



UNITED STATES
NUCLEAR REGULATORY COMMISSION
REGION IV
1600 EAST LAMAR BOULEVARD
ARLINGTON, TEXAS 76011-4511

March 2, 2022

Mr. Fadi Diya, Senior Vice President
and Chief Nuclear Officer
Ameren Missouri
Callaway Plant
8315 County Road 459
Steedman, MO 65077

SUBJECT: ANNUAL ASSESSMENT LETTER FOR CALLAWAY PLANT
(REPORT 05000483/2021006)

Dear Mr. Diya

The U.S. Nuclear Regulatory Commission (NRC) has completed its end-of-cycle performance assessment of the Callaway Plant, reviewing performance indicators (PIs), inspection results, and enforcement actions from January 1, 2021 through December 31, 2021. This letter informs you of the NRC's assessment of your facility during this period and its plans for future inspections at your facility. The NRC concluded that overall performance at your facility preserved public health and safety. The baseline inspection program was completed at your facility as defined in Inspection Manual Chapter 2515, "Light-Water Reactor Inspection Program - Operations Phase."

The NRC determined the performance at the Callaway Plant during the most recent quarter was within the Regulatory Response Column, the second highest performance column of the NRC's Reactor Oversight Process (ROP) Action Matrix. This conclusion was based on a single White performance indicator in Unplanned Scrams per 7000 Critical Hours in the Initiating Events Cornerstone originating in the fourth quarter of 2020, and all Green inspection findings during the assessment period.

Therefore, in addition to ROP baseline inspections, the NRC plans to conduct a supplemental inspection in accordance with Inspection Procedure 95001, "Supplemental Inspection Response to Action Matrix Column 2 Inputs" due to exceeding the White threshold for the Unplanned Scrams per 7000 Critical Hours Performance Indicator. The objectives of this procedure are to assure that the root causes and contributing causes of individual and collective significant performance issues are understood, to independently assess and assure that the extent of condition and extent of cause of significant individual and collective performance issues are identified, to assure that corrective actions taken to address and preclude repetition of significant performance issues are prompt and effective, and to assure that corrective action plans direct prompt actions to effectively address and preclude repetition of significant performance issues.

In your letter dated January 3, 2022 (ML22003A179), the NRC was notified of your readiness for the supplemental inspection to review the actions taken to address the performance issues. Therefore, the NRC has scheduled this supplemental inspection for the week of March 14, 2022.

The enclosed inspection plan lists the inspections scheduled through December 31, 2023. The NRC provides the inspection plan to allow for the resolution of any scheduling conflicts and personnel availability issues. Routine inspections performed by resident inspectors are not included in the inspection plan. The inspections listed during the last twelve months of the inspection plan are tentative and may be revised. The NRC will contact you as soon as possible to discuss changes to the inspection plan should circumstances warrant any changes.

In response to the COVID-19 public health emergency (PHE), the NRC adjusted inspection plans and schedules in order to safeguard the health and safety of both NRC and licensee staff while still effectively implementing the ROP. While the PHE continues, overall conditions throughout the country support performance of our inspection and oversight activities to return to normal onsite presence by our resident and region-based inspectors and completion of nominal baseline inspection samples. We continue to monitor site-specific conditions and as discussed in our November 2, 2021 memo, "Implementation of Inspection Programs Following Re-Entry from the Public Health Emergency for the Reactor Safety Program" (ML21295A302), it may be necessary to alter how and when we perform our inspection and oversight activities as we balance the importance of protecting the health and safety of our staff with the need to conduct effective oversight that supports the NRC's critical safety mission. For inspections requiring extensive coordination with offsite organizations, such as evaluated emergency preparedness exercises, NRC guidance and frequently asked questions for security and emergency preparedness can be found here: <https://www.nrc.gov/about-nrc/covid-19/security-ep/>. Similarly, the NRC has developed guidance if force-on-force inspections cannot be completed as scheduled due to an emergency, such as the COVID-19 PHE. These changes help ensure the health and safety of both NRC and licensee staff while maintaining the NRC's important safety and security mission during the COVID-19 PHE. The attached inspection plan is accurate on the date of issuance but remains subject to change based on approval of potential exemption requests or other changes needed due to changing conditions in the COVID-19 PHE. NRC staff will contact your appropriate regulatory affairs staff in order to coordinate inspection planning and scheduling.

In accordance with Title 10 of the *Code of Federal Regulations* (10 CFR) 2.390 of the NRC's "Rules of Practice," a copy of this letter will be available electronically for public inspection in the NRC Public Document Room or from the Publicly Available Records (PARS) component of NRC's document system (ADAMS). ADAMS is accessible from the NRC Web site at <http://www.nrc.gov/reading-rm/adams.html> (the Public Electronic Reading Room).

Please contact Gregory E. Werner at (817) 200-1141 with any questions you have regarding this letter.

Sincerely,

/RA/

Mike C. Hay, Acting Director
Division of Operating Reactor Safety

Docket No. 50-483
License No. NPF-30

Enclosure:
Inspection Plan

ANNUAL ASSESSMENT LETTER FOR CALLAWAY PLANT (REPORT 05000483/2021006)

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 JDixon-Herrity, DORL, NRR
 ROP Reports
 ROP Assessment

ADAMS ACCESSION NUMBER: ML22054A309

SUNSI Review ADAMS: Non-Publicly Available Non-Sensitive Keyword:
 By: **JFM1** Yes No Publicly Available Sensitive NRC-002

OFFICE	PE:DORS/B	C:DORS/B	D:DORS			
NAME	JMelfi	GWerner	MHay			
SIGNATURE	/RA/	/RA/	/RA/			
DATE	02/15/2022	02/15/2022	02/23/2022			

OFFICIAL RECORD COPY

Site Inspection Activity Plan

Callaway

01/01/2022 - 12/31/2023

Unit	Start	End	Activity	CAC	Title	Staff Count
CW 2022 INITIAL EXAM						5
1	1/9/2022	1/15/2022	OV	000956	FB-OR-ONSITE VALIDATION OF INITIAL LICENSE EXAMINATION (OV)	
1	2/13/2022	2/19/2022	EXAD	000500	FB-OR-INITIAL LICENSE EXAM ADMINISTRATION (EXAD)	
Security Protective Strategy .05						2
1	1/18/2022	4/1/2022	IP 71153	001341	Follow Up of Events and Notices of Enforcement Discretion	
1	2/14/2022	2/18/2022	IP 71130.05	000737	Protective Strategy Evaluation	
CWY 95001 Supplemental Inspection						3
1	1/3/2022	4/30/2022	IP 71152	000748	Problem Identification and Resolution (PI&R)	
1	3/14/2022	3/18/2022	IP 71153	000749	Follow Up of Events and Notices of Enforcement Discretion	
1	3/14/2022	3/18/2022	IP 95001	000938	Supplemental Inspection Response to Action Matrix Column 2 (Regulatory Response) Inputs	
Cyber Security Inspection - CWY						4
1	3/28/2022	4/1/2022	IP 71130.10	000741	Cybersecurity	
Inservice Inspection RF25 - CWY						1
1	4/4/2022	4/17/2022	IP 71111.08P	000702	Inservice Inspection Activities (PWR)	
RP 1,3,PI - CW						2
1	4/11/2022	4/15/2022	IP 71124.01	000725	Radiological Hazard Assessment and Exposure Controls	
1	4/11/2022	4/15/2022	IP 71124.03	000727	In-Plant Airborne Radioactivity Control and Mitigation	
RP 6,7 - CW						2
1	6/13/2022	6/17/2022	IP 71124.06	000730	Radioactive Gaseous and Liquid Effluent Treatment	
1	6/13/2022	6/17/2022	IP 71124.07	000731	Radiological Environmental Monitoring Program	
Fire Protection Inspection - CWY						3
1	6/27/2022	7/1/2022	IP 71111.21N.05	001646	Fire Protection Team Inspection (FPTI)	
1	7/11/2022	7/15/2022	IP 71111.21N.05	001646	Fire Protection Team Inspection (FPTI)	
Security Access Control .02						1
1	7/11/2022	7/15/2022	IP 71130.02	000734	Access Control	
1	7/11/2022	7/15/2022	IP 71130.09	001656	Security Plan Changes	
1	7/11/2022	7/15/2022	IP 71151	001338	Performance Indicator Verification	
Callaway Biennial PI&R						4
1	8/15/2022	8/19/2022	IP 71152B	000747	Problem Identification and Resolution	
1	8/29/2022	9/2/2022	IP 71152B	000747	Problem Identification and Resolution	
Security Training/Equip Maint .07 and .04						2
1	9/12/2022	9/16/2022	IP 71130.04	000736	Equipment Performance, Testing, and Maintenance	

Site Inspection Activity Plan

1	9/12/2022	9/16/2022	IP 71130.07	000739	Security Training	
Power-Operated Valves Inspection - 21N - Callaway						3
1	10/17/2022	11/4/2022	IP 71111.21N.02	001645	Design-Basis Capability of Power-Operated Valves Under 10 CFR 50.55a Requirements	
EP 2022 Program & PI Inspection - CWY						1
1	11/28/2022	12/2/2022	IP 71114.02	000717	Alert and Notification System Testing	
1	11/28/2022	12/2/2022	IP 71114.03	000718	Emergency Response Organization Staffing and Augmentation System	
1	11/28/2022	12/2/2022	IP 71114.04	000719	Emergency Action Level and Emergency Plan Changes	
1	11/28/2022	12/2/2022	IP 71114.05	000720	Maintenance of Emergency Preparedness	
1	11/28/2022	12/2/2022	IP 71151	001397	Performance Indicator Verification	
Design Bases Assurance Inspection (Team) - 21M - Callaway						6
1	1/1/2023	6/30/2023	IP 71111.21M	000713	Design Bases Assurance Inspection (Teams)	
In-Office EP Exercise Scenario Review (2023) - CWY						4
1	2/12/2023	3/18/2023	IP 71114.08	000723	Exercise Evaluation □ Scenario Review	
Security Access Authorization .01 and Access Control .02 + PIV + Plan Change .09						2
1	3/6/2023	3/10/2023	IP 71130.01	000733	Access Authorization	
1	3/6/2023	3/10/2023	IP 71130.02	000734	Access Control	
1	3/6/2023	3/10/2023	IP 71130.09	001656	Security Plan Changes	
1	3/6/2023	3/10/2023	IP 71151	001338	Performance Indicator Verification	
EP Exercise & PI Inspection (2023) - CWY						4
1	4/17/2023	4/21/2023	IP 71114.01	000716	Exercise Evaluation	
1	4/17/2023	4/21/2023	IP 71114.04	000719	Emergency Action Level and Emergency Plan Changes	
1	4/17/2023	4/21/2023	IP 71151	001397	Performance Indicator Verification	
FORCE-ON-FORCE PLANNING AND EXERCISE - CWY						4
1	5/15/2023	5/19/2023	IP 71130.03	000735	Contingency Response - Force-On-Force Testing	
1	6/5/2023	6/9/2023	IP 71130.03	000735	Contingency Response - Force-On-Force Testing	
RP 5,8 -						2
1	6/12/2023	6/16/2023	IP 71124.05	000729	Radiation Monitoring Instrumentation	
1	6/12/2023	6/16/2023	IP 71124.08	000732	Radioactive Solid Waste Processing & Radioactive Material Handling, Storage, & Transportation	
CW 2023 BRQ						3
1	6/18/2023	6/24/2023	IP 71111.11B	000704	Licensed Operator Requalification Program and Licensed Operator Performance	
Security FFD .08						1
1	9/18/2023	9/22/2023	IP 71130.08	000740	Fitness For Duty Program	
RP 1,4,PI -						2
1	10/2/2023	10/6/2023	IP 71124.01	000725	Radiological Hazard Assessment and Exposure Controls	

Site Inspection Activity Plan

1 10/2/2023 10/6/2023 IP 71124.04 000728 Occupational Dose Assessment
