U	11	370
4-Nitrophenol		110	U	110	740
N-Nitrosodi-n-propylamine		35	U	35	370
N-Nitrosodiphenylamine		23	U	23	370
Pentachlorophenol		370	U	370	740
Phenanthrene		19	U	19	370
Phenol		20	U	20	370
Pyrene		27	J	14	370
1,2,4-Trichlorobenzene		31	U	31	370
2,4,5-Trichlorophenol		11	U	11	370
2,4,6-Trichlorophenol		11	U	11	370

Surrogate	%Rec	Qualifier	Acceptance Limits
2-Fluorobiphenyl	79		50 - 120
2-Fluorophenol	83		53 - 120
Nitrobenzene-d5	81		50 - 120
Phenol-d5	86		52 - 120
Terphenyl-d14	92		55 - 120
2,4,6-Tribromophenol	75		51 - 120

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J7**

Lab Sample ID: 280-13666-5
Client Matrix: Solid

% Moisture: 10.6

Date Sampled: 03/16/2011 0950
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9008.D
Dilution:	1.0			Initial Weight/Volume:	30.0 g
Date Analyzed:	03/21/2011 1313			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Tentatively Identified Compounds **Number TIC's Found:** **2**

Cas Number	Analyte	RT	Est. Result (ug/Kg)	Qualifier
	Unknown	2.83	200	N J
	Unknown	3.25	3500	N J

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J8**

Lab Sample ID: 280-13666-6
Client Matrix: Solid

% Moisture: 7.1

Date Sampled: 03/16/2011 0930
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9009.D
Dilution:	1.0			Initial Weight/Volume:	30.8 g
Date Analyzed:	03/21/2011 1333			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
Acenaphthene		11	U	11	350
Acenaphthylene		18	U	18	350
Anthracene		18	U	18	350
Benzo[a]anthracene		21	U	21	350
Benzo[a]pyrene		21	U	21	350
Benzo[b]fluoranthene		27	U	27	350
Benzo[ghi]perylene		17	U	17	350
Benzo[k]fluoranthene		42	U	42	350
Bis(2-chloroethoxy)methane		24	U	24	350
Bis(2-chloroethyl)ether		17	U	17	350
bis (2-chloroisopropyl) ether		24	U	24	350
Bis(2-ethylhexyl) phthalate		110	J B	48	350
4-Bromophenyl phenyl ether		20	U	20	350
Butyl benzyl phthalate		45	U	45	350
Carbazole		38	U	38	350
4-Chloroaniline		86	U	86	350
4-Chloro-3-methylphenol		69	U	69	350
2-Chloronaphthalene		10	U	10	350
2-Chlorophenol		22	U	22	350
4-Chlorophenyl phenyl ether		22	U	22	350
Chrysene		28	U	28	350
Dibenz(a,h)anthracene		20	U	20	350
Dibenzofuran		21	U	21	350
1,2-Dichlorobenzene		23	U	23	350
1,3-Dichlorobenzene		13	U	13	350
1,4-Dichlorobenzene		14	U	14	350
3,3'-Dichlorobenzidine		94	U	94	690
2,4-Dichlorophenol		10	U	10	350
Diethyl phthalate		27	U	27	350
2,4-Dimethylphenol		69	U	69	350
Dimethyl phthalate		24	U	24	350
Di-n-butyl phthalate		30	U	30	350
4,6-Dinitro-2-methylphenol		350	U	350	690
2,4-Dinitrophenol		350	U	350	860
2,4-Dinitrotoluene		69	U	69	350
2,6-Dinitrotoluene		29	U	29	350
Di-n-octyl phthalate		15	U	15	350
Fluoranthene		38	U	38	350
Fluorene		19	U	19	350
Hexachlorobenzene		30	U	30	350
Hexachlorobutadiene		10	U	10	350
Hexachlorocyclopentadiene		52	U	52	350
Hexachloroethane		22	U	22	350
Indeno[1,2,3-cd]pyrene		23	U	23	350
Isophorone		18	U	18	350
2-Methylnaphthalene		20	U	20	350

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J8**

Lab Sample ID: 280-13666-6
Client Matrix: Solid
% Moisture: 7.1

Date Sampled: 03/16/2011 0930
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674		Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359		Lab File ID:	Y9009.D
Dilution:	1.0			Initial Weight/Volume:	30.8 g
Date Analyzed:	03/21/2011 1333			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
2-Methylphenol		14	U	14	350
3 & 4 Methylphenol		35	U	35	350
Naphthalene		32	U	32	350
2-Nitroaniline		52	U	52	350
3-Nitroaniline		77	U	77	350
4-Nitroaniline		76	U	76	350
Nitrobenzene		23	U	23	350
2-Nitrophenol		10	U	10	350
4-Nitrophenol		100	U	100	690
N-Nitrosodi-n-propylamine		32	U	32	350
N-Nitrosodiphenylamine		22	U	22	350
Pentachlorophenol		350	U	350	690
Phenanthrene		18	U	18	350
Phenol		19	U	19	350
Pyrene		13	U	13	350
1,2,4-Trichlorobenzene		29	U	29	350
2,4,5-Trichlorophenol		10	U	10	350
2,4,6-Trichlorophenol		10	U	10	350

Surrogate	%Rec	Qualifier	Acceptance Limits
2-Fluorobiphenyl	81		50 - 120
2-Fluorophenol	85		53 - 120
Nitrobenzene-d5	84		50 - 120
Phenol-d5	86		52 - 120
Terphenyl-d14	96		55 - 120
2,4,6-Tribromophenol	74		51 - 120

Analytical Data

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J8**

Lab Sample ID: 280-13666-6
Client Matrix: Solid

% Moisture: 7.1

Date Sampled: 03/16/2011 0930
Date Received: 03/18/2011 0930

8270C Semivolatile Organic Compounds (GC/MS)

Method:	8270C	Analysis Batch: 280-58674	Instrument ID:	MSS_Y
Preparation:	3550C	Prep Batch: 280-58359	Lab File ID:	Y9009.D
Dilution:	1.0		Initial Weight/Volume:	30.8 g
Date Analyzed:	03/21/2011 1333		Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849		Injection Volume:	0.5 uL

Tentatively Identified Compounds **Number TIC's Found:** **4**

Cas Number	Analyte	RT	Est. Result (ug/Kg)	Qualifier
	Unknown	2.82	140	N J
2213-23-2	Heptane, 2,4-dimethyl-	3.06	160	N J
2216-30-0	Heptane, 2,5-dimethyl-	3.18	160	N J
	Unknown	3.25	3500	N J

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J3**

Lab Sample ID: 280-13666-1
Client Matrix: Solid

% Moisture: 8.1

Date Sampled: 03/16/2011 0930
Date Received: 03/18/2011 0930

8081A Organochlorine Pesticides (GC)

Method:	8081A	Analysis Batch: 280-58722	Instrument ID:	GCS_P1
Preparation:	3550C	Prep Batch: 280-58378	Initial Weight/Volume:	30.1 g
Dilution:	1.0		Final Weight/Volume:	10000 uL
Date Analyzed:	03/21/2011 2326		Injection Volume:	1 uL
Date Prepared:	03/18/2011 2000		Result Type:	PRIMARY

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
4,4'-DDD		0.59	U	0.59	1.8
4,4'-DDE		0.26	U	0.26	1.8
4,4'-DDT		0.64	U	0.64	1.8
Aldrin		0.27	U	0.27	1.8
alpha-BHC		0.23	U	0.23	1.8
beta-BHC		0.72	U	0.72	1.8
delta-BHC		0.43	U	0.43	1.8
gamma-BHC (Lindane)		0.50	U	0.50	1.8
Heptachlor		0.23	U	0.23	1.8
Heptachlor epoxide		0.46	U	0.46	1.8
Endosulfan I		0.19	U	0.19	1.8
Endosulfan II		0.31	U	0.31	1.8
Endosulfan sulfate		0.30	U	0.30	1.8
Endrin		0.33	U	0.33	1.8
Endrin aldehyde		0.19	U N	0.19	1.8
Endrin ketone		0.53	U	0.53	1.8
gamma-Chlordane		0.29	U	0.29	1.8
Methoxychlor		0.49	U	0.49	3.6
alpha-Chlordane		0.35	U	0.35	1.8
Dieldrin		0.23	U	0.23	1.8
Toxaphene		17	U	17	180

Surrogate	%Rec	Qualifier	Acceptance Limits
Tetrachloro-m-xylene	88		59 - 115
Decachlorobiphenyl	96		63 - 124

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J4**

Lab Sample ID: 280-13666-2
Client Matrix: Solid
% Moisture: 5.5

Date Sampled: 03/16/2011 0935
Date Received: 03/18/2011 0930

8081A Organochlorine Pesticides (GC)

Method:	8081A	Analysis Batch: 280-58722	Instrument ID:	GCS_P1
Preparation:	3550C	Prep Batch: 280-58378	Initial Weight/Volume:	30.8 g
Dilution:	1.0		Final Weight/Volume:	10000 uL
Date Analyzed:	03/22/2011 0015		Injection Volume:	1 uL
Date Prepared:	03/18/2011 2000		Result Type:	PRIMARY

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
4,4'-DDD		0.56	U	0.56	1.8
4,4'-DDE		0.25	U	0.25	1.8
4,4'-DDT		0.61	U	0.61	1.8
Aldrin		0.26	U	0.26	1.7
alpha-BHC		0.22	U	0.22	1.7
beta-BHC		0.68	U	0.68	1.7
delta-BHC		0.41	U	0.41	1.7
gamma-BHC (Lindane)		0.48	U	0.48	1.7
Heptachlor		0.22	U	0.22	1.7
Heptachlor epoxide		0.44	U	0.44	1.7
Endosulfan I		0.18	U	0.18	1.7
Endosulfan II		0.30	U	0.30	1.8
Endosulfan sulfate		0.28	U	0.28	1.8
Endrin		0.32	U	0.32	1.8
Endrin aldehyde		0.18	U	0.18	1.8
Endrin ketone		0.50	U	0.50	1.8
gamma-Chlordane		0.27	U	0.27	1.8
Methoxychlor		0.46	U	0.46	3.4
alpha-Chlordane		0.33	U	0.33	1.8
Dieldrin		0.22	U	0.22	1.8
Toxaphene		16	U	16	170

Surrogate	%Rec	Qualifier	Acceptance Limits
Tetrachloro-m-xylene	88		59 - 115
Decachlorobiphenyl	96		63 - 124

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J5**

Lab Sample ID: 280-13666-3
Client Matrix: Solid

% Moisture: 8.5

Date Sampled: 03/16/2011 0940
Date Received: 03/18/2011 0930

8081A Organochlorine Pesticides (GC)

Method: 8081A
Preparation: 3550C
Dilution: 1.0
Date Analyzed: 03/22/2011 0032
Date Prepared: 03/18/2011 2000

Analysis Batch: 280-58722
Prep Batch: 280-58378

Instrument ID: GCS_P1
Initial Weight/Volume: 31.0 g
Final Weight/Volume: 10000 uL
Injection Volume: 1 uL
Result Type: PRIMARY

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
4,4'-DDD		0.58	U	0.58	1.8
4,4'-DDE		0.25	U	0.25	1.8
4,4'-DDT		1.0	J	0.62	1.8
Aldrin		0.27	U	0.27	1.7
alpha-BHC		0.23	U	0.23	1.7
beta-BHC		0.70	U	0.70	1.7
delta-BHC		0.42	U	0.42	1.7
gamma-BHC (Lindane)		0.49	U	0.49	1.7
Heptachlor		0.23	U	0.23	1.7
Heptachlor epoxide		0.45	U	0.45	1.7
Endosulfan I		0.19	U	0.19	1.7
Endosulfan II		0.30	U	0.30	1.8
Endosulfan sulfate		0.29	U	0.29	1.8
Endrin		0.32	U	0.32	1.8
Endrin aldehyde		0.18	U	0.18	1.8
Endrin ketone		0.52	U	0.52	1.8
gamma-Chlordane		0.28	U	0.28	1.8
Methoxychlor		0.48	U	0.48	3.5
alpha-Chlordane		0.34	U	0.34	1.8
Dieldrin		0.22	U	0.22	1.8
Toxaphene		17	U	17	170

Surrogate	%Rec	Qualifier	Acceptance Limits
Tetrachloro-m-xylene	84		59 - 115
Decachlorobiphenyl	104		63 - 124

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J6**

Lab Sample ID: 280-13666-4
Client Matrix: Solid

% Moisture: 8.9

Date Sampled: 03/16/2011 0945
Date Received: 03/18/2011 0930

8081A Organochlorine Pesticides (GC)

Method:	8081A	Analysis Batch: 280-58722		Instrument ID:	GCS_P1
Preparation:	3550C	Prep Batch: 280-58378		Initial Weight/Volume:	30.5 g
Dilution:	1.0			Final Weight/Volume:	10000 uL
Date Analyzed:	03/22/2011 0049			Injection Volume:	1 uL
Date Prepared:	03/18/2011 2000			Result Type:	PRIMARY

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
4,4'-DDD		0.59	U	0.59	1.8
4,4'-DDE		0.26	U	0.26	1.8
4,4'-DDT		0.64	U	0.64	1.8
Aldrin		0.27	U	0.27	1.8
alpha-BHC		0.23	U	0.23	1.8
beta-BHC		0.72	U	0.72	1.8
delta-BHC		0.43	U	0.43	1.8
gamma-BHC (Lindane)		0.50	U	0.50	1.8
Heptachlor		0.23	U	0.23	1.8
Heptachlor epoxide		0.46	U	0.46	1.8
Endosulfan I		0.19	U	0.19	1.8
Endosulfan II		0.31	U	0.31	1.8
Endosulfan sulfate		0.30	U	0.30	1.8
Endrin		0.33	U	0.33	1.8
Endrin aldehyde		0.18	U	0.18	1.8
Endrin ketone		0.53	U	0.53	1.8
gamma-Chlordane		0.29	U	0.29	1.8
Methoxychlor		0.49	U	0.49	3.6
alpha-Chlordane		0.35	U	0.35	1.8
Dieldrin		0.23	U	0.23	1.8
Toxaphene		17	U	17	180

Surrogate	%Rec	Qualifier	Acceptance Limits
Tetrachloro-m-xylene	84		59 - 115
Decachlorobiphenyl	90		63 - 124

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J7**

Lab Sample ID: 280-13666-5
Client Matrix: Solid

% Moisture: 10.6

Date Sampled: 03/16/2011 0950
Date Received: 03/18/2011 0930

8081A Organochlorine Pesticides (GC)

Method:	8081A	Analysis Batch: 280-58722		Instrument ID:	GCS_P1
Preparation:	3550C	Prep Batch: 280-58378		Initial Weight/Volume:	30.1 g
Dilution:	1.0			Final Weight/Volume:	10000 uL
Date Analyzed:	03/22/2011 0105			Injection Volume:	1 uL
Date Prepared:	03/18/2011 2000			Result Type:	PRIMARY

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
4,4'-DDD		0.61	U	0.61	1.9
4,4'-DDE		0.27	U	0.27	1.9
4,4'-DDT		0.89	J	0.66	1.9
Aldrin		0.28	U	0.28	1.8
alpha-BHC		0.24	U	0.24	1.8
beta-BHC		0.74	U	0.74	1.8
delta-BHC		0.45	U	0.45	1.8
gamma-BHC (Lindane)		0.52	U	0.52	1.8
Heptachlor		0.24	U	0.24	1.8
Heptachlor epoxide		0.48	U	0.48	1.8
Endosulfan I		0.20	U	0.20	1.8
Endosulfan II		0.32	U	0.32	1.9
Endosulfan sulfate		0.31	U	0.31	1.9
Endrin		0.34	U	0.34	1.9
Endrin aldehyde		0.19	U	0.19	1.9
Endrin ketone		0.55	U	0.55	1.9
gamma-Chlordane		0.30	U	0.30	1.9
Methoxychlor		0.50	U	0.50	3.7
alpha-Chlordane		0.36	U	0.36	1.9
Dieldrin		0.23	U	0.23	1.9
Toxaphene		18	U	18	180

Surrogate	%Rec	Qualifier	Acceptance Limits
Tetrachloro-m-xylene	85		59 - 115
Decachlorobiphenyl	91		63 - 124

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J8**

Lab Sample ID: 280-13666-6
Client Matrix: Solid

% Moisture: 7.1

Date Sampled: 03/16/2011 0930
Date Received: 03/18/2011 0930

8081A Organochlorine Pesticides (GC)

Method:	8081A	Analysis Batch: 280-58722	Instrument ID:	GCS_P1
Preparation:	3550C	Prep Batch: 280-58378	Initial Weight/Volume:	30.4 g
Dilution:	1.0		Final Weight/Volume:	10000 uL
Date Analyzed:	03/22/2011 0122		Injection Volume:	1 uL
Date Prepared:	03/18/2011 2000		Result Type:	PRIMARY

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
4,4'-DDD		0.58	U	0.58	1.8
4,4'-DDE		0.25	U	0.25	1.8
4,4'-DDT		0.63	U	0.63	1.8
Aldrin		0.27	U	0.27	1.8
alpha-BHC		0.23	U	0.23	1.8
beta-BHC		0.71	U	0.71	1.8
delta-BHC		0.43	U	0.43	1.8
gamma-BHC (Lindane)		0.49	U	0.49	1.8
Heptachlor		0.23	U	0.23	1.8
Heptachlor epoxide		0.45	U	0.45	1.8
Endosulfan I		0.19	U	0.19	1.8
Endosulfan II		0.30	U	0.30	1.8
Endosulfan sulfate		0.29	U	0.29	1.8
Endrin		0.32	U	0.32	1.8
Endrin aldehyde		0.18	U	0.18	1.8
Endrin ketone		0.52	U	0.52	1.8
gamma-Chlordane		0.28	U	0.28	1.8
Methoxychlor		0.48	U	0.48	3.5
alpha-Chlordane		0.34	U	0.34	1.8
Dieldrin		0.22	U	0.22	1.8
Toxaphene		17	U	17	180

Surrogate	%Rec	Qualifier	Acceptance Limits
Tetrachloro-m-xylene	85		59 - 115
Decachlorobiphenyl	98		63 - 124

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J3**

Lab Sample ID: 280-13666-1
Client Matrix: Solid

% Moisture: 8.1

Date Sampled: 03/16/2011 0930
Date Received: 03/18/2011 0930

8310 PAHs (HPLC)

Method:	8310	Analysis Batch: 280-58521		Instrument ID:	CHHPLC_G
Preparation:	3550C	Prep Batch: 280-58367		Initial Weight/Volume:	30.1 g
Dilution:	1.0			Final Weight/Volume:	4000 uL
Date Analyzed:	03/22/2011 0144			Injection Volume:	20 uL
Date Prepared:	03/18/2011 1813			Result Type:	PRIMARY

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
Acenaphthene		11	U	11	110
Acenaphthylene		9.8	U	9.8	110
Anthracene		3.3	U	3.3	22
Benzo[a]anthracene		3.5	U	3.5	16
Benzo[a]pyrene		6.9	U	6.9	16
Benzo[b]fluoranthene		4.6	U	4.6	16
Benzo[g,h,i]perylene		7.8	U	7.8	33
Benzo[k]fluoranthene		4.3	U	4.3	16
Chrysene		5.2	U	5.2	43
Dibenzo(a,h)anthracene		12	U	12	33
Fluoranthene		14	U	14	43
Fluorene		5.7	U	5.7	33
Indeno[1,2,3-cd]pyrene		13	U	13	33
Naphthalene		13	U	13	110
Phenanthrene		13	U	13	43
Pyrene		13	U	13	43

Surrogate	%Rec	Qualifier	Acceptance Limits
Terphenyl-d14 (SUR)	94		72 - 115

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J4**

Lab Sample ID: 280-13666-2
Client Matrix: Solid
% Moisture: 5.5

Date Sampled: 03/16/2011 0935
Date Received: 03/18/2011 0930

8310 PAHs (HPLC)

Method:	8310	Analysis Batch: 280-58521		Instrument ID:	CHHPLC_G
Preparation:	3550C	Prep Batch: 280-58367		Initial Weight/Volume:	31.0 g
Dilution:	1.0			Final Weight/Volume:	4000 uL
Date Analyzed:	03/22/2011 0315			Injection Volume:	20 uL
Date Prepared:	03/18/2011 1813			Result Type:	PRIMARY

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
Acenaphthene		10	U	10	100
Acenaphthylene		9.2	U	9.2	100
Anthracene		3.1	U	3.1	20
Benzo[a]anthracene		3.3	U	3.3	15
Benzo[a]pyrene		6.6	U	6.6	15
Benzo[b]fluoranthene		4.3	U	4.3	15
Benzo[g,h,i]perylene		7.4	U	7.4	31
Benzo[k]fluoranthene		4.0	U	4.0	15
Chrysene		5.0	U	5.0	41
Dibenzo(a,h)anthracene		11	U	11	31
Fluoranthene		13	U	13	41
Fluorene		5.4	U	5.4	31
Indeno[1,2,3-cd]pyrene		12	U	12	31
Naphthalene		12	U	12	100
Phenanthrene		12	U	12	41
Pyrene		12	U	12	41

Surrogate	%Rec	Qualifier	Acceptance Limits
Terphenyl-d14 (SUR)	96		72 - 115

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J5**

Lab Sample ID: 280-13666-3
Client Matrix: Solid

% Moisture: 8.5

Date Sampled: 03/16/2011 0940
Date Received: 03/18/2011 0930

8310 PAHs (HPLC)

Method:	8310	Analysis Batch: 280-58521		Instrument ID:	CHHPLC_G
Preparation:	3550C	Prep Batch: 280-58367		Initial Weight/Volume:	31.3 g
Dilution:	1.0			Final Weight/Volume:	4000 uL
Date Analyzed:	03/22/2011 0346			Injection Volume:	20 uL
Date Prepared:	03/18/2011 1813			Result Type:	PRIMARY

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
Acenaphthene		10	U	10	100
Acenaphthylene		9.4	U	9.4	100
Anthracene		3.2	U	3.2	21
Benzo[a]anthracene		360		3.3	16
Benzo[a]pyrene		230		6.7	16
Benzo[b]fluoranthene		360		4.4	16
Benzo[g,h,i]perylene		190		7.5	31
Benzo[k]fluoranthene		200		4.1	16
Chrysene		330		5.1	42
Dibenzo(a,h)anthracene		36	X	12	31
Fluoranthene		340		14	42
Fluorene		5.5	U	5.5	31
Indeno[1,2,3-cd]pyrene		220		13	31
Naphthalene		13	U	13	100
Phenanthrene		43		13	42
Pyrene		600		13	42

Surrogate	%Rec	Qualifier	Acceptance Limits
Terphenyl-d14 (SUR)	111		72 - 115

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J6**

Lab Sample ID: 280-13666-4
Client Matrix: Solid

% Moisture: 8.9

Date Sampled: 03/16/2011 0945
Date Received: 03/18/2011 0930

8310 PAHs (HPLC)

Method:	8310	Analysis Batch: 280-58521		Instrument ID:	CHHPLC_G
Preparation:	3550C	Prep Batch: 280-58367		Initial Weight/Volume:	30.7 g
Dilution:	1.0			Final Weight/Volume:	4000 uL
Date Analyzed:	03/22/2011 0416			Injection Volume:	20 uL
Date Prepared:	03/18/2011 1813			Result Type:	PRIMARY

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
Acenaphthene		11	U	11	110
Acenaphthylene		9.6	U	9.6	110
Anthracene		3.3	U	3.3	21
Benzo[a]anthracene		41		3.4	16
Benzo[a]pyrene		39		6.9	16
Benzo[b]fluoranthene		38		4.5	16
Benzo[g,h,i]perylene		7.7	U	7.7	32
Benzo[k]fluoranthene		23		4.2	16
Chrysene		40	J	5.2	43
Dibenzo(a,h)anthracene		12	U	12	32
Fluoranthene		14	U	14	43
Fluorene		5.7	U	5.7	32
Indeno[1,2,3-cd]pyrene		22	J	13	32
Naphthalene		13	U	13	110
Phenanthrene		13	U	13	43
Pyrene		21	J	13	43

Surrogate	%Rec	Qualifier	Acceptance Limits
Terphenyl-d14 (SUR)	95		72 - 115

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J7**

Lab Sample ID: 280-13666-5
Client Matrix: Solid

% Moisture: 10.6

Date Sampled: 03/16/2011 0950
Date Received: 03/18/2011 0930

8310 PAHs (HPLC)

Method:	8310	Analysis Batch: 280-58521		Instrument ID:	CHHPLC_G
Preparation:	3550C	Prep Batch: 280-58367		Initial Weight/Volume:	30.4 g
Dilution:	1.0			Final Weight/Volume:	4000 uL
Date Analyzed:	03/22/2011 0447			Injection Volume:	20 uL
Date Prepared:	03/18/2011 1813			Result Type:	PRIMARY

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
Acenaphthene		11	U	11	110
Acenaphthylene		9.9	U	9.9	110
Anthracene		3.4	U	3.4	22
Benzo[a]anthracene		38		3.5	17
Benzo[a]pyrene		21		7.1	17
Benzo[b]fluoranthene		38	X	4.6	17
Benzo[g,h,i]perylene		7.9	U	7.9	33
Benzo[k]fluoranthene		23		4.3	17
Chrysene		39	J	5.3	44
Dibenzo(a,h)anthracene		12	U	12	33
Fluoranthene		49		14	44
Fluorene		5.8	U	5.8	33
Indeno[1,2,3-cd]pyrene		20	J	13	33
Naphthalene		13	U	13	110
Phenanthrene		13	U	13	44
Pyrene		56		13	44

Surrogate	%Rec	Qualifier	Acceptance Limits
Terphenyl-d14 (SUR)	96		72 - 115

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J8**

Lab Sample ID: 280-13666-6
Client Matrix: Solid

% Moisture: 7.1

Date Sampled: 03/16/2011 0930
Date Received: 03/18/2011 0930

8310 PAHs (HPLC)

Method:	8310	Analysis Batch: 280-58521		Instrument ID:	CHHPLC_G
Preparation:	3550C	Prep Batch: 280-58367		Initial Weight/Volume:	30.4 g
Dilution:	1.0			Final Weight/Volume:	4000 uL
Date Analyzed:	03/22/2011 0517			Injection Volume:	20 uL
Date Prepared:	03/18/2011 1813			Result Type:	PRIMARY

Analyte	DryWt Corrected: Y	Result (ug/Kg)	Qualifier	MDL	RL
Acenaphthene		11	U	11	110
Acenaphthylene		9.6	U	9.6	110
Anthracene		3.2	U	3.2	21
Benzo[a]anthracene		3.4	U	3.4	16
Benzo[a]pyrene		6.8	U	6.8	16
Benzo[b]fluoranthene		4.5	U	4.5	16
Benzo[g,h,i]perylene		7.6	U	7.6	32
Benzo[k]fluoranthene		4.2	U	4.2	16
Chrysene		5.1	U	5.1	42
Dibenzo(a,h)anthracene		12	U	12	32
Fluoranthene		14	U	14	42
Fluorene		5.6	U	5.6	32
Indeno[1,2,3-cd]pyrene		13	U	13	32
Naphthalene		13	U	13	110
Phenanthrene		13	U	13	42
Pyrene		13	U	13	42

Surrogate	%Rec	Qualifier	Acceptance Limits
Terphenyl-d14 (SUR)	97		72 - 115

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J3**

Lab Sample ID: 280-13666-1
Client Matrix: Solid
% Moisture: 8.1

Date Sampled: 03/16/2011 0930
Date Received: 03/18/2011 0930

6010B Metals (ICP)

Method:	6010B	Analysis Batch: 280-58691		Instrument ID:	MT_025
Preparation:	3050B	Prep Batch: 280-58313		Lab File ID:	25B032111.asc
Dilution:	1.0			Initial Weight/Volume:	1.20 g
Date Analyzed:	03/21/2011 1752			Final Weight/Volume:	100 mL
Date Prepared:	03/21/2011 0800				

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Aluminum		5930	X	1.4	4.5
Antimony		0.34	U	0.34	0.54
Arsenic		2.1		0.60	0.91
Barium		51.1	X	0.069	0.45
Beryllium		0.10	B	0.030	0.18
Boron		0.89	B	0.89	1.8
Cadmium		0.071	B	0.037	0.18
Calcium		5520	X	12.8	45.3
Chromium		13.3	X	0.053	0.18
Cobalt		7.1	X	0.091	0.91
Copper		14.7	X	0.20	0.91
Iron		18900	X	3.4	4.5
Magnesium		4290	X	3.4	18.1
Manganese		272	X	0.091	0.91
Molybdenum		0.24	B	0.24	1.8
Nickel		9.0	X	0.11	3.6
Potassium		672		37.2	272
Selenium		0.78	U	0.78	0.91
Silicon		178	M N	5.1	9.1
Silver		0.15	U	0.15	0.18
Sodium		256		53.5	109
Vanadium		47.8	X	0.085	1.8
Zinc		36.8	X	0.36	0.91

Method:	6010B	Analysis Batch: 280-59075		Instrument ID:	MT_025
Preparation:	3050B	Prep Batch: 280-59003		Lab File ID:	25A4032311.asc
Dilution:	1.0			Initial Weight/Volume:	1.02 g
Date Analyzed:	03/24/2011 0045			Final Weight/Volume:	100 mL
Date Prepared:	03/23/2011 1400				

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Lead		3.0		0.29	0.53

7471A Mercury (CVAA)

Method:	7471A	Analysis Batch: 280-58997		Instrument ID:	MT_033
Preparation:	7471A	Prep Batch: 280-58365		Lab File ID:	110322AD.txt
Dilution:	1.0			Initial Weight/Volume:	0.64 g
Date Analyzed:	03/22/2011 1807			Final Weight/Volume:	50 mL
Date Prepared:	03/22/2011 1255				

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Mercury		0.013	B	0.0056	0.017

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J4**

Lab Sample ID: 280-13666-2
Client Matrix: Solid

% Moisture: 5.5

Date Sampled: 03/16/2011 0935
Date Received: 03/18/2011 0930

6010B Metals (ICP)

Method: 6010B
Preparation: 3050B
Dilution: 1.0
Date Analyzed: 03/21/2011 1811
Date Prepared: 03/21/2011 0800

Analysis Batch: 280-58691
Prep Batch: 280-58313

Instrument ID: MT_025
Lab File ID: 25B032111.asc
Initial Weight/Volume: 1.05 g
Final Weight/Volume: 100 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Aluminum		5870	X	1.6	5.0
Antimony		0.38	U	0.38	0.60
Arsenic		1.6		0.67	1.0
Barium		70.5	X	0.077	0.50
Beryllium		0.054	B	0.033	0.20
Boron		0.99	U	0.99	2.0
Cadmium		0.060	B	0.041	0.20
Calcium		5310	X	14.2	50.4
Chromium		15.3	X	0.058	0.20
Cobalt		9.5	X	0.10	1.0
Copper		16.6	X	0.22	1.0
Iron		24300	X	3.8	5.0
Magnesium		4590	X	3.7	20.2
Manganese		307	X	0.10	1.0
Molybdenum		0.26	U	0.26	2.0
Nickel		8.2	X	0.12	4.0
Potassium		493		41.3	302
Selenium		0.87	U	0.87	1.0
Silicon		126		5.7	10.1
Silver		0.16	U	0.16	0.20
Sodium		355		59.5	121
Vanadium		68.0	X	0.095	2.0
Zinc		44.5	X	0.40	1.0

Method: 6010B
Preparation: 3050B
Dilution: 5.0
Date Analyzed: 03/24/2011 0707
Date Prepared: 03/23/2011 1400

Analysis Batch: 280-59075
Prep Batch: 280-59003

Instrument ID: MT_025
Lab File ID: 25A4032311.asc
Initial Weight/Volume: 1.08 g
Final Weight/Volume: 100 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Lead		2.6		1.3	2.5

7471A Mercury (CVAA)

Method: 7471A
Preparation: 7471A
Dilution: 1.0
Date Analyzed: 03/22/2011 1809
Date Prepared: 03/22/2011 1255

Analysis Batch: 280-58997
Prep Batch: 280-58365

Instrument ID: MT_033
Lab File ID: 110322AD.txt
Initial Weight/Volume: 0.60 g
Final Weight/Volume: 50 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Mercury		0.0072	B	0.0059	0.018

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J5**

Lab Sample ID: 280-13666-3
Client Matrix: Solid

% Moisture: 8.5

Date Sampled: 03/16/2011 0940
Date Received: 03/18/2011 0930

6010B Metals (ICP)

Method: 6010B
Preparation: 3050B
Dilution: 1.0
Date Analyzed: 03/21/2011 1814
Date Prepared: 03/21/2011 0800

Analysis Batch: 280-58691
Prep Batch: 280-58313

Instrument ID: MT_025
Lab File ID: 25B032111.asc
Initial Weight/Volume: 1.13 g
Final Weight/Volume: 100 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Aluminum		6760	X	1.5	4.8
Antimony		0.37	U	0.37	0.58
Arsenic		3.2		0.64	0.97
Barium		72.2	X	0.074	0.48
Beryllium		0.12	B	0.032	0.19
Boron		1.1	B	0.95	1.9
Cadmium		0.10	B	0.040	0.19
Calcium		7580	X	13.6	48.4
Chromium		16.2	X	0.056	0.19
Cobalt		8.4	X	0.097	0.97
Copper		15.3	X	0.21	0.97
Iron		20500	X	3.7	4.8
Magnesium		4850	X	3.6	19.3
Manganese		294	X	0.097	0.97
Molybdenum		0.25	U	0.25	1.9
Nickel		11.3	X	0.12	3.9
Potassium		986		39.7	290
Selenium		0.83	U	0.83	0.97
Silicon		242		5.5	9.7
Silver		0.15	U	0.15	0.19
Sodium		294		57.1	116
Vanadium		50.7	X	0.091	1.9
Zinc		40.9	X	0.39	0.97

Method: 6010B
Preparation: 3050B
Dilution: 1.0
Date Analyzed: 03/24/2011 0106
Date Prepared: 03/23/2011 1400

Analysis Batch: 280-59075
Prep Batch: 280-59003

Instrument ID: MT_025
Lab File ID: 25A4032311.asc
Initial Weight/Volume: 1.04 g
Final Weight/Volume: 100 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Lead		3.9		0.28	0.53

7471A Mercury (CVAA)

Method: 7471A
Preparation: 7471A
Dilution: 1.0
Date Analyzed: 03/22/2011 1816
Date Prepared: 03/22/2011 1255

Analysis Batch: 280-58997
Prep Batch: 280-58365

Instrument ID: MT_033
Lab File ID: 110322AD.txt
Initial Weight/Volume: 0.60 g
Final Weight/Volume: 50 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Mercury		0.022		0.0060	0.019

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J6**

Lab Sample ID: 280-13666-4
Client Matrix: Solid

% Moisture: 8.9

Date Sampled: 03/16/2011 0945
Date Received: 03/18/2011 0930

6010B Metals (ICP)

Method: 6010B
Preparation: 3050B
Dilution: 1.0
Date Analyzed: 03/21/2011 1816
Date Prepared: 03/21/2011 0800

Analysis Batch: 280-58691
Prep Batch: 280-58313

Instrument ID: MT_025
Lab File ID: 25B032111.asc
Initial Weight/Volume: 1.14 g
Final Weight/Volume: 100 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Aluminum		6960	X	1.5	4.8
Antimony		0.37	U	0.37	0.58
Arsenic		2.5		0.64	0.96
Barium		69.4	X	0.073	0.48
Beryllium		0.13	B	0.032	0.19
Boron		0.94	U	0.94	1.9
Cadmium		0.082	B	0.039	0.19
Calcium		5640	X	13.6	48.1
Chromium		16.6	X	0.056	0.19
Cobalt		7.5	X	0.096	0.96
Copper		15.2	X	0.21	0.96
Iron		20100	X	3.7	4.8
Magnesium		4950	X	3.6	19.2
Manganese		273	X	0.096	0.96
Molybdenum		0.25	U	0.25	1.9
Nickel		9.5	X	0.12	3.8
Potassium		839		39.5	289
Selenium		0.83	U	0.83	0.96
Silicon		165		5.4	9.6
Silver		0.15	U	0.15	0.19
Sodium		252		56.8	115
Vanadium		49.1	X	0.090	1.9
Zinc		39.8	X	0.38	0.96

Method: 6010B
Preparation: 3050B
Dilution: 1.0
Date Analyzed: 03/24/2011 0109
Date Prepared: 03/23/2011 1400

Analysis Batch: 280-59075
Prep Batch: 280-59003

Instrument ID: MT_025
Lab File ID: 25A4032311.asc
Initial Weight/Volume: 1.04 g
Final Weight/Volume: 100 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Lead		7.6		0.28	0.53

7471A Mercury (CVAA)

Method: 7471A
Preparation: 7471A
Dilution: 1.0
Date Analyzed: 03/22/2011 1823
Date Prepared: 03/22/2011 1255

Analysis Batch: 280-58997
Prep Batch: 280-58365

Instrument ID: MT_033
Lab File ID: 110322AD.txt
Initial Weight/Volume: 0.69 g
Final Weight/Volume: 50 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Mercury		0.50		0.0053	0.016

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J7**

Lab Sample ID: 280-13666-5
Client Matrix: Solid

% Moisture: 10.6

Date Sampled: 03/16/2011 0950
Date Received: 03/18/2011 0930

6010B Metals (ICP)

Method: 6010B
Preparation: 3050B
Dilution: 1.0
Date Analyzed: 03/21/2011 1819
Date Prepared: 03/21/2011 0800

Analysis Batch: 280-58691
Prep Batch: 280-58313

Instrument ID: MT_025
Lab File ID: 25B032111.asc
Initial Weight/Volume: 1.11 g
Final Weight/Volume: 100 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Aluminum		6820	X	1.6	5.0
Antimony		0.38	U	0.38	0.60
Arsenic		2.5		0.67	1.0
Barium		68.2	X	0.077	0.50
Beryllium		0.11	B	0.033	0.20
Boron		0.99	B	0.99	2.0
Cadmium		0.096	B	0.041	0.20
Calcium		7800	X	14.2	50.4
Chromium		16.7	X	0.058	0.20
Cobalt		8.5	X	0.10	1.0
Copper		16.3	X	0.22	1.0
Iron		21000	X	3.8	5.0
Magnesium		4910	X	3.7	20.2
Manganese		320	X	0.10	1.0
Molybdenum		0.26	U	0.26	2.0
Nickel		11.4	X	0.12	4.0
Potassium		1040		41.3	302
Selenium		0.87	U	0.87	1.0
Silicon		250		5.7	10.1
Silver		0.16	U	0.16	0.20
Sodium		287		59.5	121
Vanadium		52.0	X	0.095	2.0
Zinc		42.7	X	0.40	1.0

Method: 6010B
Preparation: 3050B
Dilution: 1.0
Date Analyzed: 03/24/2011 0111
Date Prepared: 03/23/2011 1400

Analysis Batch: 280-59075
Prep Batch: 280-59003

Instrument ID: MT_025
Lab File ID: 25A4032311.asc
Initial Weight/Volume: 1.18 g
Final Weight/Volume: 100 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Lead		4.6		0.26	0.47

7471A Mercury (CVAA)

Method: 7471A
Preparation: 7471A
Dilution: 1.0
Date Analyzed: 03/22/2011 1825
Date Prepared: 03/22/2011 1255

Analysis Batch: 280-58997
Prep Batch: 280-58365

Instrument ID: MT_033
Lab File ID: 110322AD.txt
Initial Weight/Volume: 0.64 g
Final Weight/Volume: 50 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Mercury		0.019		0.0058	0.018

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Client Sample ID: **J1F1J8**

Lab Sample ID: 280-13666-6
Client Matrix: Solid

% Moisture: 7.1

Date Sampled: 03/16/2011 0930
Date Received: 03/18/2011 0930

6010B Metals (ICP)

Method: 6010B
Preparation: 3050B
Dilution: 1.0
Date Analyzed: 03/21/2011 1821
Date Prepared: 03/21/2011 0800

Analysis Batch: 280-58691
Prep Batch: 280-58313

Instrument ID: MT_025
Lab File ID: 25B032111.asc
Initial Weight/Volume: 1.06 g
Final Weight/Volume: 100 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Aluminum		7080	X	1.6	5.1
Antimony		0.39	U	0.39	0.61
Arsenic		2.3		0.67	1.0
Barium		57.0	X	0.077	0.51
Beryllium		0.12	B	0.033	0.20
Boron		0.99	U	0.99	2.0
Cadmium		0.076	B	0.042	0.20
Calcium		6670	X	14.3	50.8
Chromium		14.9	X	0.059	0.20
Cobalt		8.8	X	0.10	1.0
Copper		17.9	X	0.22	1.0
Iron		20900	X	3.9	5.1
Magnesium		5400	X	3.8	20.3
Manganese		294	X	0.10	1.0
Molybdenum		0.26	U	0.26	2.0
Nickel		13.0	X	0.12	4.1
Potassium		813		41.6	305
Selenium		0.87	U	0.87	1.0
Silicon		172		5.7	10.2
Silver		0.16	U	0.16	0.20
Sodium		388		59.9	122
Vanadium		49.9	X	0.095	2.0
Zinc		39.7	X	0.40	1.0

Method: 6010B
Preparation: 3050B
Dilution: 1.0
Date Analyzed: 03/24/2011 0113
Date Prepared: 03/23/2011 1400

Analysis Batch: 280-59075
Prep Batch: 280-59003

Instrument ID: MT_025
Lab File ID: 25A4032311.asc
Initial Weight/Volume: 1.04 g
Final Weight/Volume: 100 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Lead		3.0		0.28	0.52

7471A Mercury (CVAA)

Method: 7471A
Preparation: 7471A
Dilution: 1.0
Date Analyzed: 03/22/2011 1827
Date Prepared: 03/22/2011 1255

Analysis Batch: 280-58997
Prep Batch: 280-58365

Instrument ID: MT_033
Lab File ID: 110322AD.txt
Initial Weight/Volume: 0.69 g
Final Weight/Volume: 50 mL

Analyte	DryWt Corrected: Y	Result (mg/Kg)	Qualifier	MDL	RL
Mercury		0.023		0.0052	0.016

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

General Chemistry

Client Sample ID: **J1F1J3**

Lab Sample ID: 280-13666-1
Client Matrix: Solid
% Moisture: 8.1

Date Sampled: 03/16/2011 0930
Date Received: 03/18/2011 0930

Analyte	Result	Qual	Units	MDL	RL	Dil	Method
Nitrate Nitrite as N-Soluble	0.39	U	mg/Kg	0.39	0.81	1.0	353.2
Analysis Batch: 280-58815	Date Analyzed: 03/22/2011 1358						DryWt Corrected: Y
Chloride-Soluble	2.1	U	mg/Kg	2.1	5.3	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2054						DryWt Corrected: Y
Nitrate as N-Soluble	0.53	B	mg/Kg	0.33	2.7	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2054						DryWt Corrected: Y
Bromide-Soluble	0.41	U	mg/Kg	0.41	2.1	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2054						DryWt Corrected: Y
Nitrite as N-Soluble	0.36	U	mg/Kg	0.36	2.7	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2054						DryWt Corrected: Y
Orthophosphate as P-Soluble	1.3	U	mg/Kg	1.3	5.3	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2054						DryWt Corrected: Y
Sulfate-Soluble	3.9	B	mg/Kg	1.8	5.3	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2054						DryWt Corrected: Y
Fluoride-Soluble	0.88	U	mg/Kg	0.88	5.3	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2054						DryWt Corrected: Y

Analyte	Result	Qual	Units	RL	RL	Dil	Method
pH adj. to 25 deg C-Soluble	9.40		SU	0.0100	0.0100	1.0	9045C
Analysis Batch: 280-58419	Date Analyzed: 03/19/2011 1043						DryWt Corrected: N
Percent Moisture	8.1		%	0.10	0.10	1.0	D-2216
Analysis Batch: 280-58303	Date Analyzed: 03/18/2011 1414						DryWt Corrected: N

General Chemistry

Client Sample ID: **J1F1J4**

Lab Sample ID: 280-13666-2
Client Matrix: Solid

% Moisture: 5.5

Date Sampled: 03/16/2011 0935
Date Received: 03/18/2011 0930

Analyte	Result	Qual	Units	MDL	RL	Dil	Method
Nitrate Nitrite as N-Soluble	0.35	U	mg/Kg	0.35	0.74	1.0	353.2
Analysis Batch: 280-58815	Date Analyzed: 03/22/2011 1402						DryWt Corrected: Y
Chloride-Soluble	2.0	U	mg/Kg	2.0	5.0	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2222						DryWt Corrected: Y
Nitrate as N-Soluble	0.40	B	mg/Kg	0.32	2.5	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2222						DryWt Corrected: Y
Bromide-Soluble	0.39	U	mg/Kg	0.39	2.0	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2222						DryWt Corrected: Y
Nitrite as N-Soluble	0.34	U	mg/Kg	0.34	2.5	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2222						DryWt Corrected: Y
Orthophosphate as P-Soluble	2.1	B C	mg/Kg	1.3	5.0	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2222						DryWt Corrected: Y
Sulfate-Soluble	4.3	B	mg/Kg	1.7	5.0	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2222						DryWt Corrected: Y
Fluoride-Soluble	0.83	U	mg/Kg	0.83	5.0	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2222						DryWt Corrected: Y

Analyte	Result	Qual	Units	RL	RL	Dil	Method
pH adj. to 25 deg C-Soluble	9.26		SU	0.0100	0.0100	1.0	9045C
Analysis Batch: 280-58419	Date Analyzed: 03/19/2011 1046						DryWt Corrected: N
Percent Moisture	5.5		%	0.10	0.10	1.0	D-2216
Analysis Batch: 280-58303	Date Analyzed: 03/18/2011 1414						DryWt Corrected: N

General Chemistry

Client Sample ID: **J1F1J5**

Lab Sample ID: 280-13666-3
Client Matrix: Solid
% Moisture: 8.5

Date Sampled: 03/16/2011 0940
Date Received: 03/18/2011 0930

Analyte	Result	Qual	Units	MDL	RL	Dil	Method
Nitrate Nitrite as N-Soluble	0.64	B	mg/Kg	0.37	0.78	1.0	353.2
Analysis Batch: 280-58815	Date Analyzed: 03/22/2011 1404						DryWt Corrected: Y
Chloride-Soluble	29.1		mg/Kg	2.1	5.4	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2239						DryWt Corrected: Y
Nitrate as N-Soluble	0.75	B	mg/Kg	0.34	2.7	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2239						DryWt Corrected: Y
Bromide-Soluble	0.42	U	mg/Kg	0.42	2.2	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2239						DryWt Corrected: Y
Nitrite as N-Soluble	0.36	U	mg/Kg	0.36	2.7	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2239						DryWt Corrected: Y
Orthophosphate as P-Soluble	1.3	U	mg/Kg	1.3	5.4	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2239						DryWt Corrected: Y
Sulfate-Soluble	29.3		mg/Kg	1.9	5.4	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2239						DryWt Corrected: Y
Fluoride-Soluble	1.1	B	mg/Kg	0.89	5.4	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2239						DryWt Corrected: Y

Analyte	Result	Qual	Units	RL	RL	Dil	Method
pH adj. to 25 deg C-Soluble	9.20		SU	0.0100	0.0100	1.0	9045C
Analysis Batch: 280-58419	Date Analyzed: 03/19/2011 1047						DryWt Corrected: N
Percent Moisture	8.5		%	0.10	0.10	1.0	D-2216
Analysis Batch: 280-58303	Date Analyzed: 03/18/2011 1414						DryWt Corrected: N

General Chemistry

Client Sample ID: **J1F1J6**

Lab Sample ID: 280-13666-4
Client Matrix: Solid

% Moisture: 8.9

Date Sampled: 03/16/2011 0945
Date Received: 03/18/2011 0930

Analyte	Result	Qual	Units	MDL	RL	Dil	Method
Nitrate Nitrite as N-Soluble	14.3		mg/Kg	0.37	0.78	1.0	353.2
Analysis Batch: 280-58815	Date Analyzed: 03/22/2011 1405						DryWt Corrected: Y
Chloride-Soluble	5.9		mg/Kg	2.2	5.5	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2256						DryWt Corrected: Y
Nitrate as N-Soluble	11.3		mg/Kg	0.34	2.7	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2256						DryWt Corrected: Y
Bromide-Soluble	0.43	U	mg/Kg	0.43	2.2	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2256						DryWt Corrected: Y
Nitrite as N-Soluble	0.37	U	mg/Kg	0.37	2.7	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2256						DryWt Corrected: Y
Orthophosphate as P-Soluble	1.4	U	mg/Kg	1.4	5.5	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2256						DryWt Corrected: Y
Sulfate-Soluble	27.1		mg/Kg	1.9	5.5	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2256						DryWt Corrected: Y
Fluoride-Soluble	0.90	U	mg/Kg	0.90	5.5	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2256						DryWt Corrected: Y

Analyte	Result	Qual	Units	RL	RL	Dil	Method
pH adj. to 25 deg C-Soluble	9.06		SU	0.0100	0.0100	1.0	9045C
Analysis Batch: 280-58419	Date Analyzed: 03/19/2011 1049						DryWt Corrected: N
Percent Moisture	8.9		%	0.10	0.10	1.0	D-2216
Analysis Batch: 280-58303	Date Analyzed: 03/18/2011 1414						DryWt Corrected: N

General Chemistry

Client Sample ID: **J1F1J7**

Lab Sample ID: 280-13666-5
Client Matrix: Solid
% Moisture: 10.6

Date Sampled: 03/16/2011 0950
Date Received: 03/18/2011 0930

Analyte	Result	Qual	Units	MDL	RL	Dil	Method
Nitrate Nitrite as N-Soluble	0.54	B	mg/Kg	0.38	0.79	1.0	353.2
Analysis Batch: 280-58815	Date Analyzed: 03/22/2011 1407						DryWt Corrected: Y
Chloride-Soluble	2.1	B	mg/Kg	2.1	5.4	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2314						DryWt Corrected: Y
Nitrate as N-Soluble	0.65	B	mg/Kg	0.34	2.7	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2314						DryWt Corrected: Y
Bromide-Soluble	0.42	U	mg/Kg	0.42	2.2	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2314						DryWt Corrected: Y
Nitrite as N-Soluble	0.36	U	mg/Kg	0.36	2.7	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2314						DryWt Corrected: Y
Orthophosphate as P-Soluble	1.3	U	mg/Kg	1.3	5.4	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2314						DryWt Corrected: Y
Sulfate-Soluble	8.3		mg/Kg	1.9	5.4	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2314						DryWt Corrected: Y
Fluoride-Soluble	1.1	B	mg/Kg	0.89	5.4	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2314						DryWt Corrected: Y

Analyte	Result	Qual	Units	RL	RL	Dil	Method
pH adj. to 25 deg C-Soluble	9.37		SU	0.0100	0.0100	1.0	9045C
Analysis Batch: 280-58419	Date Analyzed: 03/19/2011 1050						DryWt Corrected: N
Percent Moisture	10.6		%	0.10	0.10	1.0	D-2216
Analysis Batch: 280-58303	Date Analyzed: 03/18/2011 1414						DryWt Corrected: N

General Chemistry

Client Sample ID: **J1F1J8**

Lab Sample ID: 280-13666-6
Client Matrix: Solid
% Moisture: 7.1

Date Sampled: 03/16/2011 0930
Date Received: 03/18/2011 0930

Analyte	Result	Qual	Units	MDL	RL	Dil	Method
Nitrate Nitrite as N-Soluble	0.42	B	mg/Kg	0.38	0.79	1.0	353.2
Analysis Batch: 280-58815	Date Analyzed: 03/22/2011 1408						DryWt Corrected: Y
Chloride-Soluble	2.1	U	mg/Kg	2.1	5.3	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2331						DryWt Corrected: Y
Nitrate as N-Soluble	0.59	B	mg/Kg	0.33	2.6	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2331						DryWt Corrected: Y
Bromide-Soluble	0.41	U	mg/Kg	0.41	2.1	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2331						DryWt Corrected: Y
Nitrite as N-Soluble	0.35	U	mg/Kg	0.35	2.6	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2331						DryWt Corrected: Y
Orthophosphate as P-Soluble	1.3	U	mg/Kg	1.3	5.3	1.0	9056M
Analysis Batch: 280-58958	Date Analyzed: 03/21/2011 2331						DryWt Corrected: Y
Sulfate-Soluble	4.4	B	mg/Kg	1.8	5.3	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2331						DryWt Corrected: Y
Fluoride-Soluble	0.87	U	mg/Kg	0.87	5.3	1.0	9056M
Analysis Batch: 280-58960	Date Analyzed: 03/21/2011 2331						DryWt Corrected: Y

Analyte	Result	Qual	Units	RL	RL	Dil	Method
pH adj. to 25 deg C-Soluble	9.38		SU	0.0100	0.0100	1.0	9045C
Analysis Batch: 280-58419	Date Analyzed: 03/19/2011 1052						DryWt Corrected: N
Percent Moisture	7.1		%	0.10	0.10	1.0	D-2216
Analysis Batch: 280-58303	Date Analyzed: 03/18/2011 1414						DryWt Corrected: N

QUALITY CONTROL RESULTS

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

QC Association Summary

Lab Sample ID	Client Sample ID	Report Basis	Client Matrix	Method	Prep Batch
GC/MS Semi VOA					
Prep Batch: 280-58359					
LCS 280-58359/2-A	Lab Control Sample	T	Solid	3550C	
MB 280-58359/1-A	Method Blank	T	Solid	3550C	
280-13666-1	J1F1J3	T	Solid	3550C	
280-13666-2	J1F1J4	T	Solid	3550C	
280-13666-2MS	Matrix Spike	T	Solid	3550C	
280-13666-2MSD	Matrix Spike Duplicate	T	Solid	3550C	
280-13666-3	J1F1J5	T	Solid	3550C	
280-13666-4	J1F1J6	T	Solid	3550C	
280-13666-5	J1F1J7	T	Solid	3550C	
280-13666-6	J1F1J8	T	Solid	3550C	
Analysis Batch:280-58674					
LCS 280-58359/2-A	Lab Control Sample	T	Solid	8270C	280-58359
MB 280-58359/1-A	Method Blank	T	Solid	8270C	280-58359
280-13666-1	J1F1J3	T	Solid	8270C	280-58359
280-13666-2	J1F1J4	T	Solid	8270C	280-58359
280-13666-2MS	Matrix Spike	T	Solid	8270C	280-58359
280-13666-2MSD	Matrix Spike Duplicate	T	Solid	8270C	280-58359
280-13666-3	J1F1J5	T	Solid	8270C	280-58359
280-13666-4	J1F1J6	T	Solid	8270C	280-58359
280-13666-5	J1F1J7	T	Solid	8270C	280-58359
280-13666-6	J1F1J8	T	Solid	8270C	280-58359

Report Basis
T = Total

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

QC Association Summary

Lab Sample ID	Client Sample ID	Report Basis	Client Matrix	Method	Prep Batch
GC Semi VOA					
Prep Batch: 280-58378					
LCS 280-58378/2-A	Lab Control Sample	T	Solid	3550C	
MB 280-58378/1-A	Method Blank	T	Solid	3550C	
280-13666-1	J1F1J3	T	Solid	3550C	
280-13666-1MS	Matrix Spike	T	Solid	3550C	
280-13666-1MSD	Matrix Spike Duplicate	T	Solid	3550C	
280-13666-2	J1F1J4	T	Solid	3550C	
280-13666-3	J1F1J5	T	Solid	3550C	
280-13666-4	J1F1J6	T	Solid	3550C	
280-13666-5	J1F1J7	T	Solid	3550C	
280-13666-6	J1F1J8	T	Solid	3550C	
Analysis Batch:280-58722					
LCS 280-58378/2-A	Lab Control Sample	T	Solid	8081A	280-58378
MB 280-58378/1-A	Method Blank	T	Solid	8081A	280-58378
280-13666-1	J1F1J3	T	Solid	8081A	280-58378
280-13666-1MS	Matrix Spike	T	Solid	8081A	280-58378
280-13666-1MSD	Matrix Spike Duplicate	T	Solid	8081A	280-58378
280-13666-2	J1F1J4	T	Solid	8081A	280-58378
280-13666-3	J1F1J5	T	Solid	8081A	280-58378
280-13666-4	J1F1J6	T	Solid	8081A	280-58378
280-13666-5	J1F1J7	T	Solid	8081A	280-58378
280-13666-6	J1F1J8	T	Solid	8081A	280-58378

Report Basis
T = Total

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

QC Association Summary

Lab Sample ID	Client Sample ID	Report Basis	Client Matrix	Method	Prep Batch
Metals					
Prep Batch: 280-58313					
LCS 280-58313/2-A	Lab Control Sample	T	Solid	3050B	
MB 280-58313/1-A	Method Blank	T	Solid	3050B	
280-13666-1	J1F1J3	T	Solid	3050B	
280-13666-1DU	Duplicate	T	Solid	3050B	
280-13666-1MS	Matrix Spike	T	Solid	3050B	
280-13666-2	J1F1J4	T	Solid	3050B	
280-13666-3	J1F1J5	T	Solid	3050B	
280-13666-4	J1F1J6	T	Solid	3050B	
280-13666-5	J1F1J7	T	Solid	3050B	
280-13666-6	J1F1J8	T	Solid	3050B	
Prep Batch: 280-58365					
LCS 280-58365/2-A	Lab Control Sample	T	Solid	7471A	
MB 280-58365/1-A	Method Blank	T	Solid	7471A	
280-13666-1	J1F1J3	T	Solid	7471A	
280-13666-2	J1F1J4	T	Solid	7471A	
280-13666-2DU	Duplicate	T	Solid	7471A	
280-13666-2MS	Matrix Spike	T	Solid	7471A	
280-13666-3	J1F1J5	T	Solid	7471A	
280-13666-4	J1F1J6	T	Solid	7471A	
280-13666-5	J1F1J7	T	Solid	7471A	
280-13666-6	J1F1J8	T	Solid	7471A	
Analysis Batch:280-58691					
LCS 280-58313/2-A	Lab Control Sample	T	Solid	6010B	280-58313
MB 280-58313/1-A	Method Blank	T	Solid	6010B	280-58313
280-13666-1	J1F1J3	T	Solid	6010B	280-58313
280-13666-1DU	Duplicate	T	Solid	6010B	280-58313
280-13666-1MS	Matrix Spike	T	Solid	6010B	280-58313
280-13666-2	J1F1J4	T	Solid	6010B	280-58313
280-13666-3	J1F1J5	T	Solid	6010B	280-58313
280-13666-4	J1F1J6	T	Solid	6010B	280-58313
280-13666-5	J1F1J7	T	Solid	6010B	280-58313
280-13666-6	J1F1J8	T	Solid	6010B	280-58313

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

QC Association Summary

Lab Sample ID	Client Sample ID	Report Basis	Client Matrix	Method	Prep Batch
Metals					
Analysis Batch:280-58997					
LCS 280-58365/2-A	Lab Control Sample	T	Solid	7471A	280-58365
MB 280-58365/1-A	Method Blank	T	Solid	7471A	280-58365
280-13666-1	J1F1J3	T	Solid	7471A	280-58365
280-13666-2	J1F1J4	T	Solid	7471A	280-58365
280-13666-2DU	Duplicate	T	Solid	7471A	280-58365
280-13666-2MS	Matrix Spike	T	Solid	7471A	280-58365
280-13666-3	J1F1J5	T	Solid	7471A	280-58365
280-13666-4	J1F1J6	T	Solid	7471A	280-58365
280-13666-5	J1F1J7	T	Solid	7471A	280-58365
280-13666-6	J1F1J8	T	Solid	7471A	280-58365
Prep Batch: 280-59003					
LCS 280-59003/2-A	Lab Control Sample	T	Solid	3050B	
MB 280-59003/1-A	Method Blank	T	Solid	3050B	
280-13666-1	J1F1J3	T	Solid	3050B	
280-13666-1DU	Duplicate	T	Solid	3050B	
280-13666-1MS	Matrix Spike	T	Solid	3050B	
280-13666-2	J1F1J4	T	Solid	3050B	
280-13666-3	J1F1J5	T	Solid	3050B	
280-13666-4	J1F1J6	T	Solid	3050B	
280-13666-5	J1F1J7	T	Solid	3050B	
280-13666-6	J1F1J8	T	Solid	3050B	
Analysis Batch:280-59075					
LCS 280-59003/2-A	Lab Control Sample	T	Solid	6010B	280-59003
MB 280-59003/1-A	Method Blank	T	Solid	6010B	280-59003
280-13666-1	J1F1J3	T	Solid	6010B	280-59003
280-13666-1DU	Duplicate	T	Solid	6010B	280-59003
280-13666-1MS	Matrix Spike	T	Solid	6010B	280-59003
280-13666-2	J1F1J4	T	Solid	6010B	280-59003
280-13666-3	J1F1J5	T	Solid	6010B	280-59003
280-13666-4	J1F1J6	T	Solid	6010B	280-59003
280-13666-5	J1F1J7	T	Solid	6010B	280-59003
280-13666-6	J1F1J8	T	Solid	6010B	280-59003

Report Basis
T = Total

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

QC Association Summary

Lab Sample ID	Client Sample ID	Report Basis	Client Matrix	Method	Prep Batch
General Chemistry					
Analysis Batch:280-58303					
280-13666-1	J1F1J3	T	Solid	D-2216	
280-13666-1DU	Duplicate	T	Solid	D-2216	
280-13666-2	J1F1J4	T	Solid	D-2216	
280-13666-3	J1F1J5	T	Solid	D-2216	
280-13666-4	J1F1J6	T	Solid	D-2216	
280-13666-5	J1F1J7	T	Solid	D-2216	
280-13666-6	J1F1J8	T	Solid	D-2216	
Prep Batch: 280-58399					
280-13666-1	J1F1J3	S	Solid	DI Leach	
280-13666-1DU	Duplicate	S	Solid	DI Leach	
280-13666-2	J1F1J4	S	Solid	DI Leach	
280-13666-3	J1F1J5	S	Solid	DI Leach	
280-13666-4	J1F1J6	S	Solid	DI Leach	
280-13666-5	J1F1J7	S	Solid	DI Leach	
280-13666-6	J1F1J8	S	Solid	DI Leach	
Analysis Batch:280-58419					
LCS 280-58419/4	Lab Control Sample	T	Water	9045C	
LCSD 280-58419/5	Lab Control Sample Duplicate	T	Water	9045C	
280-13666-1	J1F1J3	S	Solid	9045C	
280-13666-1DU	Duplicate	S	Solid	9045C	
280-13666-2	J1F1J4	S	Solid	9045C	
280-13666-3	J1F1J5	S	Solid	9045C	
280-13666-4	J1F1J6	S	Solid	9045C	
280-13666-5	J1F1J7	S	Solid	9045C	
280-13666-6	J1F1J8	S	Solid	9045C	
Prep Batch: 280-58551					
LCS 280-58551/1-A	Lab Control Sample	S	Solid	DI Leach	
MB 280-58551/2-A	Method Blank	S	Solid	DI Leach	
280-13666-1	J1F1J3	S	Solid	DI Leach	
280-13666-1DU	Duplicate	S	Solid	DI Leach	
280-13666-1MS	Matrix Spike	S	Solid	DI Leach	
280-13666-2	J1F1J4	S	Solid	DI Leach	
280-13666-3	J1F1J5	S	Solid	DI Leach	
280-13666-4	J1F1J6	S	Solid	DI Leach	
280-13666-5	J1F1J7	S	Solid	DI Leach	
280-13666-6	J1F1J8	S	Solid	DI Leach	

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

QC Association Summary

Lab Sample ID	Client Sample ID	Report Basis	Client Matrix	Method	Prep Batch
General Chemistry					
Prep Batch: 280-58700					
LCS 280-58700/2-A	Lab Control Sample	S	Solid	DI Leach	
MB 280-58700/1-A	Method Blank	S	Solid	DI Leach	
280-13666-1	J1F1J3	S	Solid	DI Leach	
280-13666-1DU	Duplicate	S	Solid	DI Leach	
280-13666-1MS	Matrix Spike	S	Solid	DI Leach	
280-13666-2	J1F1J4	S	Solid	DI Leach	
280-13666-3	J1F1J5	S	Solid	DI Leach	
280-13666-4	J1F1J6	S	Solid	DI Leach	
280-13666-5	J1F1J7	S	Solid	DI Leach	
280-13666-6	J1F1J8	S	Solid	DI Leach	
Analysis Batch:280-58815					
LCS 280-58700/2-A	Lab Control Sample	S	Solid	353.2	
MB 280-58700/1-A	Method Blank	S	Solid	353.2	
280-13666-1	J1F1J3	S	Solid	353.2	
280-13666-1DU	Duplicate	S	Solid	353.2	
280-13666-1MS	Matrix Spike	S	Solid	353.2	
280-13666-2	J1F1J4	S	Solid	353.2	
280-13666-3	J1F1J5	S	Solid	353.2	
280-13666-4	J1F1J6	S	Solid	353.2	
280-13666-5	J1F1J7	S	Solid	353.2	
280-13666-6	J1F1J8	S	Solid	353.2	
Analysis Batch:280-58958					
LCS 280-58551/1-A	Lab Control Sample	S	Solid	9056M	
MB 280-58551/2-A	Method Blank	S	Solid	9056M	
280-13666-1	J1F1J3	S	Solid	9056M	
280-13666-1DU	Duplicate	S	Solid	9056M	
280-13666-1MS	Matrix Spike	S	Solid	9056M	
280-13666-2	J1F1J4	S	Solid	9056M	
280-13666-3	J1F1J5	S	Solid	9056M	
280-13666-4	J1F1J6	S	Solid	9056M	
280-13666-5	J1F1J7	S	Solid	9056M	
280-13666-6	J1F1J8	S	Solid	9056M	

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

QC Association Summary

Lab Sample ID	Client Sample ID	Report Basis	Client Matrix	Method	Prep Batch
General Chemistry					
Analysis Batch:280-58960					
LCS 280-58551/1-A	Lab Control Sample	S	Solid	9056M	
MB 280-58551/2-A	Method Blank	S	Solid	9056M	
280-13666-1	J1F1J3	S	Solid	9056M	
280-13666-1DU	Duplicate	S	Solid	9056M	
280-13666-1MS	Matrix Spike	S	Solid	9056M	
280-13666-2	J1F1J4	S	Solid	9056M	
280-13666-3	J1F1J5	S	Solid	9056M	
280-13666-4	J1F1J6	S	Solid	9056M	
280-13666-5	J1F1J7	S	Solid	9056M	
280-13666-6	J1F1J8	S	Solid	9056M	

Report Basis
S = Soluble
T = Total

HPLC/IC					
Prep Batch: 280-58367					
LCS 280-58367/2-A	Lab Control Sample	T	Solid	3550C	
MB 280-58367/1-A	Method Blank	T	Solid	3550C	
280-13666-1	J1F1J3	T	Solid	3550C	
280-13666-1MS	Matrix Spike	T	Solid	3550C	
280-13666-1MSD	Matrix Spike Duplicate	T	Solid	3550C	
280-13666-2	J1F1J4	T	Solid	3550C	
280-13666-3	J1F1J5	T	Solid	3550C	
280-13666-4	J1F1J6	T	Solid	3550C	
280-13666-5	J1F1J7	T	Solid	3550C	
280-13666-6	J1F1J8	T	Solid	3550C	
Analysis Batch:280-58521					
LCS 280-58367/2-A	Lab Control Sample	T	Solid	8310	280-58367
MB 280-58367/1-A	Method Blank	T	Solid	8310	280-58367
280-13666-1	J1F1J3	T	Solid	8310	280-58367
280-13666-1MS	Matrix Spike	T	Solid	8310	280-58367
280-13666-1MSD	Matrix Spike Duplicate	T	Solid	8310	280-58367
280-13666-2	J1F1J4	T	Solid	8310	280-58367
280-13666-3	J1F1J5	T	Solid	8310	280-58367
280-13666-4	J1F1J6	T	Solid	8310	280-58367
280-13666-5	J1F1J7	T	Solid	8310	280-58367
280-13666-6	J1F1J8	T	Solid	8310	280-58367

Report Basis
T = Total

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Method Blank - Batch: 280-58359

Method: 8270C
Preparation: 3550C

Lab Sample ID: MB 280-58359/1-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 1132
Date Prepared: 03/18/2011 1849

Analysis Batch: 280-58674
Prep Batch: 280-58359
Units: ug/Kg

Instrument ID: MSS_Y
Lab File ID: Y9003.D
Initial Weight/Volume: 30 g
Final Weight/Volume: 1000 uL
Injection Volume: 0.5 uL

Analyte	Result	Qual	MDL	RL
Acenaphthene	10	U	10	330
Acenaphthylene	17	U	17	330
Anthracene	17	U	17	330
Benzo[a]anthracene	20	U	20	330
Benzo[a]pyrene	20	U	20	330
Benzo[b]fluoranthene	26	U	26	330
Benzo[ghi]perylene	16	U	16	330
Benzo[k]fluoranthene	40	U	40	330
Bis(2-chloroethoxy)methane	23	U	23	330
Bis(2-chloroethyl)ether	17	U	17	330
bis (2-chloroisopropyl) ether	23	U	23	330
Bis(2-ethylhexyl) phthalate	108	J	46	330
4-Bromophenyl phenyl ether	19	U	19	330
Butyl benzyl phthalate	43	U	43	330
Carbazole	36	U	36	330
4-Chloroaniline	82	U	82	330
4-Chloro-3-methylphenol	66	U	66	330
2-Chloronaphthalene	10	U	10	330
2-Chlorophenol	21	U	21	330
4-Chlorophenyl phenyl ether	21	U	21	330
Chrysene	27	U	27	330
Dibenz(a,h)anthracene	19	U	19	330
Dibenzofuran	20	U	20	330
1,2-Dichlorobenzene	22	U	22	330
1,3-Dichlorobenzene	12	U	12	330
1,4-Dichlorobenzene	14	U	14	330
3,3'-Dichlorobenzidine	90	U	90	660
2,4-Dichlorophenol	10	U	10	330
Diethyl phthalate	26	U	26	330
2,4-Dimethylphenol	66	U	66	330
Dimethyl phthalate	23	U	23	330
Di-n-butyl phthalate	29	U	29	330
4,6-Dinitro-2-methylphenol	330	U	330	660
2,4-Dinitrophenol	330	U	330	830
2,4-Dinitrotoluene	66	U	66	330
2,6-Dinitrotoluene	28	U	28	330
Di-n-octyl phthalate	14	U	14	330
Fluoranthene	36	U	36	330
Fluorene	18	U	18	330
Hexachlorobenzene	29	U	29	330
Hexachlorobutadiene	10	U	10	330
Hexachlorocyclopentadiene	50	U	50	330
Hexachloroethane	21	U	21	330

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Method Blank - Batch: 280-58359

Method: 8270C
Preparation: 3550C

Lab Sample ID:	MB 280-58359/1-A	Analysis Batch:	280-58674	Instrument ID:	MSS_Y
Client Matrix:	Solid	Prep Batch:	280-58359	Lab File ID:	Y9003.D
Dilution:	1.0	Units:	ug/Kg	Initial Weight/Volume:	30 g
Date Analyzed:	03/21/2011 1132			Final Weight/Volume:	1000 uL
Date Prepared:	03/18/2011 1849			Injection Volume:	0.5 uL

Analyte	Result	Qual	MDL	RL
Indeno[1,2,3-cd]pyrene	22	U	22	330
Isophorone	17	U	17	330
2-Methylnaphthalene	19	U	19	330
2-Methylphenol	13	U	13	330
3 & 4 Methylphenol	33	U	33	330
Naphthalene	31	U	31	330
2-Nitroaniline	50	U	50	330
3-Nitroaniline	73	U	73	330
4-Nitroaniline	73	U	73	330
Nitrobenzene	22	U	22	330
2-Nitrophenol	10	U	10	330
4-Nitrophenol	97	U	97	660
N-Nitrosodi-n-propylamine	31	U	31	330
N-Nitrosodiphenylamine	21	U	21	330
Pentachlorophenol	330	U	330	660
Phenanthrene	17	U	17	330
Phenol	18	U	18	330
Pyrene	12	U	12	330
1,2,4-Trichlorobenzene	28	U	28	330
2,4,5-Trichlorophenol	10	U	10	330
2,4,6-Trichlorophenol	10	U	10	330

Surrogate	% Rec	Acceptance Limits
2-Fluorobiphenyl	80	50 - 120
2-Fluorophenol	85	53 - 120
Nitrobenzene-d5	82	50 - 120
Phenol-d5	85	52 - 120
Terphenyl-d14	93	55 - 120
2,4,6-Tribromophenol	71	51 - 120

Method Blank TICs- Batch: 280-58359

Cas Number	Analyte	RT	Est. Result	Qual
2213-23-2	Heptane, 2,4-dimethyl-	3.06	148	N J
2216-30-0	Heptane, 2,5-dimethyl-	3.17	155	N J
	Unknown	3.25	3630	N J

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Lab Control Sample - Batch: 280-58359

Method: 8270C
Preparation: 3550C

Lab Sample ID: LCS 280-58359/2-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 1023
Date Prepared: 03/18/2011 1849

Analysis Batch: 280-58674
Prep Batch: 280-58359
Units: ug/Kg

Instrument ID: MSS_Y
Lab File ID: Y8999.D
Initial Weight/Volume: 30 g
Final Weight/Volume: 1000 uL
Injection Volume: 0.5 uL

Analyte	Spike Amount	Result	% Rec.	Limit	Qual
Acenaphthene	2670	2110	79	52 - 120	
Anthracene	2670	2390	89	57 - 120	
Carbazole	2670	2400	90	54 - 120	
4-Chloro-3-methylphenol	2670	2270	85	57 - 120	
2-Chlorophenol	2670	2070	78	53 - 120	
1,4-Dichlorobenzene	2670	1910	71	46 - 120	
2,4-Dinitrotoluene	2670	2510	94	53 - 120	
2-Methylnaphthalene	2670	2040	77	55 - 120	
2-Methylphenol	2670	2150	81	51 - 120	
4-Nitrophenol	2670	2260	85	41 - 120	
N-Nitrosodi-n-propylamine	2670	2180	82	51 - 120	
Pentachlorophenol	2670	2270	85	30 - 120	
Phenol	2670	2190	82	54 - 120	
Pyrene	2670	2460	92	50 - 120	
1,2,4-Trichlorobenzene	2670	1790	67	50 - 120	
2,4,6-Trichlorophenol	2670	2320	87	50 - 120	

Surrogate	% Rec	Acceptance Limits
2-Fluorobiphenyl	77	50 - 120
2-Fluorophenol	82	53 - 120
Nitrobenzene-d5	80	50 - 120
Phenol-d5	83	52 - 120
Terphenyl-d14	90	55 - 120
2,4,6-Tribromophenol	80	51 - 120

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Matrix Spike/
Matrix Spike Duplicate Recovery Report - Batch: 280-58359

Method: 8270C
Preparation: 3550C

MS Lab Sample ID:	280-13666-2	Analysis Batch: 280-58674	Instrument ID: MSS_Y
Client Matrix:	Solid	Prep Batch: 280-58359	Lab File ID: Y9000.D
Dilution:	1.0		Initial Weight/Volume: 30.5 g
Date Analyzed:	03/21/2011 1043		Final Weight/Volume: 1000 uL
Date Prepared:	03/18/2011 1849		Injection Volume: 0.5 uL

MSD Lab Sample ID:	280-13666-2	Analysis Batch: 280-58674	Instrument ID: MSS_Y
Client Matrix:	Solid	Prep Batch: 280-58359	Lab File ID: Y9001.D
Dilution:	1.0		Initial Weight/Volume: 30.5 g
Date Analyzed:	03/21/2011 1103		Final Weight/Volume: 1000 uL
Date Prepared:	03/18/2011 1849		Injection Volume: 0.5 uL

Analyte	% Rec. MS	% Rec. MSD	Limit	RPD	RPD Limit	MS Qual	MSD Qual
Acenaphthene	84	80	52 - 120	5	30		
Anthracene	95	93	57 - 120	2	30		
Carbazole	95	93	54 - 120	2	30		
4-Chloro-3-methylphenol	91	90	57 - 120	1	30		
2-Chlorophenol	83	80	53 - 120	4	30		
1,4-Dichlorobenzene	75	74	46 - 120	1	30		
2,4-Dinitrotoluene	97	95	53 - 120	2	30		
2-Methylnaphthalene	82	78	55 - 120	5	30		
2-Methylphenol	86	84	51 - 120	2	30		
4-Nitrophenol	87	88	41 - 120	1	30		
N-Nitrosodi-n-propylamine	87	83	51 - 120	4	30		
Pentachlorophenol	89	87	30 - 120	2	30		
Phenol	88	85	54 - 120	3	30		
Pyrene	97	98	50 - 120	1	38		
1,2,4-Trichlorobenzene	72	69	50 - 120	3	30		
2,4,6-Trichlorophenol	91	88	50 - 120	4	30		

Surrogate	MS % Rec	MSD % Rec	Acceptance Limits
2-Fluorobiphenyl	83	79	50 - 120
2-Fluorophenol	87	83	53 - 120
Nitrobenzene-d5	88	84	50 - 120
Phenol-d5	89	85	52 - 120
Terphenyl-d14	94	93	55 - 120
2,4,6-Tribromophenol	83	80	51 - 120

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Method Blank - Batch: 280-58378

Method: 8081A
Preparation: 3550C

Lab Sample ID: MB 280-58378/1-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/22/2011 0138
Date Prepared: 03/18/2011 2000

Analysis Batch: 280-58722
Prep Batch: 280-58378
Units: ug/Kg

Instrument ID: GCS_P1
Lab File ID: 048F4801.D
Initial Weight/Volume: 30 g
Final Weight/Volume: 10000 uL
Injection Volume: 1 uL
Column ID: PRIMARY

Analyte	Result	Qual	MDL	RL
4,4'-DDD	0.55	U	0.55	1.7
4,4'-DDE	0.24	U	0.24	1.7
4,4'-DDT	0.59	U	0.59	1.7
Aldrin	0.25	U	0.25	1.7
alpha-BHC	0.21	U	0.21	1.7
beta-BHC	0.66	U	0.66	1.7
delta-BHC	0.40	U	0.40	1.7
gamma-BHC (Lindane)	0.46	U	0.46	1.7
Heptachlor	0.21	U	0.21	1.7
Heptachlor epoxide	0.43	U	0.43	1.7
Endosulfan I	0.18	U	0.18	1.7
Endosulfan II	0.29	U	0.29	1.7
Endosulfan sulfate	0.28	U	0.28	1.7
Endrin	0.31	U	0.31	1.7
Endrin aldehyde	0.17	U	0.17	1.7
Endrin ketone	0.49	U	0.49	1.7
gamma-Chlordane	0.27	U	0.27	1.7
Methoxychlor	0.45	U	0.45	3.3
alpha-Chlordane	0.32	U	0.32	1.7
Dieldrin	0.21	U	0.21	1.7
Toxaphene	16	U	16	170

Surrogate	% Rec	Acceptance Limits
Tetrachloro-m-xylene	87	59 - 115
Decachlorobiphenyl	101	63 - 124

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Lab Control Sample - Batch: 280-58378

Method: 8081A
Preparation: 3550C

Lab Sample ID: LCS 280-58378/2-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 2309
Date Prepared: 03/18/2011 2000

Analysis Batch: 280-58722
Prep Batch: 280-58378
Units: ug/Kg

Instrument ID: GCS_P1
Lab File ID: 039F3901.D
Initial Weight/Volume: 30 g
Final Weight/Volume: 10000 uL
Injection Volume: 1 uL
Column ID: PRIMARY

Analyte	Spike Amount	Result	% Rec.	Limit	Qual
4,4'-DDD	16.7	13.8	83	57 - 118	
4,4'-DDE	16.7	15.4	92	61 - 115	
4,4'-DDT	16.7	15.8	95	53 - 125	
Aldrin	16.7	15.1	91	60 - 115	
alpha-BHC	16.7	15.4	92	54 - 115	
beta-BHC	16.7	15.6	94	58 - 115	
delta-BHC	16.7	15.6	94	62 - 115	
gamma-BHC (Lindane)	16.7	15.5	93	59 - 115	
Heptachlor	16.7	15.6	93	61 - 115	
Heptachlor epoxide	16.7	15.8	95	62 - 112	
Endosulfan I	16.7	15.3	92	55 - 115	
Endosulfan II	16.7	15.7	94	60 - 115	
Endosulfan sulfate	16.7	15.5	93	58 - 118	
Endrin	16.7	17.7	106	61 - 121	
Endrin aldehyde	16.7	13.3	80	54 - 115	
Endrin ketone	16.7	14.2	85	61 - 118	
gamma-Chlordane	16.7	15.5	93	60 - 115	
Methoxychlor	16.7	15.3	92	52 - 123	
alpha-Chlordane	16.7	15.4	92	60 - 115	
Dieldrin	16.7	15.9	95	63 - 117	

Surrogate	% Rec	Acceptance Limits
Tetrachloro-m-xylene	89	59 - 115
Decachlorobiphenyl	106	63 - 124

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Matrix Spike/
Matrix Spike Duplicate Recovery Report - Batch: 280-58378

Method: 8081A
Preparation: 3550C

MS Lab Sample ID:	280-13666-1	Analysis Batch: 280-58722	Instrument ID: GCS_P1
Client Matrix:	Solid	Prep Batch: 280-58378	Lab File ID: 041F4101.D
Dilution:	1.0		Initial Weight/Volume: 30.2 g
Date Analyzed:	03/21/2011 2342		Final Weight/Volume: 10000 uL
Date Prepared:	03/18/2011 2000		Injection Volume: 1 uL
			Column ID: PRIMARY

MSD Lab Sample ID:	280-13666-1	Analysis Batch: 280-58722	Instrument ID: GCS_P1
Client Matrix:	Solid	Prep Batch: 280-58378	Lab File ID: 042F4201.D
Dilution:	1.0		Initial Weight/Volume: 30.2 g
Date Analyzed:	03/21/2011 2359		Final Weight/Volume: 10000 uL
Date Prepared:	03/18/2011 2000		Injection Volume: 1 uL
			Column ID: PRIMARY

Analyte	% Rec. MS	% Rec. MSD	Limit	RPD	RPD Limit	MS Qual	MSD Qual
4,4'-DDD	79	80	57 - 118	2	20		
4,4'-DDE	88	90	61 - 115	2	15		
4,4'-DDT	91	95	53 - 125	4	29		
Aldrin	87	88	60 - 115	0	50		
alpha-BHC	89	89	54 - 115	1	17		
beta-BHC	90	91	58 - 115	1	17		
delta-BHC	89	91	62 - 115	1	19		
gamma-BHC (Lindane)	89	90	59 - 115	1	24		
Heptachlor	90	91	61 - 115	1	18		
Heptachlor epoxide	91	92	62 - 112	1	18		
Endosulfan I	88	88	55 - 115	0	26		
Endosulfan II	90	91	60 - 115	1	20		
Endosulfan sulfate	87	89	58 - 118	2	22		
Endrin	103	105	61 - 121	2	30		
Endrin aldehyde	32	7	54 - 115	127	29	N	J N *
Endrin ketone	82	82	61 - 118	1	20		
gamma-Chlordane	89	90	60 - 115	1	21		
Methoxychlor	88	93	52 - 123	5	23		
alpha-Chlordane	88	89	60 - 115	1	18		
Dieldrin	91	92	63 - 117	1	25		

Surrogate	MS % Rec	MSD % Rec	Acceptance Limits
Tetrachloro-m-xylene	85	87	59 - 115
Decachlorobiphenyl	94	94	63 - 124

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Method Blank - Batch: 280-58367

Method: 8310
Preparation: 3550C

Lab Sample ID: MB 280-58367/1-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/22/2011 0043
Date Prepared: 03/18/2011 1813

Analysis Batch: 280-58521
Prep Batch: 280-58367
Units: ug/Kg

Instrument ID: CHHPLC_G
Lab File ID: G0321027.D
Initial Weight/Volume: 30 g
Final Weight/Volume: 4000 uL
Injection Volume: 20 uL
Column ID: PRIMARY

Analyte	Result	Qual	MDL	RL
Acenaphthene	10	U	10	100
Acenaphthylene	9.0	U	9.0	100
Anthracene	3.1	U	3.1	20
Benzo[a]anthracene	3.2	U	3.2	15
Benzo[a]pyrene	6.4	U	6.4	15
Benzo[b]fluoranthene	4.2	U	4.2	15
Benzo[g,h,i]perylene	7.2	U	7.2	30
Benzo[k]fluoranthene	3.9	U	3.9	15
Chrysene	4.8	U	4.8	40
Dibenzo(a,h)anthracene	11	U	11	30
Fluoranthene	13	U	13	40
Fluorene	5.3	U	5.3	30
Indeno[1,2,3-cd]pyrene	12	U	12	30
Naphthalene	12	U	12	100
Phenanthrene	12	U	12	40
Pyrene	12	U	12	40

Surrogate	% Rec	Acceptance Limits
Terphenyl-d14 (SUR)	98	72 - 115

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Lab Control Sample - Batch: 280-58367

Method: 8310
Preparation: 3550C

Lab Sample ID: LCS 280-58367/2-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/22/2011 0113
Date Prepared: 03/18/2011 1813

Analysis Batch: 280-58521
Prep Batch: 280-58367
Units: ug/Kg

Instrument ID: CHHPLC_G
Lab File ID: G0321028.D
Initial Weight/Volume: 30 g
Final Weight/Volume: 4000 uL
Injection Volume: 20 uL
Column ID: PRIMARY

Analyte	Spike Amount	Result	% Rec.	Limit	Qual
Acenaphthene	2000	2050	103	72 - 115	
Acenaphthylene	2000	1930	96	60 - 115	
Anthracene	2000	1790	89	61 - 115	
Benzo[a]anthracene	2000	2180	109	76 - 115	
Benzo[a]pyrene	2000	1730	86	69 - 115	
Benzo[b]fluoranthene	2000	2100	105	81 - 115	
Benzo[g,h,i]perylene	2000	1990	99	71 - 115	
Benzo[k]fluoranthene	2000	2130	106	85 - 115	
Chrysene	2000	2100	105	70 - 115	
Dibenzo(a,h)anthracene	2000	2130	107	79 - 115	
Fluoranthene	2000	2090	105	67 - 115	
Fluorene	2000	2000	100	72 - 115	
Indeno[1,2,3-cd]pyrene	2000	2200	110	76 - 115	
Naphthalene	2000	2040	102	77 - 115	
Phenanthrene	2000	2060	103	79 - 115	
Pyrene	2000	2100	105	77 - 115	

Surrogate	% Rec	Acceptance Limits
Terphenyl-d14 (SUR)	98	72 - 115

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Matrix Spike/
Matrix Spike Duplicate Recovery Report - Batch: 280-58367

Method: 8310
Preparation: 3550C

MS Lab Sample ID:	280-13666-1	Analysis Batch: 280-58521	Instrument ID: CHHPLC_G
Client Matrix:	Solid	Prep Batch: 280-58367	Lab File ID: G0321030.D
Dilution:	1.0		Initial Weight/Volume: 30.3 g
Date Analyzed:	03/22/2011 0214		Final Weight/Volume: 4000 uL
Date Prepared:	03/18/2011 1813		Injection Volume: 20 uL
			Column ID: PRIMARY

MSD Lab Sample ID:	280-13666-1	Analysis Batch: 280-58521	Instrument ID: CHHPLC_G
Client Matrix:	Solid	Prep Batch: 280-58367	Lab File ID: G0321031.D
Dilution:	1.0		Initial Weight/Volume: 30.3 g
Date Analyzed:	03/22/2011 0245		Final Weight/Volume: 4000 uL
Date Prepared:	03/18/2011 1813		Injection Volume: 20 uL
			Column ID: PRIMARY

Analyte	% Rec. MS	% Rec. MSD	Limit	RPD	RPD Limit	MS Qual	MSD Qual
Acenaphthene	100	102	72 - 115	2	20		
Acenaphthylene	95	96	60 - 115	1	21		
Anthracene	89	88	61 - 115	1	20		
Benzo[a]anthracene	109	107	76 - 115	2	20		
Benzo[a]pyrene	85	84	69 - 115	2	20		
Benzo[b]fluoranthene	104	103	81 - 115	2	20		
Benzo[g,h,i]perylene	99	97	71 - 115	2	20		
Benzo[k]fluoranthene	105	103	85 - 115	2	20		
Chrysene	103	101	70 - 115	2	20		
Dibenzo(a,h)anthracene	106	104	79 - 115	2	20		
Fluoranthene	104	103	67 - 115	1	20		
Fluorene	98	98	72 - 115	1	20		
Indeno[1,2,3-cd]pyrene	110	108	76 - 115	1	20		
Naphthalene	99	101	77 - 115	2	20		
Phenanthrene	101	101	79 - 115	0	20		
Pyrene	104	103	77 - 115	1	20		

Surrogate	MS % Rec	MSD % Rec	Acceptance Limits
Terphenyl-d14 (SUR)	97	95	72 - 115

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Method Blank - Batch: 280-58313

Method: 6010B
Preparation: 3050B

Lab Sample ID: MB 280-58313/1-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 1748
Date Prepared: 03/21/2011 0800

Analysis Batch: 280-58691
Prep Batch: 280-58313
Units: mg/Kg

Instrument ID: MT_025
Lab File ID: 25B032111.asc
Initial Weight/Volume: 1 g
Final Weight/Volume: 100 mL

Analyte	Result	Qual	MDL	RL
Aluminum	1.6	U	1.6	5.0
Antimony	0.38	U	0.38	0.60
Arsenic	0.66	U	0.66	1.0
Barium	0.106	B	0.076	0.50
Beryllium	0.033	U	0.033	0.20
Boron	0.98	U	0.98	2.0
Cadmium	0.041	U	0.041	0.20
Calcium	17.32	B	14.1	50.0
Chromium	0.0640	B	0.058	0.20
Cobalt	0.10	U	0.10	1.0
Copper	0.22	U	0.22	1.0
Iron	3.8	U	3.8	5.0
Magnesium	4.48	B	3.7	20.0
Manganese	0.10	U	0.10	1.0
Molybdenum	0.26	U	0.26	2.0
Nickel	0.12	U	0.12	4.0
Potassium	41.0	U	41.0	300
Selenium	0.86	U	0.86	1.0
Silicon	5.7	U	5.7	10.0
Silver	0.16	U	0.16	0.20
Sodium	59.0	U	59.0	120
Vanadium	0.094	U	0.094	2.0
Zinc	0.40	U	0.40	1.0

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Lab Control Sample - Batch: 280-58313

Method: 6010B
Preparation: 3050B

Lab Sample ID: LCS 280-58313/2-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 1750
Date Prepared: 03/21/2011 0800

Analysis Batch: 280-58691
Prep Batch: 280-58313
Units: mg/Kg

Instrument ID: MT_025
Lab File ID: 25B032111.asc
Initial Weight/Volume: 1 g
Final Weight/Volume: 100 mL

Analyte	Spike Amount	Result	% Rec.	Limit	Qual
Aluminum	200	178.8	89	82 - 116	
Antimony	50.0	46.61	93	82 - 110	
Arsenic	100	91.76	92	85 - 110	
Barium	200	196.8	98	87 - 112	
Beryllium	5.00	4.66	93	84 - 114	
Boron	100	93.70	94	81 - 110	
Cadmium	10.0	9.81	98	87 - 110	
Calcium	5000	4663	93	82 - 114	
Chromium	20.0	19.48	97	84 - 114	
Cobalt	50.0	47.59	95	87 - 110	
Copper	25.0	24.88	100	88 - 110	
Iron	100	98.39	98	87 - 120	
Magnesium	5000	4603	92	90 - 110	
Manganese	50.0	47.53	95	88 - 110	
Molybdenum	100	98.15	98	86 - 110	
Nickel	50.0	47.38	95	87 - 110	
Potassium	5000	4864	97	89 - 110	
Selenium	200	195.2	98	83 - 110	
Silicon	1000	150.4	15	10 - 70	
Silver	5.00	4.85	97	87 - 114	
Sodium	5000	4996	100	90 - 112	
Vanadium	50.0	48.02	96	88 - 110	
Zinc	50.0	45.59	91	76 - 114	

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Matrix Spike - Batch: 280-58313

Method: 6010B
Preparation: 3050B

Lab Sample ID: 280-13666-1
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 1759
Date Prepared: 03/21/2011 0800

Analysis Batch: 280-58691
Prep Batch: 280-58313
Units: mg/Kg

Instrument ID: MT_025
Lab File ID: 25B032111.asc
Initial Weight/Volume: 1.01 g
Final Weight/Volume: 100 mL

Analyte	Sample Result/Qual		Spike Amount	Result	% Rec.	Limit	Qual
Aluminum	5930		215	7881	906	50 - 200	4
Antimony	0.34	U	53.8	29.39	55	20 - 200	
Arsenic	2.1		108	88.12	80	76 - 111	
Barium	51.1		215	252.3	93	52 - 159	
Beryllium	0.10	B	5.38	4.53	82	72 - 105	
Boron	0.89	B	108	86.00	79	75 - 107	
Cadmium	0.071	B	10.8	9.55	88	40 - 130	
Calcium	5520		5380	12280	126	43 - 165	
Chromium	13.3		21.5	33.48	93	70 - 200	
Cobalt	7.1		53.8	52.76	85	72 - 106	
Copper	14.7		26.9	39.45	92	37 - 187	
Iron	18900		108	21890	2806	70 - 200	4
Magnesium	4290		5380	10150	109	64 - 145	
Manganese	272		53.8	367.4	178	40 - 200	4
Molybdenum	0.24	B	108	90.22	84	75 - 103	
Nickel	9.0		53.8	56.28	88	61 - 126	
Potassium	672		5380	5657	93	56 - 172	
Selenium	0.78	U	215	184.8	86	76 - 104	
Silicon	178		1080	374.5	18	20 - 200	N
Silver	0.15	U	5.38	4.74	88	75 - 141	
Sodium	256		5380	5421	96	78 - 111	
Vanadium	47.8		53.8	104.9	106	50 - 169	
Zinc	36.8		53.8	85.78	91	70 - 200	

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Duplicate - Batch: 280-58313

Method: 6010B
Preparation: 3050B

Lab Sample ID: 280-13666-1
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 1757
Date Prepared: 03/21/2011 0800

Analysis Batch: 280-58691
Prep Batch: 280-58313
Units: mg/Kg

Instrument ID: MT_025
Lab File ID: 25B032111.asc
Initial Weight/Volume: 1.10 g
Final Weight/Volume: 100 mL

Analyte	Sample Result/Qual		Result	RPD	Limit	Qual
Aluminum	5930		6589	11	40	
Antimony	0.34	U	0.38	NC	40	U
Arsenic	2.1		2.60	24	30	
Barium	51.1		52.72	3	30	
Beryllium	0.10	B	0.121	17	30	B
Boron	0.89	B	0.978	9	30	B
Cadmium	0.071	B	0.0712	0.7	30	B
Calcium	5520		6727	20	30	
Chromium	13.3		14.51	8	40	
Cobalt	7.1		7.66	7	30	
Copper	14.7		15.16	3	30	
Iron	18900		19860	5	40	
Magnesium	4290		4851	12	30	
Manganese	272		283.1	4	40	
Molybdenum	0.24	B	0.26	NC	30	U
Nickel	9.0		9.89	10	30	
Potassium	672		777.1	15	40	
Selenium	0.78	U	0.85	NC	30	U
Silicon	178		420.0	81	40	M
Silver	0.15	U	0.16	NC	30	U
Sodium	256		288.4	12	30	
Vanadium	47.8		49.89	4	30	
Zinc	36.8		41.36	12	40	

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Method Blank - Batch: 280-59003

Method: 6010B
Preparation: 3050B

Lab Sample ID: MB 280-59003/1-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/24/2011 0041
Date Prepared: 03/23/2011 1400

Analysis Batch: 280-59075
Prep Batch: 280-59003
Units: mg/Kg

Instrument ID: MT_025
Lab File ID: 25A4032311.asc
Initial Weight/Volume: 1 g
Final Weight/Volume: 100 mL

Analyte	Result	Qual	MDL	RL
Lead	0.27	U	0.27	0.50

Lab Control Sample - Batch: 280-59003

Method: 6010B
Preparation: 3050B

Lab Sample ID: LCS 280-59003/2-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/24/2011 0043
Date Prepared: 03/23/2011 1400

Analysis Batch: 280-59075
Prep Batch: 280-59003
Units: mg/Kg

Instrument ID: MT_025
Lab File ID: 25A4032311.asc
Initial Weight/Volume: 1 g
Final Weight/Volume: 100 mL

Analyte	Spike Amount	Result	% Rec.	Limit	Qual
Lead	50.0	50.98	102	86 - 110	

Matrix Spike - Batch: 280-59003

Method: 6010B
Preparation: 3050B

Lab Sample ID: 280-13666-1
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/24/2011 0052
Date Prepared: 03/23/2011 1400

Analysis Batch: 280-59075
Prep Batch: 280-59003
Units: mg/Kg

Instrument ID: MT_025
Lab File ID: 25A4032311.asc
Initial Weight/Volume: 1.06 g
Final Weight/Volume: 100 mL

Analyte	Sample Result/Qual	Spike Amount	Result	% Rec.	Limit	Qual
Lead	3.0	51.3	48.79	89	70 - 200	

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Duplicate - Batch: 280-59003

Method: 6010B
Preparation: 3050B

Lab Sample ID: 280-13666-1
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/24/2011 0050
Date Prepared: 03/23/2011 1400

Analysis Batch: 280-59075
Prep Batch: 280-59003
Units: mg/Kg

Instrument ID: MT_025
Lab File ID: 25A4032311.asc
Initial Weight/Volume: 1.00 g
Final Weight/Volume: 100 mL

Analyte	Sample Result/Qual	Result	RPD	Limit	Qual
Lead	3.0	3.41	11	40	

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Method Blank - Batch: 280-58365

Method: 7471A
Preparation: 7471A

Lab Sample ID: MB 280-58365/1-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/22/2011 1802
Date Prepared: 03/22/2011 1255

Analysis Batch: 280-58997
Prep Batch: 280-58365
Units: mg/Kg

Instrument ID: MT_033
Lab File ID: 110322AD.txt
Initial Weight/Volume: 0.60 g
Final Weight/Volume: 50 mL

Analyte	Result	Qual	MDL	RL
Mercury	0.0055	U	0.0055	0.017

Lab Control Sample - Batch: 280-58365

Method: 7471A
Preparation: 7471A

Lab Sample ID: LCS 280-58365/2-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/22/2011 1804
Date Prepared: 03/22/2011 1255

Analysis Batch: 280-58997
Prep Batch: 280-58365
Units: mg/Kg

Instrument ID: MT_033
Lab File ID: 110322AD.txt
Initial Weight/Volume: 0.60 g
Final Weight/Volume: 50 mL

Analyte	Spike Amount	Result	% Rec.	Limit	Qual
Mercury	0.417	0.458	110	87 - 111	

Matrix Spike - Batch: 280-58365

Method: 7471A
Preparation: 7471A

Lab Sample ID: 280-13666-2
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/22/2011 1814
Date Prepared: 03/22/2011 1255

Analysis Batch: 280-58997
Prep Batch: 280-58365
Units: mg/Kg

Instrument ID: MT_033
Lab File ID: 110322AD.txt
Initial Weight/Volume: 0.65 g
Final Weight/Volume: 50 mL

Analyte	Sample Result/Qual		Spike Amount	Result	% Rec.	Limit	Qual
Mercury	0.0072	B	0.407	0.443	107	87 - 111	

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Duplicate - Batch: 280-58365

Method: 7471A
Preparation: 7471A

Lab Sample ID: 280-13666-2
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/22/2011 1811
Date Prepared: 03/22/2011 1255

Analysis Batch: 280-58997
Prep Batch: 280-58365
Units: mg/Kg

Instrument ID: MT_033
Lab File ID: 110322AD.txt
Initial Weight/Volume: 0.62 g
Final Weight/Volume: 50 mL

Analyte	Sample Result/Qual		Result	RPD	Limit	Qual
Mercury	0.0072	B	0.00862	18	20	B

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Method Blank - Batch: 280-58815

Method: 353.2
Preparation: N/A

Lab Sample ID: MB 280-58700/1-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/22/2011 1355
Date Prepared: N/A
Date Leached: 03/19/2011 1240

Analysis Batch: 280-58815
Prep Batch: N/A
Units: mg/Kg

Leachate Batch: 280-58700

Instrument ID: WC_Alp 2
Lab File ID: C:\FLOW_4\0322NXN.RST
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

Analyte	Result	Qual	MDL	RL
Nitrate Nitrite as N-Soluble	0.35	U	0.35	0.74

Method Reporting Limit Check - Batch: 280-58815

Method: 353.2
Preparation: N/A

Lab Sample ID: MRL 280-58815/17
Client Matrix: Water
Dilution: 1.0
Date Analyzed: 03/22/2011 1304
Date Prepared: N/A

Analysis Batch: 280-58815
Prep Batch: N/A
Units: mg/L

Instrument ID: WC_Alp 2
Lab File ID: C:\FLOW_4\0322NXN.RST
Initial Weight/Volume: 100 mL
Final Weight/Volume: 100 mL

Analyte	Spike Amount	Result	% Rec.	Limit	Qual
Nitrate Nitrite as N-Soluble	0.100	0.0805	80	50 - 150	B

Lab Control Sample - Batch: 280-58815

Method: 353.2
Preparation: N/A

Lab Sample ID: LCS 280-58700/2-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/22/2011 1356
Date Prepared: N/A
Date Leached: 03/19/2011 1240

Analysis Batch: 280-58815
Prep Batch: N/A
Units: mg/Kg

Leachate Batch: 280-58700

Instrument ID: WC_Alp 2
Lab File ID: C:\FLOW_4\0322NXN.RST
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

Analyte	Spike Amount	Result	% Rec.	Limit	Qual
Nitrate Nitrite as N-Soluble	50.0	49.51	99	90 - 110	

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Matrix Spike - Batch: 280-58815

Method: 353.2
Preparation: N/A

Lab Sample ID: 280-13666-1
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/22/2011 1401
Date Prepared: N/A
Date Leached: 03/19/2011 1240

Analysis Batch: 280-58815
Prep Batch: N/A
Units: mg/Kg

Leachate Batch: 280-58700

Instrument ID: WC_Alp 2
Lab File ID: C:\FLOW_4\0322NXN.RST
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

Analyte	Sample Result/Qual		Spike Amount	Result	% Rec.	Limit	Qual
Nitrate Nitrite as N-Soluble	0.39	U	41.0	43.78	107	90 - 110	

Duplicate - Batch: 280-58815

Method: 353.2
Preparation: N/A

Lab Sample ID: 280-13666-1
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/22/2011 1359
Date Prepared: N/A
Date Leached: 03/19/2011 1240

Analysis Batch: 280-58815
Prep Batch: N/A
Units: mg/Kg

Leachate Batch: 280-58700

Instrument ID: WC_Alp 2
Lab File ID: C:\FLOW_4\0322NXN.RST
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

Analyte	Sample Result/Qual		Result	RPD	Limit	Qual
Nitrate Nitrite as N-Soluble	0.39	U	0.38	NC	10	U

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Lab Control Sample/
Lab Control Sample Duplicate Recovery Report - Batch: 280-58419

Method: 9045C
Preparation: N/A

LCS Lab Sample ID: LCS 280-58419/4
Client Matrix: Water
Dilution: 1.0
Date Analyzed: 03/19/2011 1040
Date Prepared: N/A

Analysis Batch: 280-58419
Prep Batch: N/A
Units: SU

Instrument ID: WC_pH Probe
Lab File ID: N/A
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

LCSD Lab Sample ID: LCSD 280-58419/5
Client Matrix: Water
Dilution: 1.0
Date Analyzed: 03/19/2011 1041
Date Prepared: N/A

Analysis Batch: 280-58419
Prep Batch: N/A
Units: SU

Instrument ID: WC_pH Probe
Lab File ID: N/A
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

Analyte	% Rec. LCS	% Rec. LCSD	Limit	RPD	RPD Limit	LCS Qual	LCSD Qual
pH adj. to 25 deg C-Soluble	101	101	97 - 103	0	5		

Duplicate - Batch: 280-58419

Method: 9045C
Preparation: N/A

Lab Sample ID: 280-13666-1
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/19/2011 1044
Date Prepared: N/A
Date Leached: 03/19/2011 0848

Analysis Batch: 280-58419
Prep Batch: N/A
Units: SU

Leachate Batch: 280-58399

Instrument ID: WC_pH Probe
Lab File ID: N/A
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

Analyte	Sample Result/Qual	Result	RPD	Limit	Qual
pH adj. to 25 deg C-Soluble	9.40	9.390	0.1	5	

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Method Blank - Batch: 280-58958

Method: 9056M
Preparation: N/A

Lab Sample ID: MB 280-58551/2-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 2037
Date Prepared: N/A
Date Leached: 03/21/2011 1222

Analysis Batch: 280-58958
Prep Batch: N/A
Units: mg/Kg

Leachate Batch: 280-58551

Instrument ID: WC_IC6
Lab File ID: 132.TXT
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

Analyte	Result	Qual	MDL	RL
Nitrate as N-Soluble	0.31	U	0.31	2.5
Nitrite as N-Soluble	0.33	U	0.33	2.5
Orthophosphate as P-Soluble	1.38	B	1.2	5.0

Method Reporting Limit Check - Batch: 280-58958

Method: 9056M
Preparation: N/A

Lab Sample ID: MRL 280-58958/11
Client Matrix: Water
Dilution: 1.0
Date Analyzed: 03/21/2011 1340
Date Prepared: N/A

Analysis Batch: 280-58958
Prep Batch: N/A
Units: mg/L

Instrument ID: WC_IC6
Lab File ID: 110.TXT
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 5 mL

Analyte	Spike Amount	Result	% Rec.	Limit	Qual
Nitrate as N-Soluble	0.200	0.203	102	50 - 150	B
Nitrite as N-Soluble	0.200	0.200	100	50 - 150	B
Orthophosphate as P-Soluble	0.200	0.210	105	50 - 150	B

Lab Control Sample - Batch: 280-58958

Method: 9056M
Preparation: N/A

Lab Sample ID: LCS 280-58551/1-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 2019
Date Prepared: N/A
Date Leached: 03/21/2011 1222

Analysis Batch: 280-58958
Prep Batch: N/A
Units: mg/Kg

Leachate Batch: 280-58551

Instrument ID: WC_IC6
Lab File ID: 131.TXT
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

Analyte	Spike Amount	Result	% Rec.	Limit	Qual
Nitrate as N-Soluble	50.0	50.49	101	90 - 110	
Nitrite as N-Soluble	50.0	49.27	99	90 - 110	
Orthophosphate as P-Soluble	50.0	50.18	100	90 - 110	

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Matrix Spike - Batch: 280-58958

Method: 9056M
Preparation: N/A

Lab Sample ID: 280-13666-1
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 2204
Date Prepared: N/A
Date Leached: 03/21/2011 1222

Analysis Batch: 280-58958
Prep Batch: N/A
Units: mg/Kg

Leachate Batch: 280-58551

Instrument ID: WC_IC6
Lab File ID: 137.TXT
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

Analyte	Sample Result/Qual		Spike Amount	Result	% Rec.	Limit	Qual
Nitrate as N-Soluble	0.53	B	53.8	56.07	103	80 - 120	
Nitrite as N-Soluble	0.36	U	53.8	53.43	99	80 - 120	
Orthophosphate as P-Soluble	1.3	U	53.8	56.05	104	80 - 120	

Duplicate - Batch: 280-58958

Method: 9056M
Preparation: N/A

Lab Sample ID: 280-13666-1
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 2112
Date Prepared: N/A
Date Leached: 03/21/2011 1222

Analysis Batch: 280-58958
Prep Batch: N/A
Units: mg/Kg

Leachate Batch: 280-58551

Instrument ID: WC_IC6
Lab File ID: 134.TXT
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

Analyte	Sample Result/Qual		Result	RPD	Limit	Qual
Nitrate as N-Soluble	0.53	B	0.581	9	15	B
Nitrite as N-Soluble	0.36	U	0.36	NC	15	U
Orthophosphate as P-Soluble	1.3	U	1.3	NC	15	U

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Method Blank - Batch: 280-58960

Method: 9056M
Preparation: N/A

Lab Sample ID: MB 280-58551/2-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 2037
Date Prepared: N/A
Date Leached: 03/21/2011 1222

Analysis Batch: 280-58960
Prep Batch: N/A
Units: mg/Kg

Leachate Batch: 280-58551

Instrument ID: WC_IC6
Lab File ID: 132.TXT
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

Analyte	Result	Qual	MDL	RL
Chloride-Soluble	2.0	U	2.0	5.0
Bromide-Soluble	0.38	U	0.38	2.0
Sulfate-Soluble	1.7	U	1.7	5.0
Fluoride-Soluble	0.81	U	0.81	5.0

Method Reporting Limit Check - Batch: 280-58960

Method: 9056M
Preparation: N/A

Lab Sample ID: MRL 280-58960/11
Client Matrix: Water
Dilution: 1.0
Date Analyzed: 03/21/2011 1340
Date Prepared: N/A

Analysis Batch: 280-58960
Prep Batch: N/A
Units: mg/L

Instrument ID: WC_IC6
Lab File ID: 110.TXT
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 5 mL

Analyte	Spike Amount	Result	% Rec.	Limit	Qual
Chloride-Soluble	1.00	1.01	101	50 - 150	B
Bromide-Soluble	0.200	0.205	102	50 - 150	B
Sulfate-Soluble	1.00	1.07	107	50 - 150	B
Fluoride-Soluble	0.200	0.177	88	50 - 150	B

Lab Control Sample - Batch: 280-58960

Method: 9056M
Preparation: N/A

Lab Sample ID: LCS 280-58551/1-A
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 2019
Date Prepared: N/A
Date Leached: 03/21/2011 1222

Analysis Batch: 280-58960
Prep Batch: N/A
Units: mg/Kg

Leachate Batch: 280-58551

Instrument ID: WC_IC6
Lab File ID: 131.TXT
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

Analyte	Spike Amount	Result	% Rec.	Limit	Qual
Chloride-Soluble	250	253.1	101	90 - 110	
Bromide-Soluble	50.0	50.18	100	90 - 110	
Sulfate-Soluble	250	255.3	102	90 - 110	
Fluoride-Soluble	50.0	50.84	102	90 - 110	

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Matrix Spike - Batch: 280-58960

Method: 9056M
Preparation: N/A

Lab Sample ID: 280-13666-1
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 2204
Date Prepared: N/A
Date Leached: 03/21/2011 1222

Analysis Batch: 280-58960
Prep Batch: N/A
Units: mg/Kg

Leachate Batch: 280-58551

Instrument ID: WC_IC6
Lab File ID: 137.TXT
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

Analyte	Sample Result/Qual		Spike Amount	Result	% Rec.	Limit	Qual
Chloride-Soluble	2.1	U	269	278.4	103	80 - 120	
Bromide-Soluble	0.41	U	53.8	54.98	102	80 - 120	
Sulfate-Soluble	3.9	B	269	282.3	103	80 - 120	
Fluoride-Soluble	0.88	U	53.8	52.50	98	80 - 120	

Duplicate - Batch: 280-58960

Method: 9056M
Preparation: N/A

Lab Sample ID: 280-13666-1
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/21/2011 2112
Date Prepared: N/A
Date Leached: 03/21/2011 1222

Analysis Batch: 280-58960
Prep Batch: N/A
Units: mg/Kg

Leachate Batch: 280-58551

Instrument ID: WC_IC6
Lab File ID: 134.TXT
Initial Weight/Volume: 1.0 mL
Final Weight/Volume: 1.0 mL

Analyte	Sample Result/Qual		Result	RPD	Limit	Qual
Chloride-Soluble	2.1	U	2.1	NC	15	U
Bromide-Soluble	0.41	U	0.42	NC	15	U
Sulfate-Soluble	3.9	B	4.03	3	15	B
Fluoride-Soluble	0.88	U	0.89	NC	15	U

Quality Control Results

Client: Washington Closure Hanford

Job Number: 280-13666-1
Sdg Number: JP0124

Duplicate - Batch: 280-58303

Method: D-2216
Preparation: N/A

Lab Sample ID: 280-13666-1
Client Matrix: Solid
Dilution: 1.0
Date Analyzed: 03/18/2011 1414
Date Prepared: N/A

Analysis Batch: 280-58303
Prep Batch: N/A
Units: %

Instrument ID: No Equipment Assigned
Lab File ID: N/A
Initial Weight/Volume:
Final Weight/Volume:

Analyte	Sample Result/Qual	Result	RPD	Limit	Qual
Percent Moisture	8.1	8.2	1	20	

Washington Closure Hanford	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST	RC-075-215	Page 1 of 2

Collector J Kuepfer	Company Contact D Woolery	Telephone No. 509-431-0448	Project Coordinator KESSNER, JH
Project Designation 100-D/DR Burial Grounds & Remaining Sites - Soil Full Prot	Sampling Location 116-D-5 Outfall Deep Zone Re-Verification		SAF No. RC-075
Ice Chest No. ERC-02-002	Field Logbook No. EL-1607-09	COA R116D52000	Method of Shipment FED EX
Shipped To TestAmerica Incorporated, ~~Richland~~ DENVER	Offsite Property No. NA		Bill of Lading/Air Bill No. SEE OSPC 7968 8392 9225

Price Code 8L 8B 7 — Data Turnaround ~~21~~ Days — D 2/15/11

POSSIBLE SAMPLE HAZARDS/REMARKS
Potential Rad <DOT

Special Handling and/or Storage
Cool 4 Deg C

Preservation	Cool 4C	Cool 4C	Cool 4C	Cool 4C	Cool 4C	Cool 4C	None	None	None	None
Type of Container	G/P	G/P	G/P	aG	aG	aG	G/P	G/P	G/P	G/P
No. of Container(s)	1	1	1	1	1	1	1	0	0	0
Volume	125mL	125mL	125mL	125mL	125mL	125mL	500mL	500mL	500mL	500mL
SAMPLE ANALYSIS	See item (1) in Special Instructions.	Chromium Hex - 7196	IC Anions - 9056 Modified; NO2/NO3 - 353.2; pH (Soil) - 9045	Semi-VOA - 8270A (TCL)	PAHs - 8310	Pesticides - 8081	See item (2) in Special Instructions.	Carbon-14; Tritium - H3	Nickel-63; Strontium-8890 – Total Sr	Isotopic Plutonium
Sample No. / Matrix * / Sample Date / Sample Time										
J1F1J3 / SOIL / 3/15/11 / 0930	X		X	X	X	X				
J1F1J4 / SOIL / 3/15/11 / 0935	X		X	X	X	X				
J1F1J5 / SOIL / 3/15/11 / 0940	X		X	X	X	X				
J1F1J6 / SOIL / 3/15/11 / 0945	X		X	X	X	X				
J1F1J7 / SOIL / 3/15/11 / 0950	X		X	X	X	X				

CHAIN OF POSSESSION	Sign/Print Names		
Relinquished By/Removed From	Date/Time	Received By/Stored In	Date/Time
J Kuepfer	3/15/11 1030	D WOOLERY	3/15/11 1030
Relinquished By/Removed From	Date/Time	Received By/Stored In	Date/Time
D WOOLERY	3/15/11 1530	J.E. Bernhard	3-16-11 1530
Relinquished By/Removed From	Date/Time	Received By/Stored In	Date/Time
J.E. Bernhard well	3-17-11 1040	Fed Ex	
Relinquished By/Removed From	Date/Time	Received By/Stored In	Date/Time
			3/18/11 0830
Relinquished By/Removed From	Date/Time	Received By/Stored In	Date/Time
Relinquished By/Removed From	Date/Time	Received By/Stored In	Date/Time

SPECIAL INSTRUCTIONS
None

(1) ICP Metals - 6010TR (Close-out List) {Aluminum, Antimony, Arsenic, Barium, Beryllium, Boron, Cadmium, Calcium, Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Molybdenum, Nickel, Potassium, Selenium, Silicon, Silver, Sodium, Vanadium, Zinc}; Mercury - 7471 - (CV) {Mercury}
(2) Gamma Spec (Client List) {Americium-241, Cesium-137, Cobalt-60, Europium-152, Europium-154, Europium-155}

Matrix *
S=Soil
SE=Sediment
SO=Solid
SL=Sludge
W = Water
O=Oil
A=Air
DS=Drum Solids
DL=Drum Liquids
T=Tissue
WI=Wipe
L=Liquid
V=Vegetation
X=Other

JP0124

REVIEWED BY AJ 3-17-11 DATE

LABORATORY SECTION	Received By	Title	Date/Time
FINAL SAMPLE DISPOSITION	Disposal Method	Disposed By	Date/Time

WCH-EE-011

Washington Closure Hanford	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST	RC-075-215	Page 2 of 12
Collector: J Kuepfer	Company Contact: D Woolery; Telephone No.: 509-431-0448	Project Coordinator: KESSNER, JH	Price Code: ~~8L~~ 8B D 2/15/11
Project Designation: 100-D/DR Burial Grounds & Remaining Sites - Soil Full Prot	Sampling Location: 116-D-5 Outfall Deep Zone Re-Verification	SAF No.: RC-075	Data Turnaround: ~~21~~ 7 Days D 2/15/11
Ice Chest No.: ERC-02-002	Field Logbook No.: EL-1607-09; COA: R116D52000	Method of Shipment: FED EX	
Shipped To: D 2/15/11 TestAmerica Incorporated, ~~Richland~~ DENVER	Offsite Property No.: NA	Bill of Lading/Air Bill No.: D 3/15/11 ~~SEE OPPC~~ ~~7968 8136 8046~~ 3-17-11 7968 8392 9225	

POSSIBLE SAMPLE HAZARDS/REMARKS

Potential Rad <DOT

Special Handling and/or Storage

Cool 4 Deg C

Preservation	Cool 4C	Cool 4C	Cool 4C	Cool 4C	Cool 4C	Cool 4C	None	None	None	None
Type of Container	G/P	G/P	G/P	aG	aG	aG	G/P	G/P	G/P	G/P
No. of Container(s)	1	1	1	1	1	1	1	0	0	0
Volume	125mL	125mL	125mL	125mL	125mL	125mL	500mL	500mL	500mL	500mL
SAMPLE ANALYSIS	See item (1) in Special Instructions.	Chromium Hex - 7196	IC Anions - 9056 Modified; NO2/NO3 - 353.2; pH (Soil) - 9045	Semi-VOA - 8270A (TCL)	PAHs - 8310	Pesticides - 8081	See item (2) in Special Instructions.	Carbon-14; Tritium - H3	Nickel-63; Strontium-89/90 -- Total Sr	Isotopic Plutonium

Sample No.	Matrix *	Sample Date	Sample Time										
J1F1J8	SOIL	3/16/11	0930	X		X	X	X	X				

CHAIN OF POSSESSION — Sign/Print Names

Relinquished By/Removed From	Date/Time	Received By/Stored In	Date/Time
JKuepfer	3/16/11 1030	DWOOLERY	3/16/11 1030
DWOOLERY	3/16/11 1530	J. E. Beebe	3-16-11 1530
J. E. Beebe WCH	3-17-11 1040	Fed Ex	

SPECIAL INSTRUCTIONS

None

(1) ICP Metals - 6010TR (Close-out List) {Aluminum, Antimony, Arsenic, Barium, Beryllium, Boron, Cadmium, Calcium, Chromium, Cobalt, Copper, Iron, Lead, Magnesium, Manganese, Molybdenum, Nickel, Potassium, Selenium, Silicon, Silver, Sodium, Vanadium, Zinc}; Mercury - 7471 - (CV) {Mercury}

(2) Gamma Spec (Client List) {Americium-241, Cesium-137, Cobalt-60, Europium-152, Europium-154, Europium-155}

Matrix *: S=Soil; SE=Sediment; SO=Solid; Sl=Sludge; W = Water; O=Oil; A=Air; DS=Drum Solids; DL=Drum Liquids; T=Tissue; Wi=Wipe; L=Liquid; V=Vegetation; X=Other

REVIEWED BY AJ DATE 3-17-11

JP0124

LABORATORY SECTION	Received By	Title	Date/Time
FINAL SAMPLE DISPOSITION	Disposal Method	Disposed By	Date/Time

WCH-EE-011

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Project 28002142 - 6010TP - Solid

Analytical Due:

Report Due: 3/25/11 (Rush 5d TAT)

5C

Sample Check-in List

Date/Time Received: 3/8/11 0930 GM Screen Result 45 microR/hr

Client: Washington Closure Hanford SDG #: JP0124 NA[ ] SAF #: RC-075 NA [ ]

Job Number: 13666 Chain of Custody # RC-075-215

Shipping Container ID: AFS-04-120 ERC-02-002 GWS-132 GWS-130 Air Bill # 7968 8392 9270 7968 8392 9420 7968 8392 9225 7968 8392 9523

1. Custody Seals on shipping container intact? NA [ ] Yes [✓] No [ ]
2. Custody Seals dated and signed? NA [ ] Yes [✓] No [ ]
3. Chain of Custody record present? NA [ ] Yes [✓] No [ ]
4. Cooler Temperature °C: 2.4°C 2.7, 3.4, 4.7 NA [ ] 5. Vermiculite/packing materials is NA [ ] Wet [✓] Dry [ ]
6. Number of samples in shipping container: 6
7. Sample holding times exceeded? NA [ ] Yes [ ] No [✓]
8. Samples have:
   - ✓ Tape
   - ✓ Custody Seals
   - ✓ Hazard Lables
   - ✓ Appropriate Sample Lables
9. Samples are:
   - ✓ In Good Condition
   - ____ Broken
   - ____ Leaking
   - ____ Have Air Bubbles (Only for samples requiring no head space.)
10. Sample pH taken? NA [✓] pH<2 [ ] pH>2 [ ] pH>9 [ ] Amount HNO_3 Added ____
11. Sample Location, Sample Collector Listed? *
    *For documentation only. No corrective action needed.
12. Were any anomalies identified in sample receipt? Yes [ ] No [✓]
13. Description of anomalies (include sample numbers): ____

Sample Custodian: [signature] Date: 3/8/11

Client Sample ID	Analysis Requested	Condition	Comments/Action

Client Informed on ____ by ____ Person Contacted ____

[ ] No action necessary; process as is.

Project Manager [signature] Date 3/21/11

LS-023, Rev. 7, 1/08

From: (509) 375-4640 Origin ID: PSCA
WCH MAILROOM
WASHINGTON CLOSURE HANFORD
2620 FERMI AVE

RICHLAND, WA 99354

FedEx. Express

J11101012220225

Ship Date: 17MAR11
ActWgt: 80.0 LB
CAD: 8897843/INET3130

Delivery Address Bar Code

Ref #
Invoice #
PO #
Dept #

SHIP TO: (303) 736-0100 BILL SENDER

Sample Recieving
Test America Denver
4955 YARROW ST

ARVADA, CO 80002

1 of 4

FRI - 18 MAR A1
PRIORITY OVERNIGHT

TRK# 0201 7968 8392 9225

MASTER

XH WHHA

80002
CO-US
DEN

50DG2/BDD9/7EFB

After printing this label:
1. Use the 'Print' button on this page to print your label to your laser or inkjet printer.
2. Fold the printed page along the horizontal line.
3. Place label in shipping pouch and affix it to your shipment so that the barcode portion of the label can be read and scanned.

Warning: Use only the printed original label for shipping. Using a photocopy of this label for shipping purposes is fraudulent and could result in additional billing charges, along with the cancellation of your FedEx account number.

Use of this system constitutes your agreement to the service conditions in the current FedEx Service Guide, available on fedex.com.FedEx will not be responsible for any claim in excess of $100 per package, whether the result of loss, damage, delay, non-delivery,misdelivery,or misinformation, unless you declare a higher value, pay an additional charge, document your actual loss and file a timely claim.Limitations found in the current FedEx Service Guide apply. Your right to recover from FedEx for any loss, including intrinsic valueof the package, loss of sales, income interest, profit, attorney's fees, costs, and other forms of damage whether direct, incidental,consequential, or special is limited to the greater of $100 or the authorized declared value. Recovery cannot exceed actual documented loss.Maximum for items of extraordinary value is $500, e.g. jewelry, precious metals, negotiable instruments and other items listed in our ServiceGuide. Written claims must be filed within strict time limits, see current FedEx Service Guide.

From: (509) 375-4640 Origin ID: PSCA
WCH MAILROOM
WASHINGTON CLOSURE HANFORD
2620 FERMI AVE

RICHLAND, WA 99354

FedEx Express

J11101012220225

Ship Date: 17MAR11
ActWgt: 48.0 LB
CAD: 8897843/INET3130

Delivery Address Bar Code

Ref #
Invoice #
PO #
Dept #

SHIP TO: (303) 736-0100 BILL SENDER

Sample Recieving
Test America Denver
4955 YARROW ST

ARVADA, CO 80002

2 of 4

FRI - 18 MAR A1
PRIORITY OVERNIGHT

MPS# 7968 8392 9270
0263
Mstr# 7968 8392 9225 0201

XH WHHA

80002
CO-US
DEN

50DG2/BDDS/7EFB

After printing this label:
1. Use the 'Print' button on this page to print your label to your laser or inkjet printer.
2. Fold the printed page along the horizontal line.
3. Place label in shipping pouch and affix it to your shipment so that the barcode portion of the label can be read and scanned.

Warning: Use only the printed original label for shipping. Using a photocopy of this label for shipping purposes is fraudulent and could result in additional billing charges, along with the cancellation of your FedEx account number.

Use of this system constitutes your agreement to the service conditions in the current FedEx Service Guide, available on fedex.com.FedEx will not be responsible for any claim in excess of $100 per package, whether the result of loss, damage, delay, non-delivery,misdelivery,or misinformation, unless you declare a higher value, pay an additional charge, document your actual loss and file a timely claim.Limitations found in the current FedEx Service Guide apply. Your right to recover from FedEx for any loss, including intrinsic valueof the package, loss of sales, income interest, profit, attorney's fees, costs, and other forms of damage whether direct, incidental,consequential, or special is limited to the greater of $100 or the authorized declared value. Recovery cannot exceed actual documented loss.Maximum for items of extraordinary value is $500, e.g. jewelry, precious metals, negotiable instruments and other items listed in our ServiceGuide. Written claims must be filed within strict time limits, see current FedEx Service Guide.

From: (509) 375-4640 Origin ID: PSCA
WCH MAILROOM
WASHINGTON CLOSURE HANFORD
2620 FERMI AVE

RICHLAND, WA 99354

J11101012220225

Ship Date: 17MAR11
ActWgt: 65.0 LB
CAD: 8897843/INET3130

Delivery Address Bar Code

Ref #
Invoice #
PO #
Dept #

SHIP TO: (303) 736-0100 BILL SENDER

Sample Recieving
Test America Denver
4955 YARROW ST

ARVADA, CO 80002

3 of 4

FRI - 18 MAR A1
PRIORITY OVERNIGHT

MPS# 7968 8392 9420
0263
Mstr# 7968 8392 9225 0201

XH WHHA

80002
CO-US
DEN

50DG2/BDD9/7EFB

After printing this label:
1. Use the 'Print' button on this page to print your label to your laser or inkjet printer.
2. Fold the printed page along the horizontal line.
3. Place label in shipping pouch and affix it to your shipment so that the barcode portion of the label can be read and scanned.

Warning: Use only the printed original label for shipping. Using a photocopy of this label for shipping purposes is fraudulent and could result in additional billing charges, along with the cancellation of your FedEx account number.

Use of this system constitutes your agreement to the service conditions in the current FedEx Service Guide, available on fedex.com.FedEx will not be responsible for any claim in excess of $100 per package, whether the result of loss, damage, delay, non-delivery,misdelivery,or misinformation, unless you declare a higher value, pay an additional charge, document your actual loss and file a timely claim.Limitations found in the current FedEx Service Guide apply. Your right to recover from FedEx for any loss, including intrinsic valueof the package, loss of sales, income interest, profit, attorney's fees, costs, and other forms of damage whether direct, incidental,consequential, or special is limited to the greater of $100 or the authorized declared value. Recovery cannot exceed actual documented loss.Maximum for items of extraordinary value is $500, e.g. jewelry, precious metals, negotiable instruments and other items listed in our ServiceGuide. Written claims must be filed within strict time limits, see current FedEx Service Guide.

From: (509) 375-4640 Origin ID: PSCA
WCH MAILROOM
WASHINGTON CLOSURE HANFORD
2620 FERMI AVE

RICHLAND, WA 99354

FedEx. Express

J11101012220225

Ship Date: 17MAR11
ActWgt: 71.0 LB
CAD: 8897643/INET3130

Delivery Address Bar Code

Ref #
Invoice #
PO #
Dept #

SHIP TO: (303) 736-0100 BILL SENDER

Sample Recieving
Test America Denver
4955 YARROW ST

ARVADA, CO 80002

4 of 4

FRI - 18 MAR A1
PRIORITY OVERNIGHT

MPS# 7968 8392 9523
0263
Mstr# 7968 8392 9225 0201

XH WHHA

80002
CO-US
DEN

50DG2/BDD9/7EFB

After printing this label:
1. Use the 'Print' button on this page to print your label to your laser or inkjet printer.
2. Fold the printed page along the horizontal line.
3. Place label in shipping pouch and affix it to your shipment so that the barcode portion of the label can be read and scanned.

Warning: Use only the printed original label for shipping. Using a photocopy of this label for shipping purposes is fraudulent and could result in additional billing charges, along with the cancellation of your FedEx account number.

Use of this system constitutes your agreement to the service conditions in the current FedEx Service Guide, available on fedex.com.FedEx will not be responsible for any claim in excess of $100 per package, whether the result of loss, damage, delay, non-delivery,misdelivery,or misinformation, unless you declare a higher value, pay an additional charge, document your actual loss and file a timely claim.Limitations found in the current FedEx Service Guide apply. Your right to recover from FedEx for any loss, including intrinsic valueof the package, loss of sales, income interest, profit, attorney's fees, costs, and other forms of damage whether direct, incidental,consequential, or special is limited to the greater of $100 or the authorized declared value. Recovery cannot exceed actual documented loss.Maximum for items of extraordinary value is $500, e.g. jewelry, precious metals, negotiable instruments and other items listed in our ServiceGuide. Written claims must be filed within strict time limits, see current FedEx Service Guide.