



Department of Energy
 Savannah River Operations Office
 P.O. Box A
 Aiken, South Carolina 29802

SEP 21 2021

Ms. Susan B. Fulmer, P. G., Manager
 Federal Remediation Section
 Division of Site Assessment, Remediation and Revitalization
 Bureau of Land and Waste Management
 South Carolina Department of Health and Environmental Control
 2600 Bull Street
 Columbia, South Carolina 29201

Mr. Jon Richards
 Savannah River Remediation Project Manager
 Superfund Division
 U. S. Environmental Protection Agency, Region 4
 61 Forsyth Street, SW
 Atlanta, Georgia 30303

Dear Ms. Fulmer and Mr. Richards:

SUBJECT: Savannah River Site's Responses to the Regulatory Comments on the Facility Decommissioning Evaluation D-Area Domestic Water Production Facilities (Building 483-7D and Ancillary Facilities) (G-FDE-D-00052, Revision 0, June 11, 2020) Simple Model

The U. S. Department of Energy is submitting the subject comment responses for your review. The Savannah River Site (SRS) submitted the D-Area Domestic Water Production Facilities (Building 483-7D and Ancillary Facilities) (G-FDE-D-00052, Revision 0, June 11, 2020) on June 25, 2020 for South Carolina Department of Health and Environmental Control (SCDHEC) and U. S. Environmental Protection Agency's (EPA's) review. The SRS received the SCDHEC's comments on July 24, 2020 and EPA's conditional approval on August 31, 2020. Please review the enclosures and provide your response within thirty (30) days of receipt. The effort and time that the SCDHEC and EPA have given on the subject facility are greatly appreciated.

Questions from you or your staff may be directed to me at (803) 952-8365, or the DOE Federal Project Director, Ms. Karen Adams, at (803) 952-7871.

Sincerely,

Brian T. Hennessey

Digitally signed by Brian T.
 Hennessey
 Date: 2021.09.20 14:37:36 -04'00'

Brian T. Hennessey
 SRS Remedial Project Manager
 Infrastructure and Area Completion Division

IACD-21-167

Ms. Susan Fulmer
Mr. Jon Richards

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SEP 21 2021

Enclosures:

1. Savannah River Site Responses to Environmental Protection Agency Comments on the Facility Decommissioning Evaluation D-Area Domestic Water Production Facilities (Building 483-7D and Ancillary Facilities) (G-FDE-D-00052, Revision 0, June 11, 2020)
2. Savannah River Site Responses to South Carolina Department of Health and Environmental Control Comments on the Facility Decommissioning Evaluation D-Area Domestic Water Production Facilities (Building 483-7D and Ancillary Facilities) (G-FDE-D-00052, Revision 0, June 11, 2020)

cc w/o encl:

J. Blalock, SCDHEC-Columbia
G. K. Taylor, SCDHEC-Columbia
S. French, SCDHEC-Columbia
M. Reece, SCDHEC-Columbia
T. R. Fuss, SCDHEC-Aiken Environmental Affairs Office
B. Cameron, SCDHEC-Aiken Environmental Affairs Office
G. O'Quinn, SCDHEC-Aiken Environmental Affairs Office
H. L. Herlong, SCDHEC-Aiken Environmental Affairs Office
R. H. Pope, EPA-Atlanta

cc w/encl:

D. Lloyd, EPA-Atlanta
K. L. Beatty, SCDHEC-Aiken Environmental Affairs Office

Savannah River Site Responses to
ENVIRONMENTAL PROTECTION AGENCY
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FACILITY DECOMMISSIONING EVALUATION FOR
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EPA GENERAL COMMENTS:

- 1) Please notify the D Area core team member (Diedre Lloyd) via email or phone if, during decommissioning of a Simple Model facility, some condition is identified that may contradict the Simple Model assumptions.

Response: Agree.

In accordance with Section 4.0 of the approved *Core Team Protocol for Review and Concurrence on Facility Decommissioning Evaluations and Decommissioning Project Final Reports* (SRNS-RP-2021-00120, Revision 0 (corrected) February 2021), Savannah River Site (SRS) will notify the Environmental Protection Agency and South Carolina Department of Health and Environmental Control Core Team members if during decommissioning conditions are identified that may contradict the Simple Model assumptions.

No change to the 483-7D FDE is proposed.

Responsible Party: William Griffin, (803) 952-6430, william.griffin@srs.gov

- 2) Please provide one figure that depicts the relationship between the 8 buildings and their ancillary structures. This figure should also include all previously approved FDEs buildings and ancillary structures.

Response: Agree.

Attachment 1 shows the aerial view of D-Area and the status of the facility decommissioning evaluations (FDEs). To show all the ancillary structures would not be possible in a single aerial photo; there are too many ancillary structures and the figure would be impossible to read or understand. Attachment 1 includes all previously approved FDEs and two FDEs pending regulatory approval (including this FDE). Within the scope of the previously approved FDEs (one FDE included two buildings, 454-D and 454-1D). The Powerhouse and the 115 KV power company substation are shown for information only. FDEs assigned to the SRS Community Reuse Organization (CRO) are shown in yellow and FDEs assigned to a subcontractor are shown in green. Two of the buildings shown in green are trailers (484-1D and 484-2D); they did not require FDEs.

No change to the 483-7D FDE is proposed.

Responsible Party: William Griffin, (803) 952-6430, william.griffin@srs.gov

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- 3) Please inform EPA/SCDHEC upon property disposition to the SRS Community Reuse Organization (SRS CRO) from all DAOU FDEs via letter.
- a. Please include a brief, estimated timeline and items (property disposition) in the letter.

Response: Clarification.

The SRS CRO is responsible for Buildings 454-D, 454-1D, 484-7D, 484-12D, 484-13D, 484-15D, and 683-D. The SRS CRO has completed decommissioning of 484-7D and 484-15D and the decommissioning project final reports (DPFRs) were submitted for regulatory review on May 24, 2021. The SRS CRO has completed decommissioning of 484-12D and development of the DPFR is in progress. The CRO decommissions and removes items for reuse or resale in accordance with their agreement with the DOE. These items will be described in the facility-specific DPFR.

No change to the 483-7D FDE is proposed.

Responsible Party: William Griffin, (803) 952-6430, william.griffin@srs.gov

- 4) Please provide further detail that explains how the electrical services have been isolated/properly abandoned prior to facility decommissioning activities. Please include information for electrical services (examples: Electrical air switches, Electrical transformers, 2 Domestic Water Well electrical control panels electrical control and power panel for clear well, 2 dry transformers.

Response: Agree.

Until August 31, 2020, Building 483-7D was energized only to maintain the aviation light beacon on top of the 905-5D elevated water tower (storage tank). Internal communication received on August 17, 2020 provided approval to remove the aviation light beacon on the 905-5D water tower. After receipt of this approval, Field Change Request (FCR) E-FCR-D-00006 and Work Order 01820293 were generated to air gap the 13.8kV power to 483-7D. Prior to performing the work, SRS Employee Safety Manual 8Q, Procedure 32, “Hazardous Energy Control (Lockout/Tagout)” was employed to ensure the Out of Commission work was performed safely. The work to air gap and remove power to 483-7D was performed on August 31, 2020 in accordance with the above noted documents and SRS Safety Manual 8Q, Procedure 121, “Out of Commission (OOC) Process”.

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A PDF of the FCR is included with these responses as reference for the work performed, including isolation of both the Air Switches and the Transformers. Prior to final demolition, the facility and all ancillary equipment/facilities, including the two domestic water well electrical control panels, the electrical control panels in the building, the two dry transformers and the power panel for the clear well shall have been rendered and verified to be “Cold & Dark” as is a typical practice based on our D&D procedures and protocols.

No change to the 483-7D FDE is proposed.

Responsible Party: William Griffin, (803) 952-6430, william.griffin@srs.gov

- 5) Please include the asbestos survey in this FDE which identified presumed asbestos containing materials (PACM).

Response: Agree.

A PDF of Asbestos Inspection Report of Building 483-7D, Q-APG-D-00022, is provided with these comment responses.

No change to the 483-7D FDE is proposed.

Responsible Party: William Griffin, (803) 952-6430, william.griffin@srs.gov

EPA SPECIFIC COMMENTS:

- 6) **Part 1. Project Scope:** Please include well construction details for the Primary Domestic Water Well (905-3D, TD of 740 feet) and the Back-up Domestic Water Well (905-136D, TD of 765 feet).

Response: Agree.

Well construction details are provided on drawing W2013033 for Primary Domestic Well 905-3D and drawing W2013034 for Backup Domestic Well 905-136D. Both drawings are included with these responses.

No change to the 483-7D FDE is proposed.

Responsible Party: William Griffin, (803) 952-6430, william.griffin@srs.gov

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- a. The report outlines that each of these 2 wells will be kept in service. Please include information as to the future utilization of these wells.

Response: Clarification.

Domestic Water Wells 905-3D and 905-136D will remain in service to provide potable water to support the injection activities for the D-Area Groundwater Treatability Study (see Footnote 1 in the Scope section of the FDE). These wells are referred to as Production Well (PW) 3D and PW 136D in the *Treatability Study Work Plan for Groundwater Injection and Discharge Canal Treatment at the D-Area Groundwater (OU)* (SRNS-TR-2018-00128, Revision 1, January 2019).

No change to the 483-7D FDE is proposed.

Responsible Party: William Griffin, (803) 952-6430, william.griffin@srs.gov

- b. The report doesn't mention the disposition of the 2-yard hydrants. Please include information as to the future utilization of these 2-yard hydrants.

Response: Clarification.

The yard hydrants were taken out of service in 2013 when 483-7D domestic water service was discontinued, and water was diverted for use in the fire protection system. The two-yard hydrants are considered above grade structures and have no future use. As with all above-grade structures, they will be decommissioned to the building slab or grade as appropriate (see Scope, 1st paragraph after open bullets).

No change to the 483-7D FDE is proposed.

Responsible Party: William Griffin, (803) 952-6430, william.griffin@srs.gov

- c. The report doesn't mention the disposition of the 125,000-gallon elevated storage tank (905-5D). Please include information as to the future utilization of this structure and the associated tank drain.

Response: Clarification.

The 125,000-gallon elevated storage tank is considered an above grade structure and has no future use. As with all above-grade structures, it will be decommissioned to the building slab or grade as appropriate (see Scope, 1st paragraph after open bullets). The tank drain will be abandoned in place.

No change to the 483-7D FDE is proposed.

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Responsible Party: William Griffin, (803) 952-6430, william.griffin@srs.gov

- 7) Part 1. Project Scope:** The proposed decommissioning end-state for below grade structures of the D Area Domestic Production Facilities is to fill to grade with gravel/crusher run/grout or controlled low strength material.
- a. Please outline which method will be utilized for each below grade structure and briefly outline the determining factors that were utilized for final decision.
 - i. The Clear Well facility – 6,200 gallons capacity (20' x 20' x 15'8")
 - ii. Water meter pit and associated pre-cast 3' square concrete box below grade that are 4 feet deep.
 - iii. Polyphosphate injector structure and associated pre-cast 3' square concrete box below grade that are 4 feet deep.
 - iv. Chlorine injector structure and associated pre-cast 3' square concrete box below grade that are 4 feet deep.
 - v. Check valve and water meter structures and associated pre-cast 3' square concrete box below grade that are 4 feet deep.

Response: Clarification.

All below grade structures will be filled with controlled low strength material (CLSM) or a flowable, self-leveling grout mix. Gravel or crusher run will not be used because of their porous nature. CLSM was selected as it's the best choice to prevent future accumulation of water in the below grade structures.

No change to the 483-7D FDE is proposed.

Responsible Party: William Griffin, (803) 952-6430, william.griffin@srs.gov

- 8) Facility Description:** This section needs to include the information in Part 2. Evaluation, Clean Facilities, Question 1 in the Justification Column.
- a. Specifically, the information in the justification column needs to be included in this part of the report for clarification and understanding of the chemicals/processes utilized during Building 483-7D historical usage.

Response: Clarification.

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Most of the information in Part 2. Evaluation, Question 1, Justification column is discussed in the Process History and/or Summary of Existing Characterization sections in Part 1 of the FDE. For future FDEs, SRS will review Part 2 to ensure that the Justification information is also discussed in the applicable section of Part 1. Project Scope.

No change to the 483-7D FDE is proposed.

Responsible Party: William Griffin, (803) 952-6430, william.griffin@srs.gov

9) Building 483-7D Sump:

- a. Please provide pictures of the below grade sump area for Building 483-7D.
- b. Has this sump been inspected/cleaned?
- c. Does this sump contain gravel/sand, etc. at the bottom?
- d. Are there conduits leading from this sump to the discharge location (483-6D) Surge Basin?
 - i. If so, please include language in the FDE that outlines the final disposition of these discharge outlets/trenches.

Response to 9) a.: Agree.

Figure 1 is a photo of the Building 483-7D Sump with the grate removed.

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Figure 1: Photo of Bottom of Sump in 483-7D

Response to 9) b. and c.: Clarification.

The water and sediment in the sump were tested and found to be nonhazardous with pH of 9.42 and 9.77, respectively. The water was pumped out and the sediment was removed. Further inspection of the sump revealed no cracks or oil stains.

Response to 9) d. and i.: Clarification.

Two pumps located at the south end of Building 483-7D discharged the sump contents to the 483-6D Surge Basin at a rate of 20 gallons per minute. An aerial view (Figure 2) of the 400-D area is provided to show the location of the 483-6D Surge Basin relative to Building 483-7D. No attempt will be made to remove underground piping/conduit; all underground piping/conduit will be cut off at grade and plugged/capped. Interior trenches and sumps will be filled to slab level with CLSM or a flowable self-leveling grout mix. Exterior discharge outlets/trenches shall be abandoned in place and will remain as is.

No change to the FDE is proposed.

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Responsible Party: William B. Griffin (803-952-6430), William.Griffin@srs.gov



Figure 2: Location of the 483-6D Surge Basin Relative to Building 483-7D

Figure 2, Building 483-7D Layout:

b. Please explain the designation WC used in this Figure.

Response to 10) a.: Clarification.

SRS has reviewed Figure 2, as well as other figures within the FDE, and the “WC” designation does not appear. Figure 2 does contain the designation “DWV”, which is defined as “Drainage/Waste/Vent” on the figure.

No change to Figure 2 is proposed.

10) Figure 2, Building 483-7D Layout:

c. There are 8 floor drains, 3 open hub drains and several noted drainage/waste/vents on this Figure, do all drains/trenches lead to the sump?

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- i. If so, please either redraw the figure to demonstrate this or include language in the FDE that explains the drainage destination for all depicted/delineated drainage/waste/vents.

Response to 10) b. and i. Agree. All drains lead to the sump.

SRS has reviewed Figure 2 and determined that a better representation of the under-slab piping and drains all connected to the sump is shown in drawing W2013072, Chemical Feed Systems & Building, Plumbing Plan, which is included with these responses.

- d. Please include information within the FDE or modify Figure to depict if the Sodium Hypochlorite, Polyphosphate, Soda Ash and Potassium Permanganate Tanks/Pumps have any associated above or below grade plumbing.
 - i. Please include any associated piping's final disposition for either above or below grade plumbing that may be present.

Response to 10) c. and i: Clarification.

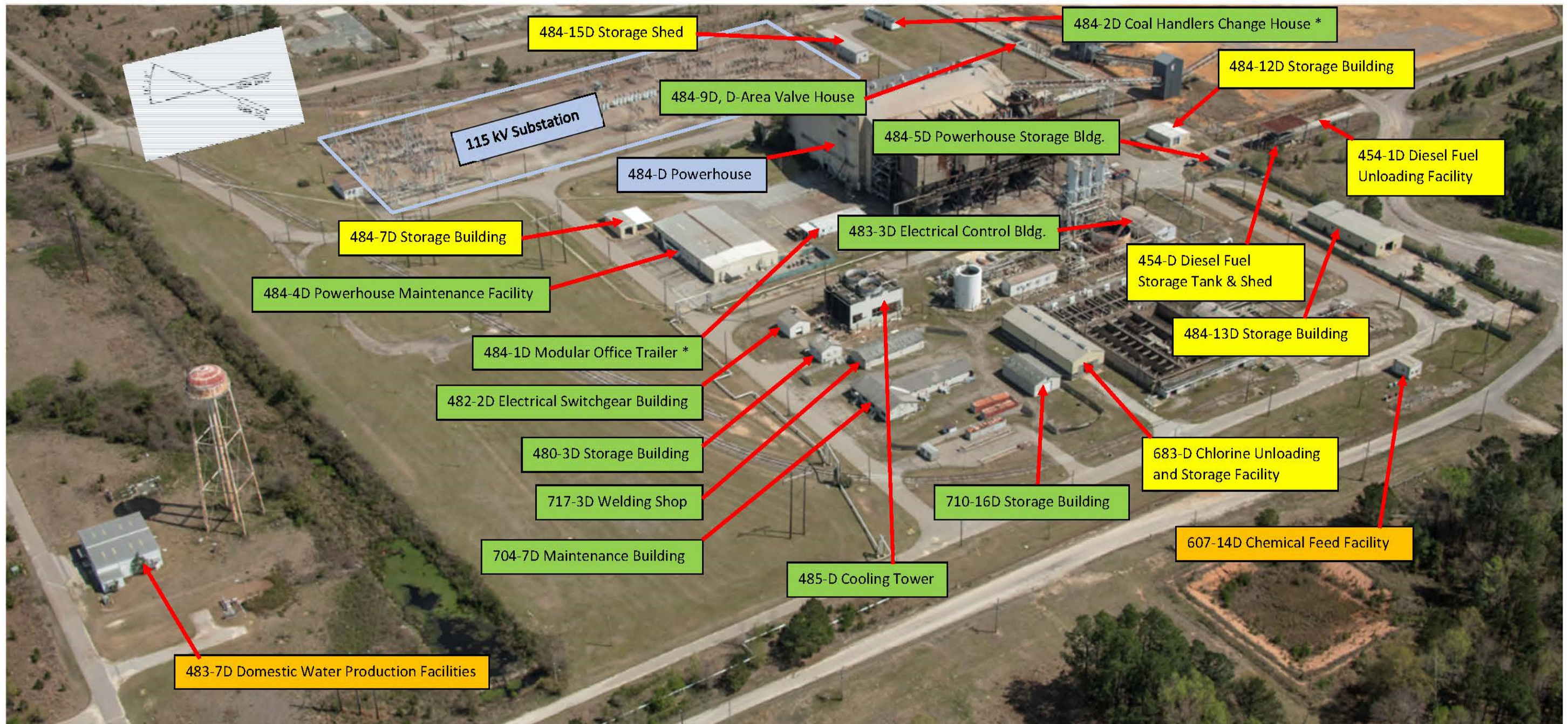
SRS has reviewed the request for details on the above listed items concerning above and below grade piping/ plumbing. The details requested are best shown on the as-built drawings listed below. PDFs of the drawings are included with these responses

1. W2013063, dated Dec.'91: "Chemical Feed Systems & Building, Floor Plan and Elevation"
2. W2013068, dated Dec. '91: "Chemical Feed Systems & Building, Chemical Feed Piping Plan Sections & Details"
3. W2013069, dated Dec. '91: "Chemical Feed Systems & Building, Piping Sections"
4. W2013070, dated Dec. '91: "Chemical Feed Systems & Building, Chemical Feed Piping Plan and Sections"
5. W2013072, dated Dec. '91: "Chemical Feed Systems & Building, Plumbing Plan"

Disposition of the above and below grade portions of the D-Area Domestic Water Facilities are discussed in Part 1. Project Scope of the FDE (see Scope, 1st and 2nd paragraphs after open bullets).

No change to the FDE is proposed.

Responsible Party: William B. Griffin (803-952-6430), William.Griffin@srs.gov



WBG 06-21-2021

Aerial of D-Area Showing FDE Status

LEGEND	
	CRO Buildings
	Subcontractor Buildings
	Pending Regulatory Approval of FDE
	Information Only
*	Buildings w/ * are portable (trailers) and require no FDE

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Field Change Request (FCR)

FCR No. E-FCR-D-00006	Rev. 0	Functional Classification GS
Title Remove Power to 483-7D and 905-136D		
<p>Field Change Request (FCR)</p>		
<p style="text-align: right;">Classification Reviewer: _____ N/A</p> <p style="text-align: right;">Date: _____ 08/25/2020</p>		

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Field Change Request (FCR)

CHANGE SECTION	FCR No. E-FCR-D-00006		Rev. 0	Functional Classification GS	
	Title Remove Power to 483-7D and 905-136D				
	Area D	Building 503000	System ELNA	Project No. N/A	
	Reason For Change ACP needs 13.8 kV power air gapped per 8Q 121 to ensure all cable sources into 483-1D are known to be in a safe state.				
	Existing Condition Power remains on at 483-7D when only used for water tank aviation light. Light is not required per Site or FAA due to lower tank height.				
	Documents (No. ; Rev.) Requiring Change E-E2-B-0150;34,E-E2-B-0156;10				
	Description Of Change Air gap and label OOC the 13.8 kV cables feeding padmount switches and transformers supplying 483-7D and 905-136D. This will eliminate remaining ACP concerns for 483-7D control cables to 483-1D.				
	Incorporation Required? <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO		Physical Work Required <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO		MT No. N/A
	Originator RAY, JOEL S.	Date 08/19/2020	Originator's Manager N/A	Date 08/19/2020	
	Responsible Engineer RAY, JOEL S.	Date 08/19/2020	Responsible Engineer Manager YARID, DON J.	Date 08/25/2020	
USQ Screening Required? <input type="checkbox"/> YES <input checked="" type="checkbox"/> NO		TRP number N/A	Design Authority Approval RAY, JOEL S.		
Verifier/Checker MACHADO, ALBERTO J.		Date 08/20/2020	Verification Methods Document Review		
Discipline Code E-ELECTRICAL					

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1. Cut/remove cables from load side of fuse holders at each location noted in table below to grade level conduit cuts and caps. See red isolation points in attached pictures. Per 8Q-121, label both poles with bakelite tags noting Out of Commission (OOC) along with date and WO#. Switches be to administrativ locked open and fuses removed.
2. For information purposes, install at 453-1D and -2D bakelite tags noting Out of Commission (OOC) with date and WO# for the incoming 13.8 kV cables - see attachment 3.

OOC Isolation Matrix WO #1820293 D-Area 13.8 kV System

Isolation Pt #	Service Desc.	From	To	Attachment #
1	13.8 kV Cable	B2309 Fuse load side	Conduit at grade	1
2	13.8 kV Cable/Conduit	B2309 Fuse load side	Conduit at grade	1
3	13.8 kV Cable	B2306 Fuse load side	Conduit at grade	2
4	13.8 kV Cable/Conduit	B2306 Fuse load side	Conduit at grade	2

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Attachment 1



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Attachment 2



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Attachment 3

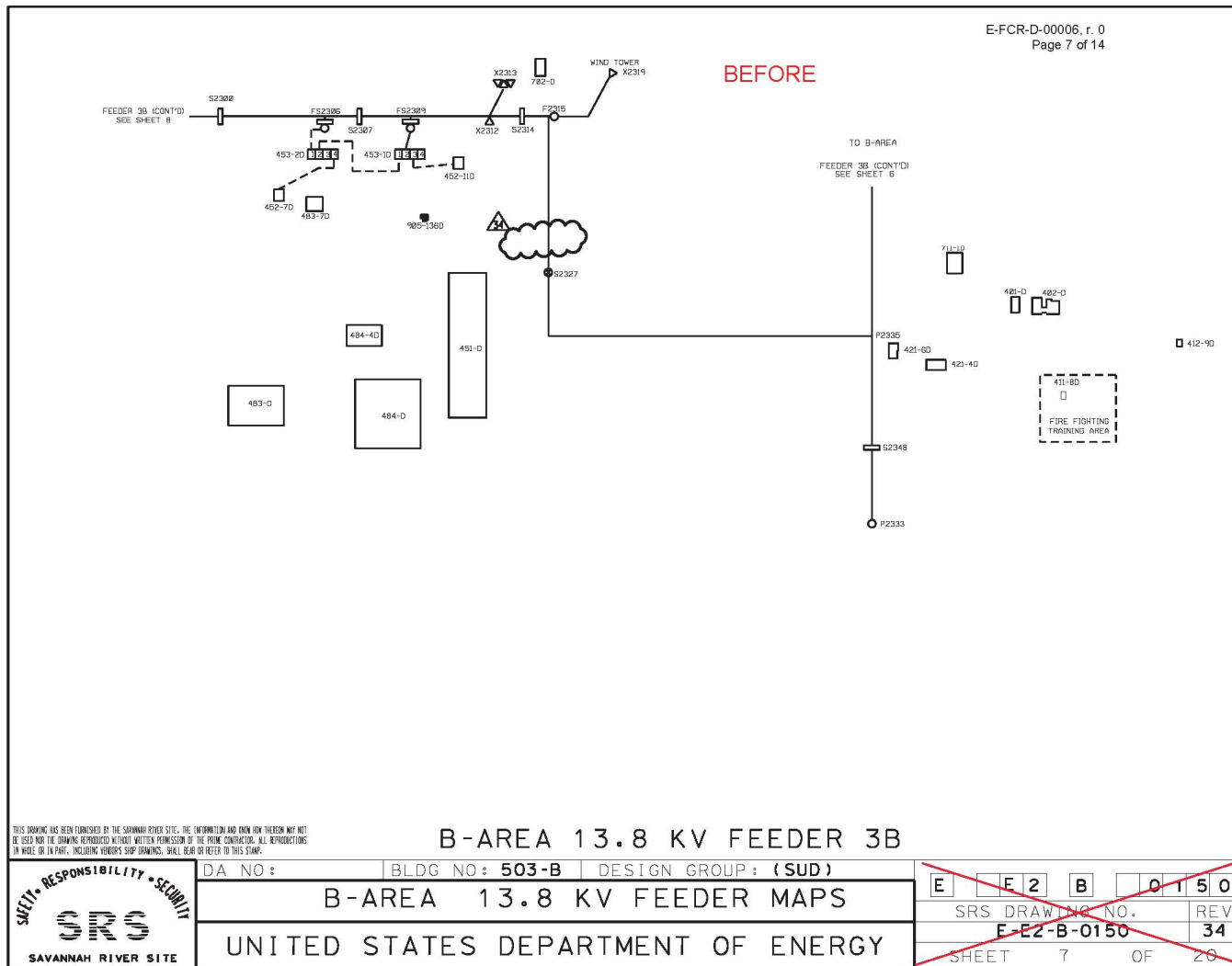


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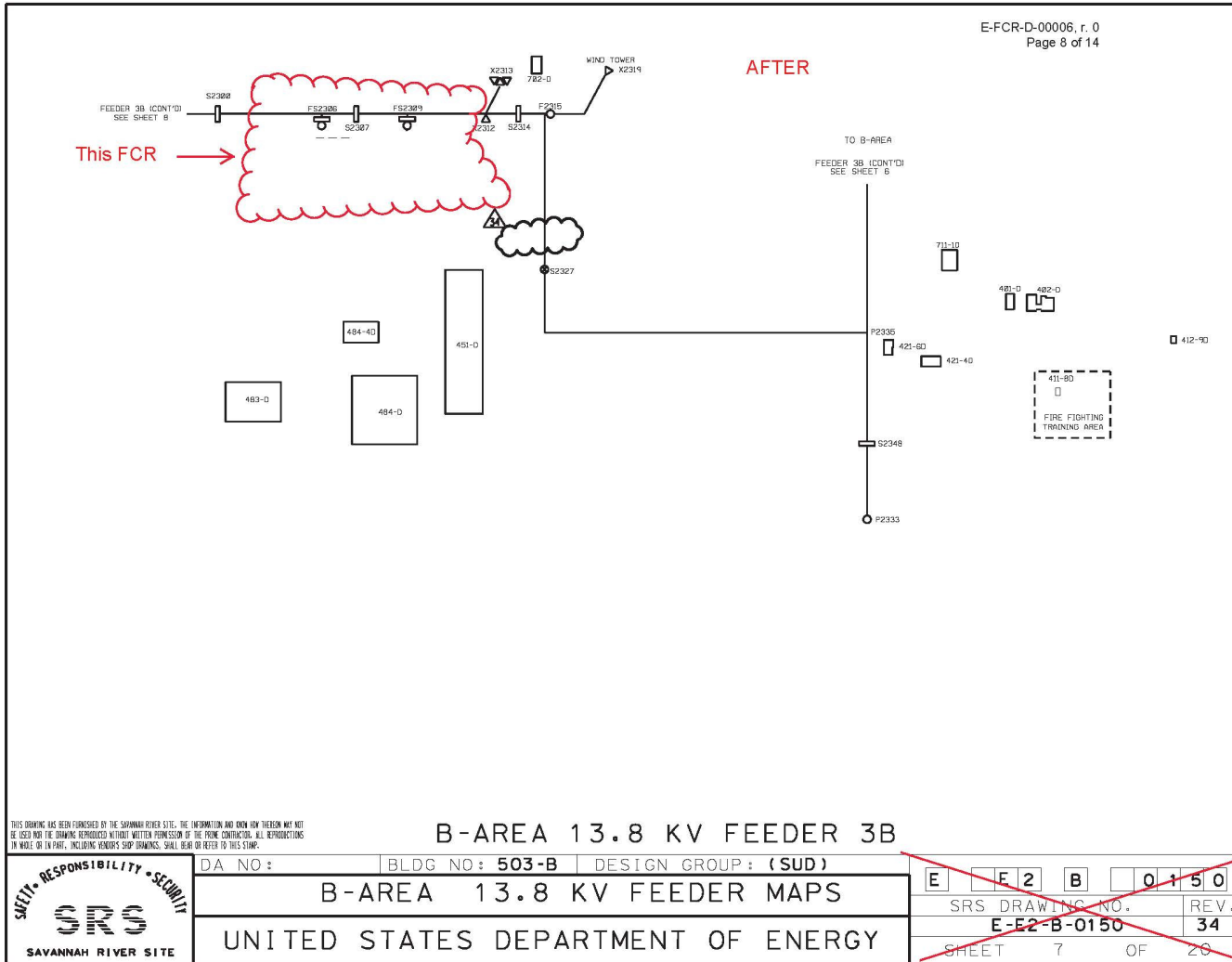
Comments on the

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B- AREA FUSE AND TRANSFORMER LIST									
METER	POLE NUMBER / XFMR NUMBER / SVGR NUMBER	FUSE TYPE / SIZE	XFMR TAP SETTING / KVA SIZE / CONNECTION / SEC. VOLTAGE	FEEDER	SINGLE LINE DRAWING NUMBER	COORDINATION DRAWING NUMBER	DRAWING NUMBER	BUILDING(S) SERVED	BEFORE
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	452-007D	SEE 453-002D-4	13800 300 DY 480Y/277	B3B	W2013044 W2013078			483-7D, 905-5D 905-3D	
	452-011D	SEE 453-001D-3	13800 45 DY 480Y/277	B3B	W2013036			WELL 905-136D	
	453-001D-1	NO FUSE	SEE 453-002D-2	B3B	W2013036				
	453-001D-2	NO FUSE	SEE B2309	B3B	W2013036				
	453-001D-3	(3) SMU20 3K STANDARD SPEED	SEE 452-011D	B3B	W2013036				
	453-002D-1	NO FUSE	SEE B2306	B3B	W2013036				
	453-002D-2	NO FUSE	SEE 453-001D-1	B3B	W2013036				
	453-002D-4	(3) SMU20 20E STANDARD SPEED	SEE 452-007D	B3B	W2013036				
	652-011G	SEE B0622	13455 112.5 DY 480Y/277	B3B	E-E2-G-0618			L LAKE DAM 686-G	
WHDM	652-026G	(3) GOULD CL14-50E SEE B0437	750 DD 480	B3A	W746010	ECCG0531		WELL 904-112G	
WHDM	652-028B	(3) GOULD CL14-100E SEE B0210	13455 1500 DD 480	B2	W746034	W2022965		703-B, 703-1B, 703-5B 703-6B/18B/19B/20B/21B 704-4B, 704-16B	
WHDM	652-029B	SEE B0065	13455 2000 DD 480	B2	EE280089	EECB0146		730-B	
	652-051G	SEE B0368	13455 300 DY 480Y/277	B3A		VPFAA85257K, SHT 136		607-67G LIFT STATION	

THIS DRAWING HAS BEEN FURNISHED BY THE SAVANNAH RIVER SITE. THE INFORMATION AND KNOW HOW THEREON MAY NOT BE USED NOR THE DRAWING REPRODUCED WITHOUT WRITTEN PERMISSION OF THE PRIME CONTRACTOR. ALL REPRODUCTIONS IN WHOLE OR IN PART, INCLUDING VENDORS SHO									
	DA NO:	BLDG NO: 503-B	DESIGN GROUP: (SUD)	R&PD DRAWING NUMBER:					
	751-B 13.8 KV FEEDER MAPS				E	E 2	B	0150	
	UNITED STATES DEPARTMENT OF ENERGY				SRS DRAWING NO.			REV.	
					E-E2-B-0150			34	
				SHEET			9	OF	29

**Savannah River Site Responses to
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G-FDE-D-00052, Revision 0, June 11, 2020**


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B- AREA FUSE AND TRANSFORMER LIST									
E-FCR-D-00006, r. 0 Page 10 of 14									
MEYER	POLE NUMBER / XFMR NUMBER / SVGR NUMBER	FUSE TYPE / SIZE	XFMR TAP SETTING / KVA SIZE / CONNECTION / SEC. VOLTAGE	FEEDER	SINGLE LINE DRAWING NUMBER	COORDINATION DRAWING NUMBER	BUILDING(S) SERVED		
	652-011G	SEE B062R	13455 112.5 DY 480Y/277	B3A	E-FCR-D-00006		L LAKE 67M 686 G		
WHDM	652-026G	(3) GOULD SEE B0437	CL14-50E	B3A	W746010	ECCG0531	WELL 904-112G		
WHDM	652-028B	(3) GOULD SEE B0210	CL14-100E	B2	W746034	W2022965	703-B, 703-1B, 703-5B 703-6B/18B/19B/20B/21B 704-4B, 704-16B		
WHDM	652-029B	SEE B0065		B2	EE280089	EECB0146	730-B		
	652-051G	SEE B036B	13455 300 DY 480Y/277	B3A		VPFAA85257K, SHT 136	607-67G LIFT STATION		

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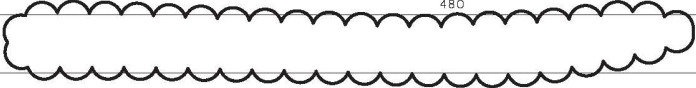

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	DA NO:	BLDG NO: 503-B	DESIGN GROUP: (SUD)	E-FCR-DRAWING NUMBER:
	751-B 13.8 KV FEEDER MAPS			E 2 B 0150
	UNITED STATES DEPARTMENT OF ENERGY			SRS DRAWING NO. REV.
				E-F2-B-0150 34
				SHEET 9 OF 20

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B- AREA FUSE AND TRANSFORMER LIST														
METER	POLE NUMBER / XFMR NUMBER / SWGR NUMBER	FUSE TYPE /SIZE	XFMR TAP SETTING/ KVA SIZE / CONNECTION / SEC. VOLTAGE	FEEDER	SINGLE LINE DRAWING NUMBER	COORDINATION DRAWING NUMBER	BUILDING(S) SERVED							
	B2155	(3) SM4 7E STD SPEED	SEE 652-045T	B3B			702-T							
	B2172	REPLACED 8-2008 (3) SMU20 40E STD SPEED	SEE 652-46T	B3B										
	H2306	(3) SMU20 40E STD SPEED	SEE 453-002D-1	B3B	W2013036									
	B2309	(3) SMU20 40E STD SPEED	SEE 453-001D-2	B3B	W2013036									
	B2312	SMU20 5E STANDARD SPEED	13800 50 SINGLE PHASE 120/240	B3B			LIGHTS							
	B2313	(3) SMU20 5E STD SPEED	13800 75 DY 208Y/120	B3B			702-D							
	B2315	(2) SMU20 20E STD SPEED	IN-LINE FUSE	B3B										
	B2319	(2) SMU20 3K	13800 10 1 PHASE 480	B3B	S5-6-1445	S5-6-1445	WIND TOWER							
														
<p>THIS DRAWING HAS BEEN FURNISHED BY THE SAVANNAH RIVER SITE. THE INFORMATION AND KNOW HOW THEREON MAY NOT BE USED NOR THE DRAWING REPRODUCED WITHOUT WRITTEN PERMISSION OF THE PRIME CONTRACTOR. ALL REPRODUCTIONS IN WHOLE OR IN PART, INCLUDING VENDORS SHO</p>														
	DA NO:		BLDG NO: 503-B	DESIGN GROUP: (SUD)		E&PD DRAWING NUMBER:								
	751-B 13.8 KV FEEDER MAPS				<table border="1"> <tr> <td>E</td> <td>E 2</td> <td>B</td> <td>0</td> <td>1</td> <td>50</td> </tr> </table>		E	E 2	B	0	1	50	SRS DRAWING NO.	
	E	E 2	B	0	1	50								
UNITED STATES DEPARTMENT OF ENERGY				<table border="1"> <tr> <td colspan="2">E-E2 B-0150</td> <td>34</td> </tr> </table>		E-E2 B-0150		34	REV.					
E-E2 B-0150		34												
				SHEET 19 OF 20										

**Savannah River Site Responses to
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FACILITY DECOMMISSIONING EVALUATION FOR BUILDING 483-7D, D-AREA DOMESTIC WATER PRODUCTION FACILITIES
G-FDE-D-00052, Revision 0, June 11, 2020**

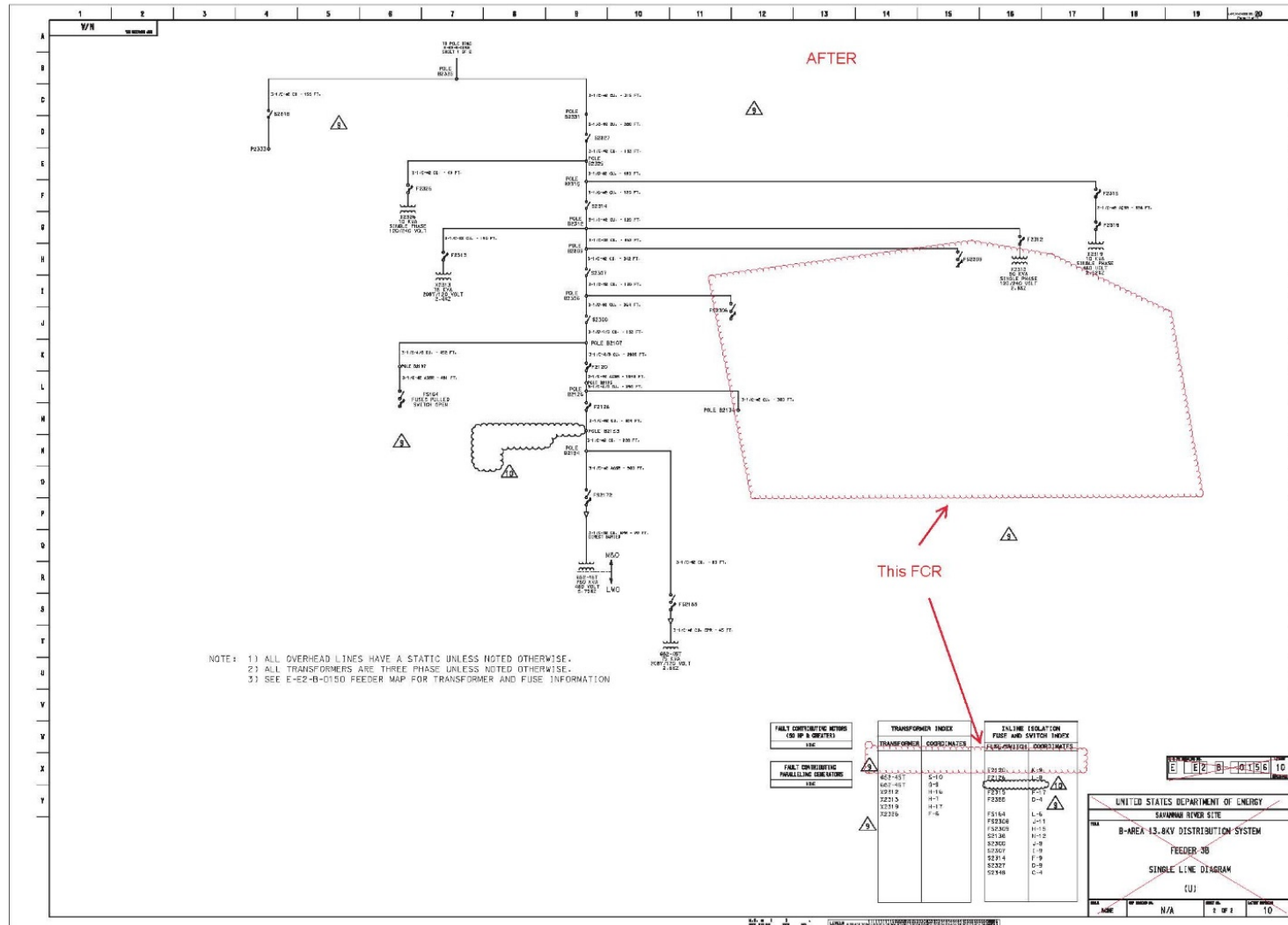
Dated: June 11, 2020 / Comments Received on August 31, 2020

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B- AREA FUSE AND TRANSFORMER LIST								
METER	POLE NUMBER / XFMR NUMBER / SWGR NUMBER	FUSE TYPE /SIZE	XFMR	FEEDER	SINGLE LINE DRAWING NUMBER	COORDINATION DRAWING NUMBER	BUILDING(S) SERVED	
			TAP SETTING / KVA SIZE / CONNECTION / SEC. VOLTAGE					
	B2155	(3) SM4 7E STD SPEED	SEE 652-045T	B3B			702-T	
	B2172	REPLACED 8-2008 (3) SMU20 40E STD SPEED	SEE 652-46T	B3B				
	B2306	Fuses Pulled						
	B2309	Fuses Pulled						
	B2312	SMU20 5E STANDARD SPEED	13800 50 SINGLE PHASE 120/240	B3B			LIGHTS	
	B2313	(3) SMU20 5E STD SPEED	13800 75 DY 208Y/120	B3B			702-D	
	B2315	(2) SMU20 20E STD SPEED	IN-LINE FUSE	B3B				
	B2319	(2) SMU20 3K	13800 10 1 PHASE 480	B3B	S5-6-1445	S5-6-1445	WIND TOWER	
<p align="center">THIS DRAWING HAS BEEN FURNISHED BY THE SAVANNAH RIVER SITE. THE INFORMATION AND KNOW HOW THEREON MAY NOT BE USED NOR THE DRAWING REPRODUCED WITHOUT WRITTEN PERMISSION OF THE PRIME CONTRACTOR. ALL REPRODUCTIONS IN WHOLE OR IN PART, INCLUDING VENDORS SHO</p>								
	DA NO:	BLDG NO: 503-B		DESIGN GROUP: (SUD)		S&PD DRAWING NUMBER:		
	751-B 13.8 KV FEEDER MAPS				E 2 B 0150		SRS DRAWING NO. REV.	
	UNITED STATES DEPARTMENT OF ENERGY				E-E2-B-0150		34	
						SHEET 19 OF 20		

**Savannah River Site Responses to
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**ENVIRONMENTAL COMPLIANCE & AREA
COMPLETION PROJECTS**

**Baseline Asbestos Inspection Report
of
Building 483-7D**



Q-APG-D-00022
December 2, 2019

**Savannah River Site Responses to
ENVIRONMENTAL PROTECTION AGENCY
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BUILDING 483-7D, D-AREA DOMESTIC WATER PRODUCTION FACILITIES
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Savannah River
Nuclear Solutions, LLC
A Fluor Daniel Partnership

INTEROFFICE MEMORANDU

December 2, 2019

Q-APG-D-00022
RSM Track Number 10755

TO: Andrew Macmillan, 730-4B Room 3026

FROM: Ken Padgett, 730-4B

BASELINE ASBESTOS INSPECTION REPORT OF BUILDING 483-7D

On November 13, 2019 a baseline asbestos inspection was performed in building 483-7D. This building is a circa 1990's structure with a footprint of approximately 3,900 SF. The building has been abandoned but it was previously used as the domestic water chemical feed system facility. It has a steel framed structure with raised seam metal siding and roofing erected on a concrete slab. The main structure still houses storage tanks and associated piping. The center of the structure has a curbed area containing pumps. All the equipment appeared to be shut down. The building has a small office space in the northeast corner constructed of concrete block with a poured concrete ceiling. There is a compressor room on the northwest side of the building, which contains the electrical service and disconnect boxes.

Eleven (11) homogenous types of material were evaluated during this inspection. Please see the attached Inspection Survey Table for descriptions, estimated quantities, and location(s) of the materials inspected. Results from SDD-APG-2009-00560 have been reproduced and added to the Inspection Survey Table. Three (3) additional samples were obtained during this inspection. The results from this inspection report will serve as the baseline reference of ACM in the building.

SUMMARY

All accessible, visible, suspect ACM was evaluated at the time of this inspection. Visible Thermal Systems Insulation (TSI) includes vinyl faced fiberglass insulation used on the walls and ceiling of the main structure. This evaluation was based on facility and material knowledge, document review, and the collection of bulk samples for laboratory analysis.

Samples collected in the SDD-APG-2009-00560 report were analyzed at the SRNS LLC. Industrial Hygiene Laboratory, which is accredited by the American Industrial Hygiene Association (AIHA) Laboratory Quality Assurance Program (LQAP) in the Field of Testing (FoT)/Polarized Light Microscopy (PLM). The laboratory ID number is 100642.

Samples in this inspection report were analyzed by Maxxam Analytic A Bureau Veritas Group Company. The laboratory is located at 3380 Chastain Meadows Parkway, Suite 300 Kennesaw, GA 30144. Please see the attached laboratory report for a review of accreditations and certifications.

Although building 483-7D has been deactivated and placed in shutdown condition, the inspector could not verify that the building was de-energized. Therefore, suspect materials may exist inside electrical disconnect boxes and conduit.

If this report is used for contract bid or regulatory permit purposes, it is the obligation of the user to verify the actual quantities of the materials presented in the Inspection Survey Table. In accordance with 40CFR part 61.145, a **ten-day notification** must be filed with SC DHEC prior to demolition.

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**Savannah River Site Responses to
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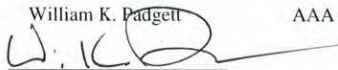


Savannah River
Nuclear Solutions, LLC
A Fluor Daniel Partnership

INTEROFFICE MEMORANDUM

Q-APG-D-00022
RSM Track Number 10755

The removal of all identified Presumed Asbestos Containing Material (PACM) must be performed by asbestos trained personnel, with proper permitting, and waste disposal procedures.

<u>ASBESTOS INSPECTOR</u>	<u>INSTITUTION</u>	<u>CERT. NO.</u>	<u>STATE</u>	<u>EXP. DATE</u>
William K. Padgett 	AAA Environmental	06-1397	SC	04/17/20

(Included on the SRS long-term in-house group license ABS 8021)

C: C.R.F., 773-52A
Site D&D Correspondence File
J.K. Barrineau, 730-4B
Mark Wright, 705-3C Room 126

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S A V A N N A H R I V E R S I T E
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**Savannah River Site Responses to
ENVIRONMENTAL PROTECTION AGENCY
Comments on the
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INSPECTION SURVEY TABLE FOR BUILDING 483-7D

Page 1 of 2

Homogeneous Number	SUSPECT MATERIAL	DESCRIPTION OF MATERIAL and SAMPLE NUMBERS	AMOUNT	TEST RESULTS	FRIABLE-NONFRIABLE
H01OB	Miscellaneous	Description: Sealant - white Sample Numbers: 4837D090420-01A, 4837D090420-01B, 4837D090420-01C 4837D191113-01A, 4837D191113-01B, 4837D191113-01C Sample Number: 4837D090420-01C and 4837D191113-01C were analyzed via TEM	Approximately 400 LF	Negative	Non-Friable Good Condition
Location: Used in concrete joints and around the perimeter of the structure. (Applied over H02OB)					
H02OB	Miscellaneous	Description: Expansion joint material - black Sample Numbers: 4837D090420-02A, 4837D090420-02B, 4837D090420-02C Sample Number: 4837D090420-02C was analyzed via TEM	Approximately 400 LF	Negative	Non-Friable Good Condition
Location: Found under H01OB (see above)					
H03OB	Miscellaneous	Description: Pipe sealant - black Sample Numbers: 4837D090420-03A, 4837D090420-03B, 4837D090420-03C Sample Number: 4837D090420-03B was analyzed via TEM	Approximately 4 SF	Negative	Non-Friable Good Condition
Location: Applied to ground wire and electric conduit penetrations through the concrete slab					
H04OB	Miscellaneous	Description: Pipe sealant - white Sample Numbers: 4837D090420-04A, 4837D090420-04B, 4837D090420-04C Sample Number: 4837D090420-04B was analyzed via TEM	Approximately 4 SF	Negative	Non-Friable Good Condition
Location: Applied around domestic water pipe penetrations through the concrete slab					
H05OB	Miscellaneous	Description: Caulking/sealant – silver Sample Numbers: 4837D090420-11A, 4837D090420-11B, 4837D090420-11C Sample Number: 4837D090420-11C was analyzed via TEM	Approximately 20 SF	Negative	Non-Friable Good Condition
Location: Applied around skylights					
H06OB	Miscellaneous	Description: Caulking/sealant – grey Sample Numbers: 4837D090420-12A, 4837D090420-12B, 4837D090420-12C Sample Number: 4837D090420-12B was analyzed via TEM	Approximately 175 SF	Negative	Non-Friable Good Condition
Location: Applied on seams and joints of roofing panels and awnings					

**Savannah River Site Responses to
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INSPECTION SURVEY TABLE FOR BUILDING 483-7D

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Homogeneous Number	SUSPECT MATERIAL	DESCRIPTION OF MATERIAL and SAMPLE NUMBERS	AMOUNT	TEST RESULTS	FRIABLE-NONFRIABLE
H07OB	Miscellaneous	Description: Caulking/sealant – white Sample Numbers: 4837D090420-13A, 4837D090420-13B, 4837D090420-13C Sample Number: 4837D090420-13C was analyzed via TEM	Approximately 50 LF	Negative	Non-Friable Good Condition
Location: Applied on roof flashing, boots, and around louvers					
H08	Miscellaneous	Description: Gaskets Sample Numbers: N/A, inaccessible for evaluation	Not quantified	PACM (See note 1)	N/A
Location: Observed on piping systems and tanks					
H09	TSI	Description: Fiberglass w/white vinyl facing (fiberglass batts) Sample Number: N/A, not suspected of containing asbestos REF: SDS #25860-1 or equivalent	N/A	N/A	N/A
Location: Observed on interior walls and ceiling					
H10	Miscellaneous	Description: Floor coating – tan Sample Numbers: 4837D090420-05, 4837D090420-06, 4837D090420-07	N/A	Negative (see note 2)	N/A
Location: Applied to flooring in chemical dike area					
H11	Miscellaneous	Description: Block coating - grey Sample Numbers: 4837D090420-08, 4837D090420-09, 4837D090420-10	Approximately 350 SF	Negative	Non-Friable Good Condition
Location: Applied to base course of concrete block walls on northeast side of building					

Notes:

1. The gaskets were inaccessible for bulk sampling, therefore are considered Presumed Asbestos Containing Material (PACM). If the work (demolition) method used avoids the separation of flanges, they will not be disturbed. Gaskets in unbroken flanges are determined to be encased in a hardened substance therefore they are not subject to regulatory requirements.
2. This material was sampled in the SDD-APG-2009-00560 inspection but was not observed during the completion of this inspection

**Savannah River Site Responses to
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November 23, 2019

Kenny Barrineau
SAVANNAH RIVER NUCLEAR SOLUTIONS, LLC
Building 730-4B, 2135
Aiken, SC 29808

Bureau Veritas Work Order No A1911169

Reference Activity Code: 0BJL15PNDC

Dear Kenny Barrineau:

Bureau Veritas North America, Inc. received 3 samples on November 18, 2019 for the analyses presented in the following report.

The results apply only to the samples analyzed in this project. Please note that any unused portion of the samples will be discarded after a sixty-day holding period, unless you have requested otherwise.

This material is confidential and is intended solely for the person to whom it is addressed. If this is received in error, please contact the number provided below.

We appreciate the opportunity to assist you. If you have any questions concerning the report, please contact the analyst whose name appears on the report or myself at (770) 499-7701.

Sincerely,

Kuntal Parikh

Senior Microscopist

Electronic signature authorized through password protection

cc: Ken Padgett
Mike
Siobhan Kitchen

Bureau Veritas North America, Inc.

Industrial Hygiene Laboratory

3380 Chastain Meadows Parkway, Suite 300
Kennesaw, GA 30144

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Main: (770) 499-7701

Fax: (770) 499-7511

www.bv-labs.com

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CASE NARRATIVE

Date: 23-Nov-19

CLIENT: SAVANNAH RIVER NUCLEAR SOLUTIONS, LLC
Project: Activity Code: 0BJL15PNDC
Work Order No A1911169

ANALYTICAL METHOD FOR ASBESTOS IN BULK SAMPLES USING POLARIZED LIGHT MICROSCOPY (PLM)

The results of this report relate only to the samples listed in the body of this report.

Unless otherwise noted below, the following statements apply: 1) all samples were received in acceptable condition, 2) all quality control results associated with this sample set were within acceptable limits and/or do not adversely affect the reported results, and 3) the industrial hygiene results have not been blank corrected unless otherwise noted.

Use of EPA/600/R-93/116 satisfies applicable requirements of the USEPA's "Interim Method for the Determination of Asbestos in Bulk Insulation Sample", EPA-600/M4-82-020, December 1982, published as Appendix E to Subpart E of 40CFR763. Bulk samples analyzed by New York State methods follow stratified point counting methods (198.1) or Method 198.6 for PLM non-friable organically bound materials (NYSDOH Lab Code -11645). Percentages are visual estimations of asbestos >3:1 aspect ratio. The reliable limit of quantitation of the method is 1%, although asbestos may be qualitatively detected at concentrations less than 1%. Samples for which asbestos is detected at <1% are reported as trace, "<1%". "None Detected" indicates that no asbestos fibers were observed. NESHAP requires point counting of a bulk sample when the result is <10% by a method other than point counting. EPA, however states that if 3 mounts of the sample are analyzed and the asbestos percentage is <10% by visual estimation, the client may elect to assume the amount to be greater than 1% or require verification by point counting. If the result by point counting is different than the result obtained by visual estimation, the point count result will be used. Sample friability or non-friability noted on the report is a requirement for the State of California and refers only to the condition of the sample under macroscopic examination. It does not imply friability or non-friability for the sample as collected or observed in the field as determined by the person collecting the sample. The Kennesaw, Georgia lab is accredited by NVLAP -Lab Code 101125-0.

(a)Polarized- light microscopy is not consistently reliable in detecting asbestos in floor coverings, similar non-friable organically bound materials, soil and vermiculite. Quantitative electron microscopy is currently the only method that can be used to determine if this material can be considered or treated as non-asbestos containing. When analysis of such materials by PLM yields results negative for the presence of asbestos, Bureau Veritas recommends utilizing quantitative transmission electron microscopy (TEM). For more information, contact the laboratory.

References

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CLIENT: SAVANNAH RIVER NUCLEAR SOLUTIONS, LLC

Project: Activity Code: 0BJL15PNDC

Work Order No A1911169

McCrone, Walter C. 1980. The Asbestos Particle Atlas. Ann Arbor, MI: Ann Arbor Science Publishers, Inc.

United States Environmental Protection Agency. Environmental Monitoring Systems Laboratory. 1982. Interim Method for the Determination of Asbestos in Bulk Insulation Samples. EPA-600/M4-82-020. Washington: GPO, December.

United States Environmental Protection Agency. Method for the Determination of Asbestos in Bulk Building Materials. EPA-600/R-93/116, July 1993 (PLM)

Fed. Reg. Vol. 55, No.224, 11/20/90, p.48415 (NESHAP)
EPA Memorandum 5/8/1991 –NESHAP Clarifications

NYSDOH Methods 198.1/198.6

QUANTITATIVE ANALYSIS OF NON-FRIABLE ORGANICALLY BOUND BULK SAMPLES FOR ASBESTOS USING TRANSMISSION ELECTRON MICROSCOPY (TEM) (NY ELAP 198.4)

Approximately 100-500 mg of sample is weighed in a tared crucible. The sample is placed in a muffle furnace at a temperature of 480°C for at least 5 hours, or until the weight has stabilized. The sample is allowed to cool to room temperature and immediately weighed to calculate percent of organic loss.

The sample is placed in a tared crucible and ground to disaggregate the residue. Approximately 1 ml of non-dilute HCL acid is slowly added to remove calcite and dolomite from the remaining sample residue. After 15 minutes, the sample is immediately diluted with ultra-pure water. The sample is then dispersed in 50 ml of ultra-pure water and filtered onto a pre-weighed 47 mm, 0.4um pore size polycarbonate filter. The filter is dried on a slide warmer and weighed again. If the residue mass is <1% of the subsample's original mass, the analysis is terminated and the result is reported as non-ACM.

A one cm² portion of the filter is cut and placed in a clean silica crucible. Approximately 5ml of ethanol are added and ultra-sonicated for 1 minute. Approximately 3 µl of the suspension is drop-mounted onto a carbon-coated TEM grid and allowed to dry.

Grids are examined at 3000X for suitability of the prep where >50% intact filter coverage and <25% particle loading is determined. Large bundles of asbestos may be noted during this phase of the analysis. At 10,000X to 20,000X, positive confirmation and further visual estimation of asbestos is determined. If there are no other particles on the filter, then the asbestos observed is 100% visual estimation. Otherwise, the estimate includes all sizes relative to other particles or fibers. Morphology, selected area

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REV. 0



CLIENT: SAVANNAH RIVER NUCLEAR SOLUTIONS, LLC
Project: Activity Code: 0BJL15PNDC
Work Order No A1911169

electron diffraction, and energy-dispersive x-ray spectroscopy are used to confirm asbestos fibers. From TEM examination as outlined above, the final visual area estimation is made of asbestos on the TEM grids and the percent asbestos in the residue is then extrapolated using gravimetric records to identify the percent asbestos in the total sample (NYS DOH Lab Code 11645).

SPECIAL NOTES

- 1)Material types analyzed by 198.1 method: a) Friable materials other than SM-V (Surfacing Material) with <10% vermiculite; b) Surfacing Material (SM) without vermiculite; and c) ceiling tile without cellulose.
- 2)Material types analyzed by 198.6/198.4 method: NOB material (other than SM-V) with <10% vermiculite; b) any material other than SM-V with >10% vermiculite; and c) Ceiling Tiles with cellulose.
- 3)Material types analyzed by 198.8 method: Surfacing Material containing vermiculite (SM-V).

REFERENCES

Chatfield Method for Quantitative Analysis of Bulk Samples for Asbestos Using Transmission Electron Microscopy (unpublished).

New York ELAP Method 198.4, May 2016.

NOTE: Some of the samples may have contained inseparable layers which were combined during preparation.

Note: The attached chain-of-custody form shows the sample data that was provided by the client.

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ANALYTICAL RESULTS

Date: 23-Nov-19

CLIENT:	SAVANNAH RIVER NUCLEAR SOLUTIONS, LLC	Sample Type:	Bulk
Work Order No.:	A1911169	Date Received:	11/18/2019
Client Reference:	Activity Code: 0BJL15PNDC	Report Date:	23-Nov-19
Method Reference:	EPA-600/M4-82-020/EPA/600/R-93/116/NYELAP 198.1		

Lab ID	Client Sample ID	Analyst	Date Sampled	Date Analyzed			
001A	4837D191113-01A	SH	11/13/2019	11/20/2019			
	Layer POB	Sample Morphology	Asbestos	%	Other Fibers	%	Particulate
	(1) 100	Homogeneous White Sealant	None Detected		Non-Detected		Binder/Filler
002A	4837D191113-01B	SH	11/13/2019	11/20/2019			
	Layer POB	Sample Morphology	Asbestos	%	Other Fibers	%	Particulate
	(1) 100	Homogeneous White Sealant	None Detected		Non-Detected		Binder/Filler
003A	4837D191113-01C	SH	11/13/2019	11/20/2019			
	Layer POB	Sample Morphology	Asbestos	%	Other Fibers	%	Particulate
	(1) 100	Homogeneous White Sealant	None Detected		Non-Detected		Binder/Filler

Laboratory Limits

Laboratory

Range	R Limit	Quartile Limit
0.1-1	100	+/- 1.482
10-100	100	+/- 22.23
1-10	100	+/- 7.41
Trace	100	+/- 1.482

Susan Hannigan (SH)

Range	R Limit	Quartile Limit
0.1-1	100	+/- 1.482
10-100	100	+/- 26.676
1-10	100	+/- 5.928
Trace	100	+/- 1.482

The reliable limit of quantitation of the method is 1%, although asbestos may be qualitatively detected at concentrations less than 1%. Samples for which asbestos is detected at <1% are reported as trace, "<1%". "None Detected" indicates that no asbestos fibers were observed.

Analyst(s) Name/Date: *Susan Hannigan* 11/23/2019

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ANALYTICAL RESULTS

Client: SAVANNAH RIVER NUCLEAR SOLUTIONS, LLC
Client Reference No.: Activity Code: 0BJL15PNDC
Work Order No.: A1911169

Date: 23-Nov-19

Analytical Method: NYELAP METHOD 198.4 by TEM
Sample Type: Bulk
Reporting Limit (% by Weight): 0.1
Date Received: 11/18/2019 1:38:18 PM
Report Date: 11/23/2019 1:27:05 PM
Grid Box Identification: 11-19-19D-1

Lab Sample No.	Client Sample Identification	Date Sampled	Analysis Date	Analyst	Sample Description (Morphology)	Asbestos Identification (%)*	Total Asbestos (%)**
A1911169-003A	4837D191113-01C	11/13/19 @12:00 am	11/23/19 @12:26 pm	KRP	White Sealant	None Detected --	< 0.1

TEM Microscope Documentation

Instrument	*Magnification	Accelerating Voltage	Calibration Date
TEM 1/D675	14481x	100 KeV	11/4/2019

*Magnification = Calibrated screen magnification at 15,000X. For ISO Method 10312 the calibrated screen magnification is at 20,000X

<: Result is less than the indicated limit of detection. --: Present but below the detection limit
*: The visual area estimation of asbestos content in the final residue.
**: The calculated total percent asbestos in the sample as received.

Analyst(s) Name/Date: Shantal Panitch 11/23/2019
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SRS Chain of Custody / Laboratory Analysis Request

Requested TAT: <input type="checkbox"/> Rush <input type="checkbox"/> Routine <input checked="" type="checkbox"/> Other <u>5 Day from rec.</u>	Activity Code <u>0BJL15PNDC</u>
Samples received in good condition? <input type="checkbox"/> Y <input type="checkbox"/> N	Sample Comments Use positive stop for all homogenous groups. TEM is required only as indicated for organically bound samples or analyst may choose another sample from that ABC group that was positive via PLM. P.O. # will sent to Kelly Smith via Email for services related to this task.
Laboratory Lab Name <u>Bureau Veritas (Atlanta)</u> Address 1 <u>3380 Chastain Meadows Pkwy, Suite 300</u> Address <u>Kennesaw, GA 30144</u> POC <u>Alan Segrave / 800-252-9919</u>	Peer Reviewed / Self Check by Name (Print) <u>Heath M. Colverson</u>

Return Results / Electronic Report To

Name (CTF)	Kenny Barrineau
Email / Phone	kenny.barrineau@srs.gov (803) 952-5650
Name (STR)	Kenny Barrineau
Email / Phone	kenny.barrineau@srs.gov (803) 952-5650
Name (Req by)	Ken Padgett
Email / Phone	william03.padgett@srs.gov (803) 646-1831
Organization	SRNS / EC&ACP
Address	Savannah River Site Aiken, SC 29802

This Line Laboratory use ONLY	Laboratory ID#:	Results attached (date):	Results Pages (Total)
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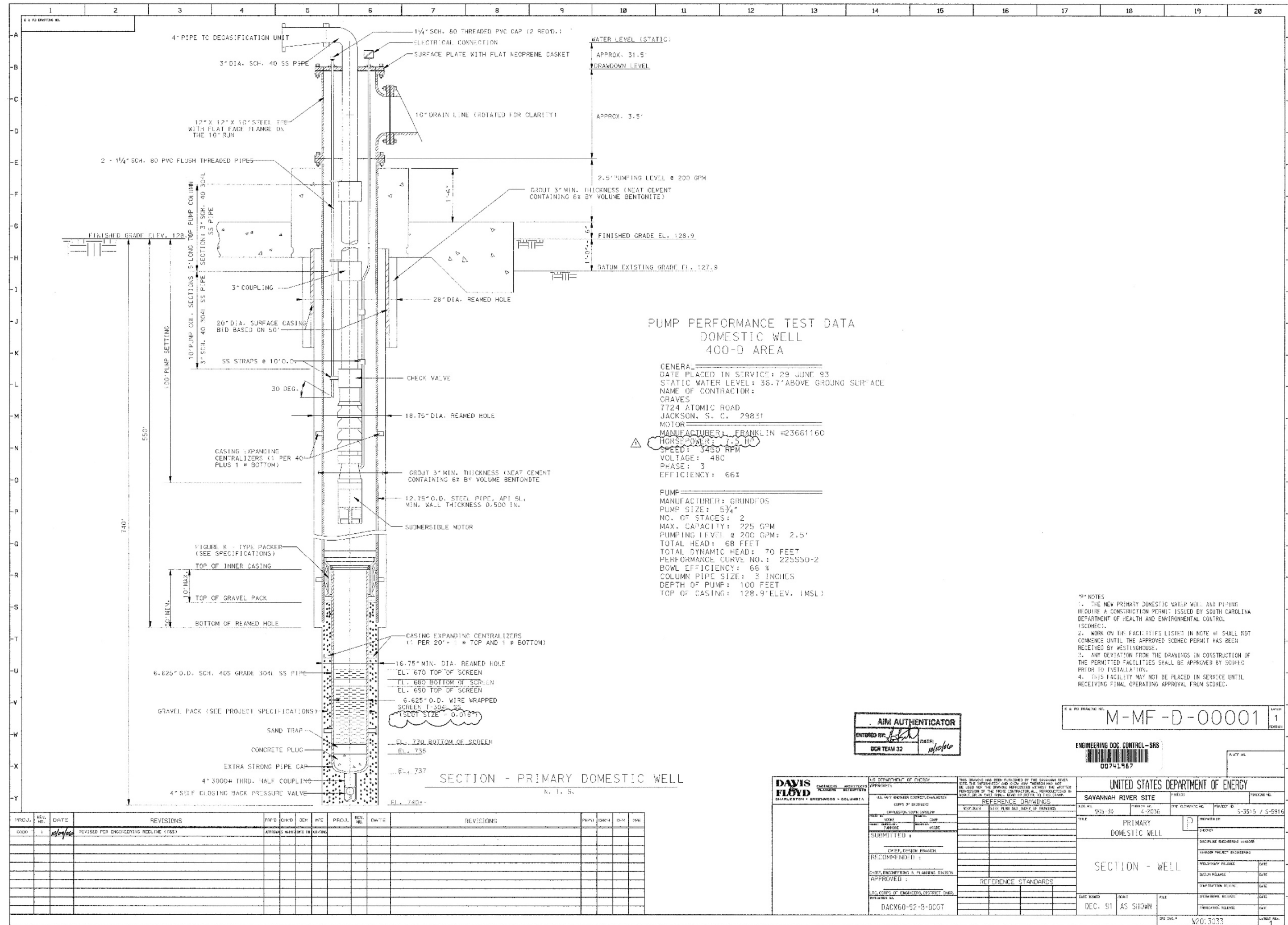
No	Field ID	Matrix	Sample Date / Time	Requested Analysis	Sample Media / Size	Time (min)	Vol / Area	Sample Comments
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	4837D191113-01B		11/13/2019	PLM	< 1 Gram	N/A	N/A	H010B - Sealant, white
	4837D191113-01C		11/13/2019	PLM/TEM	< 1 Gram	N/A	N/A	H010B - Sealant, white

Relinquished by		
Name	Signature	Date and Time
Ken Padgett	<i>[Signature]</i>	11-13-19 1600
Kane Bice	<i>[Signature]</i>	11-13-19 1606
735-B Rm 401	<i>[Signature]</i>	11-14-19 0650
Kane Bice	<i>[Signature]</i>	11-14-19 1100

Received by		
Name	Signature:	Date and Time
Kane Bice	<i>[Signature]</i>	11-13-19 1605
735-B Rm 401	<i>[Signature]</i>	11-13-19 1606
Kane Bice	<i>[Signature]</i>	11-14-19 0650
C/S Shipping	<i>[Signature]</i>	11-14-19 1130

A. Alley 11-15-19 130

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NO.	REV. NO.	DATE	REVISIONS	APP'D	CHK'D	INT.	PROJ. L.	REV. NO.	DATE	REVISIONS	APP'D	CHK'D	INT.
0000	1	10/10/00	REVISED FOR DIMENSIONING REDLINE (R05)										

AIM AUTHENTICATOR
ENTERED BY: [Signature] DATE: 10/10/00
DCR TEAM 32

ENGINEERING DOC CONTROL - SRS
M-MF-D-00001
00741967

UNITED STATES DEPARTMENT OF ENERGY

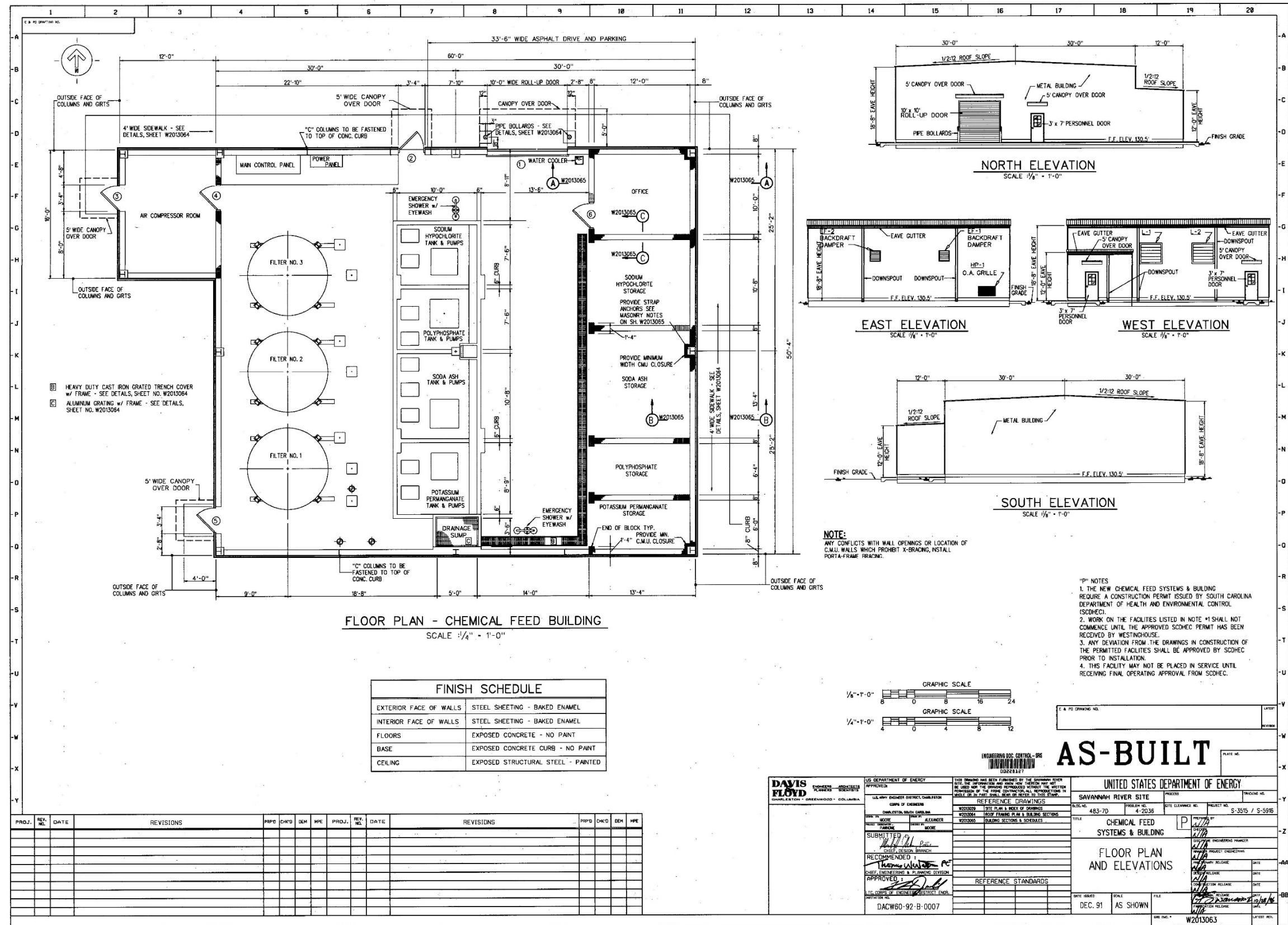
SAVANNAH RIVER SITE

PRIMARY DOMESTIC WELL

SECTION - WELL

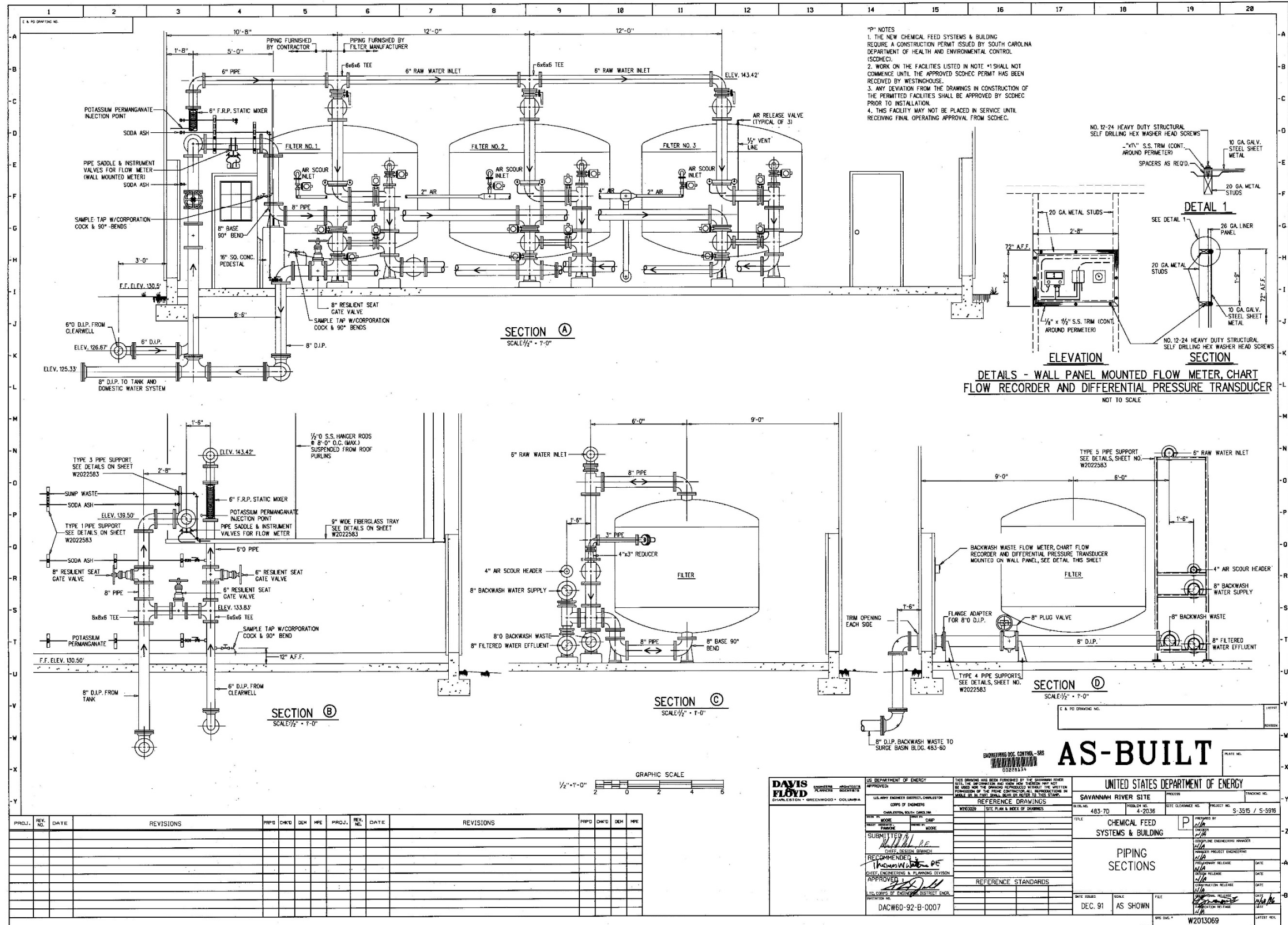
DATE ISSUED: DEC. 91
SCALE: AS SHOWN
FILE: W20-3033

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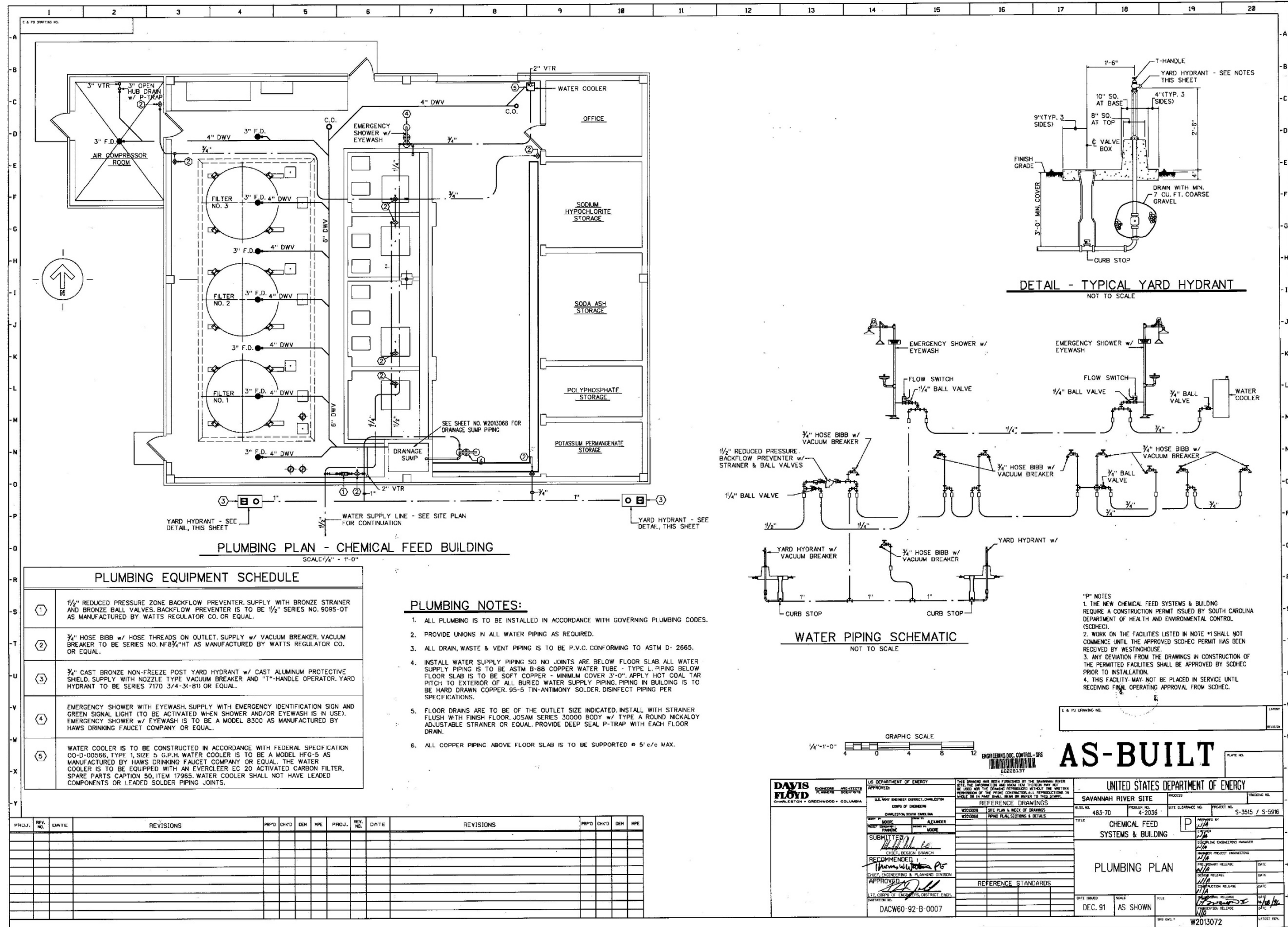


DAVIS FLOYD ENGINEERS ARCHITECTS PLANNERS COLUMBIA, MISSOURI	US DEPARTMENT OF ENERGY APPROVED: _____ SPECIAL PERMIT: _____ SUBMITTED: _____ RECOMMENDED: _____ APPROVED: _____ DATE: _____	UNITED STATES DEPARTMENT OF ENERGY SAVANNAH RIVER SITE 483-7D CHEMICAL FEED SYSTEMS & BUILDING FLOOR PLAN AND ELEVATIONS DATE ISSUED: DEC. 91 SCALE: AS SHOWN SHEET NO.: W2013063	PROJECT NO.: S-3515 / S-5986 DRAWING NO.: _____ REVISIONS: _____ DATE: _____
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SCDHEC COMMENTS

- 1) The bottom of page 5 states that there is a transformer located within Building 483-7D on the electrical control center pad and page 15 states that there is a transformer located on the clear well electrical panel outside the facility. Given the general age of the facility (page 5 states the facility was constructed in 1996; page 20 states the facility became operational in 1993), the Department doubts these are PCB-containing transformers but the FDE should specifically address this issue.

Response: Clarification.

The 1996 date listed in the first paragraph under Facility Description is incorrect. The correct date is 1993 as stated in the second paragraph under Process History. Based on the size, type, date and a review of Square D's catalogs both transformers are the dry type and contain no PCBs.

No changes to the FDE are proposed.

Responsible Party: William B. Griffin (803-952-6430), William.Griffin@srs.gov

2. Page 11 states that the sump at the south end of Building 483-7D discharged to the 483-6D Surge Basin. Please state the mechanism used to accomplish the discharge from the facility to the Surge Basin and provide the location of the Basin. Please verify that the 483-6D Surge Basin is not part of this FDE.

Response: Clarification.

Two pumps located at the south end of Building 483-7D discharged the sump contents to the 483-6D Surge Basin at a rate of 20 gallons per minute. The 483-6D Surge Basin is not part of this FDE. Figure 1 shows the location of the 483-6D Surge Basin relative to Building 483-7D.

No changes to the FDE are proposed.

Responsible Party: William B. Griffin (803-952-6430), William.Griffin@srs.gov

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Figure 1. Location of the 483-6D Surge Basin Relative to Building 483-7D

- 3) Please describe the integrity of all the pits, sumps, trenches, drainage channels, etc. that are part of this FDE.

Response: Clarification.

All the drainage channels in 483-7D were observed to be clean and free of debris. The grate over the sump was removed. The water and sediment in the sump were tested and found to be nonhazardous with pH of 9.42 and 9.77, respectively. The water was pumped out and the sediment was removed. Further inspection of the sump revealed no cracks or oil stains. Drain caps were not removed to look in the drains but appeared to be in good condition.

No changes to the FDE are proposed.

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Responsible Party: William B. Griffin (803-952-6430), William.Griffin@srs.gov



Figure 2. Photo of Bottom of Sump in 483-7D

The Department is providing the following comments to promote clarity. Responses are not required.

- 4) The first paragraph of page 11 states, "The storage areas are aligned to be opposite their corresponding injection station. The storage areas, from north to south, were for sodium hypochlorite, polyphosphate, soda ash and potassium permanganate." Figure 2 depicts the corresponding injection stations in this order yet shows the order of storage areas from north to south as sodium hypochlorite, soda ash, polyphosphate and potassium permanganate.

Response: Agree. Figure 2. Building 483-7D Layout (See also Ref. 15) and W2013063, Chemical Feed Floor Plan and Elevation Bldg. 483-7D (attached to the responses) depicts the order of the injection stations as sodium hypochlorite, polyphosphate, soda ash and potassium permanganate and the storage areas as sodium hypochlorite, soda ash,

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polyphosphate and potassium permanganate. All storage areas and injection stations were opposite each other except polyphosphate.

No changes to the FDE are proposed.

Responsible Party: William B. Griffin (803-952-6430), William.Griffin@srs.gov

- 5) Page 20 states, "Floor drains in the facility are as shown in Figure 3 and previously described." Figure 3 shows the exterior of Building 483-7D and its surroundings. Either a figure depicting the floor drains inside was inadvertently omitted, or perhaps this sentence should reference Figure 2 instead.

Response: Agree. Figure 2 is the correct figure reference.

No changes to the FDE are proposed.

Responsible Party: William B. Griffin (803-952-6430), William.Griffin@srs.gov

- 6) Transformer T-2, 452-11D, appears to be incorrectly labeled on Figure 1.

Response: Agree. "Transformer T-1 452-11D" should have been labeled "Transformer T-2 452-11D" on Figure 1.

No changes to the FDE are proposed.

Responsible Party: William B. Griffin (803-952-6430), William.Griffin@srs.gov
