

DATE: October 13, 2022
TO: Greg Lovato, Administrator
FROM: Christine Andres, Chief, Bureau of Federal Facilities
SUBJECT: Quarterly Report: July 1, 2022 to September 30, 2022

FEDERAL FACILITY AGREEMENT AND CONSENT ORDER

(FFACO) QUARTERLY REPORT

Industrial Sites Activity

At the end of September 2022, there were 1962 historical Corrective Action Sites (CASs) (out of 1970 total) that have been closed, with three (3) CASs in Corrective Action Unit (CAU) 114 and five (5) CASs in CAU 572 undergoing active work by the Department of Energy's Environmental Management Nevada Program (EM NP).

The Nevada Division of Environmental Protection Bureau of Federal Facilities' (NDEP or BFF) staff continued document reviews, Use-Restrictions reviews, and post-closure inspections for a number of closed Industrial Sites on the Nevada National Security Site (NNSS), as described below:

Document Reviews and Letters:

CAUs 114 and 572 – On September 22, 2022, BFF staff received *Notification of Activities Within Engine Maintenance, Assembly, and Disassembly (EMAD) Use Restricted (UR) Areas at the Nevada National Security Site (NNSS)* (CAU 114) and *Notification of Activities Within Test Cell C Ancillary Building and Structures Use Restricted (UR) Areas at the Nevada National Security Site (NNSS)* (CAU 572) letters from the EM NP. Prior to these formal submissions, draft letters were received by BFF, via email, on September 7, 2022. Following a brief introduction meeting and review of the draft letters, BFF staff requested an additional meeting with EM NP to discuss: (1) these notifications due to current BFF staff's lack of institutional knowledge on this specific process; and (2) specific questions generated from the letter reviews. Subsequent to this meeting, BFF issued an email to the EM NP summarizing its understanding of the reason for the notifications (i.e., the potential for planned work to impact any current use-restricted areas within or near the CAUs) and the scopes of work covered by the letters. The September 22, 2022, letters were then issued by the EM NP. BFF will issue response letters early next quarter.

CAU 577 – Area 5 Chromium-Contaminated Waste Disposal Cells – This CAU was created in March 2019 to address the closure of five (5) cells at the Radioactive Waste Management Complex (RWMC) at the NNSS that had received trivalent chromium-bearing waste in the past from Nuclear Fuel Services, located in Erwin, TN. Please see previous quarterly reports for a history of events. BFF staff received a *Draft Addendum to the Closure Report (CR) for Corrective Action Unit (CAU) 577: Area 5 Chromium Containing Waste Disposal Cells, Nevada National Security Site (NNSS), Nevada, July 2022* on July 27, 2022. BFF staff reviewed the draft addendum and sent a comment letter to the EM NP on September 7, 2022. A *Final Addendum to the Closure Report (CR) for Corrective Action Unit 577: Area 5 Chromium*

Containing Waste Disposal Cells, Nevada National Security Site (NNSS), Nevada, September 2022 was received by BFF on September 27, 2022. This submission will be reviewed and responded to next quarter, including a Notice of Completion for meeting an established milestone.

Site Visits/Inspections:

BFF staff accompanied EM NP and their contractor, Navarro, on post-closure inspections of the following Industrial Site CAUs during this quarter: 137, 139, 204, 309, 383, 476, 477, 504, 551, and 560. Field notes were generated for each site visit and added to the respective file.

Conference Calls/Meetings:

CAUs 114 and 572 – As stated above, a brief meeting was held on September 8, 2022, following BFF's receipt of the draft notification letters for each of these CAUs. After review of the drafts, another meeting was held between BFF, EM NP and Navarro staff to discuss the notification reason and process. That meeting was held on September 14, 2022.

CAU 578 – BFF staff received a draft FFACO Modification Request to create a new CAU, CAU 578, via email, on September 7, 2022. BFF staff met with EM NP and Navarro personnel on September 8, 2022, to receive an introduction on the modification request. The new CAU will include eleven existing CASs transferred from CAUs 333 (1 CASs), 344 (1 CASs) and 5000 (9 CASs), changing the functional categories on some of the transferred CASs, and investigating some CASs further to determine the ultimate closure strategy and documenting those investigations according to the appropriate FFACO process. BFF staff reviewed the request and emailed questions to the EM NP on September 15, 2022. An EM NP response was received on October 1, 2022. Hence, BFF will respond early next quarter.

Soils Activity Sites

At the end of December 2019, all Soil CASs, a total of 144, had been closed. Though all identified Soils Sites have been addressed under the FFACO, BFF staff continued post-closure monitoring activities through the post-closure inspections noted below.

Site Visits/Inspections:

BFF staff accompanied EM NP and Navarro personnel on post-closure inspections of CAUs 107, 366, and 567. Field notes were generated for each site visit and added to the respective file.

Underground Test Area (UGTA) Activity

There are five (5) UGTA CAUs, all of which are either in the Corrective Action Investigation Stage or in long-term monitoring during the Closure Stage.

During this quarter, BFF staff participated in the process of document review, project evaluation, site visits, meetings and/or teleconferences for CAUs 101 and 102 in the following ways:

Document Reviews and Letters:

CAU 101/102 – Pahute Mesa – On July 11, 2022, BFF staff received a *Notice of Posting of the Final Groundwater Flow and Contaminant Transport Model of Corrective Action Units (CAUs) 101 and 102: Central and Western Pahute Mesa, Nye County, Nevada, Revision 1, July 2022* letter. BFF staff retrieved the electronic copy of the document from the NDEP File Exchange and reviewed it. BFF staff acknowledged that comments transmitted in a May 6, 2022, letter on Revision 0 of the Document were satisfactorily addressed in the Revision and approved the *Final Groundwater Flow and Contaminant Transport Model of Corrective Action Units (CAUs) 101 and 102: Central and Western Pahute Mesa, Nye County, Nevada, Revision 1, July 2022* in a letter dated August 16, 2022.

On August 18, 2022, BFF staff received and reviewed a *Request to Advance to External Peer Review on Corrective Action Units (CAUs) 101 and 102: Central and Western Pahute Mesa* letter. BFF sent a letter on August 26, 2022, concurring that it was appropriate to move forward with the External Peer Review for CAUs 101 and 102: Central and Western Pahute Mesa.

Meetings and Presentations:

BFF staff participated in an External Peer Review (EPR), including giving a presentation outlining NDEP's role in regulatory oversight of the CAUs. The EPR consisted of meetings and field trips to the NNSS and Oasis Valley July 18-21, 2022. Participants included staff from BFF, EM NP, Navarro, DRI, representatives from various outside agencies, and the four-member EPR Panel.

A meeting was held on September 1, 2022, with staff from BFF and EM NP to discuss the status of the EPR's report.

General FFACO Business:

FFACO Transition – As the active investigation/remediation work under the FFACO nears completion, DOE and NDEP has undertaken the FFACO Transition Project to ensure that any future steward of the NNSS will be aware of all post-closure monitoring requirements on the NNSS by the addition of Appendix VII to the FFACO. The Bureau Chief represents NDEP on this working group. Several meetings occurred in early August in order to keep this project moving forward.

Calendar Year 2021 UGTA Annual Sampling Letter Report – BFF staff received the *Calendar Year 2021 Underground Test Area Annual Sampling Letter Report, Nevada National Security Site, Nevada, Revision 0, July 2022* on August 8, 2022. BFF staff reviewed the report and sent a Notice of Completion for the August 31, 2022, Milestone Deadline on August 26, 2022, and notification that BFF had no comments on this supplemental report. The *Calendar Year 2021 Underground Test Area Annual Sampling Letter Report, Nevada National Security Site, Nevada, Revision 1, August 2022* was received by BFF on September 1, 2022. Following review of Revision 1, BFF staff sent a letter on September 13, 2022, acknowledging the only change made was the addition of an appendix featuring NDEP's August 26, 2022, letter.

Informal UGTA Discussion Meetings – A practice was begun in the beginning of 2022 of holding an “informal” Teams meeting with EM NP, Navarro (EM NP's EPS contractor), DRI and BFF staff about

every six weeks to discuss present and upcoming UGTA documents or activities or any other outstanding UGTA subjects. The fifth meeting was held on September 1, 2022, with a sixth meeting scheduled for October 27, 2022.

FFACO Fee Request for FY 2023 – On May 25, 2022, BFF received the annual *Fee for Federal Facility Agreement and Consent Order (FFACO) Oversight Activities* letter from the EM NP. As some of the information required to fully answer this request for needed funding for FFACO Oversight Activities for FY 2023 was not available until the closure of the state’s previous fiscal year, BFF issued a reply letter on September 12, 2022. An acknowledgement of the request for FY 2023 has not yet been received, though the requested funds were received on October 3, 2022.

FFACO Milestones – BFF staff received the *Fiscal Year (FY) 2022+1 Milestone Chart and Listing of Modifications to the Federal Facility Agreement and Consent Order (FFACO)* from the EM NP on September 21, 2022. BFF issued a response letter on September 22, 2022, acknowledging the contents of the September 21, 2022, letter, requesting a discrepancy in the naming of a CAU be resolved, and noted there were no proposed modifications in the FY 2022+1 milestone chart. These established Milestones and Due Dates include FFACO sites under the purview of the DOE Office of Legacy Management, described below.

Use Restrictions (URs) – Late this quarter, a proposal was made by EM NP staff to hold monthly meetings to discuss the ongoing project of updating Use Restrictions in order to keep the process moving forward. The first meeting is scheduled for October 13, 2022.

Affirmation Forms – As the active investigation/remediation work under the FFACO nears completion, in addition to the FFACO Transition project, a Closure Affirmation Form project was undertaken by EM NP and Navarro to ensure that the documentation for the closure of each CAU identified in the FFACO, inclusive of its associated correction action sites, is complete in accordance with FFACO standards. Each Closure Affirmation Form requires acceptance through signature by the Bureau Chief. As this project continues, a number of forms were reviewed, commented on and/or accepted this quarter.

File Management – This quarter, staff have continued to organize, complete, scan for electronic storage, and document files for FFACO sites.

Nevada Off-Sites and the Tonopah Test Range

There are four (4) Nevada Off-Sites CAUs, two (2) Surface CAUs (CAU 416 and 417) and two (2) Subsurface CAUs (CAU 443 and 447). CAU 416 has been clean-closed. CAU 417 is in Post-Closure Monitoring. CAUs 443 and 447 are in the Closure Stage. On September 30, 2020, the Office of Legacy Management (LM) assumed responsibility for the long-term surveillance and maintenance of the Tonopah Test Range (TTR) FFACO sites. NDEP activities for the TTR sites are reported under this Section.

During this quarter, BFF staff participated in the process of document review and project evaluation with LM personnel in the following ways:

Document Reviews and Letters:

CAU 417 – Central Nevada Test Area (CNTA) Surface and CAU 443 – CNTA Subsurface – On July 7, 2022, LM submitted a Record of Technical Change (ROTC) for BFF review pertaining to specific aspect(s) of the Closure Report for each of these CAUs. Following review, BFF and LM staff teleconferenced on July 18, 2022, to discuss questions generated by BFF’s review, after which LM emailed responses. BFF staff sent a reply on August 8, 2022, stating that all of BFF’s comments had been addressed. LM sent the revised/updated ROTCs for CAUs 417 and 443 to BFF for signature on September 23, 2022. Signed ROTCs for CAUs 417 and 443 were emailed to LM on September 26 and 29, 2022, respectively. A formal submission of the ROTCs with LM signatures will be received next quarter.

CAU 447 – Project Shoal Area - Subsurface – BFF received the *Final 2021 Postclosure Groundwater Monitoring and Inspection Report, Project Shoal Area: Subsurface Corrective Action Unit 447* on July 11, 2022. As the Final Report satisfactorily addressed all of NDEP’s comments on the Draft Report, an approval letter was issued by BFF on August 11, 2022.

Site Visits:

CAU 416 – Project Shoal Surface and CAU 447 – Project Shoal Subsurface – BFF staff attended a portion of the LM annual monitoring event at the Project Shoal Site on August 30, 2022. LM’s field work included measuring water levels, downloading transducers, and inspecting the site features. This monitoring event did not include groundwater sampling, which is next scheduled to occur in 2024.

Miscellaneous:

The chief participated in monthly NDEP Attorney General staff meetings, bi-weekly Division-Wide Chief’s Staff Meetings and bi-weekly meetings with the Administrator either in person or via virtual meetings in July, August and September 2022.

During this quarter, the bureau chief attended/participated virtually in: (1) numerous calls, Zoom meetings and/or webinars as a member of the NGA’s Federal Facilities Task Force (FFTF), the State, Tribal, Government Working Group (STGWWG), the Environmental Council of States (ECOS) and/or the Combined Intergovernmental Working Group (CIWG); (2) meetings with NDEP fiscal staff; (3) regular bureau staff meetings and meetings with individual staff; (5) the Annual National Cleanup Workshop; (5) a “check-in” meeting with the NNSA/NFO Field Manager; (6) an interview for the BFF Supervisor position; and, (7) a meeting with a Nevada legislative aid to discuss the NNSS.

Tribal Interaction – During several virtual meetings this quarter with the State, Tribal, Government Working Group, the bureau chief interacted with a number of Tribes throughout the United States who have ties to the actions of the Department of Energy.

Staff Training:

BFF personnel took refresher trainings for Whistleblower Protections.

BFF personnel completed the Adult First Aid/CPR/AED Training.

Agreement in Principle (AIP) Functional Areas Summary – Grant #DE-EM0005237 0003

1. On-Site Discharges

Water Pollution Control

Document Reviews and Site Inspections:

Water Pollution Control Permit GNEV93001 – The Nevada Division of Environmental Protection’s (NDEP) Bureau of Federal Facilities (BFF) staff received the *Discharge Monitoring Report for Nevada National Security Site Sewage Ponds, Water Pollution Control Permit GNEV93001, April 1 through June 30, 2022*, on July 26, 2022. BFF staff reviewed the report and sent a response letter to the National Nuclear Security Administration/Nevada Field Office (NNSA/NFO) on August 16, 2022, acknowledging the limits set forth in the permit had been met for the quarter. The BFF wording corrections requested in the May 5, 2022, DMR response letter were incorporated into this quarter’s DMR.

The draft *Nevada National Security Site (NNSS) Wastewater Lagoons Operations and Maintenance Plan as per General Discharge Permit GNEV 93001 (O&M Plan)* was received by BFF on April 4, 2022. Following review of the O&M Plan, BFF sent comments in a June 17, 2022, letter. A meeting was held between BFF and Mission Support and Test Services (MSTS) staff on July 13, 2022, to discuss the comments. A revised O&M Plan was received by BFF on August 3, 2022. Following review and an internal meeting, BFF staff met with MSTS on September 13, 2022, to discuss all previous comments and the revised O&M Plan. Based on the meeting discussion and review of all previous documents, BFF staff emailed an additional set of comments on September 20, 2022.

Water Pollution Control Permit GNEV96021 – BFF staff received the *E-Tunnel Wastewater Discharge Permit Quarterly Monitoring Report for Second Quarter 2022* on July 21, 2022. BFF reviewed the report and sent a response letter to NNSA/NFO on August 16, 2022, acknowledging that the report was in compliance with the limits set forth in the permit.

Permit GNEV96021 expired on September 21, 2018. The permit is currently administratively continued. BFF submitted a courtesy copy of the draft renewed permit, along with questions on the submitted permit application, to NNSA/NFO and MSTS personnel via email on April 21, 2022. MSTS personnel submitted comments on the draft permit, along with answers to the application questions, electronically on June 20, 2022. A comment resolution meeting between BFF, MSTS, and NFO personnel was held on July 13, 2022. On September 1, 2022, the changes made to the draft permit by BFF were discussed between BFF, MSTS, and NFO personnel and a revised, redlined version of the Draft E-Tunnel Permit was sent to the NFO and MSTS for re-review on September 6, 2022, with the request that any further comments be submitted to BFF before October 21, 2022. Additional discussion between BFF and MSTS personnel occurred on September 13, 2022. BFF staff developed a schedule to meet a goal of the week of October 31, 2022, for issuance of the permit for a 30-day public review period, which is still on schedule.

Meetings

As stated in the previous quarterly report, due to scheduling conflicts at the end of that quarter, the quarterly water meeting for the second quarter of calendar year 2022 was held on July 6, 2022. The quarterly meeting for the third quarter of calendar year 2022 was held on September 12, 2022. Progress

on the construction of the new sewage ponds at the U1a facility, results of quarterly monitoring, and the status of the Area 23 Mercury ponds and septic tanks were discussed in these meetings.

2. Ground Water Monitoring

There was no activity in this category during this quarter.

3. Air Quality Monitoring

There was no activity in this category during this quarter.

4. Low Level and Mixed Low-Level Waste Oversight

Conference Calls:

Staff participated in weekly Waste Acceptance Review Panel (WARP) meetings via teleconference during July, August, and September 2022. Review panel members discussed waste profile comments and waste-specific compliance issues for generator-submitted low-level radioactive (LLW) and mixed low-level radioactive (MLLW) waste profiles, along with Pre-Treatment Notifications, as they pertain to Nevada National Security Site Waste Acceptance Criteria (NSSWAC), Rev. 16-00, which became effective in February 2017. As applicable, BFF staff reviewed and provided comments on LLW and MLLW profiles (for compliance with NNSWAC, Rev. 16-00) and reviewed all comment responses submitted by the currently approved LLW and MLLW generators. BFF staff also continue to hold internal meetings to discuss comments before submission to WARP.

The revised NNSWAC, DOE/NV--325-22-00 was issued and effective on March 22, 2022. Implementation of the revised NNSWAC by all the approved DOE generators who send waste to the NNS was expected within 210 calendar days (October 18, 2022). At the request of the DOE generators, the implementation of the revised NNSWAC has been extended to January 1, 2023. At that time, BFF staff will review and provide comments on LLW and MLLW profiles for compliance with NNSWAC, DOE/NV--325-22-00.

Documents Reviewed/Letters Issued:

BFF staff received and reviewed the following documents and issued the following letters during this quarter:

EPA Memorandum Dated June 7, 2022 - Open Burning and Open Detonation (OB/OD) of Waste Explosives Under the Resource Conservation and Recovery Act (RCRA).

EnergySolutions (ES) Bear Creek Operations (BCO) Waste Certification Program (WCP) Surveillance Report, Assessment Number A-2912, received on July 7, 2022.

University Of Tennessee-Battelle/Oak Ridge National Laboratory Waste Certification Program (WCP), Audit Report, A-1538, received on July 11, 2022.

Battelle Energy Alliance, LLC (BEA)/Idaho National Laboratory (INL) Waste Certification Program (WCP), Audit Report, A-1542, received on July 25, 2022.

Mid-America Conversion Services, LLC (MCS) Depleted Uranium Hexafluoride Conversion Project (DUF6) – Paducah Waste Certification Program (WCP), Audit Report, A-1540, received on July 27, 2022.

On-Site Assessment/Surveillance to Package TVA Baseplates at Watts Bar Nuclear Plant, Spring City, TN Report, A-2913, received August 6, 2022.

U.S. Army Aberdeen Proving Ground (APG) Waste Certification Program (WCP), Audit Report, A-1539, received on August 8, 2022

Acceptance Of Corrective Actions for Finding I-3844 And Rescission of Suspension of Profile ORTN000000039, Revision 13, 03/25/2020, Oak Ridge Reservation Debris, received on August 11, 2022.

Idaho National Laboratory (INL)/Battelle Energy Alliance (BEA) Waste Certification Program (WCP), Surveillance Report, A-1542, received on August 11, 2022.

On-Site Surveillance to Package TVA Baseplates at Watts Bar Nuclear Plant, Spring City, TN, Audit Report, A-2913, received on August 11, 2022.

On August 16, 2022, BFF issued to the NNSA/NFO Notices of Intent to conduct the 2022 Annual Compliance Evaluation Inspections for the RCRA Permit NEV HW0101 on October 11-13, 2022 and the Annual 2022 Inspection of a Permitted Active Solid Waste Disposal Site, Permit SW 532 on September 26, 2022, which was later mutually changed to November 7, 2022.

Asbestos Shipping Documents – State Reporting, received on August 22, 2022.

Y-12 National Security Complex/Consolidated Nuclear Security, LLC (CNS) Y-12 Weapons Material/Weapons-Related Material Certification Processes, Audit Report, A-1529, received on August 25.

Suspension of Waste Profiles Except as Noted, Radioactive Waste Acceptance Program (RWAP) Audit, Perma-Fix Environmental Services, Inc. (PERMA-FIX) Waste Certification Program (WCP), A-1541, received on September 8, 2022.

Idaho Environmental Coalition, LLC Advanced Mixed Waste Treatment Project (AMWTP) Waste Certification Program (WCP), Audit Report, A-1537, received on September 8, 2022.

Sandia National Laboratories (SNL) Waste Certification Program (WCP), Surveillance Report, A-2990, received on September 19, 2022.

Idaho Environmental Coalition/Idaho Cleanup Project (IEC/ICP) Waste Certification Program, Audit Report, A-1543, received on September 20, 2022.

Nuclear Waste: DOE Needs to Improve Transparency in Planning for Disposal of Certain Low-Level Waste (GAO-22-105636), received on September 29, 2022.

Profiles Reviewed:

Staff reviewed a total of thirteen (13) waste profiles this quarter. Of those thirteen (13) profiles, four (4) were for MLLW and/or hazardous non-radiological waste requiring disposal in the NDEP-permitted RCRA landfill and nine (9) were strictly for LLW requiring disposal in DOE Order 435.1 LLW landfills.

Meetings:

BFF staff participated in a meeting with NNSA/NFO and Navarro on August 26, 2022, to discuss several topics related to the suspension of Perma-Fix's waste program.

on August 29, 2022, BFF staff participated in a Performance Assessment Workshop presented by EM NP contractors regarding the NNS's Radioactive Waste Management Complex's Performance Assessment.

On September 1, 2022, BFF staff participated in the second monthly meeting with NNSA/NFO and MSTs staff to discuss the status of the RCRA permit renewal and NDEP's revisions to the draft RCRA Permit; status of the SW permit, SW-532; the future scheduling of RCRA and SW Compliance Evaluation Inspections (CEIs); and the EPA's memorandum: Open Burn/Detonation. The next monthly meeting will be held in November 2022 due to various scheduling conflicts in October.

On September 21, 2022, BFF staff met with Bureau of Sustainable Materials Management to discuss EPA's inquiry regarding Open Burn/Detonation at DOE and DOD sites in Nevada.

Several meetings with the EM NP, EM Headquarters and NDEP staff were held during July, August, and September to further discuss the disposal of the DRTK00000013, TVA Baseplates wastestream at the NNS, ultimately resulting in satisfactorily addressing NDEP questions.

Waste Planning and Forecasting:

BFF personnel continue development of a waste planning and forecasting document outline to be discussed with the EM NP. No meetings were held this quarter due to scheduling conflicts and resources. It is anticipated that BFF personnel and EM NP will meet in the Fall to further discuss the outline and begin gathering data for the document.

Active Profiles:

There are currently 239 active profiles, comprised of 60 MLLW profiles, 25 LLW/Solid Waste profiles and 154 LLW profiles.

Suspended Profiles:

There are currently two active profiles under suspension pending completion of corrective actions at the generator sites.

Waste Volume

A total of 65,548 ft³ of low-level waste, 694 ft³ Classified Non-Radioactive, 654 ft³ of Classified Non-Radioactive Hazardous, and 1,593 ft³ of Mixed low-level waste was received at the NNSS this quarter.

Waste Profile Analysis:

NDEP personnel continued to update and develop tools to analyze radiological data, regulatory status, and waste profile lifecycle. These tools are being utilized in the development of a waste planning document and assessing the overall waste being disposed at the NNSS.

Site Visits/Radioactive Waste Generator Facility Evaluations:

The RWAP program conducted seven (7) surveillances and four (4) audits this quarter. NDEP participated in the following:

Surveillances

BFF staff participated in two (2) in-person surveillances at the Idaho National Laboratory, Idaho Falls, ID and Sandia National Laboratory, Albuquerque, NM. Pre-audit meetings were attended by appropriate BFF staff.

Audits

BFF staff participated (2) in-person audits at the Y-12 National Security Complex, TN and Perma-Fix Diversified Scientific Services, Inc, Kingston, TN. Pre-audit meetings were attended by appropriate BFF staff.

Y-12 National Security Complex, Oak Ridge, TN – During the week of July 26, 2022, appropriately cleared BFF personnel, along with staff from the EM NP, NNSA/NFO and their contractors participated in an audit of the waste generator, Consolidated Nuclear Security, Inc. (CNS), at the Y-12 National Security Complex. The Audit was scheduled to assess the implementation of the corrective action plan (CAP) in order to reinstate CNS' weapons related material (WRM) waste program. In addition, appropriately cleared personnel, including NDEP, prior to the audit, reviewed a classified profile submitted by CNS as this profile was to be discussed during the audit. While at Y-12, BFF personnel were able to discuss corrective actions taken to re-instate the WRM waste program, observe the waste generating and treatment process at the facility, and ask questions regarding the processes.

Perma-Fix Diversified Scientific Services, Inc., Kingston, TN - During the week of August 23, 2022, BFF personnel, along with staff from the EM NP, and their contractor participated in the audit of the waste generator, Perma-Fix Diversified Scientific Services, Inc. (DSSI), at the Perma-Fix DSSI facility. BFF personnel were able to tour the facility and observe the radiological and chemical characterization processes. BFF staff were observers to the RWAP audit team recommending suspension of the Perma-Fix DSSI WCP because evidence could not be provided demonstrating waste previously shipped was independently verified/inspected, as required by Perma-Fix procedures. The NDEP is awaiting the final audit report from the RWAP team, which is to be sent in early October.

Waste Generating Facility Visits – Sandia National Laboratory, Albuquerque, NM – BFF personnel visited the Sandia National Laboratory waste generator, NT&E Solutions of Sandia, LLC (NT&E), on August 18, 2022. BFF personnel had recently reviewed a draft classified profile submitted by NT&E. DOE had requested NDEP visit Sandia National Laboratory in order to gain an understanding of the waste generating and characterization processes prior to the submittal of a waste profile by NT&E. Appropriately cleared BFF personnel, along with staff from the EM NP and their contractor, visited the facility and discussed in detail the waste generation and characterization processes. BFF personnel were able to observe the waste generating process at the facility and ask questions regarding the process.

Waste Generators Violation Statuses:

CAU 577 – Area 5 Chromium-Contaminated Waste Disposal Cells – This CAU was created in March 2019 to address the closure of five (5) cells at the Radioactive Waste Management Complex (RWMC) at the NNSS that had received trivalent chromium-bearing waste in the past from Nuclear Fuel Services, located in Erwin, TN. Please see previous quarterly reports for a history of events to date. BFF staff received a *Draft Addendum to the Closure Report (CR) for Corrective Action Unit (CAU) 577: Area 5 Chromium Containing Waste Disposal Cells, Nevada National Security Site (NNSS), Nevada, July 2022* on July 27, 2022. BFF staff reviewed the draft addendum and sent a comment letter to the EM NP on September 7, 2022. A *Final Addendum to the Closure Report (CR) for Corrective Action Unit 577: Area 5 Chromium Containing Waste Disposal Cells, Nevada National Security Site (NNSS), Nevada, September 2022* was received by BFF on September 27, 2022. This submission will be reviewed and responded to next quarter, including a Notice of Completion for meeting an established milestone deadline.

Y-12 National Security Complex – BFF and NDEP personnel continued to work on a waste issue originating at the Y-12 National Security Complex (Y-12), located in Oak Ridge. The NDEP was informed of a potential violation of RCRA Permit NEV HW0101 on July 3, 2019. Specific details of events that occurred between July 3, 2019, and September 30, 2022, are provided in the twelve previous quarterly reports. A Settlement Agreement and Administrative Order on Consent (SA) was signed by the NDEP, NNSA/NFO and the EM NP on June 22, 2021, thereby initiating the implementation of 43 separate waste management improvements throughout the DOE complex. During the week of July 26, 2022, NDEP, NNSA/NFO, the EM NP and their respective contractors conducted an audit of the corrective actions instituted for the re-instatement of CNS' weapons related material (WRM) waste program. The WRM program remains suspended until deficiencies identified by the NNSA/NFO, the EM NP and their respective contractors are addressed by CNS.

An updated status on deliverables required by the SA was provided to the bureau by the NNSA/NFO and the EM NP on July 6, 2022. As required by the SA, on July 19, 2022, BFF received a submittal of the *Nevada National Security Site (NNSS) Radioactive Waste Acceptance Program (RWAP) Finding of Alleged Violation (FOAV) Action 7, Letter Report for Selection of the Low-Level Waste (LLW) Profiles Subject to Enhanced Verification During Year Two of the Study*. Additionally, on September 14, 2022, BFF received a submittal of the *Nevada National Security Site Radioactive Waste Acceptance Program (RWAP) Finding of Alleged Violation (FOAV) Action 12 and Action 14*. These documents have been reviewed and an acknowledgement of receipt and current status of all the requirements of the SA will be sent to the EM NP next quarter.

5. Waste Management

Documents Reviewed/Letters Issued:

BFF staff received the Updated Application for Renewal of Resource Conservation and Recovery Act (RCRA) Permit NEV HW0101, U.S. Environmental Protection Agency (EPA) ID Number NV3890090001, on January 18, 2022. BFF issued a response with comments and questions on the Application to NNSA/NFO on April 12, 2022. A response to the April 12, 2022, letter was received from the NNSA/NFO on July 20, 2022. Responses/permit revisions were drafted by BFF throughout the quarter and a Final Draft RCRA permit for review was emailed to the NNSA/NFO and EPA, Region 9 on September 28, 2022. Comments are due to BFF from both agencies by October 28, 2022.

As part of the RCRA permit renewal/revision, BFF staff reviewed the *Environmental Monitoring Plan for the Area 5 Radioactive Waste Management Site, Nevada National Security Site, Nevada, Revision 0, August 2022*, received via email on August 11, 2022, from MSTs.

BFF staff reviewed comment responses, received via email on July 22, 2022, from the EM NP in answer to BFF's June 10, 2022, comments on the *Post-Closure Report for Closed Resource Conservation and Recovery Act Corrective Action Units, Nevada National Security Site, Nevada for Calendar Year 2021, Revision 0, May 2022*, which had been received on May 9, 2022. The EM NP was notified that the comment responses were satisfactory on August 11, 2022. Revision 1 of the Report was received on August 24, 2022. BFF acknowledged in a letter dated September 13, 2022, that the EM NP had satisfied the 2021 post-closure monitoring requirements.

BFF staff reviewed the *NNSS Area 23 Semi-Annual Solid Waste Disposal Site (SWDS) Report for the NNSS – January 1, 2022 through June 30, 2022*, received on July 25, 2022. BFF issued a response to NNSA/NFO on August 11, 2022, acknowledging that NNSA/NFO satisfied the permit and regulatory requirement.

BFF staff reviewed the *NNSS Area 5 Asbestos Waste Disposal Report for Second Quarter of Calendar Year (CY) 2022 for Permit NEV HW0101*, received on July 11, 2022. BFF issued a response to NNSA/NFO on August 11, 2022, acknowledging that NNSA/NFO satisfied the permit and regulatory requirement.

BFF staff reviewed the *NNSS Area 5 Asbestos Waste Disposal Report for Second Quarter of Calendar Year (CY) 2022 for Permit SW532*, received on July 11, 2022. BFF issued a response to NNSA/NFO on August 11, 2022, acknowledging that NNSA/NFO satisfied the permit and regulatory requirement.

BFF staff received and reviewed the *NNSS Quarterly Hazardous Waste Volume Report and Fee: Second Quarter Calendar Year 2022*, on July 19, 2022, and forwarded it to BFF fiscal staff for proper disbursement.

On August 16, 2022, BFF issued to the NNSA/NFO a Notice of Intent to conduct the Annual 2022 Inspection of Permitted Active Solid Waste Disposal Sites, Permits Nos. SW 13 097 02, SW 13 097 03, and SW 13 097 04 on September 27, 2022, which was later mutually changed to November 8, 2022.

BFF received the *Evapotranspiration Cover for Cell 18, Construction Acceptance Report, Revision 0*, dated December 27, 2021, in an email from NNSA/NFO on September 6, 2022. BFF staff acknowledged receipt of the Report in a letter dated September 12, 2022.

BFF staff submitted a Draft Area 9 SW 13 097 03 SW permit to NNSA/NFO on September 8, 2022, for review and comment. Comments were received by BFF on September 28, 2022. BFF staff are finalizing revisions to the permit, which will be issued early next quarter.

Conference Calls/Meetings:

On September 1, 2022, BFF staff participated in the second monthly meeting with NNSA/NFO and MSTs staff to discuss the status of solid waste permits SW 13 097 02, SW 13 097 03, SW 13 097 04 and the future scheduling of SW CEIs. The next monthly meeting will be held in November 2022 due to various scheduling conflicts in October. Several internal meetings were also held this quarter in regard to the revision of permit SW 13 097 03.

6. Major Program Proposals

There was no activity in this category during this quarter.

7. Historic Preservation

Funding has been provided to the SHPO for historic reviews at DOE and/or the NNSS during the year.

8. Environmental Monitoring Program and Report

There was no activity in this category during this quarter.

9. Sampling

No sampling activities were conducted by the Bureau during this quarter.

10. Safe Drinking Water

Document Reviews and Site Inspections

For training purposes, BFF personnel accompanied Bureau of Safe Drinking Water (BSDW) personnel on a Sanitary Survey of PWS NV0002565 on July 27, 2022. Sanitary Surveys and Significant Deficiencies for Transient Systems were reviewed on July 7, 2022.

BFF and BSDW staff completed a Sanitary Survey of the NNSS drinking systems located at the NNSS on September 19, and 20, 2022. PWS NV0004099 and part of PWS NV0000360 were inspected on September 19, 2022, with the remainder of PSW NV0000360 and NV00004098 inspected on September 20, 2022.

The BFF was copied on the following BSDW reports submitted by NNSA/NFO contractors. BFF reviewed the reports referenced below, had no comments, and filed appropriately:

- a) July 2022 Coliform Results NNS PWS NV0000360, PWS NV0004098 & Water Truck 84847
- b) July 2022 NNS Water Hauling Plan: Water Hauling Truck 84847
- c) August 2022 Coliform Results NNS PWS NV0000360, PWS NV0004098 & Water Trucks 84846 & 84847
- d) August 2022 NNS Water Hauling Coliform Results: Water Hauling Truck 84846 & 84847
- e) September 2022 Coliform Results NNS PWS NV0000360, PWS NV0004098, PWS NV0004099, Water Trucks 84846 & 84847
- f) PWS NV0000360 Third Quarter 2022 Chlorine Residuals
- g) PWS NV0000360 Lead and Copper Monitoring Report
- h) PWS NV0000360 and PWS NV0004098 secondary standards; PWS NV0000360, PWS NV0004098, PWS NV0004099 nitrates
- i) NNS PWS NV0000360 TTHM-HAA Report
- j) Corrected Total Trihalomethane and Haloacetic Acid Yearly Monitoring Report for PWS NV0000360

Meetings:

BFF and BSDW staff met in early July to discuss BFF safe drinking water responsibilities at the NNS.

As stated in the previous quarterly report, due to scheduling conflicts at the end of that quarter, the quarterly water meeting for the second quarter of calendar year 2022 was held on July 6, 2022. Please refer to last quarter's report for topics discussed during that meeting.

The quarterly meeting for the third quarter of calendar year 2022 was held on September 12, 2022. The following items were discussed:

- There were no main or line breaks this quarter.
- The replacement pump and motor for Well 4A, that had been out of service for the months of July and August 2022, was due to arrive at the site in the September 22-23, 2022 timeframe. The install of the replacement pump and motor was planned to be performed inhouse.
- Chlorinators are slated for replacement installations for 4A and 5 booster locations within the next year.
- A subcontractor has been consulted on the J-14 replacement and has run a video log.
- The BSDW approved a new stainless-steel sleeve, pump screen, and column pipe for the J-14 replacement.
- Well 16-B is being used to supply water to Area 1 for making sand to certain specifications for projects.
- Restroom trailers are continuing to be added to accommodate the expansion work occurring at U1a.
- The water hauling trucks that had been in the shop for repair earlier this calendar year are back in service and are being sampled. Sample analyses using the appropriate method will be performed.

- Lead and copper monitoring had been performed. As one of the ten samples had a high result, faucets are going to be replaced in the building in question and a new sample will be collected. Since nine of the ten samples initially taken had results within the allowable limits and the requirement is that nine of the ten samples are within those limits, the faucet replacements and resampling are being done as a best practice.

Fiscal Analysis:

Estimate of personnel resources used (FTE or hours)

The bureau of Federal Facilities is made up of a Bureau Chief, one supervisor, one subject matter expert, three technical staff and an administrative assistant. The AIP grant funds activities for each of these individuals. For the quarter, that represents approximately 4.0 FTEs based on a review of grant related activities.

Total expenditures for each task area

A total of approximately \$146,000 was spent during this quarter for AIP work. This is the most current figure available at this time and includes personnel, operating, information services, DOE oversight and purchasing costs.

Comparison of estimate to budgeted expenses:

Expenses this quarter were within the legislatively approved spending limits.

Miscellaneous:

The chief participated in monthly NDEP Attorney General staff meetings, bi-weekly Division-Wide Chief's Staff Meetings and bi-weekly meetings with the Administrator either in person or via virtual meetings in July, August and September 2022.

During this quarter, the bureau chief attended/participated virtually in: (1) numerous calls, Zoom meetings and/or webinars as a member of the NGA's Federal Facilities Task Force (FFTF), the State, Tribal, Government Working Group (STGWG), the Environmental Council of States (ECOS) and/or the Combined Intergovernmental Working Group (CIWG); (2) meetings with NDEP fiscal staff; (3) regular bureau staff meetings and meetings with individual staff; (5) the Annual National Cleanup Workshop Summit; (5) a "check-in" meeting with the NNSA/NFO Field Manager; (6) an interview for the BFF Supervisor position; and, (7) a meeting with a Nevada legislative aid to discuss the NNSS.

Staff Training:

BFF personnel attended Tri-State Seminar at the South Point Hotel and Casino for three days in August 2022 for agreement-in-principle work-related trainings.

BFF personnel took refresher trainings for Whistleblower Protections.

BFF personnel completed the American Red Cross Adult First Aid/CPR/AED Training at the end of July 2022 in the NDEP Las Vegas office.

BFF personnel received training and access to the SWIFT software to complete reports for the Sanitary Survey completed at the NNSS.

BFF personnel completed the 40-hour five-day RCRA McCoy's Seminar for hazardous waste.