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Analytical Data Package Prepared For

Fluor Hanford

Radiochemical Analysis By

TestAmerica TARL

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

Data Package Contains _____ Pages

Report Nbr: 39471

RECEIVED JULY 14, 2008

SDG Nbr	ORDER Nbr	CLIENT ID NUMBER	LOT Nbr	WORK ORDER	RPT DB ID	BATCH
W05417	S08-004	B1V2H6	J8E220269-1	KNPLT1AA	9KNPLT10	8155281
		B1V2B9	J8E220269-10	KNPP81AA	9KNPP810	8155284
	S08-004	B1V2C0	J8E220269-11	KNPQE1AA	9KNPQE10	8155284
		B1V2C1	J8E220269-12	KNPQM1AA	9KNPQM10	8155275
		B1V2C2	J8E220269-13	KNPQQ1AA	9KNPQQ10	8155275
		B1V2C3	J8E220269-14	KNPQ01AA	9KNPQ010	8155275
		B1V2B4	J8E220269-15	KNPQ21AA	9KNPQ210	8155279
		B1V2B2	J8E220269-16	KNPRE1AA	9KNPRE10	8155279
		B1V2B3	J8E220269-17	KNPRH1AA	9KNPRH10	8155279
		B1V2B0	J8E220269-18	KNPRQ1AA	9KNPRQ10	8155276
		B1V299	J8E220269-2	KNPL71AA	9KNPL710	8155276
		B1V2H7	J8E220269-3	KNPMC1AA	9KNPMC10	8155281
		B1V2H8	J8E220269-4	KNPMF1AA	9KNPMF10	8155281
		B1V296	J8E220269-5	KNPMK1AA	9KNPMK10	8155280
		B1V296	J8E220269-5	KNPMK1AC	9KNPMK10	8155281

Comments:

0080008

Report Nbr: 39471

SDG Nbr	ORDER Nbr	CLIENT ID NUMBER	LOT Nbr	WORK ORDER	RPT DB ID	BATCH
W05417	S08-004	B1V2B5	J8E220269-6	KNPML2AA	9KNPML20	8155286
		B1V2B6	J8E220269-7	KNPM12AA	9KNPM120	8155286
		B1V2B7	J8E220269-8	KNPPT2AA	9KNPPT20	8155286
		B1V2B8	J8E220269-9	KNPPX1AA	9KNPPX10	8155284
	I08-035	B1V5R3	J8E230311-1	KNTP01AA	9KNTP010	8148552
	G08-003	B1TH62	J8E280291-1	KN1G51AA	9KN1G510	8155285
		B1TH62	J8E280291-1	KN1G52AC	9KN1G520	8155282
		INTRA-LAB BLANK	J8F030000-286	KN89X2AA	9KN89X20	8155286

Comments:

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Certificate of Analysis

Fluor Hanford
1200 Jadwin Ave.
Richland, WA 99352

July 11, 2008

Attention: Steve Trent

SAF Number	:	S08-004, I08-035, G08-003
Date SDG Closed	:	May 28, 2008
Number of Samples	:	Twenty (20)
Sample Type	:	Water
SDG Number	:	W05417
Data Deliverable	:	45-Day / Summary

CASE NARRATIVE

I. Introduction

Between May 22, 2008 and May 28, 2008 twenty water samples were received at STL Richland (STLR) for radiochemical analysis. Upon receipt, the samples were assigned the following laboratory ID numbers to correspond with the Fluor Hanford specific IDs:

PGW ID#	STLR ID#	DATE OF RECEIPT	MATRIX
B1V2B0	KNPRQ	5/22/08	WATER
B1V2H6	KNPLT	5/22/08	WATER
B1V299	KNPL7	5/22/08	WATER
B1V2H7	KNPMC	5/22/08	WATER
B1V2H8	KNPMF	5/22/08	WATER
B1V296	KNPMK	5/22/08	WATER
B1V2B5	KNPML	5/22/08	WATER
B1V2B6	KNPM1	5/22/08	WATER
B1V2B7	KNPPT	5/22/08	WATER
B1V2B8	KNPPX	5/22/08	WATER
B1V2B9	KNPP8	5/22/08	WATER
B1V2C0	KNPQE	5/22/08	WATER
B1V2C1	KNPQM	5/22/08	WATER

B1V2C2	KNPQQ	5/22/08	WATER
B1V2C3	KNPQ0	5/22/08	WATER
B1V2B4	KNPQ2	5/22/08	WATER
B1V2B2	KNPRE	5/22/08	WATER
B1V2B3	KNPRH	5/22/08	WATER
B1V5R3	KNTP0	5/23/08	WATER
B1TH62	KN1G5	5/28/08	WATER

II. Sample Receipt

The samples were received in good condition. Sample B1V5R3 was received out of hold time. TestAmerica notified the client on May 23, 2008 at 12:15 p.m. The client instructed TestAmerica to proceed with the analysis (Proposed Resolution Tracking Number: 08-072). No other 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 RICH-RC-5010
Gas Proportional Counting
Gross Alpha by method RICH-RC-5014
Gross Beta by method RICH-RC-5014
Strontium-90 by method RICH-RC-5006
Gamma Spectroscopy
Gamma Spec (LL) by method RICH-RC-5017
Gamma Spec by method RICH-RC-5017
Iodine-129 by method RICH-RC-5025
Liquid Scintillation Counting
Technetium-99 by TEVA method RICH-RC-5065
Laser Induced Phosphorimetry
Total Uranium by method RICH-RC-5058
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 RICH-RC-5010:
The LCS, batch blank, sample and sample duplicate (JB1V299) results are within contractual requirements.

Gas Proportional Counting

Gross Alpha by method RICH-RC-5014:
The LCS, batch blank, samples and sample duplicate (B1V296) results are within contractual requirements.

Gross Beta by method RICH-RC-5014:
The LCS, batch blank, samples and sample duplicate (B1V2H6) results are within contractual requirements.

Strontium-90 by method RICH-RC-5006
The sample B1TH62 and B1TH62 DUP were analyzed with reduced aliquots based on weight screens.

Samples B1TH62 and B1TH62 DUP were above the required RPD. Both samples were recounted to check the decay pattern and found to be within limits.

Samples B1TH62 and B1TH62 DUP do meet the CRDL due to the reduced aliquots, however the results exceed the achieved MDAs.

Except as noted, t he LCS, batch blank, samples and sample duplicate (B1TH62) results are within contractual requirements.

Gamma Spectroscopy

Gamma Spec (LL) by method RICH-RC-5017:
There was insufficient volume for a duplicate. Sample B1TH62 was recounted on a different detector for the duplicate (B1TH62 DUP). Except as noted, the LCS, batch blank, sample and sample duplicate (B1TH62) results are within contractual requirements.

Gamma Spec by method RICH-RC-5017:
A 1000 ml aliquot was analyzed for all samples and QC in this batch. The correct aliquot size is 2500 ml. The count time was increased from 200 minute to 300 minutes in order for the CRDLs to be met. Even though counted for 300 minutes, samples B1V2B5, B1V2B5 DUP and the LCS did not meet the CRDL for Be-7. These samples were recounted for 1000 minutes and the Be-7 CRDL was met. Except as noted, the LCS, batch blank, samples and sample duplicate (B1V2B5) results are within contractual requirements.

Iodine-129 by method RICH-RC-5025:
The LCS, batch blank, samples and sample duplicate (B1V2C0) results are within contractual requirements.

Fluor Hanford
July 11, 2008

Liquid Scintillation Counting

Technetium-99 by TEVA method RICH-RC-5065:

The LCS, batch blank, samples, sample duplicate (B1V2B2), and sample matrix spike (B1V2B3) results are within contractual requirements.

Total Uranium

Total Uranium by method RICH-RC-5058:

The matrix spike had a low yield of 4%, however the activity of the sample is greater than five times the expected yield of the spike used for the matrix spike. Except as noted, the LCS, batch blank, samples, sample duplicate (B1V2C1), and sample matrix spike (B1V2C2) results are within contractual requirements.

Chemical Analysis

Hexavalent Chromium by EPA method 7196A

Sample B1V5R3 was received out of hold time. TestAmerica notified the client by phone and email on May 23, 2008. The client instructed TestAmerica to proceed with the analysis. TestAmerica was also instructed to generate an IRF for this sample. The IRF with the proposed resolution was sent to the client on June 02, 2008. The client accepted the proposed resolution (Tracking Number: 08-072) on June 3, 2008.

The LCS, batch blank, samples, sample duplicate (B1V5R3), sample matrix spike (B1V5R3), and matrix spike duplicate (B1V5R3) 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:

Sandra Seger

Sandra Seger
Project Manager

TAL RICHLAND ISSUE RESOLUTION FORM
FOR CONTRACT 615 WITH BHI/FH

Tracking Number: 08-072
SAF No.: I08-035
Date: June 2, 2008
SDG: W05417
Sample No.(s) B1V5R3

Submitted By: Sandra Seger

Phone No. 509-375-3131 x158
Fax No. 509-375-5590

Submitted To: **Steve Trent (FH)**

Phone No. ***509-373-5869***
Fax No. 866-252-5816

ISSUE	**PROPOSED RESOLUTION**
Hexavalent Chromium was received at 12:15 on May 23, 2008. The sample was out of hold time. TestAmerica notified the client by phone and email on May 23, 2008.	Client instructed TestAmerica to proceed with analysis. TestAmerica was also instructed to generate an IRF for this sample.

BHI/FH COMMENTS -
Accept proposed resolution. Please note in case narrative.

Heidi Hampt 6/3/08
Signature and date

Seger, Sandra

From: Hampt, Heidi [Heidi_Hampt@RL.gov]
Sent: Tuesday, June 03, 2008 10:04 AM
To: Seger, Sandra
Cc: ^CPP Sample Management; Trent, Stephen J; Wagar, Rhonda
Subject: RE: Cr+6 sample
Attachments: 08-072.DOC

Sandra,

Response is attached.

Thanks,
Heidi

From: Seger, Sandra [mailto:Sandra.Seger@testamericainc.com]
Sent: Monday, June 02, 2008 7:07 AM
To: Hampt, Heidi
Cc: Widrig, Dana L; Felmy, Diana; ^CPP Sample Management; Trent, Stephen J; Thompson, Christopher J; Wagar, Rhonda
Subject: FW: Cr+6 sample

The requested IRF for W05417, B1V5R3 is attached.

Sandra

From: Widrig, Dana L [mailto:Dana_L_Widrig@RL.gov]
Sent: Thursday, May 29, 2008 9:46 AM
To: Wagar, Rhonda; Seger, Sandra; Jordan, Erika
Subject: RE: Cr+6 sample

Rhonda/Erika

Remember that you need to generate an IRF for this sample. Just making sure that was communicated alright.

Thanks,

Dana

From: Wagar, Rhonda [mailto:Rhonda.Wagar@testamericainc.com]
Sent: Friday, May 23, 2008 2:02 PM
To: Widrig, Dana L
Subject: RE: Cr+6 sample

Dana,

Not a problem, I'll let the chemist know that we want the sample analyzed.

Have a great weekend.

Rhonda

From: Widrig, Dana L [mailto:Dana_L_Widrig@RL.gov]
Sent: Friday, May 23, 2008 1:23 PM
To: Wagar, Rhonda; Trent, Stephen J
Cc: ^CPP Sample Management; Seger, Sandra; Smith, Summer
Subject: RE: Cr+6 sample
Importance: High

Rhonda,

Please go ahead and run this sample anyway. Let me know if you have any questions.

Thanks,

Dana

From: Wagar, Rhonda [mailto:Rhonda.Wagar@testamericainc.com]
Sent: Friday, May 23, 2008 12:41 PM
To: Widrig, Dana L; Trent, Stephen J
Cc: ^CPP Sample Management; Seger, Sandra; Smith, Summer
Subject: Cr+6 sample

Dana,

As per our phone conversation the Hexavalent Chromium sample we received today at 12:15 pm will not be analyzed; was received out of hold time.

SAF #: I08-035
Sample #: B1V5R3
Date: 5/22/08
Time: 0835

I've attached a copy of the COC for your reference.

Thank you.

RHONDA WAGAR
Quality Assurance Specialist

TestAmerica
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Richland, WA 99354
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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	RICH-RC-5017
EPA 900.0	Alpha & Beta	RICH-RC-5014
EPA 00-02	Gross Alpha (Coprecipitation)	RICH-RC-5021
EPA 903.0	Total Alpha Radium (Ra-226)	RICH-RC-5027
EPA 903.1	Ra-226	RICH-RC-5005
EPA 904.0	Ra-228	RICH-RC-5005
EPA 905.0	Sr-89/90	RICH-RC-5006
ASTM D5174	Uranium	RICH-RC-5058
EPA 906.0	Tritium	RICH-RC-5007

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.

7/11/2008 1:11:59 PM

TestAmerica Report

Lab Code: TARL

FormNbr: R FormatType: FEAD Version: 05 Rpt Nbr: 39471 File Name: h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KN1G510	B1TH62		MW6-SBB-A1	G08-003	W05417					05/27/2008 09:19

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155285	BE-7	13966-02-4	1.01E+01	pCi/L	1.7E+01	1.7E+01	U	3.06E+01		GAMMALL_GS	2.0001E+00	L	06/17/2008 08:45	I
8155285	CO-60	10198-40-0	3.43E-01	pCi/L	2.0E+00	2.0E+00	U	3.77E+00		GAMMALL_GS	2.0001E+00	L	06/17/2008 08:45	I
8155285	CS-134	13967-70-9	3.77E-01	pCi/L	1.7E+00	1.7E+00	U	3.18E+00		GAMMALL_GS	2.0001E+00	L	06/17/2008 08:45	I
8155285	CS-137	10045-97-3	3.59E-02	pCi/L	1.8E+00	1.8E+00	U	3.19E+00		GAMMALL_GS	2.0001E+00	L	06/17/2008 08:45	I
8155285	EU-152	14683-23-9	-2.90E+00	pCi/L	4.1E+00	4.1E+00	U	6.69E+00		GAMMALL_GS	2.0001E+00	L	06/17/2008 08:45	I
8155285	EU-154	15585-10-1	-1.41E+00	pCi/L	4.5E+00	4.5E+00	U	8.10E+00		GAMMALL_GS	2.0001E+00	L	06/17/2008 08:45	I
8155285	EU-155	14391-16-3	4.77E+00	pCi/L	4.1E+00	4.1E+00	U	7.50E+00		GAMMALL_GS	2.0001E+00	L	06/17/2008 08:45	I
8155285	K-40	13966-00-2	4.72E+01	pCi/L	3.8E+01	3.8E+01		3.36E+01		GAMMALL_GS	2.0001E+00	L	06/17/2008 08:45	I
8155285	RU-106	13967-48-1	2.31E+00	pCi/L	1.5E+01	1.5E+01	U	2.69E+01		GAMMALL_GS	2.0001E+00	L	06/17/2008 08:45	I
8155285	SB-125	14234-35-6	-1.54E+00	pCi/L	4.1E+00	4.1E+00	U	7.11E+00		GAMMALL_GS	2.0001E+00	L	06/17/2008 08:45	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KN1G520	B1TH62		MW6-SBB-A1	G08-003	W05417					05/27/2008 09:19

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155282	SR-90	10098-97-2	2.20E+03	pCi/L	9.3E+01	4.6E+02		5.96E+01	71.3	SRISO_SEP_PRE	1.319E-01	L	07/10/2008 05:40	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KN89X20	INTRA-LAB BL		MW6-SBB-A1		W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155286	BE-7	13966-02-4	-5.26E+00	pCi/L	1.4E+01	1.4E+01	U	2.40E+01		GAMMA_GS	1.0001E+00	L	06/20/2008 11:20	I
8155286	CO-60	10198-40-0	1.01E+00	pCi/L	1.5E+00	1.5E+00	U	2.69E+00		GAMMA_GS	1.0001E+00	L	06/20/2008 11:20	I
8155286	CS-134	13967-70-9	5.09E-01	pCi/L	1.5E+00	1.5E+00	U	2.53E+00		GAMMA_GS	1.0001E+00	L	06/20/2008 11:20	I
8155286	CS-137	10045-97-3	-6.85E-01	pCi/L	1.4E+00	1.4E+00	U	2.34E+00		GAMMA_GS	1.0001E+00	L	06/20/2008 11:20	I
8155286	EU-152	14683-23-9	-2.26E+00	pCi/L	3.7E+00	3.7E+00	U	5.96E+00		GAMMA_GS	1.0001E+00	L	06/20/2008 11:20	I
8155286	EU-154	15585-10-1	-9.95E-01	pCi/L	4.3E+00	4.3E+00	U	7.35E+00		GAMMA_GS	1.0001E+00	L	06/20/2008 11:20	I
8155286	EU-155	14391-16-3	2.48E+00	pCi/L	2.9E+00	2.9E+00	U	4.94E+00		GAMMA_GS	1.0001E+00	L	06/20/2008 11:20	I
8155286	K-40	13966-00-2	8.26E+01	pCi/L	5.3E+01	5.3E+01		2.46E+01		GAMMA_GS	1.0001E+00	L	06/20/2008 11:20	I
8155286	RU-106	13967-48-1	-5.06E+00	pCi/L	1.2E+01	1.2E+01	U	2.09E+01		GAMMA_GS	1.0001E+00	L	06/20/2008 11:20	I
8155286	SB-125	14234-35-6	-5.67E-01	pCi/L	3.5E+00	3.5E+00	U	5.99E+00		GAMMA_GS	1.0001E+00	L	06/20/2008 11:20	I

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rptFeadRadSummaryEdd v3.48

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

7/11/2008 1:11:59 PM

TestAmerica Report

Lab Code: TARL

FormNbr: R FormatType: FEAD Version: 05 Rpt Nbr: 39471 File Name: h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPL710	B1V299		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155276	PU-238	13981-16-3	-2.73E-03	pCi/L	6.8E-02	6.8E-02	U	1.37E-01	84.7	PUISO_PLATE_AE	2.005E-01	L	06/13/2008 13:57	I
8155276	PU-239	PU-239/240	7.31E+00	pCi/L	1.0E+00	1.5E+00		1.37E-01	84.7	PUISO_PLATE_AE	2.005E-01	L	06/13/2008 13:57	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPLT10	B1V2H6		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155281	BETA	12587-47-2	3.33E+03	pCi/L	2.6E+01	4.5E+02		2.91E+00	100.0	9310_ALPHABETA	2.001E-01	L	06/17/2008 10:24	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPM120	B1V2B6		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155286	BE-7	13966-02-4	9.42E+00	pCi/L	1.3E+01	1.3E+01	U	2.27E+01		GAMMA_GS	1.0002E+00	L	06/20/2008 11:19	I
8155286	CO-60	10198-40-0	6.41E+01	pCi/L	9.2E+00	9.2E+00		1.80E+00		GAMMA_GS	1.0002E+00	L	06/20/2008 11:19	I
8155286	CS-134	13967-70-9	4.32E-02	pCi/L	1.1E+00	1.1E+00	U	1.91E+00		GAMMA_GS	1.0002E+00	L	06/20/2008 11:19	I
8155286	CS-137	10045-97-3	2.15E+02	pCi/L	2.6E+01	2.6E+01		1.91E+00		GAMMA_GS	1.0002E+00	L	06/20/2008 11:19	I
8155286	EU-152	14683-23-9	-2.96E+00	pCi/L	3.0E+00	3.0E+00	U	4.86E+00		GAMMA_GS	1.0002E+00	L	06/20/2008 11:19	I
8155286	EU-154	15585-10-1	1.45E+00	pCi/L	3.0E+00	3.0E+00	U	5.46E+00		GAMMA_GS	1.0002E+00	L	06/20/2008 11:19	I
8155286	EU-155	14391-16-3	-2.23E+00	pCi/L	2.4E+00	2.4E+00	U	3.87E+00		GAMMA_GS	1.0002E+00	L	06/20/2008 11:19	I
8155286	K-40	13966-00-2	-1.40E+01	pCi/L	3.1E+01	3.1E+01	U	4.12E+01		GAMMA_GS	1.0002E+00	L	06/20/2008 11:19	I
8155286	RU-106	13967-48-1	4.94E+00	pCi/L	9.6E+00	9.6E+00	U	1.67E+01		GAMMA_GS	1.0002E+00	L	06/20/2008 11:19	I
8155286	SB-125	14234-35-6	1.42E+00	pCi/L	3.0E+00	3.0E+00	U	5.20E+00		GAMMA_GS	1.0002E+00	L	06/20/2008 11:19	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPMC10	B1V2H7		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155281	BETA	12587-47-2	2.93E+03	pCi/L	2.4E+01	3.8E+02		2.68E+00	100.0	9310_ALPHABETA	2.00E-01	L	06/17/2008 10:24	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPMF10	B1V2H8		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155281	BETA	12587-47-2	3.92E+03	pCi/L	2.9E+01	5.0E+02		2.59E+00	100.0	9310_ALPHABETA	2.002E-01	L	06/17/2008 10:24	I

TestAmerica

rptFeadRadSummaryEdd v3.48

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

TestAmerica Report

Lab Code: TARL

FormNbr: R FormatType: FEAD Version: 05 Rpt Nbr: 39471 File Name: h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPMK10	B1V296		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155280	ALPHA	12587-46-1	5.28E+00	pCi/L	1.7E+00	2.0E+00		1.41E+00	100.0	9310_ALPHABETA	2.005E-01	L	06/17/2008 10:03	I
8155281	BETA	12587-47-2	7.19E+01	pCi/L	3.9E+00	9.9E+00		2.48E+00	100.0	9310_ALPHABETA	1.999E-01	L	06/17/2008 10:24	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPML20	B1V2B5		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155286	BE-7	13966-02-4	-1.40E+01	pCi/L	2.0E+01	2.0E+01	U	3.37E+01		GAMMA_GS	1.0011E+00	L	06/20/2008 11:17	I
8155286	CO-60	10198-40-0	5.82E+01	pCi/L	8.8E+00	8.8E+00		2.82E+00		GAMMA_GS	1.0011E+00	L	06/20/2008 11:17	I
8155286	CS-134	13967-70-9	1.54E-03	pCi/L	1.7E+00	1.7E+00	U	2.94E+00		GAMMA_GS	1.0011E+00	L	06/20/2008 11:17	I
8155286	CS-137	10045-97-3	2.19E+02	pCi/L	2.7E+01	2.7E+01		2.80E+00		GAMMA_GS	1.0011E+00	L	06/20/2008 11:17	I
8155286	EU-152	14683-23-9	-3.43E+00	pCi/L	4.6E+00	4.6E+00	U	7.38E+00		GAMMA_GS	1.0011E+00	L	06/20/2008 11:17	I
8155286	EU-154	15585-10-1	2.23E-01	pCi/L	4.2E+00	4.2E+00	U	7.37E+00		GAMMA_GS	1.0011E+00	L	06/20/2008 11:17	I
8155286	EU-155	14391-16-3	-2.41E+00	pCi/L	3.1E+00	3.1E+00	U	5.08E+00		GAMMA_GS	1.0011E+00	L	06/20/2008 11:17	I
8155286	K-40	13966-00-2	1.39E+01	pCi/L	4.6E+01	4.6E+01	U	2.22E+01		GAMMA_GS	1.0011E+00	L	06/20/2008 11:17	I
8155286	RU-106	13967-48-1	-1.48E+01	pCi/L	1.5E+01	1.5E+01	U	2.39E+01		GAMMA_GS	1.0011E+00	L	06/20/2008 11:17	I
8155286	SB-125	14234-35-6	-3.86E+00	pCi/L	4.6E+00	4.6E+00	U	7.49E+00		GAMMA_GS	1.0011E+00	L	06/20/2008 11:17	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPP810	B1V2B9		MW6-SBB-A1		W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155284	I-129L	15046-84-1	4.76E+00	pCi/L	1.9E+00	1.9E+00	U	3.41E+00	94.6	I129_SEP_LEPS_G	5.0043E-01	L	06/26/2008 20:24	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPPT20	B1V2B7		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155286	BE-7	13966-02-4	-4.85E+00	pCi/L	2.5E+01	2.5E+01	U	4.23E+01		GAMMA_GS	1.0001E+00	L	06/20/2008 11:19	I
8155286	CO-60	10198-40-0	6.04E+01	pCi/L	9.0E+00	9.0E+00		3.14E+00		GAMMA_GS	1.0001E+00	L	06/20/2008 11:19	I
8155286	CS-134	13967-70-9	1.61E+00	pCi/L	2.3E+00	2.3E+00	U	3.92E+00		GAMMA_GS	1.0001E+00	L	06/20/2008 11:19	I
8155286	CS-137	10045-97-3	2.24E+02	pCi/L	2.8E+01	2.8E+01		3.56E+00		GAMMA_GS	1.0001E+00	L	06/20/2008 11:19	I

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

8155286	EU-152	14683-23-9	2.52E+00	pCi/L	5.7E+00	5.7E+00	U	9.62E+00	GAMMA_GS	1.0001E+00	L	06/20/2008	11:19	I
8155286	EU-154	15585-10-1	-2.65E+00	pCi/L	5.2E+00	5.2E+00	U	8.70E+00	GAMMA_GS	1.0001E+00	L	06/20/2008	11:19	I
8155286	EU-155	14391-16-3	-2.48E+00	pCi/L	4.2E+00	4.2E+00	U	6.99E+00	GAMMA_GS	1.0001E+00	L	06/20/2008	11:19	I
8155286	K-40	13966-00-2	-1.05E+02	pCi/L	5.8E+01	5.8E+01	U	8.63E+01	GAMMA_GS	1.0001E+00	L	06/20/2008	11:19	I
8155286	RU-106	13967-48-1	-8.83E+00	pCi/L	1.8E+01	1.8E+01	U	3.09E+01	GAMMA_GS	1.0001E+00	L	06/20/2008	11:19	I
8155286	SB-125	14234-35-6	-3.62E+00	pCi/L	6.0E+00	6.0E+00	U	9.84E+00	GAMMA_GS	1.0001E+00	L	06/20/2008	11:19	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPPX10	B1V2B8		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155284	I-129L	15046-84-1	1.00E+01	pCi/L	2.8E+00	2.8E+00	U	4.08E+00	98.4	I129_SEP_LEPS_G	5.0038E-01	L	06/26/2008 20:23	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPQ010	B1V2C3		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155275	Uranium	7440-61-1	9.09E+02	ug/L	1.1E+02	1.1E+02		8.35E-02		UTOT_KPA	2.51E-02	ML	06/24/2008 10:27	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPQ210	B1V2B4		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155279	TC-99	14133-76-7	2.28E+02	pCi/L	9.1E+00	1.9E+01		9.77E+00	100.0	TC99_ETVDSK_LS	1.2501E-01	L	06/11/2008 19:53	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPQE10	B1V2C0		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155284	I-129L	15046-84-1	6.15E+00	pCi/L	2.3E+00	2.3E+00	U	3.78E+00	98.9	I129_SEP_LEPS_G	5.001E-01	L	06/26/2008 20:25	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPQM10	B1V2C1		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155275	Uranium	7440-61-1	9.34E+02	ug/L	1.1E+02	1.1E+02		8.42E-02		UTOT_KPA	2.49E-02	ML	06/24/2008 10:14	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPQQ10	B1V2C2		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

TestAmerica Report

Lab Code: TARL

FormNbr: R FormatType: FEAD Version: 05 Rpt Nbr: 39471 File Name: h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155275	Uranium	7440-61-1	8.13E+02	ug/L	9.6E+01	9.6E+01		8.28E-02		UTOT_KPA	2.53E-02	ML	06/24/2008 10:23	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPRE10	B1V2B2		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155279	TC-99	14133-76-7	2.30E+02	pCi/L	9.1E+00	1.9E+01		9.73E+00	100.0	TC99_ETVDSK_LS	1.25E-01	L	06/11/2008 20:56	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPRH10	B1V2B3		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155279	TC-99	14133-76-7	2.30E+02	pCi/L	9.1E+00	1.9E+01		9.78E+00	100.0	TC99_ETVDSK_LS	1.2501E-01	L	06/11/2008 23:02	I

Lab Sample Id:	Client Id:	Test User	Contract Nbr	SAF Nbr	Sdg Nbr:	QC Type:	Moisture/ Solids%*:	Distilled Volume	Sample On Date:	Collection Date:
9KNPRQ10	B1V2B0		MW6-SBB-A1	S08-004	W05417					05/22/2008 10:00

Batch	Analyte	CAS#	Result	Unit	CntU 2S	TotU 2S	Qual	MDA	TrcYield	Method	Alq Size	Unit	Analy Date/Time	Act
8155276	PU-238	13981-16-3	-1.21E-02	pCi/L	7.7E-02	7.7E-02	U	2.02E-01	88.2	PUISO_PLATE_AE	2.0064E-01	L	06/13/2008 13:57	I
8155276	PU-239	PU-239/240	8.09E+00	pCi/L	1.1E+00	1.7E+00		1.52E-01	88.2	PUISO_PLATE_AE	2.0064E-01	L	06/13/2008 13:57	I

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Blank Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id: KN8801AB **Sdg/Rept Nbr:** W05417 39471 **Collection Date:** 05/22/2008 10:00

Client Id: NA **Matrix:** WATER WATER **Sample On Date:**

Moisture/Solids%*: **QC Type:** BLK **Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								AX	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155279	TC-99	5.20E+00	pCi/L	6.0E+00	U	9.80E+00	100.0		TC99_ETVDSK	1.25E-01	06/12/2008				D
BLK	14133-76-7			4.2E+00						L	01:08				

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Blank Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id: KN8871AB
Client Id: NA
Moisture/Solids%*:

Sdg/Rept Nbr: W05417 39471
Matrix: WATER WATER
QC Type: BLK

Collection Date: 05/22/2008 10:00
Sample On Date:
Received Date: 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								AZ	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155280	ALPHA	5.60E-02	pCi/L	4.7E-01	U	1.28E+00	100.0		9310_ALPHAB	1.999E-01	06/17/2008				D
BLK	12587-46-1			4.7E-01						L	10:03				

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Blank Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id: KN88J1AB **Sdg/Rept Nbr:** W05417 39471 **Collection Date:** 05/22/2008 10:00

Client Id: NA **Matrix:** WATER WATER **Sample On Date:**

Moisture/Solids%*: **QC Type:** BLK **Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BB	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155275	Uranium	6.08E-02	ug/L	8.2E-03	U	8.42E-02			UTOT_KPA	2.49E-02	06/24/2008				D
BLK	7440-61-1			8.2E-03						ML	09:59				

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Blank Report

Lab Code: TARL

FormNbr: R FormatType: FEAD VersionNbr: 05 File Name: h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KN88N1AB	**Sdg/Rept Nbr:**	W05417	39471	**Collection Date:** 05/22/2008 10:00
Client Id:	NA	**Matrix:**	WATER	WATER	**Sample On Date:**
Moisture/Solids%*:		**QC Type:**	BLK		**Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BE	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155276	PU-238	-3.46E-02	pCi/L	6.9E-02	U	2.48E-01	87.4		PUISO_PLATE	2.0022E-01	06/13/2008				D
BLK	13981-16-3			6.9E-02						L	13:58				
8155276	PU-239	5.05E-02	pCi/L	9.5E-02	U	1.97E-01	87.4		PUISO_PLATE	2.0022E-01	06/13/2008				D
BLK	PU-239/240			9.5E-02						L	13:58				

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Blank Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KN89C1AB	**Sdg/Rept Nbr:**	W05417 39471	**Collection Date:**	05/22/2008 10:00
Client Id:	NA	**Matrix:**	WATER WATER	**Sample On Date:**	
Moisture/Solids%*:		**QC Type:**	BLK	**Received Date:**	05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BG	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155281	BETA	8.75E-01	pCi/L	1.2E+00	U	2.58E+00	100.0		9310_ALPHAB	2.002E-01	06/17/2008				D
BLK	12587-47-2			1.2E+00						L	10:24				

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Blank Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KN89M1AB	**Sdg/Rept Nbr:**	W05417	39471	**Collection Date:** 05/27/2008 09:19
Client Id:	NA	**Matrix:**	WATER	WATER	**Sample On Date:**
Moisture/Solids%*:		**QC Type:**	BLK		**Received Date:** 05/28/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BI	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155282	SR-90	-4.59E-02	pCi/L	1.8E-01	U	4.02E-01	80.6		SRISO_SEP_P	9.993E-01	07/03/2008				D
BLK	10098-97-2			1.8E-01						L	05:39				

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Blank Report

Lab Code: TARL

FormNbr: R FormatType: FEAD VersionNbr: 05 File Name: h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KN89R1AB	**Sdg/Rept Nbr:**	W05417 39471	**Collection Date:**	05/22/2008 10:00
Client Id:	NA	**Matrix:**	WATER WATER	**Sample On Date:**	
Moisture/Solids%*:		**QC Type:**	BLK	**Received Date:**	05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BK	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155284	I-129L	2.11E-01	pCi/L	9.5E-01	U	1.83E+00	99.7		I129_SEP_LEP	5.0016E-01	06/26/2008				D
BLK	15046-84-1			9.5E-01						L	23:18				

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Blank Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id: KN89V1AB **Sdg/Rept Nbr:** W05417 39471 **Collection Date:** 05/27/2008 09:19

Client Id: NA **Matrix:** WATER WATER **Sample On Date:**

Moisture/Solids%*: **QC Type:** BLK **Received Date:** 05/28/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BM	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155285	BE-7	5.22E+00	pCi/L	1.2E+01	U	2.26E+01			GAMMALL_GS	2.00E+00	06/17/2008				D
BLK	13966-02-4			1.2E+01						L	08:45				
8155285	CO-60	1.65E+00	pCi/L	1.4E+00	U	2.83E+00			GAMMALL_GS	2.00E+00	06/17/2008				D
BLK	10198-40-0			1.4E+00						L	08:45				
8155285	CS-134	-3.85E-01	pCi/L	1.3E+00	U	2.27E+00			GAMMALL_GS	2.00E+00	06/17/2008				D
BLK	13967-70-9			1.3E+00						L	08:45				
8155285	CS-137	-7.56E-01	pCi/L	1.4E+00	U	2.25E+00			GAMMALL_GS	2.00E+00	06/17/2008				D
BLK	10045-97-3			1.4E+00						L	08:45				
8155285	EU-152	3.93E+00	pCi/L	3.3E+00	U	6.22E+00			GAMMALL_GS	2.00E+00	06/17/2008				D
BLK	14683-23-9			3.3E+00						L	08:45				
8155285	EU-154	-1.12E+00	pCi/L	4.0E+00	U	6.95E+00			GAMMALL_GS	2.00E+00	06/17/2008				D
BLK	15585-10-1			4.0E+00						L	08:45				
8155285	EU-155	-1.93E+00	pCi/L	2.8E+00	U	4.65E+00			GAMMALL_GS	2.00E+00	06/17/2008				D
BLK	14391-16-3			2.8E+00						L	08:45				
8155285	K-40	-3.97E-01	pCi/L	2.1E+01	U	4.13E+01			GAMMALL_GS	2.00E+00	06/17/2008				D
BLK	13966-00-2			2.1E+01						L	08:45				
8155285	RU-106	4.50E+00	pCi/L	1.2E+01	U	2.19E+01			GAMMALL_GS	2.00E+00	06/17/2008				D
BLK	13967-48-1			1.2E+01						L	08:45				
8155285	SB-125	6.66E-01	pCi/L	3.2E+00	U	5.73E+00			GAMMALL_GS	2.00E+00	06/17/2008				D
BLK	14234-35-6			3.2E+00						L	08:45				

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Blank Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id: KN89X2AB **Sdg/Rept Nbr:** W05417 39471 **Collection Date:** 05/22/2008 10:00
Client Id: NA **Matrix:** WATER WATER **Sample On Date:**
Moisture/Solids%*: **QC Type:** BLK **Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BO	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155286	BE-7	-5.26E+00	pCi/L	1.4E+01	U	2.40E+01			GAMMA_GS	1.0001E+00	06/20/2008				D
BLK	13966-02-4			1.4E+01						L	11:20				
8155286	CO-60	1.01E+00	pCi/L	1.5E+00	U	2.69E+00			GAMMA_GS	1.0001E+00	06/20/2008				D
BLK	10198-40-0			1.5E+00						L	11:20				
8155286	CS-134	5.09E-01	pCi/L	1.5E+00	U	2.53E+00			GAMMA_GS	1.0001E+00	06/20/2008				D
BLK	13967-70-9			1.5E+00						L	11:20				
8155286	CS-137	-6.85E-01	pCi/L	1.4E+00	U	2.34E+00			GAMMA_GS	1.0001E+00	06/20/2008				D
BLK	10045-97-3			1.4E+00						L	11:20				
8155286	EU-152	-2.26E+00	pCi/L	3.7E+00	U	5.96E+00			GAMMA_GS	1.0001E+00	06/20/2008				D
BLK	14683-23-9			3.7E+00						L	11:20				
8155286	EU-154	-9.95E-01	pCi/L	4.3E+00	U	7.35E+00			GAMMA_GS	1.0001E+00	06/20/2008				D
BLK	15585-10-1			4.3E+00						L	11:20				
8155286	EU-155	2.48E+00	pCi/L	2.9E+00	U	4.94E+00			GAMMA_GS	1.0001E+00	06/20/2008				D
BLK	14391-16-3			2.9E+00						L	11:20				
8155286	K-40	8.26E+01	pCi/L	5.3E+01		2.46E+01			GAMMA_GS	1.0001E+00	06/20/2008				D
BLK	13966-00-2			5.3E+01						L	11:20				
8155286	RU-106	-5.06E+00	pCi/L	1.2E+01	U	2.09E+01			GAMMA_GS	1.0001E+00	06/20/2008				D
BLK	13967-48-1			1.2E+01						L	11:20				
8155286	SB-125	-5.67E-01	pCi/L	3.5E+00	U	5.99E+00			GAMMA_GS	1.0001E+00	06/20/2008				D
BLK	14234-35-6			3.5E+00						L	11:20				

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Control Sample Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id: KN8801CS **Sdg/Rept Nbr:** W05417 39471 **Collection Date:** 05/22/2008 10:00

Client Id: NA **Matrix:** WATER WATER **Sample On Date:**

Moisture/Solids%*: **QC Type:** BS **Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								AY	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155279	TC-99	4.90E+02	pCi/L	3.4E+01		9.74E+00	100.0	5.46E+02	TC99_ETVDSK	1.2502E-01	06/12/2008			75	D
BS	14133-76-7			1.3E+01				89.7		L	02:10			125	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Control Sample Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KN8871CS	**Sdg/Rept Nbr:**	W05417	39471	**Collection Date:** 05/22/2008 10:00
Client Id:	NA	**Matrix:**	WATER	WATER	**Sample On Date:**
Moisture/Solids%*:		**QC Type:**	BS		**Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BA	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155280	ALPHA	2.03E+01	pCi/L	5.1E+00		8.18E-01	100.0	2.26E+01	9310_ALPHAB	2.004E-01	06/17/2008			70	D
BS	12587-46-1			2.9E+00				89.7		L	10:03			130	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Control Sample Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KN88J1CS	**Sdg/Rept Nbr:**	W05417	39471	**Collection Date:** 05/22/2008 10:00
Client Id:	NA	**Matrix:**	WATER	WATER	**Sample On Date:**
Moisture/Solids%*:		**QC Type:**	BS		**Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BC	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155275	Uranium	3.50E+01	ug/L	4.1E+00		8.42E-02		3.64E+01	UTOT_KPA	2.49E-02	06/24/2008			75	D
BS	7440-61-1			4.1E+00				96.1		ML	10:04			125	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Control Sample Report

Lab Code: TARL

FormNbr: R FormatType: FEAD VersionNbr: 05 File Name: h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KN88J1DS	**Sdg/Rept Nbr:**	W05417	39471	**Collection Date:** 05/22/2008 10:00
Client Id:	NA	**Matrix:**	WATER	WATER	**Sample On Date:**
Moisture/Solids%*:		**QC Type:**	BS		**Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BD	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155275	Uranium	3.35E+00	ug/L	3.4E-01		8.42E-02		3.62E+00	UTOT_KPA	2.49E-02	06/24/2008			75	D
BS	7440-61-1			3.4E-01				92.5		ML	10:08			125	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Control Sample Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KN88N1CS	**Sdg/Rept Nbr:**	W05417	39471	**Collection Date:** 05/22/2008 10:00
Client Id:	NA	**Matrix:**	WATER	WATER	**Sample On Date:**
Moisture/Solids%*:		**QC Type:**	BS		**Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BF	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155276	PU-239	4.24E+00	pCi/L	1.0E+00		1.70E-01	90.1	4.65E+00	PUISO_PLATE	2.0028E-01	06/13/2008			75	D
BS	PU-239/240			7.9E-01				91.1		L	13:58			125	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Control Sample Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KN89C1CS	**Sdg/Rept Nbr:**	W05417	39471	**Collection Date:** 05/22/2008 10:00
Client Id:	NA	**Matrix:**	WATER	WATER	**Sample On Date:**
Moisture/Solids%*:		**QC Type:**	BS		**Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BH	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155281	BETA	2.11E+01	pCi/L	3.5E+00		2.80E+00	100.0	2.28E+01	9310_ALPHAB	2.006E-01	06/17/2008			70	D
BS	12587-47-2			2.4E+00				92.6		L	10:24			130	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Control Sample Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id: KN89M1CS
Client Id: NA
Moisture/Solids%*:

Sdg/Rept Nbr: W05417 39471
Matrix: WATER WATER
QC Type: BS

Collection Date: 05/27/2008 09:19
Sample On Date:
Received Date: 05/28/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BJ	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155282	SR-90	1.39E+01	pCi/L	2.1E+00		4.71E-01	75.4	1.41E+01	SRISO_SEP_P	1.0028E+00	07/03/2008			70	D
BS	10098-97-2			6.6E-01				99.0		L	05:39			130	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Control Sample Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KN89R1CS	**Sdg/Rept Nbr:**	W05417 39471	**Collection Date:**	05/22/2008 10:00
Client Id:	NA	**Matrix:**	WATER WATER	**Sample On Date:**	
Moisture/Solids%*:		**QC Type:**	BS	**Received Date:**	05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BL	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155284	I-129L	4.33E+01	pCi/L	6.5E+00		2.92E+00	94.3	4.59E+01	I129_SEP_LEP	5.0038E-01	06/26/2008			70	D
BS	15046-84-1			6.5E+00				94.3		L	23:18			130	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Control Sample Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id: KN89V1CS **Sdg/Rept Nbr:** W05417 39471 **Collection Date:** 05/27/2008 09:19

Client Id: NA **Matrix:** WATER WATER **Sample On Date:**

Moisture/Solids%*: **QC Type:** BS **Received Date:** 05/28/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BN	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155285	CO-60	4.62E+01	pCi/L	8.6E+00		2.38E+00		3.79E+01	GAMMALL_GS	2.00E+00	06/17/2008			70	D
BS	10198-40-0			8.6E+00				121.8		L	12:10			130	
8155285	CS-137	6.09E+01	pCi/L	9.2E+00		3.82E+00		4.93E+01	GAMMALL_GS	2.00E+00	06/17/2008			70	D
BS	10045-97-3			9.2E+00				123.4		L	12:10			130	
8155285	EU-152	8.29E+01	pCi/L	1.6E+01		8.60E+00		7.54E+01	GAMMALL_GS	2.00E+00	06/17/2008			70	D
BS	14683-23-9			1.6E+01				109.9		L	12:10			130	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Control Sample Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KN89X2CS	**Sdg/Rept Nbr:**	W05417 39471	**Collection Date:**	05/22/2008 10:00
Client Id:	NA	**Matrix:**	WATER WATER	**Sample On Date:**	
Moisture/Solids%*:		**QC Type:**	BS	**Received Date:**	05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
	MW6-SBB-A19981								BP	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155286	CO-60	8.52E+01	pCi/L	1.1E+01		2.30E+00		7.58E+01	GAMMA_GS	1.0002E+00	06/20/2008			70	D
BS	10198-40-0			1.1E+01				112.4		L	11:21			130	
8155286	CS-137	1.06E+02	pCi/L	1.3E+01		2.54E+00		9.89E+01	GAMMA_GS	1.0002E+00	06/20/2008			70	D
BS	10045-97-3			1.3E+01				107.1		L	11:21			130	
8155286	EU-152	1.61E+02	pCi/L	2.1E+01		6.72E+00		1.51E+02	GAMMA_GS	1.0002E+00	06/20/2008			70	D
BS	14683-23-9			2.1E+01				106.3		L	11:21			130	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Duplicate Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id: KN1G51ER **Sdg/Rept Nbr:** W05417 39471 **Collection Date:** 05/27/2008 09:19

Client Id: B1TH62 **Matrix:** WATER WATER **Sample On Date:**

Moisture/Solids%*: **QC Type:** DUP **Received Date:** 05/28/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
G08-003	MW6-SBB-A19981								AV	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155285	BE-7	9.08E+00	pCi/L	1.3E+01	U	2.39E+01			GAMMALL_GS	2.0001E+00	06/17/2008	10.2	0.1		D
DUP	13966-02-4	1.01E+01		1.3E+01						L	12:09	20.0	3		
8155285	CO-60	1.34E+00	pCi/L	1.4E+00	U	2.91E+00			GAMMALL_GS	2.0001E+00	06/17/2008	118.4	1.		D
DUP	10198-40-0	3.43E-01		1.4E+00						L	12:09	20.0	3		
8155285	CS-134	1.22E+00	pCi/L	1.4E+00	U	2.66E+00			GAMMALL_GS	2.0001E+00	06/17/2008	105.9	0.9		D
DUP	13967-70-9	3.77E-01		1.4E+00						L	12:09	20.0	3		
8155285	CS-137	6.19E-01	pCi/L	1.5E+00	U	2.70E+00			GAMMALL_GS	2.0001E+00	06/17/2008	178.1	0.6		D
DUP	10045-97-3	3.59E-02		1.5E+00						L	12:09	20.0	3		
8155285	EU-152	-1.56E+00	pCi/L	3.6E+00	U	6.02E+00			GAMMALL_GS	2.0001E+00	06/17/2008	0.0	0.5		D
DUP	14683-23-9	-2.90E+00		3.6E+00						L	12:09	20.0	3		
8155285	EU-154	6.72E-01	pCi/L	3.9E+00	U	7.28E+00			GAMMALL_GS	2.0001E+00	06/17/2008	0.0	0.8		D
DUP	15585-10-1	-1.41E+00		3.9E+00						L	12:09	20.0	3		
8155285	EU-155	-2.28E+00	pCi/L	4.2E+00	U	7.02E+00			GAMMALL_GS	2.0001E+00	06/17/2008	565.9	2.4		D
DUP	14391-16-3	4.77E+00		4.2E+00						L	12:09	20.0	3		
8155285	K-40	1.62E+01	pCi/L	2.1E+01	U	2.43E+01			GAMMALL_GS	2.0001E+00	06/17/2008	97.8	2.1		D
DUP	13966-00-2	4.72E+01		2.1E+01						L	12:09	20.0	3		
8155285	RU-106	5.97E+00	pCi/L	1.3E+01	U	2.29E+01			GAMMALL_GS	2.0001E+00	06/17/2008	88.5	0.4		D
DUP	13967-48-1	2.31E+00		1.3E+01						L	12:09	20.0	3		
8155285	SB-125	-2.20E+00	pCi/L	3.7E+00	U	6.05E+00			GAMMALL_GS	2.0001E+00	06/17/2008	0.0	0.3		D
DUP	14234-35-6	-1.54E+00		3.7E+00						L	12:09	20.0	3		

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Duplicate Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id: KN1G52DR
Client Id: B1TH62
Moisture/Solids%*:

Sdg/Rept Nbr: W05417 39471
Matrix: WATER WATER
QC Type: DUP

Collection Date: 05/27/2008 09:19
Sample On Date:
Received Date: 05/28/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
G08-003	MW6-SBB-A19981								AW	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155282	SR-90	1.89E+03	pCi/L	4.0E+02		4.48E+01	82.1		SRISO_SEP_P	1.329E-01	07/10/2008	14.9	1.1		D
DUP	10098-97-2	2.20E+03		7.9E+01						L	05:40	20.0	3		

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Duplicate Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id: KNPL71CR **Sdg/Rept Nbr:** W05417 39471 **Collection Date:** 05/22/2008 10:00

Client Id: B1V299 **Matrix:** WATER WATER **Sample On Date:**

Moisture/Solids%*: **QC Type:** DUP **Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
S08-004	MW6-SBB-A19981								BQ	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155276	PU-238	-2.84E-03	pCi/L	7.1E-02	U	1.43E-01	92.6		PUISO_PLATE	2.0001E-01	06/13/2008	0.0	0.		D
DUP	13981-16-3	-2.73E-03		7.1E-02						L	13:57	20.0	3		
8155276	PU-239	7.29E+00	pCi/L	1.5E+00		1.77E-01	92.6		PUISO_PLATE	2.0001E-01	06/13/2008	.3	0.		D
DUP	PU-239/240	7.31E+00		1.0E+00						L	13:57	20.0	3		

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Duplicate Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KNPLT1CR	**Sdg/Rept Nbr:**	W05417 39471	**Collection Date:**	05/22/2008 10:00
Client Id:	B1V2H6	**Matrix:**	WATER WATER	**Sample On Date:**	
Moisture/Solids%*:		**QC Type:**	DUP	**Received Date:**	05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
S08-004	MW6-SBB-A19981								BR	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155281	BETA	3.37E+03	pCi/L	4.4E+02		2.67E+00	100.0		9310_ALPHAB	2.004E-01	06/17/2008	1.2	0.1		D
DUP	12587-47-2	3.33E+03		2.6E+01						L	10:24	20.0	3		

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Duplicate Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KNPMK1DR	**Sdg/Rept Nbr:**	W05417 39471	**Collection Date:**	05/22/2008 10:00
Client Id:	B1V296	**Matrix:**	WATER WATER	**Sample On Date:**	
Moisture/Solids%*:		**QC Type:**	DUP	**Received Date:**	05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
S08-004	MW6-SBB-A19981								BS	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155280	ALPHA	6.81E+00	pCi/L	2.4E+00		1.43E+00	100.0		9310_ALPHAB	2.003E-01	06/17/2008	25.4	0.9		D
DUP	12587-46-1	5.28E+00		1.9E+00						L	10:03	20.0	3		

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Duplicate Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id: KNPML2CR **Sdg/Rept Nbr:** W05417 39471 **Collection Date:** 05/22/2008 10:00

Client Id: B1V2B5 **Matrix:** WATER WATER **Sample On Date:**

Moisture/Solids%*: **QC Type:** DUP **Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
S08-004	MW6-SBB-A19981								BT	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155286	BE-7	-4.75E+00	pCi/L	2.1E+01	U	3.49E+01			GAMMA_GS	1.0001E+00	06/20/2008	0.0	0.6		D
DUP	13966-02-4	-1.40E+01		2.1E+01						L	11:17	20.0	3		
8155286	CO-60	6.96E+01	pCi/L	9.7E+00		2.70E+00			GAMMA_GS	1.0001E+00	06/20/2008	17.9	1.7		D
DUP	10198-40-0	5.82E+01		9.7E+00						L	11:17	20.0	3		
8155286	CS-134	-3.17E-01	pCi/L	1.8E+00	U	3.14E+00			GAMMA_GS	1.0001E+00	06/20/2008	0.0	0.2		D
DUP	13967-70-9	1.54E-03		1.8E+00						L	11:17	20.0	3		
8155286	CS-137	2.25E+02	pCi/L	3.0E+01		2.82E+00			GAMMA_GS	1.0001E+00	06/20/2008	3.1	0.3		D
DUP	10045-97-3	2.19E+02		3.0E+01						L	11:17	20.0	3		
8155286	EU-152	-5.33E-01	pCi/L	4.6E+00	U	7.74E+00			GAMMA_GS	1.0001E+00	06/20/2008	0.0	0.9		D
DUP	14683-23-9	-3.43E+00		4.6E+00						L	11:17	20.0	3		
8155286	EU-154	-1.27E+00	pCi/L	4.5E+00	U	7.55E+00			GAMMA_GS	1.0001E+00	06/20/2008	0.0	0.5		D
DUP	15585-10-1	2.23E-01		4.5E+00						L	11:17	20.0	3		
8155286	EU-155	1.38E+00	pCi/L	2.9E+00	U	5.03E+00			GAMMA_GS	1.0001E+00	06/20/2008	0.0	1.8		D
DUP	14391-16-3	-2.41E+00		2.9E+00						L	11:17	20.0	3		
8155286	K-40	-7.05E+01	pCi/L	5.4E+01	U	6.87E+01			GAMMA_GS	1.0001E+00	06/20/2008	0.0	2.2		D
DUP	13966-00-2	1.39E+01		5.4E+01						L	11:17	20.0	3		
8155286	RU-106	4.56E-01	pCi/L	1.6E+01	U	2.68E+01			GAMMA_GS	1.0001E+00	06/20/2008	0.0	1.4		D
DUP	13967-48-1	-1.48E+01		1.6E+01						L	11:17	20.0	3		
8155286	SB-125	-8.31E-01	pCi/L	4.9E+00	U	8.20E+00			GAMMA_GS	1.0001E+00	06/20/2008	0.0	0.9		D
DUP	14234-35-6	-3.86E+00		4.9E+00						L	11:17	20.0	3		

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Duplicate Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KNPQE1CR	**Sdg/Rept Nbr:**	W05417 39471	**Collection Date:**	05/22/2008 10:00
Client Id:	B1V2C0	**Matrix:**	WATER WATER	**Sample On Date:**	
Moisture/Solids%*:		**QC Type:**	DUP	**Received Date:**	05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
S08-004	MW6-SBB-A19981								BU	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155284	I-129L	4.14E+00	pCi/L	2.0E+00	U	3.27E+00	98.6		I129_SEP_LEP	5.0029E-01	06/26/2008	39.0	1.4		D
DUP	15046-84-1	6.15E+00		2.0E+00						L	23:17	20.0	3		

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Duplicate Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KNPQM1CR	**Sdg/Rept Nbr:**	W05417 39471	**Collection Date:**	05/22/2008 10:00
Client Id:	B1V2C1	**Matrix:**	WATER WATER	**Sample On Date:**	
Moisture/Solids%*:		**QC Type:**	DUP	**Received Date:**	05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
S08-004	MW6-SBB-A19981								BV	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155275	Uranium	9.18E+02	ug/L	1.1E+02		8.35E-02			UTOT_KPA	2.51E-02	06/24/2008	1.7	0.2		D
DUP	7440-61-1	9.34E+02		1.1E+02						ML	10:17	20.0	3		

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica QC Duplicate Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id:	KNPRE1CR	**Sdg/Rept Nbr:**	W05417	39471	**Collection Date:** 05/22/2008 10:00
Client Id:	B1V2B2	**Matrix:**	WATER	WATER	**Sample On Date:**
Moisture/Solids%*:		**QC Type:**	DUP		**Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
S08-004	MW6-SBB-A19981								BX	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155279	TC-99	2.36E+02	pCi/L	1.9E+01		9.81E+00	100.0		TC99_ETVDSK	1.2502E-01	06/11/2008	2.6	0.4		D
DUP	14133-76-7	2.30E+02		9.2E+00						L	21:59	20.0	3		

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica Qc Matrix Spike Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id: KNPQQ1CW **Sdg/Rept Nbr:** W05417 39471 **Collection Date:** 05/22/2008 10:00

Client Id: B1V2C2 **Matrix:** WATER WATER **Sample On Date:**

Moisture/Solids%*: **QC Type:** MS **Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
S08-004	MW6-SBB-A19981								BW	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155275	Uranium	1.52E+02	ug/L	1.5E+02		8.32E-02		3.59E+01	UTOT_KPA	2.52E-02	06/24/2008			60	D
MS	7440-61-1			1.5E+02				422.0		ML	10:25			140	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

Friday, July 11, 2008

TestAmerica Qc Matrix Spike Report

Lab Code: TARL

FormNbr: R **FormatType:** FEAD **VersionNbr:** 05 **File Name:** h:\Reportdb\edd\FeadIV\Rad\W05417.Edd, h:\Reportdb\edd\FeadIV\Rad\39471.Edd

Lab Sample Id: KNPRH1CW **Sdg/Rept Nbr:** W05417 39471 **Collection Date:** 05/22/2008 10:00

Client Id: B1V2B3 **Matrix:** WATER WATER **Sample On Date:**

Moisture/Solids%*: **QC Type:** MS **Received Date:** 05/22/2008

SAF Nbr	Contract Nbr	Test User	Case Nbr	SAS Nbr	Suffix	Decant	Distilled Volume	File Id	FSuffix	RTyp
S08-004	MW6-SBB-A19981								BY	H

Batch # / Qc Type	Analyt/ CAS#	Result/ Orig Rst	Unit	Tot/Cnt Uncert 2S	Qu-al	MDC	Tracer Yield	Spk Conc/ %Rec	Analy Method	Aliq Size/	Date/Time Analyzed	RPD/ UCL	RER/ UCL	LCS LCL/UCL	R Typ
8155279	TC-99	3.31E+03	pCi/L	2.2E+02		9.77E+00	100.0	3.60E+03	TC99_ETVDSK	1.2501E-01	06/12/2008			60	D
MS	14133-76-7			3.2E+01				91.9		L	00:05			140	

U Qual - Analyzed for, but the result is less than the Mdc or gamma scan did not identify the nuclide.
J Qual - No U qualifier has been assigned and the result is below the Reporting Limit (CRDL).
B Qual- Analyte was found in the associated laboratory blank above the MDC.

TestAmerica

TA Richland
Hexavalent Chromium - Water

Analyst:	S. Wheland	Calibration Curve Information				SOP Information		BATCH #	8148552
Start Date:	5/23/2008		Amount	Conc.(mg/L)	ABS.	RICH-WC-5003		SDG #	W05417
Start Time:		Blank	0.000	0.000	0.000	Revision 7		Matrix	Water
End Date:	5/23/2008	Std. 1	0.100	0.050	0.093				
End Time		Std. 2	0.500	0.250	0.464			Instrument Information	
		Std. 3	0.750	0.375	0.684	MDL (mg/L)	0.002	Instrument:	Hach DR2010
Analyst Signature:		Std. 4	1.500	0.750	1.364			Wavelength:	540
		Std 5	2.000	1.000	1.785			R Squared	0.99979
Date:	5/25/08	Standard Volume (mL):			100.000			Slope:	1.79038
		Date of Curve:			5/23/2008			Intercept:	0.00805

	Calibration Information:	ICV Information:		LCS Information:		Matrix Spike Information:	
Dilution ID #	Cr-08-00105	Cr-08-00106		Cr-08-00105		Cr-08-00105	
Prep Date:	05/23/08	05/23/08		05/23/08		05/23/08	
Concentration (mg/L)	50	50		50		50	
Expiration Date:	05/24/08	05/24/08		05/24/08		05/24/08	
Pipettor(s)	70,190	190		190		190	
Volume Used (Expected Value		1.000	0.50000	1.00	0.50000	0.50	0.26316

Expected values are only amounts added in mg and not final concentrations

Sample ID	Client ID	Type	Sample Volume (mL)	Sample ABS.	Blank ABS.	Corrected ABS.	Dilution Factor	Curve Conc. (mg/L)	Final Conc. (mg/L)	% Rec.
n/a	n/a	ICV	100.000	0.936	0.000	0.936	1	0.5183	0.518	103.66%
n/a	n/a	ICB	100.000	-0.001	0.000	-0.001	1	<MDL	<MDL	
KNXFH1AA	n/a	Prep Blank	100.000	-0.001		-0.001	1	<MDL	<MDL	
KNXFH1AC	n/a	LCS	100.000	0.914		0.914	1	0.5060	0.506	101.20%
KNTP01AA	B1V5R3'	Sample	100.000	0.017		0.017	1	0.0050	0.005	
KNTP01AC-S	B1V5R3'-MS	MS	100.000	0.498		0.498	1	0.2737	~~0.274~~ 0.2[illegible]	102.09%
KNTP01AD-D	B1V5R3'-MSD	MSD	100.000	0.503		0.503	1	0.2764	~~0.276~~ 0.2[illegible]	103.15%
KNTP01AE-X	B1V5R3'-DUP	Duplicate	100.000	0.018		0.018	1	0.0056	0.006	SKS 7/8/08
			100.000				1			
			100.000				1			
			100.000				1			
			100.000				1			
n/a	n/a	CCV	100.000	0.934		0.934	1	0.5172	0.517	103.44%
n/a	n/a	CCB	100.000	0.000		0.000	1	<MDL	<MDL	
			100.000				1			
			100.000				1			
			100.000				1			
			100.000				1			
			100.000				1			

TESTAMERICA

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review/Verification Checklist

RADIOCHEMISTRY, First Level Review

6/19/2008 2:49:41 PM

Lot No., Due Date: J8E220269; 07/14/2008

Client, Site: 384868; PGW 615HANFORD HANFORD

QC Batch No., Method Test: 8155276; RPUISO Pulso by ALP

SDG, Matrix: W05417; WATER

	Yes	No	N/A
8.0 Correction Calculation Protocol Used. OK	✓		
8.01 The Appropriate Methods Were Used To Analyze the Samples OK	✓		
8.02 Final Results Are in the Appropriate Activity Units OK	✓		
8.03 Batch Contains the Required QC Appropriate for the Method OK	✓		
8.04 The Correct Tracer and QC Vials Where Used in the Samples OK	✓		
8.05 Sample was Appropriately Traced Before or After Fractionating the Sample OK	✓		
8.06 At Least the Minimum Sample Volume Was Used OK	✓		
8.07 The Correct Count Geometry was Used. OK	✓		
8.08 The Sample was Counted for the Minimum Count Time or CRDL was Achieved. OK	✓		
8.09 Method Blank is within Control Limits. OK	✓		
8.1 Comments.			
8.11 Matrix Blank is within Control Limits. No Matrix Blanks (MBlks) found in Batch!			✓
8.12 Method Blank(s) < QAS Limit Value (No B Flag Necessary). OK	✓		
8.13 QAS Specified Duplicate Equation Value within Control Limits. OK (RPD)	✓		
8.14 LCS within Control Limits. OK	✓		
8.15 MLCS within Control Limits. No Matrix Spikes (MLCS) found in Batch!			✓
8.16 MS within Control Limits. No Matrix Spike Samples (MS) found in Batch!			✓
8.17 Tracer within Control Limits. OK	✓		
8.18 Samples are above Minimum Tracer Yield (No Failed Samples) OK	✓		
8.19 Sample Specific MDC <= CRDL. OK	✓		
8.2 Comments:			
8.21 Result < Lc, Activity Not Detected, U Flag. No Limit Specified!			✓
8.22 Result < Mdc, Activity Not Detected, U Flag. Batch Positive Result => KNPL71AA PU-239 7.3E+00 L:1.4E-01 KNPRQ1AA PU-239 8.1E+00 L:1.5E-01		✓	
8.23 Result <= Action Level, when Defined. OK; No Action Level Found => PU-238 PU-239 OK; No Callin Level Found => PU-238 PU-239	✓		
8.24 Result + 3s >=0, Not Too Negative. OK	✓		

8.25 Counting Spectrum are within FWHM Limits. Yes No N/A

FWHM > maxFWHM => KNPL71AA PU-239 47.6>0
KNPL71AC PU-239 54.688>0
KNPRQ1AA PU-239 48.294>0
KN88N1AC PU-239 47.998>0 Q:V1

8.26 Instruments have Current Calibrations. Yes No N/A

8.27 Correct Count Library Used. Yes No N/A

Library Not Specified => KNPL71AA I:[NUC_LIBR]AR_PU Q:
KNPL71AC I:[NUC_LIBR]AR_PU Q:
KNPRQ1AA I:[NUC_LIBR]AR_PU Q:
KN88N1AA I:[NUC_LIBR]AR_PU Q:
KN88N1AC I:[NUC_LIBR]AR_PU Q:

8.28 Instrument Background within Limits at Time of Counting. (Not Applicable to this version. To be developed in later versions) Yes No N/A

8.29 Instrument Check Source within Limits at the Time of Counting. (Not Applicable to this version. To be developed in later versions) Yes No N/A

8.3 Comments:

8.31 Results Blank Subtracted as Appropriate. Yes No N/A

OK

First Level Review Lisa Anderson Date 6/19/08

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist

RADIOCHEMISTRY

Second Level Review

Batch Number: 815S276

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: Erika Ford Date: 6/20/8

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

TESTAMERICA

6/12/2008 10:02:07 AM

Sample Preparation/Analysis

Balance Id:1120482733

384868, Pacific Northwest National Laboratory ,
Pacific Northwest National Lab

AZ Gross Alpha PrpRC5014
S7 Gross Alpha by GPC using Am-241 curve
5I CLIENT: HANFORD

Pipet #: 245

AnalyDueDate: 07/07/2008 W0541 7

Sep1 DT/Tm Tech:

Batch: 8155280 **WATER** **pCi/L** **PM, Quote: SS , 57671**

Sep2 DT/Tm Tech:

SEQ Batch, Test: None All Tests: 8155275 DHSS, 8155276 6DSO, 8155279 FPS5, 8155280 AZS7, 8155281 BCS8, 8155284 BNTB, 8155286 AWTA,

Prep Tech: ,HarrisD | Bock

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 KNPMK-1-AA J8E220269-5-SAMP 05/22/2008 10:00	AmtRec: 20ML,LP	200.50g,in #Containers: 2		1.5	14.1	50	11A	1029	6/17 kr S	Scr: Alpha: 7.79E-05 uCi/Sa Beta: -2.28E-04 uCi/Sa
2 KNPMK-1-AD-X J8E220269-5-DUP 05/22/2008 10:00	AmtRec: 20ML,LP	200.30g,in #Containers: 2			14.6		11B			Scr: Alpha: 7.79E-05 uCi/Sa Beta: -2.28E-04 uCi/Sa
3 KN887-1-AA-B J8F030000-280-BLK 05/22/2008 10:00	AmtRec:	199.90g,in #Containers: 1			0.4		11C			Scr: Alpha: Beta:
4 KN887-1-AC-C J8F030000-280-LCS 05/22/2008 10:00	AmtRec:	200.40g,in #Containers: 1	ASD4490 05/27/08,pd 06/01/08,r		0.6		11D			Scr: Alpha: Beta:

Comments: pH 2.0 Ott 6/12/08

All Clients for Batch:
384868, Pacific Northwest National Laboratory Pacific Northwest National Lab, SS , 57671

KNPMK1AA-SAMP Constituent List:

ALPHA	RDL:3	pCi/L	LCL:	UCL:	RPD:
KN8871AA-BLK:					
ALPHA	RDL:3	pCi/L	LCL:	UCL:	RPD:
KN8871AC-LCS:					
Am-241	RDL:	pCi/L	LCL:70	UCL:130	RPD:20

KNPMK1AA-SAMP Calc Info:

52

6/12/2008 10:02:08 AM

Sample Preparation/Analysis

AZ Gross Alpha PrpRC5014
S7 Gross Alpha by GPC using Am-241 curve
5I CLIENT: HANFORD

Balance Id:1120482733

Pipet #: _____

AnalyDueDate: 07/07/2008

Sep1 DT/Tm Tech:

Batch: 8155280 pCi/L

Sep2 DT/Tm Tech:

SEQ Batch, Test: None

Prep Tech: ,HarrisD

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

KN8871AA-BLK:

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

KN8871AC-LCS:

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

Approved By _____ Date: _____

6/18/2008 3:36:16 PM

ICOC Fraction Transfer/Status Report

ByDate: 6/19/2007, 6/23/2008, Batch: '8155280', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus	Accepting			Comments
8155280						
AC		Rev1C	HarrisD	6/12/2008 9:58:26		
SC			wagarr	IsBatched	6/4/2008 4:12:05 PM	ICOC_RADCALC v4.8.32
SC			HarrisD	InPrep	6/12/2008 9:58:26 AM	RICH-RC-5017 Revision 6
SC			HarrisD	Prep1C	6/12/2008 10:02:08 AM	RICH-RC-5014 REVISION 7
SC			BockJ	InPrep2	6/16/2008 7:26:07 AM	RICH-RC-5014 REVISION 7
SC			BockJ	Prep2C	6/17/2008 9:15:58 AM	RICH-RC-5014 REVISION 7
SC			BlackCL	InCnt1	6/17/2008 9:26:34 AM	RICH-RD-0003 REVISION 5
SC			ClarkR	CalcC	6/17/2008 12:06:02 PM	RICH-RD-0003 REVISION 5
SC			nortonj	Rev1C	6/18/2008 3:36:12 PM	RICH-RC-0002 REV 8
AC			HarrisD	6/12/2008 10:02:08		
AC			BockJ	6/16/2008 7:26:07		
AC			BockJ	6/17/2008 9:15:58		
AC			BlackCL	6/17/2008 9:26:34		
AC			ClarkR	6/17/2008 12:06:02		
AC			nortonj	6/18/2008 3:36:12 PM		

AC: Accepting Entry; SC: Status Change

TAL Richland

Richland Wa.

Grp Rec Cnt: 7

ICOCFractions v4.8.33

TestAmerica

Data Review/Verification Checklist

RADIOCHEMISTRY, First Level Review

6/18/2008 3:35:50 PM

Lot No., Due Date: J8E220269; 07/14/2008

Client, Site: 384868; PGW 615HANFORD HANFORD

QC Batch No., Method Test: 8155281; RBETA-SR Beta by GPC-Sr/Y

SDG, Matrix: W05417; WATER

	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 Review John Norton **Date** 6-18-8

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist
RADIOCHEMISTRY
Second Level Review

Batch Number: 815 5281

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: Erika Todd Date: 6/19/18

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

TESTAMERICA

6/19/2008 6:55:44 AM

Sample Preparation/Analysis

384868, Pacific Northwest National Laboratory ,
Pacific Northwest National Lab

AnalyDueDate: 07/11/2008

CL Sr-90 Prp/SepRC5006(5071)
TL Sr-85 by Nal and Sr-90 by GPC 7 day ingrowth
5I CLIENT: HANFORD

Balance Id:1120482733
Pipet #: DRM DM
Sep1 DT/Tm Tech: 6/23/08 15:50:04
Sep2 DT/Tm Tech: 7-1-08 1015
Prep Tech: BockJ

Batch: 8155282 **WATER** **pCi/L** **PM, Quote: SS , 57671**
SEQ Batch, Test: None All Tests: 8155282 CLTL, 8155285 AWTA,

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Tracer Yield	Dish Size	Ppt or Geometry	Count Time Min	Detector Id 6/23/08	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
1 KN1G5-1-AC		131.90g,in	SRTB16251 05/21/08,pd				150	9"	1811	6/23/08	
J8E280291-1-SAMP					1.5	021.4		6A	0636	7/2/08	
								6A	0609	7/3	
	YTA18958 Ex:4/29/2009		0.9166 ~~0.9247~~ 7/3								
05/27/2008 09:19		AmtRec: 20ML,3XLP,4LP		#Containers: 5				Scr:	Alpha: 4.46E-05 uCi/Sa	Beta: 9.62E-03 uCi/Sa	6.6E-02L
2 KN1G5-1-AD-X		132.90g,in	SRTB16252 05/21/08,pd					3"	1811	6/23/08	
J8E280291-1-DUP						022.8				7/	
								6B	0636	7/2/08	
	YTA18959 Ex:4/29/2009		~~0.9217~~ 7/3			0.9147		6B	0609	7/3	
05/27/2008 09:19		AmtRec: 20ML,3XLP,4LP		#Containers: 5				Scr:	Alpha: 4.46E-05 uCi/Sa	Beta: 9.62E-03 uCi/Sa	6.6E-02L
3 KN89M-1-AA-B		999.30g,in	SRTB16254 05/21/08,pd					3"	1852	6/23/08	
J8F030000-282-BLK						022.2					
								6C	0636	7/2	
	YTA18960 Ex:4/29/2009		0.9222					6C	0609	7/3	
05/27/2008 09:19		AmtRec:		#Containers: 1				Scr:	Alpha:	Beta:	
4 KN89M-1-AC-C		1002.80g,in	SRSG1480 06/18/08,pd					9"	1852	6/23/08	
J8F030000-282-LCS						021.9					
								6D	0636	7/2	
	YTA18961 Ex:4/29/2009		0.8750					6D	0609	7/3	
05/27/2008 09:19		AmtRec:		#Containers: 1				Scr:	Alpha:	Beta:	

57

TESTAMERICA

6/19/2008 6:55:45 AM

Sample Preparation/Analysis

CL Sr-90 Prp/SepRC5006(5071)
TL Sr-85 by NaI and Sr-90 by GPC 7 day ingrowth
5I CLIENT: HANFORD

Balance Id:1120373922,1120482733

Pipet #:

AnalyDueDate: 07/11/2008

Sep1 DT/Tm Tech:

Batch: 8155282 pCi/L

SEQ Batch, Test: None

Sep2 DT/Tm Tech:

Prep Tech: ,BockJ

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

Comments: ~~KN1G5-SAMP~~ Comments

pH < 2.0, Sample reduced due to Screening results LB 6-19-08

All Clients for Batch:
384868, Pacific Northwest National Laboratory Pacific Northwest National Lab, SS , 57671

KN1G51AC-SAMP Constituent List:

Sr-85	RDL:	pCi/L	LCL:20	UCL:105	RPD:20	Sr-90	RDL:2	pCi/L	LCL:70	UCL:130	RPD:20

KN89M1AA-BLK:

Sr-85	RDL:	pCi/L	LCL:20	UCL:105	RPD:20	Sr-90	RDL:2	pCi/L	LCL:	UCL:	RPD:

KN89M1AC-LCS:

Sr-85	RDL:	pCi/L	LCL:20	UCL:105	RPD:20	Sr-90	RDL:2	pCi/L	LCL:70	UCL:130	RPD:20

KN1G51AC-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

KN89M1AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

KN89M1AC-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

Approved By _____ Date: _____

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

RE-COUNT REQUEST

DUE DATE 7/11/08

CUSTOMER PGW

ANALAYSIS ~~HO~~ SR

MATRIX water

LOT NUMBER J8E280091

SAMPLE DELIVERY GROUP

OLD BATCH NUMBER 815528.2

NEW BATCH NUMBER

LAB SAMPLE ID	CLIENT ID	REASON FOR REQUEST & ANALYSIS COMMENTS
1) KN19547C		Dups out.
2) KN19547DX		
3)		
4)		
5)		
6)		
7)		
8)		
9)		
10)		
11)		
12)		
13)		
14)		
15)		
16)		
17)		
18)		
19)		
20)		

RC-126, 12/07, Rev 5

7/9/2008 1:28:10 PM

Sample Preparation/Analysis

Balance Id:1120482733,1120373922,1120

384868, Pacific Northwest National Laboratory ,
Pacific Northwest National Lab

CL Sr-90 Prp/SepRC5006(5071)
TL Sr-85 by NaI and Sr-90 by GPC 7 day ingrowth
5I CLIENT: HANFORD

Pipet #: _____

AnalyDueDate: 07/11/2008

Sep1 DT/Tm Tech: 06/23/2008 15:50,ManisD

Batch: 8155282 **WATER** **pCi/L** **PM, Quote: SS , 57671**

Sep2 DT/Tm Tech:

SEQ Batch, Test: None All Tests: 8155282 CLTL, 8155285 AWTA,

Prep Tech: ManisD

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Tracer Yield	Dish Size	Ppt or Geometry	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
1 KN1G5-1-AC J8E280291-1-SAMP		131.90g,in	SRTB16251 05/21/08,pd 05/22/07 r			~~06/23/2008 15:50,s1~~					
05/27/2008 09:19		AmtRec: 20ML,3XLP,4LP		#Containers: 5				Scr:	Alpha: 4.46E-05 uCi/Sa	Beta: 9.62E-03 uCi/Sa	6.6E-02L
2 KN1G5-1-AD-X J8E280291-1-DUP		132.90g,in	SRTB16252 05/21/08,pd 05/22/07 r			~~06/23/2008 15:50,s1~~					
05/27/2008 09:19		AmtRec: 20ML,3XLP,4LP		#Containers: 5				Scr:	Alpha: 4.46E-05 uCi/Sa	Beta: 9.62E-03 uCi/Sa	6.6E-02L
3 KN1G5-2-AC J8E280291-1-SAMP		131.90g	SRTB 16251			21.4		SA	0009	7/10/08	
05/27/2008 09:19		AmtRec: 20ML,3XLP,4LP		#Containers: 5				Scr:	Alpha: 4.46E-05 uCi/Sa	Beta: 9.62E-03 uCi/Sa	6.6E-02L
4 KN1G5-2-AD-X J8E280291-1-DUP		132.90g	SRTB 16252			22.0		SB	0009	7/10/08	
05/27/2008 09:19		AmtRec: 20ML,3XLP,4LP		#Containers: 5				Scr:	Alpha: 4.46E-05 uCi/Sa	Beta: 9.62E-03 uCi/Sa	6.6E-02L

7/9/2008 1:28:11 PM

Sample Preparation/Analysis

CL Sr-90 Prp/SepRC5006(5071)
TL Sr-85 by NaI and Sr-90 by GPC 7 day ingrowth
5I CLIENT: HANFORD

Balance Id:1120373922,1120482733,1120

Pipet #: _____

AnalyDueDate: 07/11/2008

Sep1 DT/Tm Tech: 06/23/2008 15:50

Batch: 8155282 pCi/L

Sep2 DT/Tm Tech:

SEQ Batch, Test: None

Prep Tech: ,ManisD

Work Order, Lot, Sample DateTime	Total Amt/Unit	Initial Aliquot Amt/Unit	QC Tracer Prep Date	Tracer Yield	Dish Size	Ppt or Geometry	Count Time Min	Detector Id	Count On | Off (24hr) Circle	CR Analyst, Init/Date	Comments:
5 KN89M-1-AA-B		999.30g,in	SRTB16254								
J8F030000-282-BLK			05/21/08,pd 05/22/07,r								
						06/23/2008 15:50,s1					
05/27/2008 09:19		AmtRec:	#Containers: 1					Scr:	Alpha:		Beta:
6 KN89M-1-AC-C		1002.80g,in	SRSG1480								
J8F030000-282-LCS			06/18/08,pd 01/23/08,r								
						06/23/2008 15:50,s1					
05/27/2008 09:19		AmtRec:	#Containers: 1					Scr:	Alpha:		Beta:

Comments: KN1G5-SAMP Comments

All Clients for Batch:
384868, Pacific Northwest National Laboratory Pacific Northwest National Lab, SS , 57671

KN1G51AC-SAMP Constituent List:

Sr-85	RDL:	pCi/L	LCL:20	UCL:105	RPD:20	Sr-90	RDL:2	pCi/L	LCL:70	UCL:130	RPD:20

KN89M1AA-BLK:

Sr-85	RDL:	pCi/L	LCL:20	UCL:105	RPD:20	Sr-90	RDL:2	pCi/L	LCL:	UCL:	RPD:

KN89M1AC-LCS:

Sr-85	RDL:	pCi/L	LCL:20	UCL:105	RPD:20	Sr-90	RDL:2	pCi/L	LCL:70	UCL:130	RPD:20

KN1G51AC-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

Sample Preparation/Analysis

CL Sr-90 Prp/SepRC5006(5071)
TL Sr-85 by NaI and Sr-90 by GPC 7 day ingrowth
5I CLIENT: HANFORD

Balance Id:1120373922,1120482733,1120

Pipet #: _____

AnalyDueDate: 07/11/2008

Sep1 DT/Tm Tech: 06/23/2008 15:50

Batch: 8155282 pCi/L

Sep2 DT/Tm Tech:

SEQ Batch, Test: None

Prep Tech: ,ManisD

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

KN89M1AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

KN89M1AC-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

Approved By _____ Date: _____

TESTAMERICA

7/11/2008 10:33:53 AM

ICOC Fraction Transfer/Status Report

ByDate: 7/12/2007, 7/16/2008, Batch: '8155282', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus	Accepting			Comments
8155282						
AC		Rev1C	HarrisD	6/11/2008 9:32:05		
SC			wagarr	IsBatched	6/4/2008 4:12:05 PM	ICOC_RADCALC v4.8.32
SC			HarrisD	InPrep	6/11/2008 9:32:05 AM	RICH-RC-5017 Revision 6
SC			BockJ	InPrep	6/19/2008 6:45:42 AM	RICH-RC-5016 Revision 7
SC			BockJ	Prep1C	6/19/2008 6:55:59 AM	RICH-RC-5016 REVISION 7
SC			ManisD	InSep1	6/20/2008 9:49:35 AM	RL-GPC-003 REV 0
SC			DAWKINSO	InCnt1	6/23/2008 4:24:12 PM	RL-CI-007 REVISION 0
SC			DAWKINSO	Cnt1C	6/23/2008 8:07:27 PM	RL-CI-007 REVISION 0
SC			ManisD	InSep2	6/24/2008 11:05:37 AM	RL-GPC-004 REV 0
SC			McDowellD	Sep1C	7/1/2008 3:49:18 PM	RL-GPC-004 REV 0
SC			DAWKINSO	InCnt2	7/1/2008 4:28:02 PM	RL-CI-006 REVISION 0
SC			BlackCL	CalcC	7/3/2008 7:09:20 AM	RL-CI-006 REVISION 0
SC			BlackCL	InCnt1	7/10/2008 4:46:55 AM	RL-CI-006 REVISION 0
SC			BlackCL	CalcC	7/10/2008 7:51:35 AM	RL-CI-006 REVISION 0
SC			antonsonl	Rev1C	7/11/2008 10:26:14 AM	RICH-RC-0002 REV 8
AC			BockJ	6/19/2008 6:45:42		
AC			BockJ	6/19/2008 6:55:59		
AC			ManisD	6/20/2008 9:49:35		
AC			DAWKINSO	6/23/2008 4:24:12 PM		
AC			DAWKINSO	6/23/2008 8:07:27 PM		
AC			ManisD	6/24/2008 11:05:37		
AC			McDowellD	7/1/2008 3:49:18 PM		
AC			DAWKINSO	7/1/2008 4:28:02 PM		
AC			BlackCL	7/3/2008 7:09:20 AM		
AC			BlackCL	7/10/2008 4:46:55		
AC			BlackCL	7/10/2008 7:51:35		
AC			antonsonl	7/11/2008 10:26:14		

AC: Accepting Entry; SC: Status Change

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review/Verification Checklist

RADIOCHEMISTRY, First Level Review

6/25/2008 4:14:00 PM

Lot No., Due Date: J8E280291; 07/14/2008

Client, Site: 384868; PGW 615HANFORD HANFORD

QC Batch No., Method Test: 8155285; RGAMMA Gamma by GER

SDG, Matrix: W05417; WATER

	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 Review Tina Anderson **Date** 6/24/08

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist

RADIOCHEMISTRY

Second Level Review

Batch Number: 915528S

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: Erika Job Date: 6/26/08

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

TestAmerica

Data Review/Verification Checklist

RADIOCHEMISTRY, First Level Review

6/30/2008 11:42:32 AM

Lot No., Due Date: J8E220269; 07/14/2008

Client, Site: 384868; PGW 615HANFORD HANFORD

QC Batch No., Method Test: 8155286; RGAMMA Gamma by GER

SDG, Matrix: W05417; WATER

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:
Please see NCM # 10-12594

First Level Review John Norton **Date** 6-30-8

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist

RADIOCHEMISTRY

Second Level Review

Batch Number: 81SS286

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: See NCM

Second Level Review: Erika Ford Date: 7/1/15

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

Clouseau
Nonconformance Memo

TestAmerica

NCM #:	**10-12594**		
NCM Initiated By:	John Norton	Classification:	**Anomaly**
Date Opened:	06/30/2008	Status:	**GLREVIEW**
Date Closed:		Production Area:	Environmental - Prep
		Tests:	Gamma by GER
		Lot #'s (Sample #'s):	J8E220269 (6,7,8), J8F030000 (286),
		QC Batches:	8155286,
Nonconformance:	MDA not met		
Subcategory:	Data accepted		

Problem Description / Root Cause

Name	Date	Description
John Norton	06/30/2008	When first counted these samples did not meet the RDL for Be-7.

Corrective Action

Name	Date	Corrective Action
John Norton	06/30/2008	The samples were re-counted for a longer period of time, the RDL has been met.

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: 6/30/2008

TestAmerica

Data Review/Verification Checklist

RADIOCHEMISTRY. First Level Review

6/27/2008 10:45:11 AM

Lot No., Due Date: J8E220269; 07/14/2008

Client, Site: 384868; PGW 615HANFORD HANFORD

QC Batch No., Method Test: 8155284; RGAMLEPS Gamma by LEPS

SDG, Matrix: W05417; WATER

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 Review Glenn E Wheland **Date** 6/27/08

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist

RADIOCHEMISTRY

Second Level Review

Batch Number: 815S284

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: Erika Ford Date: 6/30/15

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

TestAmerica

Data Review/Verification Checklist

RADIOCHEMISTRY, First Level Review

6/12/2008 11:36:33 AM

Lot No., Due Date: J8E220269; 07/14/2008

Client, Site: 384868; PGW 615HANFORD HANFORD

QC Batch No., Method Test: 8155279; RTC99 Tc-99 by LSC

SDG, Matrix: W05417; WATER

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 Review John Norton **Date** 6-12-8

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist
RADIOCHEMISTRY
Second Level Review

Batch Number: 8155279

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: Erika Dodd Date: 6/12/18

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

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review/Verification Checklist

RADIOCHEMISTRY, First Level Review

7/1/2008 2:10:36 PM

Lot No., Due Date: J8E220269; 07/14/2008

Client, Site: 384868; PGW 615HANFORD HANFORD

QC Batch No., Method Test: 8155275; RUNAT UNat by KPA

SDG, Matrix: W05417; WATER

	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:
Please see NCM # 10-12614

First Level Review John Porter **Date** 7-1-8

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist
RADIOCHEMISTRY
Second Level Review

Batch Number: 8155278

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: See ncm

Second Level Review: Mike Ford Date: 7/3/8

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

Clouseau
Nonconformance Memo

TestAmerica

NCM #:	**10-12614**		
NCM Initiated By:	John Norton	Classification:	**Anomaly**
Date Opened:	07/01/2008	Status:	**CHREVIEW**
Date Closed:		Production Area:	Counting
		Tests:	UNat by KPA
		Lot #'s (Sample #'s):	J8E220269 (12,13,14), J8F030000 (275),
		QC Batches:	8155275,
Nonconformance:	QC data exceeded criteria		
Subcategory:	MS/MSD out of control: high levels in sample		

Problem Description / Root Cause

Name	Date	Description
John Norton	07/01/2008	The matrix spike provided a low yield of only 4%.

Corrective Action

Name	Date	Corrective Action
John Norton	07/01/2008	The activity of the sample is greater than five times the expected yield of the spike used for the matrix spike, the batch can be accepted.

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

ENTERED 7/8/08
SKS

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Richland Laboratory
Data Review Check List
Hexavalent Chromium

Batch Number(s): **8148552** J8E230311

Lab Sample Numbers or WC 5417

Method/Test/Parameter: **Cr+6 in Water / RICH-WC-5003**

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?	✓			✓
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?			✓	✓
6. ICP only: CRDL standard (CRI or CRA) analyzed at required frequency?			✓	✓
7. ICP only: Interference check samples (ICSA, ICSAB) and HICAL analyzed at the required frequencies and within QC limits?			✓	✓

Review Item	Yes (✓)	No (✓)	N/A (✓)	2nd Level Review (✓)
E. Other	✓			
1. Are all nonconformances included and noted?				✓
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: [signature] Date: 5/28/08

Second-Level Review: [signature] Date: 07/08/08

TESTAMERICA

FLUOR HANFORD

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

J8E226269 W05417 Due 07-07-08

C.O.C. # **S08-004-1054**

Page 1 of 1

Collector D. R. Williamson	**Contact/Requester** Steve Trent	**Telephone No-** 509-373-3869 **MSIN** **FAX**
SAF No. S08-004	**Sampling Origin** Hanford Site	**Purchase Order/Charge Code**
Project Title SURV. APRIL 2008	HNF-N-506-13	**Ice Chest No.** GW-1 **Temp.**
Shipped To (Lab) TestAmerica Incorporated, Richland	**Method of Shipment** Govt. Vehicle	**Bill of Lading/Air Bill No.**
Protocol SURV	**Priority:** 45 Days	**Offsite Property No.**

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
Site-Wide Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2B0		W	5-22-08	1000	1x20-mL P	Activity Scan	None
B1V2B0		W	↓	↓	1x1000-mL G/P	PUISO_PLATE_AEA: Pu-238 + 239/240 (2)	HNO3 to pH <2
						KNPRQ	

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
D. R. Williamson			MAY 22 2008 1700			05/23/08	MAY 22 2008 1728
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time

Matrix *

S	= Soil	DS	= Drum Solid
SE	= Sediment	DL	= Drum Liquid
SO	= Solid	T	= Tissue
SL	= Sludge	WI	= Wine
W	= Water	L	= Liquid
O	= Oil	V	= Vegetation
A	= Air	X	= Other

FINAL SAMPLE DISPOSITION Disposal Method (e.g., Return to customer, per lab procedure, used in process) Disposed By Date/Time

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TESTAMERICA

FLUOR HANFORD	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST J8E220269 W05417 Due 07-07-08	C.O.C. # S08-004-1091 Page 1 of 1

Collector: D. R. Williamson	Contact/Requester: Steve Trent	Telephone No.: 509-373-5869 MSIN FAX
SAF No.: S08-004	Sampling Origin: Hanford Site	Purchase Order/Charge Code
Project Title: SURV, APRIL 2008	HNF-N-506-13	Ice Chest No.: GW-1 Temp.
Shipped To (Lab): TestAmerica Incorporated, Richland	Method of Shipment: Govt. Vehicle	Bill of Lading/Air Bill No.
Protocol: SURV	Priority: 45 Days	Offsite Property No.

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS Hold Time — Total Activity Exemption: Yes ☑ No ☐
Site-Wide Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2H6		W	5-22-08	1000	1x20-mL P	Activity Scan	None
B1V2H6		W	↓	↓	1x1000-mL P	9310_ALPHABETA_GPC: Gross Beta (1)	HNO3 to pH <2
						KNPLT	

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
D. R. Williamson	Dave Will		MAY 22 2008		S. Smith	S. Smith	MAY 22 2008
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time

Matrix *

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

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

TESTAMERICA

FLUOR HANFORD

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

J8E220269 W05417 Due 07-07-08

C.O.C. # **S08-004-1053**

Page 1 of 1

Collector D. R. Williamson	**Contact/Requester** Steve Trent	**Telephone No.** 509-373-5869 **MSIN** **FAX**
SAF No. S08-004	**Sampling Origin** Hanford Site	**Purchase Order/Charge Code**
Project Title SURV, APRIL 2008	HNF-N-506-13	**Ice Chest No.** GN-1 **Temp.**
Shipped To (Lab) TestAmerica Incorporated, Richland	**Method of Shipment** Govt. Vehicle	**Bill of Lading/Air Bill No.**
Protocol SURV	**Priority:** 45 Days	**Offsite Property No.**

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
Site-Wide Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V299		W	5-22-08	1000	1x20-mL P	Activity Scan	None
B1V299		W	↓	↓	1x1000-mL G/P	PUISO_PLATE_AEA: Pu-238 + 239/240 (2)	HNO3 to pH <2
						KNPL7	

Relinquished By	Print / Sign	Date/Time	Received By	Print / Sign	Date/Time
D. R. Williamson	Dave Williamson	MAY 22 2008	S. Smith	S. Smith	MAY 22 2008
Relinquished By		Date/Time	Received By		Date/Time
Relinquished By		Date/Time	Received By		Date/Time
Relinquished By		Date/Time	Received By		Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liquid	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wine	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION Disposal Method (e.g., Return to customer, per lab procedure, used in process) Disposed By Date/Time

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TESTAMERICA

FLUOR HANFORD	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST	C.O.C. # S08-004-1092
	J8E226269 W05417 Due 07-07-08	Page 1 of 1

Collector D. R. Williamson	Contact/Requester Steve Trent	Telephone No. 509-373-5869 MSIN FAX
SAF No. S08-004	Sampling Origin Hanford Site	Purchase Order/Charge Code
Project Title SURV, APRIL 2008	HNF-N-326-13	Ice Chest No. 6G-1 Temp.
Shipped To (Lab) TestAmerica Incorporated, Richland	Method of Shipment Govt. Vehicle	Bill of Lading/Air Bill No.
Protocol SURV	Priority: 45 Days	Offsite Property No.

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS Hold Time
Site-Wide Generator Knowledge Information Form applies.
Total Activity Exemption: Yes ☑ No ☐

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2H7		W	5-22-08	1000	1x20-mL P	Activity Scan	None
B1V2H7		W	↓	↓	1x1000-mL P	9310_ALPHABETA_GPC: Gross Beta (1)	HNO3 to pH <2
						KNPMC	

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
	D. R. Williamson	Dave Williamson	MAY 22 2008		S. Smith	S. Smith	MAY 22 2008
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time

Matrix *

S	Soil	DS	Drum Solid
SE	Sediment	DL	Drum Liquid
SO	Solid	T	Tissue
SL	Sludge	WI	Wine
W	Water	L	Liquid
O	Oil	V	Vegetation
A	Air	X	Other

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

TESTAMERICA

FLUOR HANFORD

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

J8E220269 W05417 Due 07.07.08

C.O.C. # **S08-004-1093**

Page 1 of 1

Collector D. R. Williamson	**Contact/Requester** Steve Trent	**Telephone No.** 509-373-5869 **MSIN** **FAX**
SAF No. S08-004	**Sampling Origin** Hanford Site	**Purchase Order/Charge Code**
Project Title SURV, APRIL 2008	HNF-N-506.13	**Ice Chest No.** GW-1 **Temp.**
Shipped To (Lab) TestAmerica Incorporated, Richland	**Method of Shipment** Govt. Vehicle	**Bill of Lading/Air Bill No.**
Protocol SURV	**Priority:** 45 Days	**Offsite Property No.**

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
Site-Wide Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2H8		W	5-22-08	1000	1x20-mL P	Activity Scan	None
B1V2H8		W	↓	↓	1x1000-mL P	9310_ALPHABETA_GPC: Gross Beta (1)	HNO3 to pH <2
						KNPMF	

Relinquished By	Print / Sign	Date/Time	Received By	Print / Sign	Date/Time
D. R. Williamson	Dave Will	MAY 22 2008 RCC	S. Smith	S. Smith	MAY 22 2008 RCC
Relinquished By		Date/Time	Received By		Date/Time
Relinquished By		Date/Time	Received By		Date/Time
Relinquished By		Date/Time	Received By		Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liqui	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wipe	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION Disposal Method (e.g., Return to customer, per lab procedure, used in process) Disposed By Date/Time

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TESTAMERICA

FLUOR HANFORD	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST	C.O.C. # S08-004-1050
	JSE220269 W05417 Due 07.07.08	Page 1 of 1

Collector: D. R. Williamson	Contact/Requester: Steve Trent	Telephone No.: 509-373-5969 MSIN FAX
SAF No.: S08-004	Sampling Origin: Hanford Site	Purchase Order/Charge Code
Project Title: SURV, APRIL 2008	HNF-N-506-13	Ice Chest No.: GW-1 Temp.
Shipped To (Lab): TestAmerica Incorporated, Richland	Method of Shipment: Govt. Vehicle	Bill of Lading/Air Bill No.
Protocol: SURV	Priority: 45 Days	Offsite Property No.

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS Hold Time
Site-Wide Generator Knowledge Information Form applies.

Total Activity Exemption: Yes ☑ No ☐

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V296		W	5-22-08	1000	1x20-mL P	Activity Scan	None
B1V296		W	↓	↓	1x1000-mL P	9310_ALPHABETA_GPC: Alpha + Beta (2)	HNO3 to pH <2
						KNPMK	

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
D. R. Williamson	Dave Williamson		MAY 22 2008 12:00	S. Smith	S. Smith		MAY 22 2008 12:00
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liqui	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wine	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

TESTAMERICA

FLUOR HANFORD

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

JSE 226269 W05417 Due 07 07.08

C.O.C. # **S08-004-1059**

Page 1 of 1

Collector D. R. Williamson	**Contact/Requester** Steve Trent	**Telephone No.** 509-373-5869 **MSIN** **FAX**
SAF No. S08-004	**Sampling Origin** Hanford Site	**Purchase Order/Charge Code**
Project Title SURV. APRIL 2008	HNF-N-506-13	**Ice Chest No.** GW-1 **Temp.**
Shipped To (Lab) TestAmerica Incorporated Richland	**Method of Shipment** Govt. Vehicle	**Bill of Lading/Air Bill No.**
Protocol SURV	**Priority:** 45 Days	**Offsite Property No.**

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
Site-Wide Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2B5		W	5.22.08	1000	1x20-mL P	Activity Scan	None
B1V2B5		W	↓	↓	3x1000-mL G/P	GAMMA_GS: List-1 (10)	HNO3 to pH <2
						KNPML	

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
	D. R. Williamson	Dave Will.	MAY 22 2008 1200		S. Smith	S. Smith	MAY 22 2008 1200
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SF = Sediment		DL = Drum Liqui	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wipe	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

TESTAMERICA

FLUOR HANFORD

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

JSE 226269 W05417 Due 07-07-08

C.O.C. # **S08-004-1060**

Page 1 of 1

Collector D. R. Williamson	**Contact/Requester** Steve Trent	**Telephone No.** 509-373-5869 **MSIN** **FAX**
SAF No. S08-004	**Sampling Origin** Hanford Site	**Purchase Order/Charge Code**
Project Title SURV. APRIL 2008	HNF-N-506-13	**Ice Chest No.** GW-1 **Temp.**
Shipped To (Lab) TestAmerica Incorporated, Richland	**Method of Shipment** Govt. Vehicle	**Bill of Lading/Air Bill No.**
Protocol SURV	**Priority:** 45 Days	**Offsite Property No.**

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
Site-Wide Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2B6		W	5-22-08	1000	1x20-mL P	Activity Scan	None
B1V2B6		W	↓	↓	3x1000-mL G/P	GAMMA_GS: List-1 (10)	HNO3 to pH <2
						KNPM1	

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
	D. R. Williamson	[signature]	MAY 22 2008 1200		S. Smith	S. Smith	MAY 22 2008 1200
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liqui	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wine	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

TESTAMERICA

FLUOR HANFORD	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST J8E220269 W05417 Due 07-07-08	C.O.C. # S08-004-1061 Page 1 of 1

Collector: D. R. Williamson	Contact/Requester: Steve Trent	Telephone No.: 509-373-3869 MSIN FAX
SAF No.: S08-004	Sampling Origin: Hanford Site	Purchase Order/Charge Code
Project Title: SURV, APRIL 2008	HNF-N-506-13	Ice Chest No.: GW-1 Temp.
Shipped To (Lab): TestAmerica Incorporated, Richland	Method of Shipment: Govt. Vehicle	Bill of Lading/Air Bill No.
Protocol: SURV	Priority: 45 Days	Offsite Property No.

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS Hold Time
Site-Wide Generator Knowledge Information Form applies.

Total Activity Exemption: Yes ☑ No ☐

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2B7		W	5-22-08	1000	1x20-mL P	Activity Scan	None
B1V2B7		W	↓	↓	3x1000-mL G/P	GAMMA_GS: List-1 (10)	HNO3 to pH <2
						KNPPT	

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
	D. R. Williamson		MAY 22 2008 1200		S. Smith		MAY 22 2008 1200
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time

Matrix *

S	= Soil	DS	= Drum Solid
SE	= Sediment	DL	= Drum Liqui
SO	= Solid	T	= Tissue
SL	= Sludge	WI	= Wine
W	= Water	L	= Liquid
O	= Oil	V	= Vegetation
A	= Air	X	= Other

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

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TESTAMERICA

FLUOR HANFORD	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST J8E220269 005417 Due 07 07 08	C.O.C. # S08-004-1062 Page 1 of 1

Collector: D. R. Williamson	Contact/Requester: Steve Trent	Telephone No.: 509-373-5869 MSIN FAX
SAF No.: S08-004	Sampling Origin: Hanford Site	Purchase Order/Charge Code
Project Title: SURV, APRIL 2008	HNF-N-506-13	Ice Chest No.: GW-1 Temp.
Shipped To (Lab): TestAmerica Incorporated, Richland	Method of Shipment: Govt. Vehicle	Bill of Lading/Air Bill No.
Protocol: SURV	Priority: 45 Days	Offsite Property No.

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS Hold Time
Site-Wide Generator Knowledge Information Form applies.

Total Activity Exemption: Yes ☑ No ☐

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2B8		W	5-22-08	1000	1x20-mL P	Activity Scan	None
B1V2B8		W	↓	↓	2x4000-mL G/P	I129_SEP_LEPS_GS: I-129 (1)	None
						KNPPX	

Relinquished By (Print / Sign)	Date/Time	Received By (Print / Sign)	Date/Time
D. R. Williamson	MAY 22 2008 1200	S. Smith	MAY 22 2008 1200
Relinquished By	Date/Time	Received By	Date/Time
Relinquished By	Date/Time	Received By	Date/Time
Relinquished By	Date/Time	Received By	Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liqui	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wine	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

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TESTAMERICA

FLUOR HANFORD	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST J8E231269 W05417 Due 07-07-08	C.O.C. # S08-004-1063 Page 1 of 1

Collector: D. R. Williamson	Contact/Requester: Steve Trent	Telephone No.: 509-372-3869 MSIN FAX
SAF No.: S08-004	Sampling Origin: Hanford Site	Purchase Order/Charge Code
Project Title: SURV, APRIL 2008	HNF-N-506-13	Ice Chest No.: GW-1 Temp.
Shipped To (Lab): TestAmerica Incorporated, Richland	Method of Shipment: Govt. Vehicle	Bill of Lading/Air Bill No.
Protocol: SURV	Priority: 45 Days	Offsite Property No.

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS Hold Time
Site-Wide Generator Knowledge Information Form applies.

Total Activity Exemption: Yes ☑ No ☐

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2B9		W	5.22.08	1000	1x20-mL P	Activity Scan	None
B1V2B9		W	↓	↓	2x4000-mL G/P	I129_SEP_LEPS_GS: I-129 (1)	None
						KNPP8	

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
	D. R. Williamson	[signature]	MAY 22 2008 1200		S. Smith	S. Smith	MAY 22 2008 1200
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time

Matrix *

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

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

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TESTAMERICA

FLUOR HANFORD	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST J8E220269 WC5417 Due 07.07.08	C.O.C. # S08-004-1064 Page 1 of 1

Collector: D. R. Williamson	Contact/Requester: Steve Trent	Telephone No.: 509-373-5869 MSIN FAX
SAF No.: S08-004	Sampling Origin: Hanford Site	Purchase Order/Charge Code
Project Title: SURV, APRIL 2008	HNF-N-506-13	Ice Chest No.: GW-1 Temp.
Shipped To (Lab): TestAmerica Incorporated, Richland	Method of Shipment: Govt. Vehicle	Bill of Lading/Air Bill No.
Protocol: SURV	Priority: 45 Days	Offsite Property No.

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
Site-Wide Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2C0		W	5.22.08	1200	1x20-mL P	Activity Scan	None
B1V2C0		W	↓	↓	2x4000-mL G/P	I129_SEP_LEPS_GS: I-129 (1)	None
						KNPQE	

Relinquished By	Print / Sign	Date/Time	Received By	Print / Sign	Date/Time
D. R. Williamson	Dave Will	MAY 22 2008 1200	S. Smith	S. Smith	MAY 22 2008 1200
Relinquished By		Date/Time	Received By		Date/Time
Relinquished By		Date/Time	Received By		Date/Time
Relinquished By		Date/Time	Received By		Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liquid	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wine	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION Disposal Method (e.g., Return to customer, per lab procedure, used in process) Disposed By Date/Time

TESTAMERICA

FLUOR HANFORD

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

J8E220269 W05417 Due 07.07.08

C.O.C. # **S08-004-1065**

Page 1 of 1

Collector D. R. Williamson	**Contact/Requester** Steve Trent	**Telephone No.** 509-373-5869 **MSIN** **FAX**
SAF No. S08-004	**Sampling Origin** Hanford Site	**Purchase Order/Charge Code**
Project Title SURV, APRIL 2008	HNF-N-506-13	**Ice Chest No.** GW-1 **Temp.**
Shipped To (Lab) TestAmerica Incorporated, Richland	**Method of Shipment** Govt. Vehicle	**Bill of Lading/Air Bill No.**
Protocol SURV	**Priority:** 45 Days	**Offsite Property No.**

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
Site-Wide Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2C1		W	5.22.08	1000	1x20-mL P	Activity Scan	None
B1V2C1		W	↓	↓	1x500-mL G/P	UTOT_KPA: Uranium (1)	HNO3 to pH <2
						KNPGM	

Relinquished By	Print / Sign	Date/Time	Received By	Print / Sign	Date/Time
D. R. Williamson	D. R. Williamson	1200 MAY 22 2008	S. Smith	S. Smith	1200 MAY 22 2008
Relinquished By		Date/Time	Received By		Date/Time
Relinquished By		Date/Time	Received By		Date/Time
Relinquished By		Date/Time	Received By		Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liqui	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wipe	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION Disposal Method (e.g., Return to customer, per lab procedure, used in process) Disposed By Date/Time

TESTAMERICA

FLUOR HANFORD	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST J8E230369 WO5417 Due 07-07-08	C.O.C. # S08-004-1066 Page 1 of 1

Collector: D. R. Williamson	Contact/Requester: Steve Trent	Telephone No.: 509-373-5869 MSIN FAX
SAF No.: S08-004	Sampling Origin: Hanford Site	Purchase Order/Charge Code
Project Title: SURV. APRIL 2008	HNF-N-506-13	Ice Chest No.: GW-1 Temp.
Shipped To (Lab): TestAmerica Incorporated, Richland	Method of Shipment: Govt. Vehicle	Bill of Lading/Air Bill No.
Protocol: SURV	Priority: 45 Days	Offsite Property No.

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ✔ No
Site-Wide Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2C2		W	5-22-08	1000	1x20-mL P	Activity Scan	None
B1V2C2		W	↓	↓	1x500-mL G/P	UTOT_KPA: Uranium (1)	HNO3 to pH <2
						KNPGG	

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
D. R. Williamson	D. R. Williamson	[signature]	1200 MAY 22 2008	[signature]	S. Smith	S. Smith	1200 MAY 22 2008
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SF = Sediment		DL = Drum Liquid	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wipe	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

TESTAMERICA

FLUOR HANFORD	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST	C.O.C. # S08-004-1067
	JSE 226269 W05417 Due 07-07-08	Page 1 of 1

Collector: D. R. Williamson	Contact/Requester: Steve Trent	Telephone No.: 509-373-5869 MSIN FAX
SAF No.: S08-004	Sampling Origin: Hanford Site	Purchase Order/Charge Code
Project Title: SURV, APRIL 2008	HNF-N-506-13	Ice Chest No.: GW-1 Temp.
Shipped To (Lab): TestAmerica Incorporated Richland	Method of Shipment: Govt. Vehicle	Bill of Lading/Air Bill No.
Protocol: SURV	Priority: 45 Days	Offsite Property No.

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
Site-Wide Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2C3		W	5-22-08	1000	1x20-mL P	Activity Scan	None
B1V2C3		W	↓	↓	1x500-mL G/P	UTOT_KPA: Uranium (1)	HNO3 to pH <2
						KNPGC	

Relinquished By	Print / Sign	Date/Time	Received By	Print / Sign	Date/Time
D. R. Williamson	D. R. Williamson	MAY 22 2008 1200	S. Smith	S. Smith	MAY 22 2008 1200
Relinquished By		Date/Time	Received By		Date/Time
Relinquished By		Date/Time	Received By		Date/Time
Relinquished By		Date/Time	Received By		Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liqui	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wine	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

TESTAMERICA

FLUOR HANFORD	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST JSE220269 W05417 Due 07.07.08	C.O.C. # S08-004-1058 Page 1 of 1

Collector: D. R. Williamson	Contact/Requester: Steve Trent	Telephone No.: 509-373-5869 MSIN FAX
SAF No.: S08-004	Sampling Origin: Hanford Site	Purchase Order/Charge Code
Project Title: SURV, APRIL 2008	HNF-N-506-13	Ice Chest No: GW-1 Temp.
Shipped To (Lab): TestAmerica Incorporated, Richland	Method of Shipment: Govt. Vehicle	Bill of Lading/Air Bill No.
Protocol: SURV	Priority: 45 Days	Offsite Property No.

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS Hold Time — Total Activity Exemption: Yes ☑ No ☐
Site-Wide Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2B4		W	5-22-08	1100	1x20-mL P	Activity Scan	None
B1V2B4		W	↓	↓	1x500-mL P	TC99_ETVDSK_LSC: Tc-99 (1)	HCl to pH <2
						KNPQ2	

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
D. R. Williamson	Dave Will		MAY 22 2008		S. Smith		MAY 22 2008
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liqui	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wine	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

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TESTAMERICA

FLUOR HANFORD

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

J8E220269 W05417 Due 07-07-08

C.O.C. # **S08-004-1056**

Page 1 of 1

Collector D. R. Williamson	**Contact/Requester** Steve Trent	**Telephone No.** 509-373-5809 **MSIN** **FAX**
SAF No. S08-004	**Sampling Origin** Hanford Site	**Purchase Order/Charge Code**
Project Title SURV. APRIL 2008	HNF-N-506-13	**Ice Chest No.** GW-1 **Temp.**
Shipped To (Lab) TestAmerica Incorporated, Richland	**Method of Shipment** Govt. Vehicle	**Bill of Lading/Air Bill No.**
Protocol SURV	**Priority:** 45 Days	**Offsite Property No.**

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
Site-Wide Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2B2		W	5-22-08	1000	1x20-mL P	Activity Scan	None
B1V2B2		W	↓	↓	1x500-mL P	TC99_ETVDSK_LSC: Tc-99 (1)	HCl to pH <2
						KNPRE	

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
D. R. Williamson	Dave Williamson		MAY 22 2008 1200	L. Smith	S. Smith		MAY 22 2008 1200
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liqui	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wine	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION Disposal Method (e.g., Return to customer, per lab procedure, used in process) Disposed By Date/Time

TESTAMERICA

FLUOR HANFORD

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

JSE 220269 W05417 Due 07-07-08

C.O.C. # **S08-004-1057**

Page 1 of 1

Collector D. R. Williamson	**Contact/Requester** Steve Trent	**Telephone No.** 509-373-5869 **MSIN** **FAX**
SAF No. S08-004	**Sampling Origin** Hanford Site	**Purchase Order/Charge Code**
Project Title SURV. APRIL 2008	HNF-N-506-13	**Ice Chest No.** CW-1 **Temp.**
Shipped To (Lab) TestAmerica Incorporated, Richland	**Method of Shipment** Govt. Vehicle	**Bill of Lading/Air Bill No.**
Protocol SURV	**Priority:** 45 Days	**Offsite Property No.**

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
Site-Wide Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V2B3		W	5-22-08	1000	1x20-mL P	Activity Scan	None
B1V2B3		W	↓	↓	1x500-mL P	TC99_ETVDSK_LSC: Tc-99 (1)	HCl to pH <2
						KNPRH	

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
D. R. Williamson	Dave Williamson		MAY 22 2008 1200	S. Smith	S. Smith		MAY 22 2008 1200
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time
Relinquished By			Date/Time	Received By			Date/Time

Matrix *

S	= Soil	DS	= Drum Solid
SE	= Sediment	DL	= Drum Liqui
SO	= Solid	T	= Tissue
SL	= Sludge	WI	= Wine
W	= Water	L	= Liquid
O	= Oil	V	= Vegetation
A	= Air	X	= Other

FINAL SAMPLE DISPOSITION	Disposal Method (e.g., Return to customer, per lab procedure, used in process)	Disposed By	Date/Time

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Sample Check-in List

Date/Time Received: 05/22/08 12:00 GM Screen Result .07

Client: PGW SDG #: W05417 NA[ ] SAF #: 508-004 NA [ ]

Work Order Number: J8E220269 Chain of Custody # 508-004 - ~~1049~~, ~~1048~~, ~~1049~~, ~~1055~~, ~~1051~~, 1052 1091, 1053, 1092, 1093, 1050, 1059, 1060, 1061,

Shipping Container ID: _____ Air Bill # ~~1062~~, ~~1063~~, ~~1064~~, ~~1065~~, ~~1066~~, 1067, 1058, 1056, 1057, 1054,

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: _____ NA [✓]
5. Vermiculite/packing materials is NA [✓] Wet [ ] Dry [ ]
6. Number of samples in shipping container: 18
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 None
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: L. Smith Date: 05/22/08

Client Sample ID	Analysis Requested	Condition	Comments/Action

Client Informed on _____ by _____ Person Contacted _____

[ ] No action necessary; process as is.

Project Manager _____ Date _____

TESTAMERICA

FLUOR HANFORD

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST

J8E230311 W05417 Due 07.07.08

C.O.C. # **108-035-89**

Page 1 of 1

Collector R. D. Julian	**Contact/Requester** Steve Trent	**Telephone No.** 509-373-5869 **MSIN** **FAX**
SAF No. 108-035	**Sampling Origin** Hanford Site	**Purchase Order/Charge Code**
Project Title 100HR3IAM(1/2), MAY 2008	HNF-N-506-15	**Ice Chest No.** GWS-009 **Temp.**
Shipped To (Lab) TestAmerica Incorporated, Richland	**Method of Shipment** Govt. Vehicle	**Bill of Lading/Air Bill No.**
Protocol CERCLA	**Priority:** 45 Days	**Offsite Property No.**

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
100 Area Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1V5R3		W	5/22/08	0835	1x500-mL aG	7196_CR6: Hexavalent Chromium (1)	Cool~4C
B1V5R3		W	↓	↓	1x20-mL P	Activity Scan	None
						KNTPO	

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
R. D. Julian			5/23/08 1030	RB Hulse			5/23/08 1030
RB Hulse			5/23/08 12:15	S. Smith			05/23/08 12:15

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liqui	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wine	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION Disposal Method (e.g., Return to customer, per lab procedure, used in process) Disposed By Date/Time

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Sample Check-in List

Date/Time Received: 05/23/08 12:15 GM Screen Result .07

Client: POW SDG #: W05417 NA[ ] SAF #: I08-035 NA [ ]

Work Order Number: J8E230311 Chain of Custody # I08-035-89

Shipping Container ID: _____ Air Bill # _____

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: _____ NA [✓] 5. Vermiculite/packing materials is NA [✓] Wet [ ] Dry [ ]
6. Number of samples in shipping container: 1
7. Sample holding times exceeded? NA [✓] Yes [ ] No [ ]
8. Samples have:
   - ____ Tape
   - ____ Custody Seals
   - ____ Hazard Lables
   - 1 Appropriate Sample Lables
9. Samples are:
   - 1 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 None
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: L. Smith Date: 05 23 08

Client Sample ID	Analysis Requested	Condition	Comments/Action

Client Informed on _____ by _____ Person Contacted _____

[ ] No action necessary; process as is.

Project Manager _____ Date _____

TESTAMERICA

FLUOR HANFORD	CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST J8E280291 WO5417 Due 07-11-08	C.O.C. # G08-003-8 Page 1 of 1

Collector: R. Ellingsworth	Contact/Requester: Steve Trent	Telephone No.: 509-373-5869 MSIN FAX
SAF No.: G08-003	Sampling Origin: Hanford Site	Purchase Order/Charge Code
Project Title: INR2-RB MARCH 2008	HNF-N-506-16	Ice Chest No.: GW-1 Temp.
Shipped To (Lab): TestAmerica Incorporated Richland	Method of Shipment: Govt. Vehicle	Bill of Lading/Air Bill No.
Protocol: SURV	Priority: 45 Days	Offsite Property No.

POSSIBLE SAMPLE HAZARDS/REMARKS
** ** Contains Radioactive Material at concentrations that are not regulated for transportation per 49 CFR but are not releasable per DOE Order 5400.5 (1990/1993)

SPECIAL INSTRUCTIONS **Hold Time** Total Activity Exemption: Yes ☑ No ☐
100 Area Generator Knowledge Information Form applies.

Sample No.	Lab ID	*	Date	Time	No/Type Container	Sample Analysis	Preservative
B1TH62		W	5/27/08	0919	1x20-mL P	Activity Scan	None
B1TH62		W	↓	↓	1x4000-mL G/P	GAMMALL_GS: List-1 (9)	HNO3 to pH <2
B1TH62		W	↓	↓	3x1000-mL G/P	SRISO_SEP_PRECIP_GPC: Sr-90 (1)	HNO3 to pH <2

KNIGS

Relinquished By	Print	Sign	Date/Time	Received By	Print	Sign	Date/Time
R. Ellingsworth			5/28/08 0830	RA SHEPARD			5/28/08 0830
R. A. Shepard			5/28/08 1325	RP LWLANE			52808 1325

Matrix *

S = Soil		DS = Drum Solid	
SE = Sediment		DL = Drum Liquid	
SO = Solid		T = Tissue	
SL = Sludge		WI = Wine	
W = Water		L = Liquid	
O = Oil		V = Vegetation	
A = Air		X = Other	

FINAL SAMPLE DISPOSITION Disposal Method (e.g., Return to customer, per lab procedure, used in process) Disposed By Date/Time

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Sample Check-in List

Date/Time Received: 05 28 08 1325 GM Screen Result 11

Client: PGW SDG #: W05417 NA[ ] SAF #: G08-003 NA [ ]

Work Order Number: J8E280791 Chain of Custody # G08-003-8

Shipping Container ID: _____ Air Bill # _____

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: _____ NA [✓]
5. Vermiculite/packing materials is NA [✓] Wet [ ] Dry [ ]
6. Number of samples in shipping container: 1
7. Sample holding times exceeded? NA [✓] Yes [ ] No [ ]
8. Samples have:
   - _____ Tape
   - _____ Custody Seals
   - _____ Hazard Lables
   - 1 Appropriate Sample Lables
9. Samples are:
   - 1 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 None
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: 52808

Client Sample ID	Analysis Requested	Condition	Comments/Action

Client Informed on _____ by _____ Person Contacted _____

[ ] No action necessary; process as is.

Project Manager _____ Date _____

TESTAMERICA

6/10/2008 7:37:27 AM

Sample Preparation/Analysis

Balance Id:1120373922

384868, Pacific Northwest National Laboratory ,
Pacific Northwest National Lab

6D Pu PrpRC5016, Sep~~RC5018~~(5039) 5287 WA
SO Plutonium-238,239/40 by Alpha Spec
5I CLIENT: HANFORD

Pipet #:

AnalyDueDate: 07/07/2008

Sep1 DT/Tm Tech:

Batch: 8155276 WATER pCi/L PM, Quote: SS , 57671

Sep2 DT/Tm Tech:

SEQ Batch, Test: None

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 KNPL7-1-AA J8E220269-2-SAMP 05/22/2008 10:00	AmtRec: 20ML,LP	200.50g,in	PUTC11133 05/14/08,pd 06/07/94,r #Containers: 2			Scr:	Alpha: 1.03E-04 uCi/Sa	Beta: 4.14E-06 uCi/Sa
2 KNPL7-1-AC-X J8E220269-2-DUP 05/22/2008 10:00	AmtRec: 20ML,LP	200.01g,in	PUTC11134 05/14/08,pd 06/07/94,r #Containers: 2			Scr:	Alpha: 1.03E-04 uCi/Sa	Beta: 4.14E-06 uCi/Sa
3 KNPRQ-1-AA J8E220269-18-SAMP 05/22/2008 10:00	AmtRec: 20ML,LP	200.64g,in	PUTC11135 05/14/08,pd 06/07/94,r #Containers: 2			Scr:	Alpha: -6.88E-05 uCi/Sa	Beta: -1.79E-05 uCi/Sa
4 KN88N-1-AA-B J8F030000-276-BLK 05/22/2008 10:00	AmtRec:	200.22g,in	PUTC11136 05/14/08,pd 06/07/94,r #Containers: 1			Scr:	Alpha:	Beta:
5 KN88N-1-AC-C J8F030000-276-LCS 05/22/2008 10:00	AmtRec:	200.28g,in	PUSG0971 05/14/08,pd 06/07/94,r #Containers: 1			Scr:	Alpha:	Beta:

Comments: pH < 2.0 JSW 6/10/08

All Clients for Batch:
384868, Pacific Northwest National Laboratory Pacific Northwest National Lab, SS , 57671

KNPL71AA-SAMP Constituent List:

PU-238	RDL:1	pCi/L	LCL:	UCL:	RPD:	PU-239	RDL:1	pCi/L	LCL:70	UCL:130	RPD:20

6/10/2008 7:37:29 AM

Sample Preparation/Analysis

6D Pu PrpRC5016, SepRC5010(5039)
SO Plutonium-238,239/40 by Alpha Spec
5I CLIENT: HANFORD

Balance Id:1120373922

Pipet #: _____

AnalyDueDate: 07/07/2008

Sep1 DT/Tm Tech:

Batch: 8155276 **pCi/L**

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:

```
 Pu-242      RDL:          pCi/L    LCL:20     UCL:105    RPD:20
KN88N1AA-BLK:
 PU-238      RDL:1         pCi/L    LCL:       UCL:       RPD:       PU-239     RDL:1      pCi/L    LCL:       UCL:       RPD:
 Pu-242      RDL:          pCi/L    LCL:20     UCL:105    RPD:20
KN88N1AC-LCS:
 PU-239      RDL:1         pCi/L    LCL:70     UCL:130    RPD:20     Pu-242     RDL:       pCi/L    LCL:20     UCL:105    RPD:20

KNPL71AA-SAMP Calc Info:
    Uncert Level (#s).: 2    Decay to SaDt: Y    Blk Subt.: N    Sci.Not.: Y    ODRs: B
KN88N1AA-BLK:
    Uncert Level (#s).: 2    Decay to SaDt: Y    Blk Subt.: N    Sci.Not.: Y    ODRs: B
KN88N1AC-LCS:
    Uncert Level (#s).: 2    Decay to SaDt: Y    Blk Subt.: N    Sci.Not.: Y    ODRs: B
```

Approved By _____ Date: _____

6/19/2008 2:49:07 PM

ICOC Fraction Transfer/Status Report

ByDate: 6/20/2007, 6/24/2008, Batch: '8155276', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus	Accepting			Comments
8155276						
AC		Rev1C	WoodT	6/10/2008 7:37:40		
SC			wagarr	IsBatched	6/4/2008 4:12:05 PM	ICOC_RADCALC v4.8.32
SC			WoodT	InPrep	6/10/2008 7:37:40 AM	RICH-RC-5016 REVISION 7
SC			WoodT	Prep1C	6/10/2008 7:37:51 AM	RICH-RC-5016 REVISION 7
SC			ManisD	Sep1C	6/12/2008 3:40:32 PM	RICH-RC-5087 REV 1
SC			AshworthA	Sep2C	6/13/2008 11:36:23 AM	RICH-RC-5039 REV5
SC			ClarkR	InCnt1	6/13/2008 11:46:46 AM	RICH-RD-0008 REVISION 4
SC			DAWKINSO	CalcC	6/13/2008 5:07:27 PM	RICH-RD-0008 REVISION 4
SC			antonsonl	Rev1C	6/19/2008 2:48:59 PM	RICH-RC-0002 REV 8
AC			WoodT	6/10/2008 7:37:51		
AC			ManisD	6/12/2008 3:40:32 PM		
AC			AshworthA	6/13/2008 11:36:23		
AC			ClarkR	6/13/2008 11:46:46		
AC			DAWKINSO	6/13/2008 5:07:27 PM		
AC			antonsonl	6/19/2008 2:48:59 PM		

AC: Accepting Entry; SC: Status Change

TestAmerica Richland

Richland Wa.

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Grp Rec Cnt: 7

ICOCFractions v4.8.34

TestAmerica

Data Review/Verification Checklist

RADIOCHEMISTRY, First Level Review

6/18/2008 3:36:51 PM

Lot No., Due Date: J8E220269; 07/14/2008

Client, Site: 384868; PGW 615HANFORD HANFORD

QC Batch No., Method Test: 8155280; RALPHA-A Alpha by GPC-Am

SDG, Matrix: W05417; WATER

	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 Review John Horton **Date** 6-18-8

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist

RADIOCHEMISTRY

Second Level Review

Batch Number: Y155280

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: Erika Ford Date: 6/19/8

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

TESTAMERICA

6/12/2008 10:07:31 AM

Sample Preparation/Analysis

384868, Pacific Northwest National Laboratory ,
Pacific Northwest National Lab

BC Gross Beta PrpRC5014
S8 Gross Beta by GPC using Sr/Y-90 curve
5I CLIENT: HANFORD

Balance Id:1120482733
Pipet #: 2/5

AnalyDueDate: 07/07/2008 1005417

Batch: 8155281 WATER pCi/L
SEQ Batch, Test: None

PM, Quote: SS , 57671

Sep1 DT/Tm Tech:
Sep2 DT/Tm Tech:
Prep Tech: ,HarrisD/Back 3

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 KNPLT-1-AA J8E220269-1-SAMP 05/22/2008 10:00		200.10g,in AmtRec: 20ML,LP #Containers: 2		1.5	30.4	100	26A	11/2	6/17/08	Scr: Alpha: 4.15E-05 uCi/Sa Beta: 9.24E-05 uCi/Sa
2 KNPLT-1-AC-X J8E220269-1-DUP 05/22/2008 10:00		200.40g,in AmtRec: 20ML,LP #Containers: 2			26.8		26B			Scr: Alpha: 4.15E-05 uCi/Sa Beta: 9.24E-05 uCi/Sa
3 KNPMC-1-AA J8E220269-3-SAMP 05/22/2008 10:00		200.00g,in AmtRec: 20ML,LP #Containers: 2			28.8		26C			Scr: Alpha: 1.80E-06 uCi/Sa Beta: 7.03E-05 uCi/Sa
4 KNPMF-1-AA J8E220269-4-SAMP 05/22/2008 10:00		200.20g,in AmtRec: 20ML,LP #Containers: 2			29.4		26D			Scr: Alpha: -1.26E-04 uCi/Sa Beta: 2.69E-04 uCi/Sa
5 KNPMK-1-AC J8E220269-5-SAMP 05/22/2008 10:00		199.90g,in AmtRec: 20ML,LP #Containers: 2			29.8		27A			Scr: Alpha: 7.79E-05 uCi/Sa Beta: -2.28E-04 uCi/Sa
6 KN89C-1-AA-B J8F030000-281-BLK 05/22/2008 10:00		200.20g,in AmtRec: #Containers: 1			0.2		27B			Scr: Alpha: Beta:
7 KN89C-1-AC-C J8F030000-281-LCS 05/22/2008 10:00		200.60g,in AmtRec: #Containers: 1	BESB3259 05/27/08,pd 10/11/06,r		0.3		27C			Scr: Alpha: Beta:

106

TESTAMERICA

6/12/2008 10:07:33 AM

Sample Preparation/Analysis

BC Gross Beta PrpRC5014
S8 Gross Beta by GPC using Sr/Y-90 curve
5I CLIENT: HANFORD

Balance Id:1120482733

Pipet #:

AnalyDueDate: 07/07/2008

Sep1 DT/Tm Tech:

Batch: 8155281 pCi/L

Sep2 DT/Tm Tech:

SEQ Batch, Test: None

Prep Tech: ,HarrisD

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:

Comments: PR2.0 DLH 6/12/08

All Clients for Batch:
384868, Pacific Northwest National Laboratory Pacific Northwest National Lab, SS , 57671

KNPLT1AA-SAMP Constituent List:

BETA	RDL:4.00E+00	pCi/L	LCL:	UCL:	RPD:
KN89C1AA-BLK:					
BETA	RDL:4.00E+00	pCi/L	LCL:	UCL:	RPD:
KN89C1AC-LCS:					
Sr-90	RDL:	pCi/L	LCL:70	UCL:130	RPD:20

KNPLT1AA-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KN89C1AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KN89C1AC-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

Approved By _____ Date: _____

6/18/2008 3:35:21 PM

ICOC Fraction Transfer/Status Report

ByDate: 6/19/2007, 6/23/2008, Batch: '8155281', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus	Accepting			Comments
8155281						
AC		Rev1C	HarrisD	6/12/2008 10:03:31		
SC			wagarr	IsBatched	6/4/2008 4:12:05 PM	ICOC_RADCALC v4.8.32
SC			HarrisD	InPrep	6/12/2008 10:03:31 AM	RICH-RC-5014 Revision 7
SC			HarrisD	Prep1C	6/12/2008 10:07:34 AM	RICH-RC-5014 REVISION 7
SC			BockJ	InPrep2	6/16/2008 7:26:18 AM	RICH-RC-5014 REVISION 7
SC			BockJ	Prep2C	6/17/2008 9:16:09 AM	RICH-RC-5014 REVISION 7
SC			BlackCL	InCnt1	6/17/2008 9:26:42 AM	RICH-RD-0003 REVISION 5
SC			ClarkR	CalcC	6/17/2008 12:10:14 PM	RICH-RD-0003 REVISION 5
SC			nortonj	Rev1C	6/18/2008 3:35:14 PM	RICH-RC-0002 REV 8
AC			HarrisD	6/12/2008 10:07:34		
AC			BockJ	6/16/2008 7:26:18		
AC			BockJ	6/17/2008 9:16:09		
AC			BlackCL	6/17/2008 9:26:42		
AC			ClarkR	6/17/2008 12:10:14		
AC			nortonj	6/18/2008 3:35:14 PM		

AC: Accepting Entry; SC: Status Change

TAL Richland

Richland Wa.

Page 1

Grp Rec Cnt: 7

ICOCFractions v4.8.33

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Data Review/Verification Checklist

RADIOCHEMISTRY, First Level Review

7/11/2008 10:27:38 AM

Lot No., Due Date: J8E280291; 07/14/2008

Client, Site: 384868; PGW 615HANFORD HANFORD

QC Batch No., Method Test: 8155282; RSR85907 Sr-85/90 by GPC-7

SDG, Matrix: W05417; WATER

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:
NCM 10-12658

First Level Review Lisa Christenson **Date** 7/11/08

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Data Review Checklist

RADIOCHEMISTRY

Second Level Review

Batch Number: 8155282

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: 7/11/08

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

Clouseau
Nonconformance Memo

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

NCM #: **10-12658**
NCM Initiated By: Lisa Antonson
Date Opened: 07/11/2008
Date Closed:

Classification: **Anomaly**
Status: **QAREVIEW**
Production Area: Environmental - Sep
Tests: Sr-85/90 by GPC-7
Lot #'s (Sample #'s): J8E280291 (1), J8F030000 (282),
QC Batches: 8155282,

Nonconformance: Dups not within acceptance limits
Subcategory: Other (explanation required)

Problem Description / Root Cause

Name	Date	Description
Lisa Antonson	07/11/2008	The dups in the batch were above the client required RPD. The were recounted to check the decay pattern and found to be within limits.
Lisa Antonson	07/11/2008	The samples do not meet CRDL but have results that exceed the MDA achieved.

Corrective Action

Name	Date	Corrective Action
Lisa Antonson	07/11/2008	The samples were recounted.
Lisa Antonson	07/11/2008	

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: 7/11/2008

TESTAMERICA

6/9/2008 2:09:57 PM

Sample Preparation/Analysis

384868, Pacific Northwest National Laboratory ,
Pacific Northwest National Lab

AW Gamma PrpRC5017
TA Gamma by HPGE
5I CLIENT: HANFORD

W0541Y

Balance Id:
Pipet #:
Sep1 DT/Tm Tech:
Sep2 DT/Tm Tech:
Prep Tech: ManisD | Bock D

AnalyDueDate: 07/11/2008

Batch: 8155285 WATER pCi/L PM, Quote: SS , 57671
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:
1 KN1G5-1-AA J8E280291-1-SAMP 05/27/2008 09:19		2000.10g,in AmtRec: 20ML,3XLP,4LP #Containers: 5		100 mL	100 mes	200	G7	1205 Scr: Alpha: 4.46E-05 uCi/Sa	6/17/08 MC Beta: 9.62E-03 uCi/Sa 6.6E-02L	
2 KN1G5-1-AE-X J8E280291-1-DUP 05/27/2008 09:19		2000.10g,in AmtRec: 20ML,3XLP,4LP #Containers: 5		100 mL		200	G10	1529 Scr: Alpha: 4.46E-05 uCi/Sa	6/17/08 MC Beta: 9.62E-03 uCi/Sa 6.6E-02L	
3 KN89V-1-AA-B J8F030000-285-BLK 05/27/2008 09:19		1999.99g,in AmtRec: #Containers: 1		100 mL		200	G10	1205 Scr: Alpha:	6/17/08 MC Beta:	
4 KN89V-1-AC-C J8F030000-285-LCS 05/27/2008 09:19		2000.04g,in AmtRec: #Containers: 1	QCAG1476 04/23/08,pd 06/14/05 r	100 mL		200	G7	1530 Scr: Alpha:	6/17/08 MC Beta:	

Comments: KN1G5-SAMP "Comments Please count sample twice for DUP. drm 6/9/08"
pH <2 DRM 6/9/08

All Clients for Batch:
384868, Pacific Northwest National Laboratory Pacific Northwest National Lab, SS , 57671

KN1G51AA-SAMP Constituent List:

Co-60	RDL:0.00E+00	pCi/L	LCL:	UCL:	RPD:	Cs-134	RDL:0.00E+00	pCi/L	LCL:	UCL:	RPD:
Cs-137	RDL:6.00E+00	pCi/L	LCL:70	UCL:130	RPD:20	Cs-137DA	RDL:6.00E+00	pCi/L	LCL:70	UCL:130	RPD:20
Eu-154	RDL:0.00E+00	pCi/L	LCL:	UCL:	RPD:	Eu-155	RDL:.00E+00	pCi/L	LCL:	UCL:	RPD:
K-40	RDL:0.00E+00	pCi/L	LCL:	UCL:	RPD:	Sb-125	RDL:0.00E+00	pCi/L	LCL:	UCL:	RPD:

KN89V1AA-BLK:

TESTAMERICA

6/9/2008 2:09:57 PM

Sample Preparation/Analysis

AW Gamma PrpRC5017
TA Gamma by HPGE
5I CLIENT: HANFORD

Balance Id:

Pipet #:

AnalyDueDate: 07/11/2008

Sep1 DT/Tm Tech:

Batch: 8155285 pCi/L

Sep2 DT/Tm Tech:

SEQ Batch, Test: None

Prep Tech: ,ManisD

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:

Co-60	RDL:0.00E+00	pCi/L	LCL:	UCL:	RPD:	Cs-134	RDL:0.00E+00	pCi/L	LCL:	UCL:	RPD:
Cs-137	RDL:6.00E+00	pCi/L	LCL:	UCL:	RPD:	Cs-137DA	RDL:6.00E+00	pCi/L	LCL:	UCL:	RPD:
Eu-154	RDL:0.00E+00	pCi/L	LCL:	UCL:	RPD:	Eu-155	RDL:.00E+00	pCi/L	LCL:	UCL:	RPD:
K-40	RDL:0.00E+00	pCi/L	LCL:	UCL:	RPD:	Sb-125	RDL:0.00E+00	pCi/L	LCL:	UCL:	RPD:

KN89V1AC-LCS:

Cs-137	RDL:15	pCi/L	LCL:70	UCL:130	RPD:20	Cs-137DA	RDL:15	pCi/L	LCL:70	UCL:130	RPD:20
K-40	RDL:6	pCi/L	LCL:70	UCL:130	RPD:20	Ra-226	RDL:--	pCi/L	LCL:70	UCL:130	RPD:20
RA-228	RDL:--	pCi/L	LCL:70	UCL:130	RPD:20	RA-228DA	RDL:--	pCi/L	LCL:70	UCL:130	RPD:20
U-238	RDL:--	pCi/L	LCL:70	UCL:130	RPD:20						

KN1G51AA-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

KN89V1AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

KN89V1AC-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

Approved By _____ Date: _____

113

6/25/2008 4:12:26 PM

ICOC Fraction Transfer/Status Report

ByDate: 6/26/2007, 6/30/2008, Batch: '8155285', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus	Accepting			Comments
8155285						
AC		**Rev1C**	**ManisD**	6/9/2008 1:04:24 PM		
SC			wagarr	IsBatched	6/4/2008 4:12:05 PM	ICOC_RADCALC v4.8.32
SC			ManisD	InPrep	6/9/2008 1:04:24 PM	RICH-RC-5017 REV 6
SC			ManisD	Prep1C	6/9/2008 2:49:17 PM	RICH-RC-5017 REV 6
SC			BockJ	Prep2C	6/17/2008 8:30:26 AM	RICH-RC-5017 REVISION 6
SC			ClarkR	InCnt1	6/17/2008 8:34:21 AM	RICH-RD-0007 REVISION 6
SC			DAWKINSO	CalcC	6/17/2008 9:30:31 PM	RICH-RD-0007 REVISION 6
SC			antonsonl	Rev1C	6/25/2008 4:12:18 PM	RICH-RC-0002 REV 8
AC			**ManisD**	6/9/2008 2:49:17 PM		
AC			**BockJ**	6/17/2008 8:30:26		
AC			**ClarkR**	6/17/2008 8:34:21		
AC			**DAWKINSO**	6/17/2008 9:30:31 PM		
AC			**antonsonl**	6/25/2008 4:12:18 PM		

AC: Accepting Entry; SC: Status Change

TAL Richland

Richland Wa.

Grp Rec Cnt: 6

ICOCFractions v4.8.33

TESTAMERICA

6/9/2008 2:42:12 PM

Sample Preparation/Analysis

Balance Id:1120373922

384868, Pacific Northwest National Laboratory ,
Pacific Northwest National Lab

AW Gamma PrpRC5017
TA Gamma by HPGE
5I CLIENT: HANFORD

Pipet #:

AnalyDueDate: 07/07/2008

Sep1 DT/Tm Tech:

Batch: 8155286 **WATER** **pCi/L** **PM, Quote: SS , 57671**

Sep2 DT/Tm Tech:

SEQ Batch, Test: None

Prep Tech: ManisD

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 KNPML-1-AA J8E220269-6-SAMP 05/22/2008 10:00		1001.09g,in AmtRec: 20ML,3XLP	#Containers: 4	100 mL	100mLs	200 Count time 300	G13 Scr:	1777 Alpha: 8.80E-05 uCi/Sa	6/17/08 Beta: 4.56E-05 uCi/Sa	
2 KNPML-1-AC-X J8E220269-6-DUP 05/22/2008 10:00		1000.05g,in AmtRec: 20ML,3XLP	#Containers: 4	100 mL		200	G6 Scr:	1778 Alpha: 8.80E-05 uCi/Sa	Beta: 4.56E-05 uCi/Sa	
3 KNPM1-1-AA J8E220269-7-SAMP 05/22/2008 10:00		1000.24g,in AmtRec: 20ML,3XLP	#Containers: 4	100 mL		200 Count time 300	G1 Scr:	1779 Alpha: 5.48E-04 uCi/Sa	Beta: -1.86E-04 uCi/Sa	
4 KNPPT-1-AA J8E220269-8-SAMP 05/22/2008 10:00		1000.08g,in AmtRec: 20ML,3XLP	#Containers: 4	100 mL		200 Count time 300	G11 Scr:	1740 Alpha: -3.43E-05 uCi/Sa	Beta: 7.86E-05 uCi/Sa	
5 KN89X-1-AA-B J8F030000-286-BLK 05/22/2008 10:00		1000.09g,in AmtRec:	#Containers: 1	100 mL		200	G15 Scr:	1741 Alpha:	Beta:	
6 KN89X-1-AC-C J8F030000-286-LCS 05/22/2008 10:00		1000.20g,in AmtRec:	QCAG1477 04/23/08,pd 06/14/05 r #Containers: 1	100 mL		200	G14 Scr:	1743 Alpha:	Beta:	

115

TAL Richland
Richland Wa.

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

Page 1

ISV - Insufficient Volume for Analysis

WO Cnt: 6
Prep_SamplePrep v4.8.32

TESTAMERICA

6/9/2008 2:42:13 PM

Sample Preparation/Analysis

AW Gamma PrpRC5017
TA Gamma by HPGE
5I CLIENT: HANFORD

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

AnalyDueDate: 07/07/2008

Batch: 8155286 pCi/L
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:

Comments: pH <2, DRM 6/9/08
Samples should of been fored at 2,500 mL, therefor Count time was raised. JB 6-17-08

All Clients for Batch:
384868, Pacific Northwest National Laboratory Pacific Northwest National Lab, SS , 57671

KNPML1AA-SAMP Constituent List:

Co-60	RDL:2.50E+01	pCi/L	LCL:	UCL:	RPD:	Cs-134	RDL:1.50E+01	pCi/L	LCL:	UCL:	RPD:
Cs-137	RDL:1.50E+01	pCi/L	LCL:70	UCL:130	RPD:20	Cs-137DA	RDL:1.50E+01	pCi/L	LCL:70	UCL:130	RPD:20
Eu-152	RDL:5.00E+01	pCi/L	LCL:	UCL:	RPD:	Eu-154	RDL:5.00E+01	pCi/L	LCL:	UCL:	RPD:
Eu-155	RDL:5.00E+01	pCi/L	LCL:	UCL:	RPD:	K-40	RDL:0.00E+00	pCi/L	LCL:	UCL:	RPD:
Sb-125	RDL:5.00E+01	pCi/L	LCL:	UCL:	RPD:						

KN89X1AA-BLK:

Co-60	RDL:2.50E+01	pCi/L	LCL:	UCL:	RPD:	Cs-134	RDL:1.50E+01	pCi/L	LCL:	UCL:	RPD:
Cs-137	RDL:1.50E+01	pCi/L	LCL:	UCL:	RPD:	Cs-137DA	RDL:1.50E+01	pCi/L	LCL:	UCL:	RPD:
Eu-152	RDL:5.00E+01	pCi/L	LCL:	UCL:	RPD:	Eu-154	RDL:5.00E+01	pCi/L	LCL:	UCL:	RPD:
Eu-155	RDL:5.00E+01	pCi/L	LCL:	UCL:	RPD:	K-40	RDL:0.00E+00	pCi/L	LCL:	UCL:	RPD:
Sb-125	RDL:5.00E+01	pCi/L	LCL:	UCL:	RPD:						

KN89X1AC-LCS:

Cs-137	RDL:15	pCi/L	LCL:70	UCL:130	RPD:20	Cs-137DA	RDL:15	pCi/L	LCL:70	UCL:130	RPD:20
K-40	RDL:6	pCi/L	LCL:70	UCL:130	RPD:20	Ra-226	RDL:--	pCi/L	LCL:70	UCL:130	RPD:20
RA-228	RDL:--	pCi/L	LCL:70	UCL:130	RPD:20	RA-228DA	RDL:--	pCi/L	LCL:70	UCL:130	RPD:20
U-238	RDL:--	pCi/L	LCL:70	UCL:130	RPD:20						

KNPML1AA-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

KN89X1AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

KN89X1AC-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

Approved By _____ Date: _____

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

RE-COUNT REQUEST

DUE DATE 7-7

CUSTOMER PGW

ANALAYSIS γ

MATRIX H_2O

LOT NUMBER J8E220269

SAMPLE DELIVERY GROUP

OLD BATCH NUMBER 8155286

NEW BATCH NUMBER √

LAB SAMPLE ID	CLIENT ID	REASON FOR REQUEST & ANALYSIS COMMENTS
1) ALL		RDL NOT MET
2)		
3)		
4)		
5)		
6)		
7)		
8)		
9)		
10)		
11)		
12)		
13)		
14)		
15)		
16)		
17)		
18)		
19)		
20)		

RC-126, 12/07, Rev 5

TESTAMERICA

6/19/2008 11:42:58 AM

Sample Preparation/Analysis

Balance Id:1120373922

384868, Pacific Northwest National Laboratory ,
Pacific Northwest National Lab

AW Gamma PrpRC5017
TA Gamma by HPGE
5I CLIENT: HANFORD

Pipet #: _____

AnalyDueDate: 07/07/2008

Sep1 DT/Tm Tech:

Batch: 8155286 WATER pCi/L PM, Quote: SS , 57671

Sep2 DT/Tm Tech:

SEQ Batch, Test: None

Prep Tech: ManisD

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 KNPML-1-AA J8E220269-6-SAMP 05/22/2008 10:00		1001.09g,in AmtRec: 20ML,3XLP		100 mL #Containers: 4		200		Scr:	Alpha: 8.80E-05 uCi/Sa	Beta: 4.56E-05 uCi/Sa
2 KNPML-1-AC-X J8E220269-6-DUP 05/22/2008 10:00		1000.05g,in AmtRec: 20ML,3XLP		100 mL #Containers: 4		200		Scr:	Alpha: 8.80E-05 uCi/Sa	Beta: 4.56E-05 uCi/Sa
[redacted] J8E220269-6-SAMP 05/22/2008 10:00		1001.09 AmtRec: 20ML,3XLP		#Containers: 4		1000	G15 Scr:	0357 Alpha: 8.80E-05 uCi/Sa	6/20/08 [illegible] Beta: 4.56E-05 uCi/Sa	
[redacted] J8E220269-6-DUP 05/22/2008 10:00		1000.05 AmtRec: 20ML,3XLP		#Containers: 4		1000	G15 Scr:	0357 Alpha: 8.80E-05 uCi/Sa	6/20/08 [illegible] Beta: 4.56E-05 uCi/Sa	
5 KNPM1-1-AA J8E220269-7-SAMP 05/22/2008 10:00		1000.24g,in AmtRec: 20ML,3XLP		100 mL #Containers: 4		200		Scr:	Alpha: 5.48E-04 uCi/Sa	Beta: -1.86E-04 uCi/Sa
[redacted] J8E220269-7-SAMP 05/22/2008 10:00		1000.24 AmtRec: 20ML,3XLP		#Containers: 4		1000	G11 Scr:	0357 Alpha: 5.48E-04 uCi/Sa	6/20/08 [illegible] Beta: -1.86E-04 uCi/Sa	
7 KNPPT-1-AA J8E220269-8-SAMP 05/22/2008 10:00		1000.08g,in AmtRec: 20ML,3XLP		100 mL #Containers: 4		200		Scr:	Alpha: -3.43E-05 uCi/Sa	Beta: 7.86E-05 uCi/Sa

TESTAMERICA

6/19/2008 11:42:59 AM

Sample Preparation/Analysis

384868, Pacific Northwest National Laboratory ,
Pacific Northwest National Lab

AW Gamma PrpRC5017
TA Gamma by HPGE
5I CLIENT: HANFORD

AnalyDueDate: 07/07/2008

Batch: 8155286 **WATER** **pCi/L** **PM, Quote: SS , 57671**
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:
8 KNPPT-2-SP J8E220269-8-SAMP 05/22/2008 10:00		1000.08 AmtRec: 20ML,3XLP			#Containers: 4	1000	G14	0959	6/20/08 KL Scr: Alpha: -3.43E-05 uCi/Sa	Beta: 7.86E-05 uCi/Sa
9 KN89X-1-AA-B J8F030000-286-BLK 05/22/2008 10:00		1000.09g,in AmtRec:		100 mL	#Containers: 1	200			Scr: Alpha:	Beta:
10 KN89X-1-AC-C J8F030000-286-LCS 05/22/2008 10:00		1000.20g,in AmtRec:	QCAG1477 04/23/08,pd 06/14/05,r	100 mL #Containers: 1		200			Scr: Alpha:	Beta:
11 KN89X-0-AA-B J8F030000-286-BLK 05/22/2008 10:00		1000.09 AmtRec:			#Containers: 1	1000	G7	0400	6/20/08 KL Scr: Alpha:	Beta:
12 KN89X-2-AC-C J8F030000-286-LCS 05/22/2008 10:00		1000.2 AmtRec:	QCAG1477		#Containers: 1	1000	G10	0401	6/20/08 KL Scr: Alpha:	Beta:

Comments:

All Clients for Batch:
384868, Pacific Northwest National Laboratory Pacific Northwest National Lab, SS , 57671

KNPML1AA-SAMP Constituent List:

Co-60	RDL:2.50E+01	pCi/L	LCL:	UCL:	RPD:	Cs-134	RDL:1.50E+01	pCi/L	LCL:	UCL:	RPD:

TESTAMERICA

6/19/2008 11:42:59 AM

Sample Preparation/Analysis

AW Gamma PrpRC5017
TA Gamma by HPGE
5I CLIENT: HANFORD

Balance Id:

Pipet #:

Sep1 DT/Tm Tech:

Sep2 DT/Tm Tech:

Prep Tech:

AnalyDueDate: 07/07/2008

Batch: 8155286 pCi/L
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:

```
 Cs-137      RDL:1.50E+01   pCi/L   LCL:70    UCL:130   RPD:20    Cs-137DA   RDL:1.50E+01   pCi/L   LCL:70    UCL:130   RPD:20
 Eu-152      RDL:5.00E+01   pCi/L   LCL:      UCL:      RPD:      Eu-154     RDL:5.00E+01   pCi/L   LCL:      UCL:      RPD:
 Eu-155      RDL:5.00E+01   pCi/L   LCL:      UCL:      RPD:      K-40       RDL:0.00E+00   pCi/L   LCL:      UCL:      RPD:
 Sb-125      RDL:5.00E+01   pCi/L   LCL:      UCL:      RPD:
KN89X1AA-BLK:
 Co-60       RDL:2.50E+01   pCi/L   LCL:      UCL:      RPD:      Cs-134     RDL:1.50E+01   pCi/L   LCL:      UCL:      RPD:
 Cs-137      RDL:1.50E+01   pCi/L   LCL:      UCL:      RPD:      Cs-137DA   RDL:1.50E+01   pCi/L   LCL:      UCL:      RPD:
 Eu-152      RDL:5.00E+01   pCi/L   LCL:      UCL:      RPD:      Eu-154     RDL:5.00E+01   pCi/L   LCL:      UCL:      RPD:
 Eu-155      RDL:5.00E+01   pCi/L   LCL:      UCL:      RPD:      K-40       RDL:0.00E+00   pCi/L   LCL:      UCL:      RPD:
 Sb-125      RDL:5.00E+01   pCi/L   LCL:      UCL:      RPD:
KN89X1AC-LCS:
 Cs-137      RDL:15         pCi/L   LCL:70    UCL:130   RPD:20    Cs-137DA   RDL:15         pCi/L   LCL:70    UCL:130   RPD:20
 K-40        RDL:6          pCi/L   LCL:70    UCL:130   RPD:20    Ra-226     RDL:--         pCi/L   LCL:70    UCL:130   RPD:20
 RA-228      RDL:--         pCi/L   LCL:70    UCL:130   RPD:20    RA-228DA   RDL:--         pCi/L   LCL:70    UCL:130   RPD:20
 U-238       RDL:--         pCi/L   LCL:70    UCL:130   RPD:20
KN89X2AA-BLK:

KN89X2AC-LCS:

KNPML1AA-SAMP Calc Info:
    Uncert Level (#s).: 2    Decay to SaDt: Y    Blk Subt.: N    Sci.Not.: Y    ODRs: B
KN89X1AA-BLK:
    Uncert Level (#s).: 2    Decay to SaDt: Y    Blk Subt.: N    Sci.Not.: Y    ODRs: B
KN89X1AC-LCS:
    Uncert Level (#s).: 2    Decay to SaDt: Y    Blk Subt.: N    Sci.Not.: Y    ODRs: B
KN89X2AA-BLK:
    Uncert Level (#s).: 2    Decay to SaDt: Y    Blk Subt.: N    Sci.Not.: Y    ODRs: B
KN89X2AC-LCS:
    Uncert Level (#s).: 2    Decay to SaDt: Y    Blk Subt.: N    Sci.Not.: Y    ODRs: B
```

Approved By _____ Date: _____

6/30/2008 11:34:01 AM

ICOC Fraction Transfer/Status Report

ByDate: 7/1/2007, 7/5/2008, Batch: '8155286', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus	Accepting			Comments
8155286						
AC		**Rev1C**	**ManisD**	6/9/2008 1:04:14 PM		
SC			wagarr	IsBatched	6/4/2008 4:12:05 PM	ICOC_RADCALC v4.8.32
SC			ManisD	InPrep	6/9/2008 1:04:14 PM	RICH-RC-5017 REV 6
SC			ManisD	Prep1C	6/9/2008 2:49:05 PM	RICH-RC-5017 REV 6
SC			BockJ	InPrep2	6/16/2008 9:37:30 AM	RICH-RC-5017 REVISION 6
SC			BockJ	Prep2C	6/17/2008 8:30:32 AM	RICH-RC-5017 REVISION 6
SC			ClarkR	InCnt1	6/17/2008 8:34:13 AM	RICH-RD-0007 REVISION 6
SC			ClarkR	CalcC	6/17/2008 2:21:14 PM	RICH-RD-0007 REVISION 6
SC			BlackCL	InCnt1	6/19/2008 1:32:57 PM	RICH-RD-0007 REVISION 6
SC			ClarkR	CalcC	6/21/2008 7:57:16 AM	RL-CI-007 REVISION 0
SC			nortonj	Rev1C	6/30/2008 11:33:11 AM	RICH-RC-0002 REV 8
AC			**ManisD**	6/9/2008 2:49:05 PM		
AC			**BockJ**	6/16/2008 9:37:30		
AC			**BockJ**	6/17/2008 8:30:32		
AC			**ClarkR**	6/17/2008 8:34:13		
AC			**ClarkR**	6/17/2008 2:21:14 PM		
AC			**BlackCL**	6/19/2008 1:32:57 PM		
AC			**ClarkR**	6/21/2008 7:57:16		
AC			**nortonj**	6/30/2008 11:33:11		

AC: Accepting Entry, SC: Status Change

TAL Richland

Richland Wa.

Grp Rec Cnt: 9

ICOCFractions v4.8.33

TESTAMERICA

6/17/2008 5:25:00 AM

Sample Preparation/Analysis

Balance Id:1120373922

384868, Pacific Northwest National Laboratory ,
Pacific Northwest National Lab

BN I-129 Prp/SepRC5025
TB Gamma by LEPD
5I CLIENT: HANFORD

Pipet #: _____

AnalyDueDate: 07/07/2008 WO5417

Sep1 DT/Tm Tech:

Batch: 8155284 **WATER** **pCi/L** **PM, Quote: SS , 57671**

Sep2 DT/Tm Tech:

SEQ Batch, Test: None All Tests: 8155275 DHSS, 8155276 6DSO, 8155279 FPS5, 8155280 AZS7, 8155281 BCS8, 8155284 BNTB, 8155286
AWTA,

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:
1 KNPPX-1-AA J8E220269-9-SAMP 05/22/2008 10:00		500.38g,in AmtRec: 20ML,2X4LP	ITA7308 05/21/08 #Containers: 3		36.4	100	L2	2203 Scr: Alpha: 5.84E-05 uCi/Sa	6/26/08 CN Beta: 1.22E-04 uCi/Sa	
2 KNPP8-1-AA J8E220269-10-SAMP 05/22/2008 10:00		500.43g,in AmtRec: 20ML,2X4LP	ITA7309 05/21/08 #Containers: 3		35.0		L4	2204 Scr: Alpha: 1.40E-03 uCi/Sa	Beta: -4.08E-04 uCi/Sa	
3 KNPQE-1-AA J8E220269-11-SAMP 05/22/2008 10:00		500.10g,in AmtRec: 20ML,2X4LP	ITA7311 06/16/08 #Containers: 3		36.6		L5	2205 Scr: Alpha: -4.73E-05 uCi/Sa	Beta: 1.54E-03 uCi/Sa	
4 KNPQE-1-AC-X J8E220269-11-DUP 05/22/2008 10:00		500.29g,in AmtRec: 20ML,2X4LP	ITA7312 06/16/08 #Containers: 3		36.5		L4	0057 Scr: Alpha: -4.73E-05 uCi/Sa	Beta: 1.54E-03 uCi/Sa	
5 KN89R-1-AA-B J8F030000-284-BLK 05/22/2008 10:00		500.16g,in AmtRec:	ITA7313 06/16/08 #Containers: 1		36.9		L5	0058 Scr: Alpha:	Beta:	
6 KN89R-1-AC-C J8F030000-284-LCS 05/22/2008 10:00		500.38g,in AmtRec:	ISB0286 05/06/08 #Containers: 1		35.4		L2	0058 Scr: Alpha:	Beta:	

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TESTAMERICA

6/17/2008 5:25:01 AM

Sample Preparation/Analysis

BN I-129 Prp/SepRC5025
TB Gamma by LEPD
5I CLIENT: HANFORD

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

AnalyDueDate: 07/07/2008

Batch: 8155284 pCi/L
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:

Comments:

All Clients for Batch:
384868, Pacific Northwest National Laboratory Pacific Northwest National Lab, SS , 57671

KNPPX1AA-SAMP Constituent List:
I-129 RDL:5.00E+00 pCi/L LCL:70 UCL:130 RPD:20
KN89R1AA-BLK:
I-129 RDL:5.00E+00 pCi/L LCL: UCL: RPD:
KN89R1AC-LCS:
I-129 RDL:5 pCi/L LCL:70 UCL:130 RPD:20
KNPPX1AA-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KN89R1AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KN89R1AC-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

Approved By _____ Date: _____

123

6/27/2008 10:44:49 AM

ICOC Fraction Transfer/Status Report

ByDate: 6/28/2007, 7/2/2008, Batch: '8155284'. User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus		Accepting		Comments
8155284						
AC		Rev1C	WoodT	6/17/2008 5:21:49		
SC			wagarr	IsBatched	6/4/2008 4:12:05 PM	ICOC_RADCALC v4.8.32
SC			WoodT	InPrep	6/17/2008 5:21:49 AM	RICH-RC-5016 Revision 7
SC			WoodT	Prep1C	6/17/2008 5:25:32 AM	RICH-RC-5016 REVISION 7
SC			BostedD	InPrep2	6/18/2008 1:40:15 PM	RICHRC5025 REVISION 4
SC			BostedD	Prep2C	6/26/2008 2:24:03 PM	RL-GAM-002 REVISION 0
SC			DAWKINSO	InCnt1	6/26/2008 3:05:57 PM	RL-CI-007 REVISION 0
SC			ClarkR	CalcC	6/27/2008 7:32:56 AM	RL-CI-007 REVISION 0
SC			whelands	Rev1C	6/27/2008 10:44:43 AM	RICH-RC-0002 REV 8
AC			WoodT	6/17/2008 5:25:32		
AC			BostedD	6/18/2008 1:40:15 PM		
AC			BostedD	6/26/2008 2:24:03 PM		
AC			DAWKINSO	6/26/2008 3:05:57 PM		
AC			ClarkR	6/27/2008 7:32:56		
AC			whelands	6/27/2008 10:44:43		

AC: Accepting Entry; SC: Status Change

TAL Richland

Richland Wa.

Grp Rec Cnt: 7

ICOCFractions v4.8.33

TESTAMERICA

6/9/2008 10:48:39 AM

Sample Preparation/Analysis

Balance Id:1120373922

384868, Pacific Northwest National Laboratory ,
Pacific Northwest National Lab

FP Tc-99 Prp/SepRC5065
S5 Technetium-99 by Liquid Scint
5I CLIENT: HANFORD

Pipet #: _____

AnalyDueDate: 07/07/2008

Sep1 DT/Tm Tech:

Batch: 8155279 WATER pCi/L PM, Quote: SS , 57671

Sep2 DT/Tm Tech:

SEQ Batch, Test: None

Prep Tech: ,Barcotl

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 KNPQ2-1-AA J8E220269-15-SAMP 05/22/2008 10:00		AmtRec: 20ML,500MLP	125.01g,in #Containers: 2	125.01g		60		Scr:	Alpha: -2.72E-05 uCi/Sa	Beta: 5.17E-05 uCi/Sa
2 KNPRE-1-AA J8E220269-16-SAMP 05/22/2008 10:00		AmtRec: 20ML,500MLP	125.00g,in #Containers: 2	125.00g				Scr:	Alpha: 8.62E-06 uCi/Sa	Beta: 2.41E-05 uCi/Sa
3 KNPRE-1-AC-X J8E220269-16-DUP 05/22/2008 10:00		AmtRec: 20ML,500MLP	125.02g,in #Containers: 2	125.02g				Scr:	Alpha: 8.62E-06 uCi/Sa	Beta: 2.41E-05 uCi/Sa
4 KNPRH-1-AA J8E220269-17-SAMP 05/22/2008 10:00		AmtRec: 20ML,500MLP	125.01g,in #Containers: 2	125.01g				Scr:	Alpha: -5.15E-05 uCi/Sa	Beta: 6.27E-05 uCi/Sa
5 KNPRH-1-AC-S J8E220269-17-MS 05/22/2008 10:00		AmtRec: 20ML,500MLP	125.01g,in #Containers: 2	125.01g	TCSG2066 05/20/08,pd 01/10/06,r			Scr:	Alpha: -5.15E-05 uCi/Sa	Beta: 6.27E-05 uCi/Sa
6 KN880-1-AA-B J8F030000-279-BLK 05/22/2008 10:00		AmtRec:	125.00g,in #Containers: 1	125.00g				Scr:	Alpha:	Beta:
7 KN880-1-AC-C J8F030000-279-LCS 05/22/2008 10:00		AmtRec:	125.02g,in #Containers: 1	125.02g	TCSE2225 04/11/08,pd 01/10/06,r			Scr:	Alpha:	Beta:

TESTAMERICA

6/9/2008 10:48:41 AM

Sample Preparation/Analysis

FP Tc-99 Prp/SepRC5065
S5 Technetium-99 by Liquid Scint
5I CLIENT: HANFORD

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

AnalyDueDate: 07/07/2008

Batch: 8155279 pCi/L
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:
8 KN880-1-AD-BN J8F030000-279-IBLK 05/22/2008 10:00	AmtRec:	#Containers: 1				60		Scr:	Alpha:	Beta:

Comments:

All Clients for Batch:
384868, Pacific Northwest National Laboratory Pacific Northwest National Lab, SS , 57671

KNPQ21AA-SAMP Constituent List:
Tc-99 RDL:15 pCi/L LCL:70 UCL:130 RPD:20
KNPRH1AC-MS:

KN8801AA-BLK:
Tc-99 RDL:15 pCi/L LCL: UCL: RPD:
KN8801AC-LCS:
Tc-99 RDL:15 pCi/L LCL:70 UCL:130 RPD:20
KN8801AD-IBLK:
Tc-99 RDL:15 pCi/L LCL: UCL: RPD:

KNPQ21AA-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KNPRH1AC-MS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KN8801AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KN8801AC-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KN8801AD-IBLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

Approved By _____ Date: _____

6/12/2008 11:35:49 AM

ICOC Fraction Transfer/Status Report

ByDate: 6/13/2007, 6/17/2008, Batch: '8155279', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus	Accepting			Comments
8155279						
AC		**Rev1C**	**Barcotl**	6/9/2008 10:48:54		
SC			wagarr	IsBatched	6/4/2008 4:12:05 PM	ICOC_RADCALC v4.8.32
SC			Barcotl	InPrep	6/9/2008 10:48:54 AM	RICH-RC-5016 REVISION 7
SC			Barcotl	Prep1C	6/9/2008 10:49:06 AM	RICH-RC-5016 REVISION 7
SC			Barcotl	InPrep2	6/11/2008 12:32:42 PM	RICH-RC-5065 REVISION 6
SC			Barcotl	Prep2C	6/11/2008 12:32:55 PM	RICH-RC-5065 REVISION 6
SC			ClarkR	InCnt1	6/11/2008 12:51:48 PM	RICH-RD-0001 REVISION 4
SC			ClarkR	CalcC	6/12/2008 7:39:10 AM	RICH-RD-0001 REVISION 4
SC			nortonj	Rev1C	6/12/2008 11:35:41 AM	RICH-RC-0002 REV 8
AC			**Barcotl**	6/9/2008 10:49:06		
AC			**Barcotl**	6/11/2008 12:32:42		
AC			**Barcotl**	6/11/2008 12:32:55		
AC			**ClarkR**	6/11/2008 12:51:48		
AC			**ClarkR**	6/12/2008 7:39:10		
AC			**nortonj**	6/12/2008 11:35:41		

AC: Accepting Entry; SC: Status Change

TAL Richland

Richland Wa.

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Grp Rec Cnt: 7

ICOCFractions v4.8.33

TESTAMERICA

6/10/2008 3:56:34 PM

Sample Preparation/Analysis

384868, Pacific Northwest National Laboratory ,
Pacific Northwest National Lab

DH UNat_Laser PrpRC5015
SS Total Uranium by KPA
5I CLIENT: HANFORD

Balance Id:1120482733

Pipet #:

AnalyDueDate: 07/07/2008 (WSC117)

Sep1 DT/Tm Tech:

Batch: 8155275 WATER ug/L PM, Quote: SS , 57671

Sep2 DT/Tm Tech:

SEQ Batch, Test: None

Prep Tech: ,HarrisD (Back).

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 KNPQM-1-AA J8E220269-12-SAMP 05/22/2008 10:00		24.90g,in AmtRec: 20ML,500MLP	#Containers: 2			Scr: Alpha: 2.99E-04 uCi/Sa 3.0E-01L	Beta: 1.45E-04 uCi/Sa	
2 KNPQM-1-AC-X J8E220269-12-DUP 05/22/2008 10:00		25.10g,in AmtRec: 20ML,500MLP	#Containers: 2			Scr: Alpha: 2.99E-04 uCi/Sa 3.0E-01L	Beta: 1.45E-04 uCi/Sa	
3 KNPQQ-1-AA J8E220269-13-SAMP 05/22/2008 10:00		25.30g,in AmtRec: 20ML,500MLP	#Containers: 2			Scr: Alpha: 3.22E-04 uCi/Sa 2.8E-01L	Beta: 1.12E-04 uCi/Sa	
4 KNPQQ-1-AC-S J8E220269-13-MS 05/22/2008 10:00		25.20g,in AmtRec: 20ML,500MLP	UNSF4237 05/22/08,pd 02/01/86,r #Containers: 2			Scr: Alpha: 3.22E-04 uCi/Sa 2.8E-01L	Beta: 1.12E-04 uCi/Sa	
5 KNPQ0-1-AA J8E220269-14-SAMP 05/22/2008 10:00		25.10g,in AmtRec: 20ML,500MLP	#Containers: 2			Scr: Alpha: 3.16E-04 uCi/Sa 2.8E-01L	Beta: 1.12E-04 uCi/Sa	
6 KN88J-1-AA-B J8F030000-275-BLK 05/22/2008 10:00		24.90g,in AmtRec:	#Containers: 1			Scr: Alpha:	Beta:	
7 KN88J-1-AC-C J8F030000-275-LCS 05/22/2008 10:00		24.90g,in AmtRec:	UNSF4238 05/22/08,pd 02/01/86,r #Containers: 1			Scr: Alpha:	Beta:	

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TESTAMERICA

6/10/2008 3:56:35 PM

Sample Preparation/Analysis

DH UNat_Laser PrpRC5015
SS Total Uranium by KPA
5I CLIENT: HANFORD

Balance Id:1120482733
Pipet #:
Sep1 DT/Tm Tech:
Sep2 DT/Tm Tech:
Prep Tech: ,HarrisD

AnalyDueDate: 07/07/2008

Batch: 8155275 ug/L
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-KN88J-1-AD-C		24.90g.in	UNSC2522					
J8F030000-275-LCS			05/22/08,pd 03/22/05 r					
05/22/2008 10:00		AmtRec:	#Containers: 1			Scr:	Alpha:	Beta:

Comments: pH<2.0 DH 6/10/08

All Clients for Batch:
384868, Pacific Northwest National Laboratory Pacific Northwest National Lab, SS , 57671

KNPQM1AA-SAMP Constituent List:
Uranium RDL:1.44E-01 ug/L LCL: UCL: RPD:
KNPQQ1AC-MS:

KN88J1AA-BLK:
Uranium RDL:1.44E-01 ug/L LCL: UCL: RPD:
KN88J1AC-LCS:
Uranium RDL:0.144343 ug/L LCL:70 UCL:130 RPD:20
KN88J1AD-LCS:
Uranium RDL:0.144343 ug/L LCL:70 UCL:130 RPD:20

KNPQM1AA-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KNPQQ1AC-MS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KN88J1AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KN88J1AC-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KN88J1AD-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

Approved By _____ Date: _____

7/1/2008 2:09:11 PM

ICOC Fraction Transfer/Status Report

ByDate: 7/2/2007, 7/6/2008, Batch: '8155275', User: *ALL Order By DateTimeAccepting

Q Batch	Work Ord	CurStatus	Accepting			Comments
8155275						
AC		**Rev1C**	**HarrisD**	6/10/2008 3:52:21 PM		
SC			wagarr	IsBatched	6/4/2008 4:12:05 PM	ICOC_RADCALC v4.8.32
SC			HarrisD	InPrep	6/10/2008 3:52:21 PM	RICH-RC-5014 Revision 7
SC			HarrisD	Prep1C	6/10/2008 3:55:48 PM	RICH-RC-5015 REVISION 6
SC			BockJ	InPrep2	6/17/2008 6:24:31 AM	RICH-RC-5015 REVISION 6
SC			BockJ	Prep2C	6/23/2008 10:00:26 AM	RL-KPA-001 REVISION 0
SC			NelsonT	Cnt1C	6/24/2008 9:59:42 AM	RL-KPA-003 REVISION 0
SC			nortonj	Rev1C	7/1/2008 2:08:58 PM	RICH-RC-0002 REV 8
AC			**HarrisD**	6/10/2008 3:55:48 PM		
AC			**BockJ**	6/17/2008 6:24:31		
AC			**BockJ**	6/23/2008 10:00:26		
AC			**NelsonT**	6/24/2008 9:59:42		
AC			**nortonj**	7/1/2008 2:08:58 PM		

AC: Accepting Entry; SC: Status Change

TAL Richland

Richland Wa.

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Grp Rec Cnt: 6

ICOCFractions v4.8.33

TESTAMERICA

5/28/2008 8:36:35 AM

Sample Preparation/Analysis

384868, Pacific Northwest National Laboratory ,
Pacific Northwest National Lab

88 NO SAMPLE PREPARATION PERFORMED / DIRECT INJECTION
EA Chromium, Hexavalent (7196A)
5I CLIENT: HANFORD

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

AnalyDueDate: 07/07/2008

Batch: 8148552 WATER mg/L
SEQ Batch, Test: None All Tests: 8148552 88EA,

PM, Quote: SS , 57671

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 KNTP0-1-AA								
J8E230311-1-SAMP								
05/22/2008 08:35		AmtRec: 20ML,500G	#Containers: 2			Scr:	Alpha:	Beta:
2 KNTP0-1-AC-S								
J8E230311-1-MS								
05/22/2008 08:35		AmtRec: 20ML,500G	#Containers: 2			Scr:	Alpha:	Beta:
3 KNTP0-1-AD-D								
J8E230311-1-MSD								
05/22/2008 08:35		AmtRec: 20ML,500G	#Containers: 2			Scr:	Alpha:	Beta:
4 KNTP0-1-AE-X								
J8E230311-1-DUP								
05/22/2008 08:35		AmtRec: 20ML,500G	#Containers: 2			Scr:	Alpha:	Beta:
5 KNXFH-1-AA-B								
J8E270000-552-BLK								
05/22/2008 08:35		AmtRec:	#Containers: 1			Scr:	Alpha:	Beta:
6 KNXFH-1-AC-C								
J8E270000-552-LCS								
05/22/2008 08:35		AmtRec:	#Containers: 1			Scr:	Alpha:	Beta:

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TESTAMERICA

5/28/2008 8:36:36 AM

Sample Preparation/Analysis

88 NO SAMPLE PREPARATION PERFORMED / DIRECT INJECTION
EA Chromium, Hexavalent (7196A)
5I CLIENT: HANFORD

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

AnalyDueDate: 07/07/2008

Batch: 8148552 mg/L
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:

Comments:

All Clients for Batch:
384868, Pacific Northwest National Laboratory Pacific Northwest National Lab, SS , 57671

KNTP01AA-SAMP Constituent List:

KNTP01AC-MS Constituent List:

KNTP01AD-MSD:

KNXFH1AA-BLK:

KNXFH1AC-LCS:

KNTP01AA-SAMP Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KNTP01AC-MS Calc Info:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KNTP01AD-MSD:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KNXFH1AA-BLK:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B
KNXFH1AC-LCS:
Uncert Level (#s).: 2 Decay to SaDt: Y Blk Subt.: N Sci.Not.: Y ODRs: B

Approved By Date: