

N3B-Los Alamos 1200 Trinity Drive, Suite 150 Los Alamos, New Mexico 87544 (505) 257-7690



Environmental Management Los Alamos Field Office 1200 Trinity Drive, Suite 400 Los Alamos, New Mexico 87544 (240) 562-1122

Date: November 4, 2021 Refer To: N3B-2021-0356

Carol Johnson Enforcement and Compliance Assurance Division U.S. Environmental Protection Agency, Region 6 1201 Elm Street, Suite 500 (6 ECD-WR) Dallas, Texas 75270-2102

Subject: NPDES Permit No. NM0030759 – Analytical Results for Site Monitoring Areas

CDV-SMA-7, CDV-SMA-9.05, F-SMA-2, PJ-SMA-11.1, PT-SMA-2, and S-SMA-6 from the First Measurable Storm Event Following Certification of Enhanced

**Control Measures** 

Dear Ms. Johnson:

This letter and enclosures are being submitted in accordance with the requirements of the U.S. Environmental Protection Agency (EPA) National Pollutant Discharge Elimination System (NPDES) Permit No. NM0030759, for discharges of storm water at Los Alamos National Laboratory. The permit was issued to Los Alamos National Security, LLC (LANS) and the U.S. Department of Energy (DOE), effective November 1, 2010, and on April 30, 2018, responsibilities, coverage, and liability transferred from LANS to Newport News Nuclear BWXT-Los Alamos, LLC (N3B). As specified in Part I, Section E.l(c),

Permittees shall certify completion of installation of control measures under this subsection to EPA within 30 days of completion of all such measures at the Site and, where applicable shall provide sampling results within 30 days of receipt of analytical results from the first measurable storm event after completion of such measures.

Accordingly, the analytical results from samples collected during the first measurable storm event received at Site Monitoring Areas (SMAs) CDV-SMA-7, CDV-SMA-9.05, F-SMA-2, PJ-SMA-11.1, PT-SMA-2, and S-SMA-6 in the last 30 days are enclosed. The reports provide references to the certificates of completion of the installation of the control measures. Table 1 includes information about the confirmation samples collected at the SMAs. The enclosed certified documents can be accessed at the following website: <a href="https://ext.em-la.doe.gov/ips">https://ext.em-la.doe.gov/ips</a>.

# Table 1 Confirmation Samples Collected at CDV-SMA-7, CDV-SMA-9.05, F-SMA-2, PJ-SMA-11.1, PT-SMA 2, and S-SMA-6 from the First Measurable Storm Event after Certification of Installation of Enhanced Controls

Watershed	Priority	Site Number	SMA Number	Permitted Feature	Sample Collection Date	Data Receipt Date
Water/Cañon de Valle	Moderate	15-008(d)	CDV-SMA-7	V013	8/26/2021	10/5/2021
Water/Cañon de Valle	Moderate	15-007(b)	CDV-SMA-9.05	V016	8/26/2021	10/5/2021
Water/Cañon de Valle	Moderate	36-004(c)	F-SMA-2	F001	8/26/2021	10/5/2021
Pajarito	Moderate	40-003(b)	PJ-SMA-11.1	J014	8/26/2021	10/5/2021
Water/Cañon de Valle	Moderate	15-008(f) 36-003(b) 36-004(e)	PT-SMA-2	1004	8/26/2021	10/5/2021
Sandia	High	72-001	S-SMA-6	S016	8/26/2021	10/5/2021

If you have any questions, please contact Emily Day at (505) 695-4243 (emily.day@em-la.doe.gov) or M. Lee Bishop at (702) 218-4460 (lee.bishop@em.doe.gov).

Sincerely,

Troy Thomson

Acting Program Manager Environmental Remediation

N3B-Los Alamos

Sincerely,

15

Digitally signed by BRIAN HARCEK Date: 2021.11.04 10:23:15 -06'00'

M. Lee Bishop, Director

Office of Quality and Regulatory Compliance

U.S. Department of Energy

Environmental Management

Los Alamos Field Office

Enclosure(s): One hard copy with electronic files:

- 1. Analytical Results from the First Measurable Storm Event Following Certification of Enhanced Control Measures at CDV-SMA-7 (EM2021-0705)
- 2. Analytical Results from the First Measurable Storm Event Following Certification of Enhanced Control Measures at CDV-SMA-9.05 (EM2021-0706)
- 3. Analytical Results from the First Measurable Storm Event Following Certification of Enhanced Control Measures at F-SMA-2 (EM2021-0707)
- 4. Analytical Results from the First Measurable Storm Event Following Certification of Enhanced Control Measures at PJ-SMA-11.1 (EM2021-0708)
- 5. Analytical Results from the First Measurable Storm Event Following Certification of Enhanced Control Measures at PT-SMA-2 (EM2021-0709)
- 6. Analytical Results from the First Measurable Storm Event Following Certification of Enhanced Control Measures at S-SMA-6 (EM2021-0710)

cc (letter with hard-copy enclosure[s]): Susan Lucas-Kamat, NMED-SWQB

cc (letter and enclosure[s] emailed):

Esteban Herrera, EPA Region 6, Dallas, TX

Curry Jones, EPA Region 6, Dallas, TX

Laurie King, EPA Region 6, Dallas, TX

Brent Larsen, EPA Region 6, Dallas, TX

Chris Catechis, NMED-DOE-OB/-RPD

Steve Yanicak, NMED-DOE-OB

Stephen Hoffman, NA-LA

Peter Maggiore, NA-LA

M. Lee Bishop, EM-LA

Arturo Duran, EM-LA

John Evans, EM-LA

Michael Mikolanis, EM-LA

David Nickless, EM-LA

Cheryl Rodriguez, EM-LA

Jennifer Payne, LANL

William Alexander, N3B

Sharon Brady, N3B

Don Carlson, N3B

Emily Day, N3B

Thomas Harrison, N3B

Debby Holgerson, N3B

Jeff Holland, N3B

Audrey Krehlik, N3B

Kim Lebak, N3B

Joseph Legare, N3B

Dana Lindsay, N3B

Pamela Maestas, N3B

Ed McDaris, N3B

Jason Moore, N3B

Joseph Murdock, N3B

Joseph Noll, N3B

Gerald O'Leary III, N3B

Tashia Owen, N3B

Karly Rodriguez, N3B

Joseph Sena, N3B

Troy Thomson, N3B

Steve Veenis, N3B

Amanda White, N3B

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n3brecords@em-la.doe.gov

Public Reading Room (EPRR)

PRS website

#### William Alexander

From: Johnson, Carol

**Sent:** Friday, November 5, 2021 7:11 AM

To: William Alexander

Cc: Emily M. Day; Cheryl Rodriguez; Audrey Krehlik; Karly B. Rodriguez; Amanda B. White; Jones, Curry; Larsen, Brent; Regulatory

Documentation; Herrera, Esteban; King, Laurie

**Subject:** RE: Submittal to EPA on 11/4/21 Analytical Results 6 SMAs

Thank you for your submittal, William. Your email was received.

#### Carol Johnson

Enforcement and Compliance Assurance Division US Environmental Protection Agency 1201 Elm St. Suite 500 (6EN-WR) Dallas, TX 75270

"Develop success from failures. Discouragement and failure are two of the surest stepping stones to success." -Dale Carnegie

From: William Alexander

Sent: Thursday, November 4, 2021 3:21 PM

To: Johnson, Carol

Cc: Emily M. Day; Cheryl Rodriguez; Audrey Krehlik; Karly B. Rodriguez; Amanda B. White; Jones, Curry; Larsen, Brent; Regulatory Documentation;

Herrera, Esteban; King, Laurie

Subject: Submittal to EPA on 11/4/21 Analytical Results 6 SMAs

Ms. Johnson,

Attached for submittal is a PDF of the following:

• NPDES Permit No. NM0030759 – Analytical Results for Site Monitoring Areas CDV-SMA-7, CDV-SMA-9.05, F-SMA-2, PJ-SMA-11.1, PT-SMA-2, and S-SMA-6 from the First Measurable Storm Event Following Certification of Enhanced (N3B-2021-0356)

Please acknowledge receipt of this submittal by responding to this email. Let me know if you have any questions.

Thanks,
William Alexander
Newport News Nuclear BWXT-Los Alamos "N3B"
Manager (Acting)
Business Services Regulatory Documentation
Writer/Editor/Compositor/Database Admin

#### Analytical Results from the First Measurable Storm Event Following Certification of Enhanced Control Measures at CDV-SMA-7

**November 4, 2021** 

PF: V013 CDV-SMA-7 Site: 15-008(d)

The following certification of analytical results received from the confirmation monitoring sample collected after the completion of the installation of enhanced controls was performed in accordance with the National Pollutant Discharge Elimination System (NPDES) Permit No. NM0030759, Part I.E.1.

#### **CERTIFICATION STATEMENT OF AUTHORIZATION**

"I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate and complete. I am aware there are significant penalties for submitting false information including the possibility of fine and imprisonment for knowing violations."

Steve Veenis, Water Program Director **Environmental Remediation** 

Newport News Nuclear BWXT-Los Alamos, LLC

Digitally signed by BRIAN HARCEK Date: 2021.11.04 10:23:33

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M. Lee Bishop, Director Office of Quality and Regulatory Compliance U.S. Department of Energy **Environmental Management** Los Alamos Field Office

10/26/2021

Date

Date

PF: V013 CDV-SMA-7 Site: 15-008(d)

Table 1 presents the analytical results received from the confirmation monitoring sample collected from the first measurable storm event following the installation and subsequent certification of enhanced controls at Site Monitoring Area (SMA) CDV-SMA-7. Final analytical results were received on October 5, 2021. The descriptions and photographs of each enhanced control installed at CDV-SMA-7 were provided to the U.S. Environmental Protection Agency on December 14, 2020 (N3B-2020-0434, EM2020-0631). Table 2 presents each applicable target action level (TAL) for the analytes monitored.

Table 1
Radiochemical Analytical Results from the First Measurable Storm Event
Collected on August 26, 2021, Following Installation of Enhanced Controls at CDV-SMA-7

Sample ID	Analyte	Field Preparation	Detection Status	Result (pCi/L)	TAL Exceedance Ratio	Minimum Detectable Activity (pCi/L)	Uncertainty (pCi/L)	Qualifier*	Data Receipt Date
WT_IPC-21-221585	Gross alpha	Unfiltered	Detect	113	7.53	12.8	7.41	J	10/5/2021

Note: TAL exceedance ratio is the analytical result divided by the applicable average TAL.

Table 2 Applicable TAL(s)

Analyte	Unit	CAS No.	MQL	ATAL	MTAL
Gross alpha	pCi/L	n/a*	n/a	15	n/a

<sup>\*</sup> Qualifier: J = Result is estimated.

<sup>\*</sup> n/a = Not applicable.

#### Analytical Results from the First Measurable Storm Event Following Certification of Enhanced Control Measures at CDV-SMA-9.05

**November 4, 2021** 

PF: V016 CDV-SMA-9.05 Site: 15-007(b)

The following certification of analytical results received from the confirmation monitoring sample collected after the completion of the installation of enhanced controls was performed in accordance with the National Pollutant Discharge Elimination System (NPDES) Permit No. NM0030759, Part I.E.1.

#### **CERTIFICATION STATEMENT OF AUTHORIZATION**

"I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate and complete. I am aware there are significant penalties for submitting false information including the possibility of fine and imprisonment for knowing violations."

Steve Veenis, Water Program Director Environmental Remediation

Newport News Nuclear BWXT-Los Alamos, LLC

Digitally signed by BRIAN HARCEK Date: 2021.11.04 10:24:06 -06'00'

M. Lee Bishop, Director
Office of Quality and Regulatory Compliance
U.S. Department of Energy
Environmental Management
Los Alamos Field Office

10/26/2021

Date

Date

PF: V016 CDV-SMA-9.05 Site: 15-007(b)

Table 1 presents the analytical results received from the confirmation monitoring sample collected from the first measurable storm event following the installation and subsequent certification of enhanced controls at Site Monitoring Area (SMA) CDV-SMA-9.05. Final analytical results were received on October 5, 2021. The descriptions and photographs of each enhanced control installed at CDV-SMA-9.05 were provided to the U.S. Environmental Protection Agency on December 14, 2020 (N3B-2020-0434, EM2020-0632). Table 2 presents each applicable target action level (TAL) for the analytes monitored.

Table 1

Radiochemical Analytical Results from the First Measurable Storm Event

Collected on August 26, 2021, Following Installation of Enhanced Controls at CDV-SMA-9.05

Sample ID	Analyte	Field Preparation	Detection Status	Result (pCi/L)	TAL Exceedance Ratio	Minimum Detectable Activity (pCi/L)	Uncertainty (pCi/L)	Qualifier*	Data Receipt Date
WT_IPC-21-221589	Gross alpha	Unfiltered	Detect	4.83	0.322	0.961	0.462	NQ	10/5/2021

Note: TAL exceedance ratio is the analytical result divided by the applicable average TAL.

Table 2
Applicable TAL(s)

Analyte	Unit	CAS No.	MQL	ATAL	MTAL
Gross alpha	pCi/L	n/a*	n/a	15	n/a

<sup>\*</sup> Qualifier: NQ = Result is not qualified.

<sup>\*</sup> n/a = Not applicable.

#### Analytical Results from the First Measurable Storm Event Following Certification of Enhanced Control Measures at F-SMA-2

**November 4, 2021** 

PF: F001 F-SMA-2 Site: 36-004(c)

The following certification of analytical results received from the confirmation monitoring sample collected after the completion of the installation of enhanced controls was performed in accordance with the National Pollutant Discharge Elimination System (NPDES) Permit No. NM0030759, Part I.E.1.

#### **CERTIFICATION STATEMENT OF AUTHORIZATION**

"I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate and complete. I am aware there are significant penalties for submitting false information including the possibility of fine and imprisonment for knowing violations."

Steve Veenis, Water Program Director Environmental Remediation

Newport News Nuclear BWXT-Los Alamos, LLC

Digitally signed by BRIAN HARCEK Date: 2021.11.04 10:24:27 -06'00'

M. Lee Bishop, Director
Office of Quality and Regulatory Compliance
U.S. Department of Energy
Environmental Management
Los Alamos Field Office

Date

10/26/2021

Date

PF: F001 F-SMA-2 Site: 36-004(c)

Tables 1 and 2 present the analytical results received from the confirmation monitoring sample collected from the first measurable storm event following the installation and subsequent certification of enhanced controls at Site Monitoring Area (SMA) F-SMA-2. Final analytical results were received on October 5, 2021. The descriptions and photographs of each enhanced control installed at F-SMA-2 were provided to the U.S. Environmental Protection Agency on September 29, 2015 (ADESH-15-142, LA-UR-15-26831). Table 3 presents each applicable target action level (TAL) for the analytes monitored.

Table 1
Radiochemical Analytical Results from the First Measurable Storm Event
Collected on August 26, 2021, Following Installation of Enhanced Controls at F-SMA-2

Sample ID	Analyte	Field Preparation	Detection Status	Result (pCi/L)	TAL Exceedance Ratio	Minimum Detectable Activity (pCi/L)	Uncertainty (pCi/L)	Qualifier <sup>a</sup>	Data Receipt Date
WT_IPC-21-221104	Radium-226 and radium-228	Unfiltered	Detect	8.13	0.271	n/a <sup>b</sup>	0.657	NQ	10/5/2021
WT_IPC-21-221104	Gross alpha	Unfiltered	Detect	37.2	2.48	3.23	2.24	NQ	10/5/2021

Note: TAL exceedance ratio is the analytical result divided by the applicable average TAL.

Table 2

Metals and Organic Analytical Results from the First Measurable Storm Event

Collected on August 26, 2021, Following Installation of Enhanced Controls at F-SMA-2

Sample ID	Analyte	Field Preparation	Detection Status	Result (µg/L)	TAL Exceedance Ratio	Method Detection Limit	Quantitation Limit	Qualifier <sup>a</sup>	Data Receipt Date
WT_IPC-21-221106	Aluminum	Filtered	Detect	839	1.12	19.3	50	NQ	10/5/2021
WT_IPC-21-221106	Antimony	Filtered	Nondetect	1	0.00156	1	3	U	10/5/2021
WT_IPC-21-221106	Arsenic	Filtered	Nondetect	2	0.222	2	5	U	10/5/2021
WT_IPC-21-221106	Boron	Filtered	Detect	24.7	0.00494	15	50	J	10/5/2021
WT_IPC-21-221106	Cadmium	Filtered	Nondetect	0.3	0.3	0.3	1	U	10/5/2021

<sup>&</sup>lt;sup>a</sup> Qualifier: NQ = Result is not qualified.

<sup>&</sup>lt;sup>b</sup> n/a = Value is not applicable.

PF: F001 F-SMA-2 Site: 36-004(c)

#### Table 2 (continued)

Sample ID	Analyte	Field Preparation	Detection Status	Result (µg/L)	TAL Exceedance Ratio	Method Detection Limit	Quantitation Limit	Qualifier <sup>a</sup>	Data Receipt Date
WT_IPC-21-221106	Chromium	Filtered	Nondetect	3	0.0143	3	10	U	10/5/2021
WT_IPC-21-221106	Cobalt	Filtered	Nondetect	1	0.001	1	5	U	10/5/2021
WT_IPC-21-221106	Copper	Filtered	Detect	8.87	2.06	0.3	2	NQ	10/5/2021
WT_IPC-21-221106	Lead	Filtered	Detect	7.35	0.432	0.5	2	NQ	10/5/2021
WT_IPC-21-221104	Mercury	Unfiltered	Detect	0.076	0.0987	0.067	0.2	J	10/5/2021
WT_IPC-21-221106	Nickel	Filtered	Detect	1.59	0.00935	0.6	2	J	10/5/2021
WT_IPC-21-221104	Selenium	Unfiltered	Detect	6.91	1.38	2	5	NQ	10/5/2021
WT_IPC-21-221106	Silver	Filtered	Nondetect	0.3	0.6	0.3	1	U	10/5/2021
WT_IPC-21-221106	Thallium	Filtered	Nondetect	0.6	0.0952	0.6	2	U	10/5/2021
WT_IPC-21-221106	Vanadium	Filtered	Detect	3.24	0.0324	1	5	J	10/5/2021
WT_IPC-21-221106	Zinc	Filtered	Detect	9.26	0.22	3.3	20	J	10/5/2021
WT_IPC-21-221104	Cyanide, weak acid dissociable	Unfiltered	Nondetect	1.67	0.167	1.67	5	U	10/5/2021
WT_IPC-21-221104	RDX <sup>b</sup>	Unfiltered	Detect	0.674	0.00337	0.0847	0.265	NQ	10/5/2021
WT_IPC-21-221104	Trinitrotoluene [2,4,6-]	Unfiltered	Nondetect	0.0847	0.00424	0.0847	0.265	U	10/5/2021

Notes: TAL exceedance ratio is the result divided by the smallest applicable TAL. Applicable TALs are the larger of the maximum TAL and minimum quantification level (MQL) or the larger of the average TAL or MQL.

<sup>&</sup>lt;sup>a</sup> Qualifier: NQ = Result is not qualified; U = result is not detected; J = result is estimated.

<sup>&</sup>lt;sup>b</sup> RDX = Royal Demolition Explosive.

PF: F001 F-SMA-2 Site: 36-004(c)

Table 3
Applicable TALs

Analyte	Unit	CAS No.	MQL	ATAL	MTAL
Radium-226 and radium-228	pCi/L	n/a <sup>a</sup>	n/a	30	n/a
Gross alpha	pCi/L	n/a	n/a	15	n/a
Aluminum	μg/L	7429-90-5	2.5	n/a	750
Antimony	μg/L	7440-36-0	60	640	n/a
Arsenic	μg/L	7440-38-2	0.5	9	340
Boron	μg/L	7440-42-8	100	5000	n/a
Cadmium	μg/L	7440-43-9	1	n/a	0.6
Chromium	μg/L	7440-47-3	10	n/a	210
Cobalt	μg/L	7440-48-4	50	1000	n/a
Copper	μg/L	7440-50-8	0.5	n/a	4.3
Lead	μg/L	7439-92-1	0.5	n/a	17
Mercury	μg/L	7439-97-6	0.005	0.77	1.4
Nickel	μg/L	7440-02-0	0.5	n/a	170
Selenium	μg/L	7782-49-2	5	5	20
Silver	μg/L	7440-22-4	0.5	n/a	0.4
Thallium	μg/L	7440-28-0	0.5	6.3	n/a
Vanadium	μg/L	7440-62-2	50	100	n/a
Zinc	μg/L	7440-66-6	20	n/a	42
Cyanide, weak acid dissociable	μg/L	57-12-5	10	5.2	22
RDX⁵	μg/L	121-82-4	n/a	200	n/a
Trinitrotoluene[2,4,6-]	μg/L	118-96-7	n/a	20	n/a

a n/a = Not applicable.

<sup>&</sup>lt;sup>b</sup> RDX = Royal Demolition Explosive.

#### Analytical Results from the First Measurable Storm Event Following Certification of Enhanced Control Measures at PJ-SMA-11.1

**November 4, 2021** 

PF: J014 PJ-SMA-11.1 Site: 40-003(b)

The following certification of analytical results received from the confirmation monitoring sample collected after the completion of the installation of enhanced controls was performed in accordance with the National Pollutant Discharge Elimination System (NPDES) Permit No. NM0030759, Part I.E.1.

#### **CERTIFICATION STATEMENT OF AUTHORIZATION**

"I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate and complete. I am aware there are significant penalties for submitting false information including the possibility of fine and imprisonment for knowing violations."

Steve Veenis, Water Program Director

Environmental Remediation

Newport News Nuclear BWXT-Los Alamos, LLC

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Date: 2021.11.04 10:24:54

M. Lee Bishop, Director
Office of Quality and Regulatory Compliance
U.S. Department of Energy
Environmental Management
Los Alamos Field Office

10/26/2021

Date

Date

PF: J014 PJ-SMA-11.1 Site: 40-003(b)

Tables 1 and 2 present the analytical results received from the confirmation monitoring sample collected from the first measurable storm event following the installation and subsequent certification of enhanced controls at Site Monitoring Area (SMA) PJ-SMA-11.1. Final analytical results were received on October 5, 2021. The descriptions and photographs of each enhanced control installed at PJ-SMA-11.1 were provided to the U.S. Environmental Protection Agency on August 17, 2015 (ADESH-15-108, LA-UR-15-21905). Table 3 presents each applicable target action level (TAL) for the analytes monitored.

Table 1
Radiochemical Analytical Results from the First Measurable Storm Event
Collected on August 26, 2021, Following Installation of Enhanced Controls at PJ-SMA-11.1

Sample ID	Analyte	Field Preparation	Detection Status	Result (pCi/L)	TAL Exceedance Ratio	Minimum Detectable Activity (pCi/L)	Uncertainty (pCi/L)	Qualifier*	Data Receipt Date
WT_IPC-21-221376	Gross alpha	Unfiltered	Detect	132	8.8	10.8	7.36	NQ	10/5/2021

Note: TAL exceedance ratio is the analytical result divided by the applicable average TAL.

Table 2
Metals and Organic Analytical Results from the First Measurable Storm Event
Collected on August 26, 2021, Following Installation of Enhanced Controls at PJ-SMA-11.1

Sample ID	Analyte	Field Preparation	Detection Status	Result (µg/L)	TAL Exceedance Ratio	Method Detection Limit	Quantitation Limit	Qualifier*	Data Receipt Date
WT_IPC-21-221377	Aluminum	Filtered	Detect	542	0.723	19.3	50	NQ	10/5/2021
WT_IPC-21-221377	Copper	Filtered	Detect	37.6	8.74	0.3	2	NQ	10/5/2021

Notes: TAL exceedance ratio is the result divided by the smallest applicable TAL. Applicable TALs are the larger of the maximum TAL and minimum quantification level (MQL) or the larger of the average TAL or MQL.

<sup>\*</sup> Qualifier: NQ = Result is not qualified.

<sup>\*</sup> Qualifier: NQ = Result is not qualified.

PF: J014 PJ-SMA-11.1 Site: 40-003(b)

Table 3
Applicable TALs

Analyte	Unit	CAS No.	MQL	ATAL	MTAL
Gross alpha	pCi/L	n/a*	n/a	15	n/a
Aluminum	μg/L	7429-90-5	2.5	n/a	750
Copper	μg/L	7440-50-8	0.5	n/a	4.3

<sup>\*</sup> n/a = Not applicable.

#### Analytical Results from the First Measurable Storm Event Following Certification of Enhanced Control Measures at PT-SMA-2

**November 4, 2021** 

PF: I004 PT-SMA-2 Sites: 15-008(f)

36-003(b) 36-004(e)

Date

The following certification of analytical results received from the confirmation monitoring sample collected after the completion of the installation of enhanced controls was performed in accordance with the National Pollutant Discharge Elimination System (NPDES) Permit No. NM0030759, Part I.E.1.

#### CERTIFICATION STATEMENT OF AUTHORIZATION

"I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate and complete. I am aware there are significant penalties for submitting false information including the possibility of fine and imprisonment for knowing violations."

Steve Veenis, Water Program Director
Environmental Remediation
Newport News Nuclear BWXT-Los Alamos, LLC

Digitally signed by BRIAN
HARCEK
Date: 2021.11.04 10:25:17

M. Lee Bishop, Director
Office of Quality and Regulatory Compliance
U.S. Department of Energy
Environmental Management
Los Alamos Field Office

-06'00'

PF: I004 PT-SMA-2 Sites: 15-008(f)

36-003(b) 36-004(e)

Tables 1 and 2 present the analytical results received from the confirmation monitoring sample collected from the first measurable storm event following the installation and subsequent certification of enhanced controls at Site Monitoring Area (SMA) PT-SMA-2. Final analytical results were received on October 5, 2021. The descriptions and photographs of each enhanced control installed at PT-SMA-2 were provided to the U.S. Environmental Protection Agency on July 15, 2021 (N3B-2021-0196, EM2021-0376). Table 3 presents each applicable target action level (TAL) for the analytes monitored.

Table 1
Radiochemical Analytical Results from the First Measurable Storm Event
Collected on August 26, 2021, Following Installation of Enhanced Controls at PT-SMA-2

Sample ID	Analyte	Field Preparation	Detection Status	Result (pCi/L)	TAL Exceedance Ratio	Minimum Detectable Activity (pCi/L)	Uncertainty (pCi/L)	Qualifier*	Data Receipt Date
WT_IPC-21-231304	Gross alpha	Unfiltered	Detect	175	11.7	9.15	7.74	NQ	10/5/2021

Note: TAL exceedance ratio is the analytical result divided by the applicable average TAL.

Table 2

Metals and Organic Analytical Results from the First Measurable Storm Event

Collected on August 26, 2021, Following Installation of Enhanced Controls at PT-SMA-2

Sample ID	Analyte	Field Preparation	Detection Status	Result (µg/L)	TAL Exceedance Ratio	Method Detection Limit	Quantitation Limit	Qualifier*	Data Receipt Date
WT_IPC-21-231306	Copper	Filtered	Detect	5.19	1.21	0.3	2	NQ	10/5/2021

Notes: TAL exceedance ratio is the result divided by the smallest applicable TAL. Applicable TALs are the larger of the maximum TAL and minimum quantification level (MQL) or the larger of the average TAL or MQL.

<sup>\*</sup> Qualifier: NQ = Result is not qualified.

<sup>\*</sup> Qualifier: NQ = result is not qualified.

PF: I004 PT-SMA-2 Sites: 15-008(f)

36-003(b) 36-004(e)

## Table 3 Applicable TALs

Analyte	Unit	CAS No.	MQL	ATAL	MTAL
Gross alpha	pCi/L	n/a*	n/a	15	n/a
Copper	μg/L	7440-50-8	0.5	n/a	4.3

<sup>\*</sup> n/a = Not applicable.

#### Analytical Results from the First Measurable Storm Event Following Certification of Enhanced Control Measures at S-SMA-6

**November 4, 2021** 

PF: S016 S-SMA-6 Site: 72-001

The following certification of analytical results received from the confirmation monitoring sample collected after the completion of the installation of enhanced controls was performed in accordance with the National Pollutant Discharge Elimination System (NPDES) Permit No. NM0030759, Part I.E.1.

#### **CERTIFICATION STATEMENT OF AUTHORIZATION**

"I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate and complete. I am aware there are significant penalties for submitting false information including the possibility of fine and imprisonment for knowing violations."

Steve Veenis, Water Program Director Environmental Remediation

Newport News Nuclear BWXT-Los Alamos, LLC

Digitally signed by BRIAN HARCEK Date: 2021.11.04 10:25:36 -06'00'

M. Lee Bishop, Director
Office of Quality and Regulatory Compliance
U.S. Department of Energy
Environmental Management
Los Alamos Field Office

10/26/2021 Date

Date

PF: S016 S-SMA-6 Site: 72-001

Tables 1 and 2 present the analytical results received from the confirmation monitoring sample collected from the first measurable storm event following the installation and subsequent certification of enhanced controls at Site Monitoring Area (SMA) S-SMA-6. Final analytical results were received on October 5, 2021. The descriptions and photographs of each enhanced control installed at S-SMA-6 were provided to the U.S. Environmental Protection Agency on December 14, 2020 (N3B-2020-0434, EM2020-0635). Table 3 presents each applicable target action level (TAL) for the analytes monitored.

Table 1

Radiochemical Analytical Results from the First Measurable Storm Event

Collected on August 26, 2021, Following Installation of Enhanced Controls at S-SMA-6

Sample ID	Analyte	Field Preparation	Detection Status	Result (pCi/L)	TAL Exceedance Ratio	Minimum Detectable Activity (pCi/L)	Uncertainty (pCi/L)	Qualifier*	Data Receipt Date
WT_IPC-21-221611	Gross alpha	Unfiltered	Detect	156	10.4	10.9	8.26	NQ	10/5/2021

Note: TAL exceedance ratio is the analytical result divided by the applicable average TAL.

Table 2
Metals and Organic Analytical Results from the First Measurable Storm Event
Collected on August 26, 2021, Following Installation of Enhanced Controls at S-SMA-6

Sample ID	Analyte	Field Preparation	Detection Status	Result (µg/L)	TAL Exceedance Ratio	Method Detection Limit	Quantitation Limit	Qualifier <sup>a</sup>	Data Receipt Date
WT_IPC-21-221793	Aluminum	Filtered	Detect	389	0.519	19.3	50	NQ	10/5/2021
WT_IPC-21-221793	Copper	Filtered	Detect	33.1	7.7	0.3	2	NQ	10/5/2021
WT_IPC-21-221793	Lead	Filtered	Detect	42.1	2.48	0.5	2	NQ	10/5/2021
WT_IPC-21-221611	Total PCBb	Unfiltered	Nondetect	0	0	n/a <sup>c</sup>	0.00805	U	10/13/2021

Notes: TAL exceedance ratio is the result divided by the smallest applicable TAL. Applicable TALs are the larger of the maximum TAL and minimum quantification level (MQL) or the larger of the average TAL or MQL.

<sup>\*</sup> Qualifier: NQ = Result is not qualified.

<sup>&</sup>lt;sup>a</sup> Qualifier: NQ = Result is not qualified; U = result is not detected.

<sup>&</sup>lt;sup>b</sup> PCB = Polychlorinated biphenyls.

<sup>&</sup>lt;sup>c</sup> n/a = Value is not applicable.

PF: S016 S-SMA-6 Site: 72-001

Table 3
Applicable TALs

Analyte	Unit	CAS No.	MQL	ATAL	MTAL
Gross alpha	pCi/L	n/aª	n/a	15	n/a
Aluminum	μg/L	7429-90-5	2.5	n/a	750
Copper	μg/L	7440-50-8	0.5	n/a	4.3
Lead	μg/L	7439-92-1	0.5	n/a	17
Total PCB <sup>b</sup>	μg/L	1336-36-3	n/a	0.00064	n/a

<sup>&</sup>lt;sup>a</sup> n/a = Value is not applicable.

b PCB = Polychlorinated biphenyls.