

Control #: D4-300-081

## FACILITY STATUS CHANGE FORM

<b>Date Submitted:</b> February 21, 2013 <b>Originator:</b> Chris Strand <b>Phone:</b> 554-2720	<b>Area:</b> 300 Area <b>Facility ID:</b> 308A <b>Action Memorandum:</b> Action Memorandum #3	<b>Control #:</b> D4-300-081
--	--	---------------------------------

**This form documents agreement among the parties listed below on the status of the facility D&D operations and the disposition of underlying soil in accordance with the applicable regulatory decision documents.**

### Section 1: Facility Status

- All D4 operations required by action memo complete.
- D4 operations required by action memo partially complete, remaining operations deferred.

### Description of Completed Activities and Current Conditions:

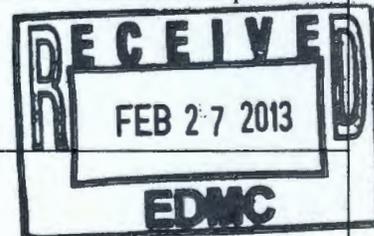
**Deactivation:** Utility isolations were performed on the facility prior to beginning facility decontamination.

The following hazardous materials were removed prior to facility demolition: contaminated glove boxes, ducting, lead, asbestos, beryllium, mercury, batteries, Freon, oil, light ballasts, HEPA filters and miscellaneous construction materials. Hazardous material removal and waste disposition was performed in accordance with *Removal Action Work for 300 Area Facilities, DOE/RL-2004-77, Revision 2 (RAWP)*.

**Demolition:** Above-grade demolition of the 308A Building was completed in April of 2012. Below-grade demolition of the 308A foundation was completed in June of 2012. The TRIGA reactor and majority of the adjacent fuel storage were removed in December of 2012. The building debris and TRIGA reactor were removed and disposed of at ERDF. The demolition was performed under Radiological and Industrial Hygiene controls.

### Description of Deferral (as applicable):

N/A



### Section 2: Underlying Soil Status

- No waste site(s) present. No additional actions anticipated.
- Documented waste site(s) present. Cleanup and closeout to be addressed under Record of Decision.
- Potential waste site discovered during D4 operations. Waste site identification number <to be> assigned. Cleanup and closeout to be addressed under Record of Decision.

### Description of Current/As-Left Conditions:

The 308A Building, foundations, TRIGA reactor, and majority of the fuel storage basin were removed. The weld test assembly pit and a portion of the fuel storage basin were left in place following radiological surveys that demonstrated the structures were free of contamination. GPERs surveys are included as attachments 3. No soil contamination was observed and no anomalies were noted. The site is backfilled to surrounding area grade, no IH or radiological postings remain.

### Identification of Documented Waste Site(s) or Nature of Potential Waste Site Discovery (as applicable):

300-214 (Retention Process Sewer), 300-15 (Process Sewer), and 300-RRLWS (Retired Radioactive Liquid Waste Sewer) were removed to the limits of the excavation layback.

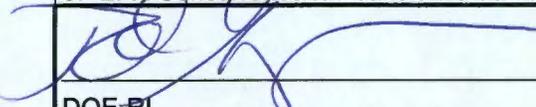
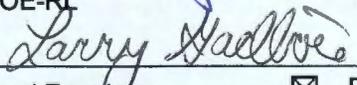
The following rejected UICs were decommissioned during demolition:

- UIC - 300-72, Misc. Stream # 404 - removed.  
 UIC - 300-73, Misc. Stream # 405 - removed.  
 UIC - 300-74, Misc. Stream # 406 - removed.

# FACILITY STATUS CHANGE FORM

**Section 3: List of Attachments**

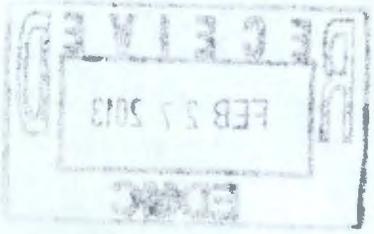
1. Facility information (building history, characterization and identification of documented waste sites).
2. Project photographs.
3. GPERS Survey.
4. EPA Concurrence to Leave the Weld Test Assembly Pit.
5. EPA Concurrence to Leave a Portion of the Fuel Storage Basin.

 DOE-RL  Lead Regulator	2/21/2013 Date Feb 25, 2013 Date
Lead Regulator <input checked="" type="checkbox"/> EPA <input type="checkbox"/> Ecology	

**DISTRIBUTION:**

EPA: Larry Gadbois, B1-46  
 Ecology: Rick Bond, H0-57  
 DOE: Rudy Guercia, A3-04  
 Document Control, H0-30  
 Administrative Record, H6-08 (300-FF-2 OU)

SIS Coordinator: Ben Cowin, H4-22  
 D4 EPL: Chris Strand, L5-45  
 Sample Design/Cleanup Verification: Theresa Howell, H4-23  
 FR Engineering: Eric Ison, L6-06  
 FR EPL: Chris Strand, L5-45



## Attachment 1: Facility Information

### 308A Building History:

The 308A Building was a 7000 square foot annex added to the northeast corner of the 308 Building in 1971. 308A supported FFTF fuel bundle assembly including quality control measurements and testing. The quality inspection equipment included neutron radiography using a Training, Research, Isotopes, General Atomics (TRIGA) reactor installed in Room 160 in 1975. In 1979, a shipping and receiving annex was added on the south side of 308A which included a bridge crane for handling fuel assembly shipping containers.

The greater 308 Complex was bordered by Spruce Street to the north, New Mexico Avenue to the east, Redwood Street to the south, and California Avenue to the west.

Test Pin and fuel assembly fabrication activities at the 308 Complex were discontinued in 1990. Special nuclear material (SNM) removal was completed in May of 1992 and the deactivation work that began in 1986 was completed in June of 1996 with the transition from Westinghouse to Bechtel Hanford for surveillance and maintenance.

Above-grade demolition of both 308 and 308A were completed in April of 2012. The Weld Test Assembly Pit located in Room 158 of 308A was decontaminated and filled with controlled density fill prior to demolition, eliminating the potential for contaminated debris to fall into the pit. Radiological surveys and sample results supported this approach.

Below-grade demolition of 308A was completed in December of 2012 with the removal of the TRIGA reactor and majority of the adjacent fuel storage basin. The remaining portion of the fuel storage basin was surveyed and found to be contamination free. This structure was left in place and backfilled. Backfill of the 308 and 308A was completed in February 2013.

### Building Characterization:

Table 1 summarizes the industrial hygiene, radiological control, and asbestos samples collected in the 308 Building.

**Table 1. Summary of Characterization Surveys at the 308 & 308A Buildings.**

Type	Date	Documented In	Results Summary
<b>Pre-Demolition</b>			
Asbestos	May 8, 2007 August 20, 2007 February 7, 2011	CNN # 133644 CNN # 135276 CNN # 156298	ACM was identified in Floor tile and mastic, roofing, TSI pipe insulation, and vermiculite in the cinder block walls.
IH Surveys and Beryllium Characterization	November 20, 2003 January 22, 2008 March 17, 2008 May 6, 2008 June 27, 2010 January 11, 2011	CNN # 111111 CNN # 137591 (135006) CNN # 138600 CNN # 139330 CNN # 152071 CNN # 154715	Be, Pb, Cd & Cr were identified and demolition work was performed under Industrial Hygiene Work plan, Beryllium Work Permit, monthly sample routines and weekly air sampling in rooms 8-16.

**Table 1. Summary of Characterization Surveys at the 308 & 308A Buildings  
Continued.**

Radiological Surveys	January 18, 2006	RSR-300PS-06-0123	Field surveys, sampling and non-destructive-analyses (NDA) were performed. Highly contaminated items were removed or fixed in-place, such as ducting, gloves boxes and the RLWS
	February 1, 2006	RSR-300PS-06-0210	
	February 2, 2006	RSR-300PS-06-0223	
	February 8, 2006	RSR-300PS-06-0273	
	February 9, 2006	RSR-300PS-06-0282	
	April 5, 2007	RSR-300PS-07-0707	
	April 11, 2007	RSR-300PS-07-0744	
	April 12, 2007	RSR-300PS-07-0745	
	May 3, 2007	RSR-300PS-07-0883	
	May 7, 2007	RSR-300PS-07-0884	
	May 8, 2007	RSR-300PS-07-0900	
	May 14, 2007	RSR-300PS-07-0919	
	July 11, 2007	RSR-300PS-07-1308	
	February 7, 2008	RSR-300PS-08-0425	
	July 10, 2008	RSR-300PS-08-2162	
	August 28, 2008	RSR-300PS-08-2699	
	September 8, 2008	RSR-300PS-08-2797	

**Associated WIDs sites:**

300-214, 300-15, and 300-RRLWS piping were removed to the limits of the excavation layback.

The following "Rejected" Underground Injection Control (UICs) wells were decommissioned (plugged and removed) during the 308 Building demolition:

- UIC – 300-72            Misc. Stream # 404
- UIC – 300-73            Misc. Stream #405
- UIC – 300-74            Misc. Stream # 406

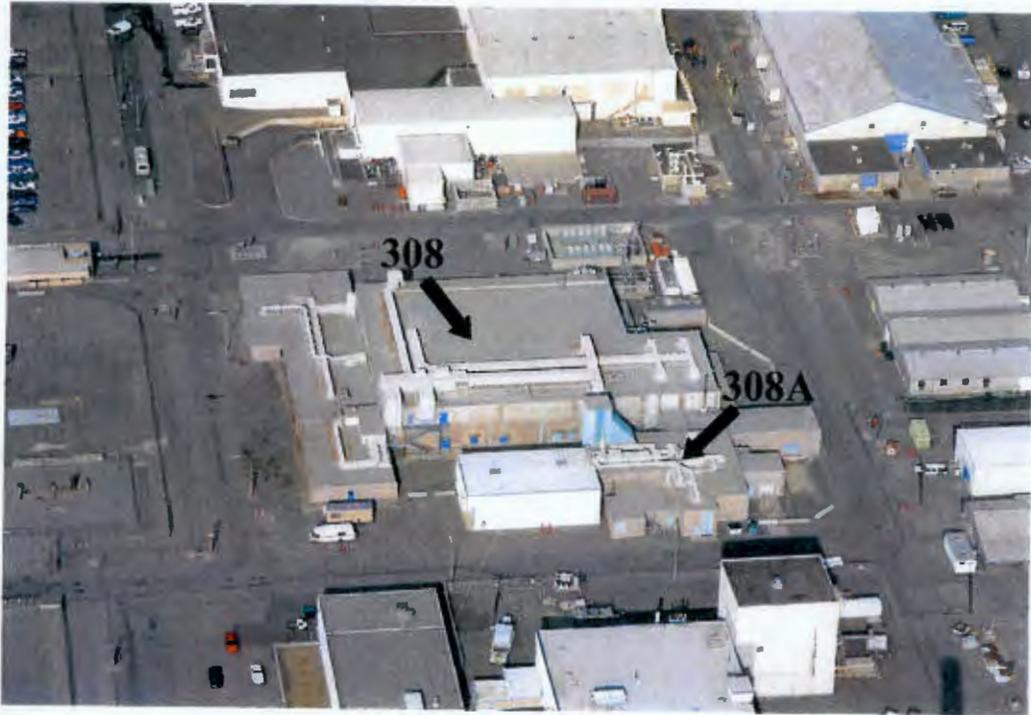
**Anomalies Discovered During Demolition.**

No anomalies were discovered during the demolition of the 308A Building. Soils beneath the slab and foundations displayed no visual evidence of staining or discoloration.

In process and final tritium samples were taken around and under the TRIGA reactor, all results were non-detect. Down-posting surveys with hand-held instruments and a final GPERS surveys of the excavation face following TRIGA reactor removal identified no radiological contamination.

## Attachment 2: Project Photographs

**Photograph 1. Looking west at the 308 Complex in 1999.**



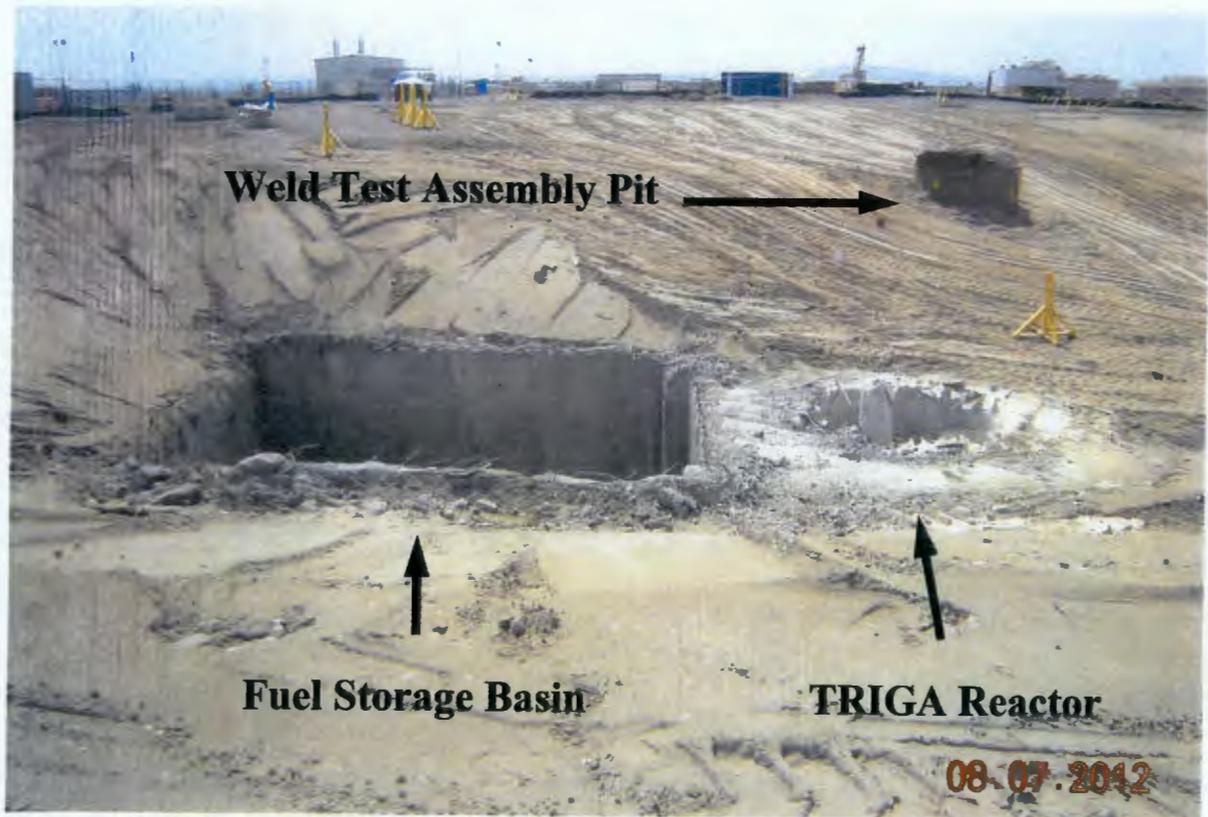
**Photograph 2. Looking south at 308A, August 4, 2006.**



**Photograph 3. Areal view looking southwest following above-grade demolition of 308A on September 8, 2011.**



**Photograph 4. Looking south during 308A below-grade demolition on August 7, 2012.**



**Photograph 5. Looking west as the TRIGA reactor is moved to the transportation trailer on December 15, 2012.**



**Photograph 6. Looking southeast at the 308A excavation following removal of the TRIGA reactor, January 7, 2013**



**Remaining portion of the fuel storage basin.**

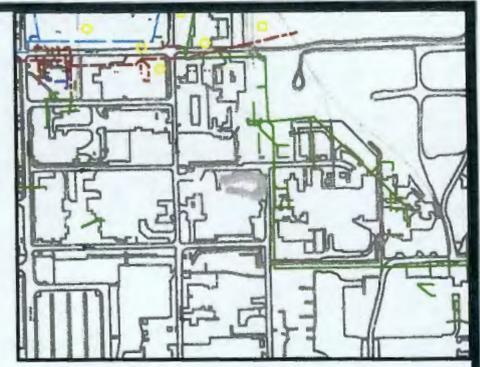
**Photograph 7. Looking southeast at the 308 and 308A site following backfill,  
February 20, 2011.**



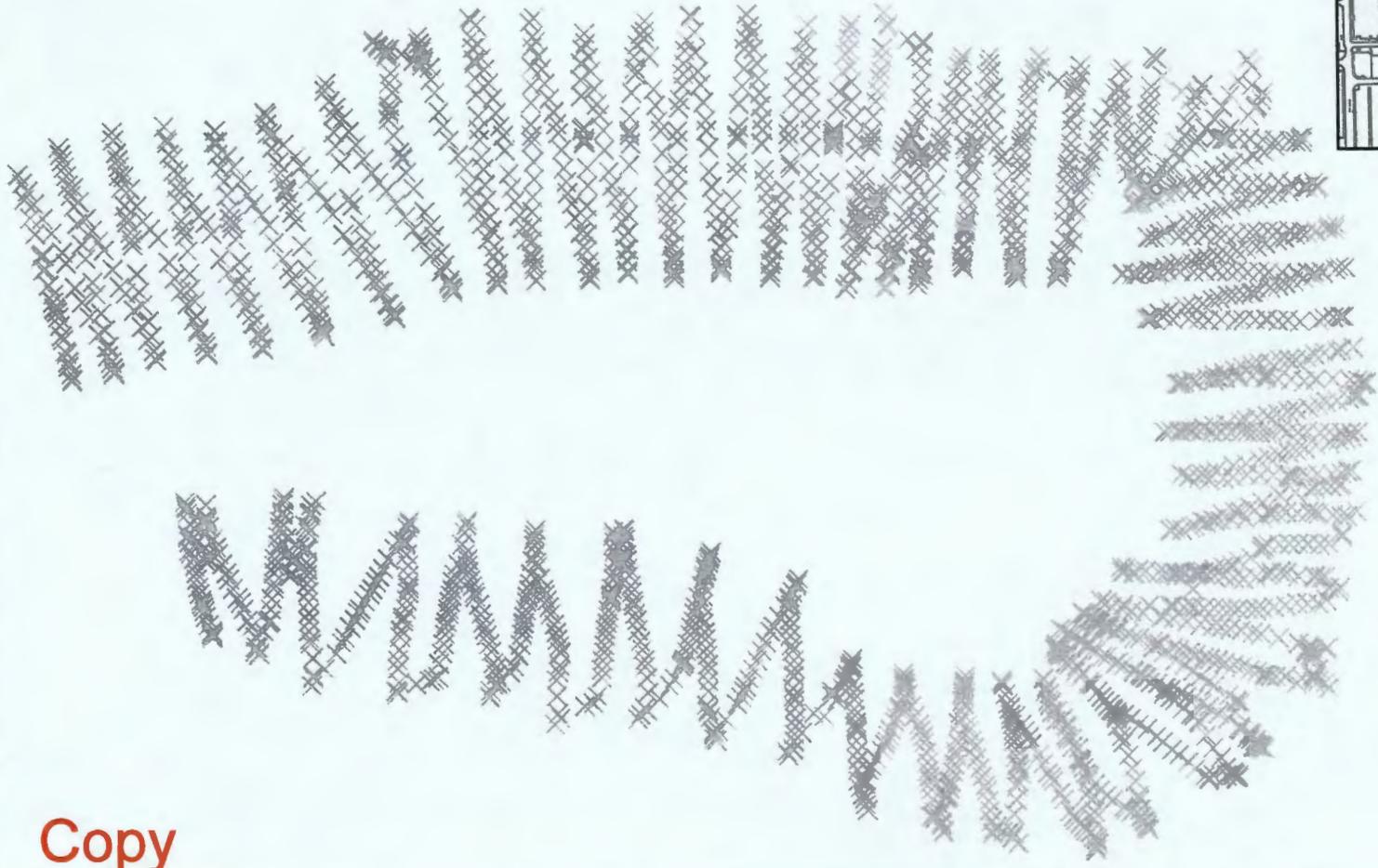
**Attachment 3: GPERS Survey.**



Bkg Location  
65 meters NNW



Site View



Copy

**Legend**

- NET CPM
- X <1.5x bkg
  - >1.5x bkg - 5000
  - 5000 - 10000
  - 10000 - 25000
  - 25000

**Summary Statistics**

Coverage File: D4,DD4\_355  
Number of Data Pnts: 2612  
Type of Survey: gamma  
Max GCPM: 2268  
Avg Bkg CPM: 1517  
Survey Date: 12/20/2012  
Area Surveyed: 1060 m<sup>2</sup>  
Project File: ESRFRM120155  
Pdf File: ESRFRM120155C

**300 D4  
308A Complex  
GPERS Radiological Survey  
Gamma Track Map**



Survey Map Prepared By Bruce Coomer, ESI

**Attachment 4: EPA Concurrence to Leave  
The Weld Test Assembly Pit.**

**Harrie, John P**

---

**From:** Guercia, Rudolph [Rudolph.Guercia@rt.doe.gov]  
**Sent:** Tuesday, July 05, 2011 7:06 AM  
**To:** DePeel, Nicole J; Harrie, John P  
**Cc:** Elkins, Dan A; Mullen, William E  
**Subject:** FW: 308A Assembly Pit Closure Report

FYI

RF Guercia  
Field Engineering, Richland Operations Office  
(509) 376-5494/(509) 373-0726 fax

-----Original Message-----

**From:** Larry Gadbois [mailto:Gadbois.Larry@epamail.epa.gov]  
**Sent:** Thursday, June 30, 2011 1:40 PM  
**To:** Guercia, Rudolph  
**Cc:** Strand, Christopher P  
**Subject:** 308A Assembly Pit Closure Report

This afternoon Chris dropped off a copy of the "308A Building Assembly Pit Closure Report - June 20, 2011" for EPA's review and consideration as sufficient documentation to leave this pit in place as part of the cleanup. EPA has reviewed the information in the document and agrees with the conclusion that this assembly pit is not contaminated and does not need to be removed. EPA supports filling the pit with clean dirt or controlled density fill so that no new contamination falls into the pit during the demolition and remediation of the 308A building. EPA recommends this document be included as part of the facility status change form for the 308A building.

If you have any questions, please let me know.  
--Larry--

## 308A Building Assembly Pit Closure Report – June 20, 2011

This report is being provided to present the results of sampling conducted at the 308A Building Assembly Pit with the objective of using these data to close the feature in-place.

The 308A Building Assembly Pit is located in the southwest corner of the 308A Fuels Development Laboratory Annex in room 158. The 308A Building houses the former Neutron Radiography Facility (NRF) which included the TRIGA Reactor and associated equipment. The 308A wing was built in 1975-1977 on the northeast corner of the 308 Building to support the Fast Flux Test Facility (FFTF) fuel bundle assembly program that processed welded rod fuels, welded test assemblies, and fuel assemblies. No uranium or plutonium inventory remains in the 308A Building.

The Assembly Pit is approximately 7-feet in diameter and 45-feet deep. The pit is constructed of concrete (2-feet thick) with a series of platforms spaced 7-feet apart that provided access to vertically placed, pre-irradiated fuel rods. A ¼-inch steel liner was constructed at the bottom with a sump located at the bottom center of the pit and a vertical air duct extended the entire depth of the pit. The interior surface of the pit is painted (See Figure-1).

Initial characterization included the collection of samples:

- of scabbled paint from the surface of the pit at 3 locations – metal wall and 2 from the concrete wall that were composited into one sample:
  - **J1FFX8** analyzed for RAD and ICP Metals;
- from the Exhaust duct inlet using wet wipe method:
  - **J1FH0Z** analyzed for ICP metals;
- of floor debris – collected as a bulk sample:
  - **J1FH00** analyzed for ICP Metals;
- of wire insulation at a junction box and floor tile/mastic from the bottom of the pit:
  - **J1FHP1** and **J1FHN8** analyzed for asbestos.

Laboratory results indicated metal concentrations above the *Table 2-1 Cleanup Levels (DOE/RL-2001-47, Rev. 3.)* as shown in the attached Table-1. Laboratory results for asbestos and Radionuclides were non-detectable or below background levels, respectively.

Based on the results of the initial round of sampling, the Assembly Pit was decontaminated using wet wipe methods and a HEPA vacuum and re-sampled on June 7, 2011. The exhaust duct was completely removed prior to decontamination and subsequent sampling.

Following decontamination, thirteen wipe samples were collected from 10-cm by 10-cm areas at each of the six levels and the bottom of the pit as shown in the attached Figure-2. The wipe samples were submitted for laboratory analyses of ICP Metals and the laboratory results are shown on attached Table-2.

The initial sampling effort was designed to evaluate the presence of asbestos, metals and Radionuclides in the Assembly Pit. From the laboratory results of scabbled paint samples, the lack of radiological contamination suggests that the paint was not applied as a fixative and no residual radiological contamination resides in-place within the concrete/paint in the pit.

The objective of the second round of sampling was to determine whether removable concentrations of metal exist on the surface of the walls in the pit and whether decontamination efforts were successful.

Laboratory results indicate that decontamination efforts were able to reduce removable contamination in that pit contributed by welding, solder and brazing activities that were performed in the pit. Remaining metal concentrations are attributed to levels contained in the paint itself.

A simple calculation estimating the mass of the metals in the structure (Figure-3) shows metal content apportioned to the 229,204 lb structure are:

- Arsenic = 6.49E-04 lbs
- Barium = 7.74E-03 lbs
- Cadmium = 1.54E-04 lbs
- Chromium = 2.78E-01 lbs
- Lead = 1.70E-02 lbs
- Selenium = 2.05E-04 lbs
- Silver = 2.05E-04 lbs, and
- Mercury = 2.06E-04 lbs.

As shown in Table 2 (attached), metal concentrations above *Table 2-1 Cleanup Levels* were found in eleven of the thirteen wipe samples. Laboratory results indicated that cadmium, chromium, nickel and zinc are present above unrestricted protective of groundwater and the Columbia River levels. Metal concentrations in all but one sample (J1JF49) were below the Residential Direct Exposure levels. Results from sample J1JF49 (bottom of pit) were below the Industrial Direct Exposure levels. However, the results are not collected from soil where a contaminant could be mobilized, and therefore not directly applicable to the soil regulations.

In order to address whether cadmium, chromium, cobalt, copper, lead, manganese, selenium, silver, zinc and mercury in the paint could pose a threat to groundwater or the Columbia River if situated in the vadose zone, the data was compared the published Kd values.

By applying the Kd values and the corresponding vadose zone thickness for each metal of concern, only selenium would require a vadose thickness greater than 9-feet as shown in Table-3, below. The remaining metals would only need 1-foot or less of vadose zone thickness to be protective of the groundwater and the Columbia River.

**Table-3**  
**Kd vs. Vadose Zone Thickness (in Feet)**

Metal	Kd Value	Vadose Zone Thickness
Cadmium	30	1
Chromium	200	0
Copper	22	1
Lead	30	1
Manganese	50	0
Nickel	65	0
Selenium	5	9
Silver	90	0
Zinc	30	1
Mercury	30	1

Depth to the water table was determined based on data from Well 399-4-11 which is located just south of the 308 complex. The historical high groundwater in the area of the 308A was 36.95-feet below ground surface (bgs) which occurred in September of 1999. The historic low groundwater was 63.7-feet bgs and the average depth to groundwater for the period between 1987 and 2011 is 60.36-feet bgs. During the 24-year period the well was monitored, groundwater reached the bottom of the assembly pit twice (9-27-00, DTW = 45.85 and 9-30-99, DTW = 36.17).

At a depth of - 45-feet, the 308A assembly Pit is normally 6 to 15-feet above the water table.

#### **Conclusions**

- From these data, it appears that the 308A Assembly Pit would not pose a threat to the groundwater or the Columbia River in its current configuration.
- Laboratory results indicate that the metal concentrations substantially meet the unrestricted direct exposure levels for the 300 Area.
- Given the low concentrations of metal apportioned in the structure completely encapsulated in concrete, the risk of mobilizing these metals is Low

WCH proposes to fill the pit with controlled density fill (CDF) and abandon the structure in-place.

**Table-1 308A Initial Assembly Pit Sample Results in ppm - March 2011**

Sample No.	Location	Antimony	Arsenic	Barium	Beryllium	Cadmium	Chromium	Cobalt	Copper	Lead	Manganese	Molybdenum	Nickel	Selenium	Silver	Vanadium	Zinc	Mercury
J1FH00	Deep pit floor	33.8	0.788	20.1	< 0.169	18.2	218	3.11	17.7	46.3	142	8.07	109	< 0.847	< 0.847	19.4	161	6.2
J1FH02	Deep pit duct	2.21	< 0.648	11.2	< 0.2	5.74	98.8	8.78	25.4	27.6	33.3	7.29	61.1	0.513 B	1.07	4.08	947	0.33
J1FFX7	Paint deep pit	3.69	8.81	105	0.195 B	2.06	3,770	30.9	41.7	231	597	2.30 B	18.1	2.78	2.78	34.1	9,470	2.8
<i>Unrestricted GW Soil</i>		<i>5</i>	<i>20</i>	<i>200</i>	<i>1.51</i>	<i>0.81</i>	<i>18.5</i>	<i>15.7</i>	<i>59.2</i>	<i>10.2</i>	<i>512</i>	<i>8</i>	<i>19.1</i>	<i>5</i>	<i>8</i>	<i>85.1</i>	<i>480</i>	<i>0.33</i>
<i>Columbia River Res Soil</i>		<i>5</i>	<i>20</i>	<i>400</i>	<i>1.51</i>	<i>0.81</i>	<i>18.5</i>	<i>NA</i>	<i>22</i>	<i>10.2</i>	<i>512</i>	<i>NA</i>	<i>27.4</i>	<i>1</i>	<i>0.73</i>	<i>NA</i>	<i>67.8</i>	<i>0.33</i>
<b>Unrestricted Direct Exp overall</b>		<b>32</b>	<b>20</b>	<b>1,600</b>	<b>10.4</b>	<b>13.9</b>	<b>120,000</b>	<b>24</b>	<b>2,960</b>	<b>353</b>	<b>3,760</b>	<b>400</b>	<b>1,600</b>	<b>400</b>	<b>400</b>	<b>560</b>	<b>24,000</b>	<b>24</b>

B = Result below MRL

Reference = DOE/RL-2001-47

NR = Not reported or requested

NA = Not applicable

< = not detected

Above one or more lookup value for unrestricted land use

Table-2 308A Assembly Pit Wipe Sample Results in ppm - June 2011

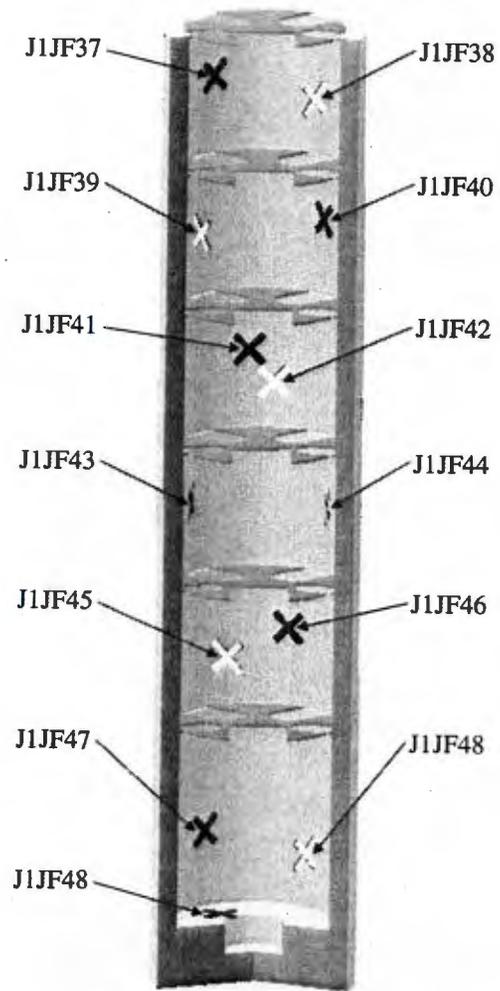
Sample No.	Antimony	Arsenic	Barium	Be	Cadmium	Chromium	Cobalt	Copper	Lead	Manganese	Molybdenum	Nickel	Selenium	Silver	Vanadium	Zinc	Mercury
J1JF37			1.58		5.14	42.8		4.32	4.01	10.8	1.64	21.8				254	0.026
J1JF38					10.8	18.7		3.13		4.61		23.6		2.63		62.6	0.035
J1JF39			1.11		0.6	51		3.91		9		26.7				74.8	0.06
J1JF40						10		1.53		2.38		5.53				39.1	0.057
J1JF41			1.15		1.44	27.8		5.42	2.41	5.9		15.7				78.1	0.036
J1JF42	2.06		1.01		1.44	34.2		27	8.37	6.04		17.3				60.3	0.016
J1FJ43	7.93				2.08	105		16.9	23.8	16.5	2.28	54.9				103	0.027
J1FJ44	23.8		1.63		0.98	12.3		23.2	116	3.6		7.03				73.2	0.012
J1JF45					0.541	13.3		2.69		3.19		7.13				57.6	0.043
J1JF46			1.56		1.29	80		5.09	6.49	13	2.14	40.1				76.6	0.048
J1JF47			1.73		2.97	106		6.9	4.12	31	2.49	54.9				140	0.063
J1JF48	3.02		2.26		2.3	142		6.74	14	21.5	5.26	79.6				89.2	0.078
J1JF49	106	4.6	81.5		153	1,740	32.4	248	341	633	84.9	1,170	4.3	3.09	260	1,890	5.86
Unrestricted GW Soil	5	20	200	1.51	0.81	18.5	15.7	59.2	10.2	512	8	19.1	5	8	85.1	480	0.33
Columbia River Res Soil	5	20	400	1.51	0.81	18.5	NA	22	10.2	512	NA	27.4	1	0.73	NA	67.8	0.33
Residential Direct Exposure	32	20	1,600	10.4	13.9	120,000	24	2,960	353	3,760	400	1,600	400	400	560	24,000	24
Industrial Direct Exposure	1,400	58	4,900	104	139	5,250,000	1,050	130,000	1,000	165,000	17,500	70,000	17,500	17,500	24,500	1,050,000	1,050

Black cell indicates results below method reporting limit

Yellow shading indicates result exceeding one or more Table 2-1 Cleanup levels



**Figure 2 - 308A Room 158 Assembly Pit Wipe Sample Locations**



**Figure-3 308A Assembly Pit Heavy Metal Calculations**

Figure-3 308A Assembly Pit Heavy Metal Calculations						
Assembly Pit Weight and Surface Area based on dimensions per H-3-15443						
Concrete Shell						
ID (ft)		8				
OD (ft)		10				
H (ft)		45				
Volume (ft <sup>3</sup> )		1272.35				
Base						
D (ft)		10				
H (ft)		3				
Sump D (ft)		3				
Sump H (ft)		1.5				
Volume (ft <sup>3</sup> )		225.02				
Total Volume (ft <sup>3</sup> )		1497.36				
Density (lb/ft <sup>3</sup> )		150				
Concrete Weight (lb)		224604.24				
Steel Shell - 14 gauge steel						
Thickness (in.)		0.0747				
D (ft)		10				
H (ft)		48				
Volume (ft <sup>3</sup> )		9.4				
Density (lb/ft <sup>3</sup> )		490				
Steel Weight (lb)		4599.67				
Total Weight (lb)		229203.91				
Total Surface Area (ft <sup>2</sup> )		1181.24				
Assumed paint density (g/mL)						
		4				
Assumed paint thickness (mil)						
		3				
Estimated Quantities of Heavy Metals						
	Paint Sample (mg/kg)	Estimated Weight in Paint (lb)	Wipe Sample Average (µg per 100 cm <sup>2</sup> )	Estimated Weight on Surface (lb)	Estimate Total Weight in Pit (lb)	Concentration Averaged Over Pit Structure (ppm)
Arsenic	8.81	6.49E-04	ND	N/A	6.49E-04	0.003
Barium	105	7.74E-03	1.50	1.19E-06	7.74E-03	0.034
Cadmium	2.06	1.52E-04	2.69	2.14E-06	1.54E-04	0.001
Chromium	3770	2.78E-01	53.8	4.25E-05	2.78E-01	1.213
Lead	231	1.70E-02	22.4	1.78E-06	1.70E-02	0.074
Selenium	2.78	2.05E-04	ND	N/A	2.05E-04	0.001
Silver	2.78	2.05E-04	ND	N/A	2.05E-04	0.001
Mercury	2.80	2.06E-04	0.042	3.33E-08	2.06E-04	0.001

**Attachment 5: EPA Concurrence to Leave  
A Portion of the Fuel Storage Basin.**

169180

**^WCH Document Control**

**From:** Strand, Christopher P  
**Sent:** Tuesday, January 08, 2013 4:46 AM  
**To:** ^WCH Document Control  
**Subject:** FW: Completion of 308A

Please chron and enter into project record as "EPA Approval to leave the 308A Fuel Storage Basin in Place".

Thanks,

Chris  
 554-2720

---

**From:** Gadbois.Larry@epamail.epa.gov [mailto:Gadbois.Larry@epamail.epa.gov]  
**Sent:** Monday, January 07, 2013 2:09 PM  
**To:** Guercia, Rudolph F  
**Cc:** Strand, Christopher P  
**Subject:** Re: Completion of 308A

Rudy:

Based on the information provided in the email message below that documents the structure is uncontaminated,

EPA supports leaving the remaining portion of the concrete basin.

--Larry--

"Strand, Christopher P" ---01/07/2013 11:13:40 AM---Larry, On DOE's behalf, I would like to propose leaving the remaining portion

---

From: "Strand, Christopher P" <cpstrand@wch-rcc.com>  
 To: Larry Gadbois/R10/USEPA/US@EPA, "Guercia, Rudolph F" <rudolph.guercia@rl.doe.gov>  
 Date: 01/07/2013 11:13 AM  
 Subject: Completion of 308A

Larry,

On DOE's behalf, I would like to propose leaving the remaining portion of the 308A Fuel Storage Basin in place (reference attached photograph). The 308-A fuel storage basin was used to stage unirradiated fuel assemblies for quality control radiography at the TRIGA reactor. Supporting this proposal are radiological survey records (attached) for pre and post demolition surveys. All surveys demonstrate this structure is uncontaminated. This proposal is consistent with Section 2.6 of *the Removal Action Work Plan for 300 Area Facilities*, DOE/RL-2004-77, Rev. 2.

In addition, the transport ramp and layback soils from around the TRIGA reactor have been stockpiled and sampled for reuse (composite results attached). Sample data supports re-use of these spoils, I have therefore, released this material for use as fill. A final composite tritium sample around the immediate reactor location has been taken. Backfill of this area will not occur until sample results are received and reviewed. Previous in-process tritium samples around the reactor were taken during excavation. All sample results were negative for tritium, therefore, I have a high degree of confidence the last sample will display no contamination.

1/8/2013

Please call if you have any questions.

Thanks,

Chris  
554-2720

<<308 Pictures 173.jpg>>

<<308A composite data.xls>>

<<300PS-08-2699 Rm 134\_154\_166 Storage Pit Tubes.pdf>> <<300PS-12-4026 308-A Excavation & Fuel Storage Basin.pdf>> <<300PS-12-3679 308-A Excavation & Fuel Storage Basin.pdf>>

[attachment "308 Pictures 173.jpg" deleted by Larry Gadbois/R10/USEPA/US] [attachment "308A composite data.xls" deleted by Larry Gadbois/R10/USEPA/US] [attachment "300PS-08-2699 Rm 134\_154\_166 Storage Pit Tubes.pdf" deleted by Larry Gadbois/R10/USEPA/US] [attachment "300PS-12-4026 308-A Excavation & Fuel Storage Basin.pdf" deleted by Larry Gadbois/R10/USEPA/US] [attachment "300PS-12-3679 308-A Excavation & Fuel Storage Basin.pdf" deleted by Larry Gadbois/R10/USEPA/US]