

# UNITED STATES NUCLEAR REGULATORY COMMISSION

WASHINGTON, D.C. 20555-0001

March 26, 2018

Mr. Scott T. Anderson, Director Division of Waste Management and Radiation Control Department of Environmental Quality P.O. Box 144880 Salt Lake City, UT 84114-4880

Dear Mr. Anderson:

On February 27, 2018, the Management Review Board (MRB), which consisted of U.S. Nuclear Regulatory Commission (NRC) senior managers and an Organization of Agreement States Liaison to the MRB, met to consider the proposed final Followup Integrated Materials Performance Evaluation Program (IMPEP) report for the Utah Agreement State Program. The MRB found the Utah program adequate to protect public health and safety and compatible with the NRC program.

The enclosed final report contains a summary of the IMPEP team's findings (Section 5.0) and recommendations. The review team made no new recommendations regarding program performance by the Utah Agreement State Program during this review and closed out the sole recommendation from the 2015 review. Based on the results of the current IMPEP review, a full IMPEP review of the Utah Agreement State Program will take place in July 2019, as scheduled.

I appreciate the courtesy and cooperation extended to the IMPEP team during the review. I also wish to acknowledge your continued support for the Agreement State program. I look forward to our agencies continuing to work cooperatively in the future.

Sincerely,

#### /RA/

Daniel H. Dorman
Acting Deputy Executive Director for Materials,
Waste, Research, State, Tribal, Compliance,
Administration, and Human Capital Programs
Office of the Executive Director for Operations

#### **Enclosures:**

- 1. Utah Final Followup IMPEP Report
- 2. Utah Periodic Meeting Summary

cc: Jennifer Opila, CO Organization of Agreement States Liaison to the MRB



INTEGRATED MATERIALS PERFORMANCE EVALUATION PROGRAM FOLLOWUP REVIEW OF THE UTAH AGREEMENT STATE PROGRAM

DECEMBER 12 - 13, 2017

**FINAL REPORT** 

#### **EXECUTIVE SUMMARY**

This report presents the results of the followup Integrated Materials Performance Evaluation Program (IMPEP) review of the Utah Agreement State Program. The review was conducted during the period of December 12 – 13, 2017, by a team comprised of technical staff members from the U.S. Nuclear Regulatory Commission (NRC) and the State of Washington.

Based on the results of this review, the team recommended, and the Management Review Board (MRB) agreed, that Utah's performance was satisfactory for the two indicators reviewed: Technical Quality of Incident and Allegation Activities and Compatibility Requirements.

The team did not make any new recommendations and the MRB agreed that the recommendation from the 2015 IMPEP review, regarding financial surety statutes for the low level radioactive waste disposal site, should be closed (see Section 2.0).

Other aspects of the Utah Agreement State Program not fully evaluated as part of the followup review were discussed at a Periodic Meeting held in conjunction with the followup review (see Appendix B).

Accordingly, the team recommended, and the MRB agreed, that the Utah Agreement State Program is adequate to protect public health and safety and compatible with the NRC's program. The team recommended, and the MRB agreed, that the next full IMPEP review should take place in July 2019, as scheduled.

# 1.0 INTRODUCTION

This report presents the results of the followup review of the Utah Agreement State Program. The review was conducted during the period of December 12 – 13, 2017, by a team comprised of technical staff members from the U.S. Nuclear Regulatory Commission (NRC) and the State of Washington. Team members are identified in Appendix A. The review was conducted in accordance with the "Agreement State Program Policy Statement," published in the *Federal Register* on October 18, 2017, and NRC Management Directive (MD) 5.6, "Integrated Materials Performance Evaluation Program (IMPEP)," dated February 26, 2004. Preliminary results of the followup review, which covered the period of August 1, 2015, to December 13, 2017, were discussed with Utah management on the last day of the review.

In preparation for the review, a questionnaire addressing the applicable common and non-common performance indicators was sent to Utah on August 31, 2017. Utah provided its response to the questionnaire on November 22, 2017. A copy of the questionnaire response is available in the NRC's Agencywide Documents Access and Management System (ADAMS) using the Accession Number ML17331A669.

A draft of this report was issued to Utah on January 11, 2018, for factual comment (Accession Number ML18008A163). Utah responded to the findings and conclusions of the review by letter dated January 29, 2018. A copy of the response is available in ADAMS (Accession Number ML18030B063). The Management Review Board (MRB) convened on February 27, 2018, to discuss the team's findings.

The Utah Agreement State Program is administered by the Uranium Mills and Radioactive Materials Section (UMills/RAM Section) and the Low-Level Radioactive Waste Section (LLRW Section) within the Division of Waste Management and Radiation Control (the Division). The Division is part of the Utah Department of Environmental Quality. Organization charts for Utah are available in ADAMS (Accession Number ML18008A111).

At the time of the review, the Utah Agreement State Program regulated 210 specific licenses authorizing possession and use of radioactive materials. The review focused on the radioactive materials program as it is carried out under the Section 274b. (of the Atomic Energy Act of 1954, as amended) Agreement between the NRC and the State of Utah.

The followup review focused on Utah's performance with regard to the common performance indicator, Technical Quality of Incident and Allegation Activities, and non-common performance indicator, Compatibility Requirements, including the sole recommendation made during the 2015 IMPEP review (ADAMS Accession Number ML15306A357). Other aspects of the Utah Agreement State Program not fully evaluated as part of the followup review were discussed at a Periodic Meeting held in conjunction with the followup review. The Periodic Meeting summary is included as Appendix B.

The team evaluated the information gathered against the established criteria for the applicable common and non-common performance indicators and made a preliminary assessment of the Utah Agreement State Program's performance.

#### 2.0 PREVIOUS IMPEP REVIEW AND STATUS OF RECOMMENDATIONS

The previous IMPEP review concluded on July 31, 2015. The final report is available in ADAMS (Accession Number ML15306A357). The results of the review and the status of the single recommendation are as follows:

Technical Staffing and Training: Satisfactory

Recommendation: None

Status of Materials Inspection Program: Satisfactory

Recommendation: None

Technical Quality of Inspections: Satisfactory

Recommendation: None

Technical Quality of Licensing Actions: Satisfactory

Recommendation: None

Technical Quality of Incident and Allegation Activities: Satisfactory, but Needs

Improvement

Recommendation: None

Compatibility Requirements: Unsatisfactory

Recommendation: The review team recommends that the State modify financial surety statutes for the LLRW disposal site, such that the statutes ensure adequate financial surety and do not conflict with Federal requirements.

Status: As part of this review, the team performed an in-depth analysis of the State's actions in response to this recommendation. As detailed in Section 4.1 of this report, this recommendation is closed.

Low-Level Radioactive Waste Disposal Program: Satisfactory

Recommendation: None

Uranium Recovery Program: Satisfactory

Recommendation: None

Overall finding: Adequate to protect public health and safety and not compatible with the

NRC's program.

# 3.0 COMMON PERFORMANCE INDICATORS

Five common performance indicators are used to review the NRC regional and Agreement State radioactive materials programs. These indicators are: (1) Technical Staffing and Training; (2) Status of Materials Inspection Program; (3) Technical Quality of Inspections; (4) Technical Quality of Licensing Actions; and (5) Technical Quality of Incident and Allegation Activities. Four of these indicators were found satisfactory during the 2015 IMPEP review and were not reviewed as part of this followup review in accordance with State Agreements procedure SA-119, "Followup Integrated Materials Performance Evaluation Program Reviews." These topics were discussed during the Periodic Meeting held concurrently with the followup review (Appendix B).

# 3.1 <u>Technical Quality of Incident and Allegation Activities</u>

The quality, thoroughness, and timeliness of response to incidents and allegations of safety concerns can have a direct bearing on public health and safety. An assessment of incident response and allegation investigation procedures, actual implementation of these procedures, internal and external coordination, and investigative and followup actions, are a significant indicator of the overall quality of the incident response and allegation programs.

### a. Scope

The team used the guidance in State Agreements procedure SA-105, "Reviewing the Common Performance Indicator: Technical Quality of Incident and Allegation Activities," and evaluated Utah's performance with respect to the following performance indicator objectives:

- Incident response, investigation, and allegation procedures are in place and followed.
- Response actions are appropriate, well-coordinated, and timely.
- On-site responses are performed when incidents have potential health, safety, or security significance.
- Appropriate followup actions are taken to ensure prompt compliance by licensees.
- Followup inspections are scheduled and completed, as necessary.
- Notifications are made to the NRC Headquarters Operations Center for incidents requiring a 24-hour or immediate notification to the Agreement State or NRC.
- Incidents are reported to the Nuclear Material Events Database (NMED).
- Allegations are investigated in a prompt, appropriate manner.
- Concerned individuals are notified of investigation conclusions.
- Concerned individuals' identities are protected, as allowed by law.

## b. <u>Discussion</u>

During the review period, 16 incidents were recorded by the Utah program. The team examined casework for seven incidents (six reportable and one non-reportable) to evaluate Utah's performance. The casework reviewed included two incidents involving

equipment failures, two incidents involving lost or stolen radioactive material, two medical events, and one event involving a damaged portable gauge.

The team determined that there was significant improvement in Utah's radioactive material incident response program since the 2015 IMPEP review. The previous IMPEP team identified cases where the incident response procedures were not always followed or implemented appropriately. The team found that, during this review period, UMills/RAM Section staff followed written procedures, responded appropriately to all of the events reviewed and thoroughly documented findings. The team noted that enforcement actions were taken when necessary and were well documented.

Utah's UMills/RAM Section Manager stated their philosophy is to deploy "boots on the ground" to ensure events are appropriately evaluated and radiation hazards are mitigated. When an event is reported to Utah, the UMills/RAM Section Manager (or an inspector if the Section Manager is not available) determines the appropriate response. The team found that Utah responds immediately to the incident site for all incidents that have not been mitigated by the licensee at the time of the licensee's notification. If the licensee reports the incident after the event has been mitigated, then Utah sends an inspector to the licensee's office of record for additional followup.

Another area that showed improvement from the previous IMPEP review was timely reporting of events to the NRC's Headquarters Operations Officer (HOO) for inclusion in NMED. Eleven of the 16 incidents recorded by Utah during the review period were reported to the HOO, including all reportable incidents. The team determined that in each case reviewed, the UMills/RAM Section reported the events well within the required timeframe. The team verified that the other five incidents were not reportable.

During the review period, one allegation involving radioactive materials was received directly by the UMills/RAM Section and no allegations involving radioactive materials were referred to Utah by the NRC. The team evaluated the UMills/RAM Section's response to the single allegation and determined that the Section took prompt and appropriate action in response to the concerns raised. The allegation was appropriately closed, the concerned individual was notified of the actions taken by the UMills/RAM Section, and the alleger's identity was protected.

# c. Evaluation

The team determined that, during the review period, Utah met the performance indicator objectives listed in Section 3.1.a., and recommended that Utah's performance with respect to the indicator, Technical Quality of Incident and Allegation Activities, be found satisfactory.

## d. MRB Conclusion

The MRB agreed with the team's recommendation and found Utah's performance with respect to this indicator to be satisfactory.

# 4.0 NON-COMMON PERFORMANCE INDICATORS

Four non-common performance indicators are used to review Agreement State programs: (1) Compatibility Requirements; (2) Sealed Source and Device (SS&D) Evaluation Program; (3) LLRW Program; and (4) Uranium Recovery Program. The NRC's Agreement with Utah retains regulatory authority for SS&D evaluations. The final two indicators were found "Satisfactory" during the 2015 review and were discussed during the Periodic Meeting (Appendix B). Hence only the first non-common performance indicator was reviewed during this followup review in accordance with State Agreements procedure SA-119, "Followup Integrated Materials Performance Evaluation Program Reviews."

# 4.1 Compatibility Requirements

State statutes should authorize the State to establish a program for the regulation of agreement material and provide authority for the assumption of regulatory responsibility under the agreement. The statutes must authorize the State to promulgate regulatory requirements necessary to provide reasonable assurance of protection of public health, safety, and security. The State must be authorized through its legal authority to license, inspect, and enforce legally binding requirements, such as regulations and licenses. NRC regulations that should be adopted by an Agreement State for purposes of compatibility or health and safety should be adopted in a time frame so that the effective date of the State requirement is not later than three years after the effective date of the NRC's final rule. Other program elements, as defined in Appendix A of State Agreements procedure SA-200, "Compatibility Categories and Health and Safety Identification for NRC Regulations and Other Program Elements," that have been designated as necessary for maintenance of an adequate and compatible program should be adopted and implemented by an Agreement State within six months following NRC designation.

# a. Scope

The team used the guidance in State Agreements procedure SA-107, "Reviewing the Non-Common Performance Indicator: Compatibility Requirements," and evaluated Utah's performance with respect to the following performance indicator objectives. A complete list of regulation amendments can be found on the NRC website at the following address: <a href="https://scp.nrc.gov/regtoolbox.html">https://scp.nrc.gov/regtoolbox.html</a>.

- The Agreement State program does not create conflicts, duplications, gaps, or other
  conditions that jeopardize an orderly pattern in the regulation of radioactive materials
  under the Atomic Energy Act, as amended.
- Regulations adopted by the Agreement State for purposes of compatibility or health and safety were adopted no later than three years after the effective date of the NRC regulation.
- Other program elements, as defined in SA-200, that have been designated as necessary for maintenance of an adequate and compatible program have been adopted and implemented within six months of NRC designation.

- The State statutes authorize the State to establish a program for the regulation of agreement material and provide authority for the assumption of regulatory responsibility under the agreement.
- The State is authorized through its legal authority to license, inspect, and enforce legally binding requirements such as regulations and licenses.
- Impact of sunset requirements, if any, on the State's regulations.

## b. Discussion

Utah became an Agreement State on April 1, 1984. The Utah Agreement State Program's statutory authority is contained in the Utah Code Annotated, Title 19, Chapter 3, Radiation Control Act. The Division is designated as Utah's radiation control agency. Two legislative amendments affecting the radiation control program were passed during the review period. Both went into effect on May 8, 2017. House Bill 296 – Radioactive and Hazardous Waste Account Amendments, modified perpetual care requirements for waste facilities and contained additional requirements for the state treasurer. The other, Senate Bill 79 (S.B. 79) – Waste Management Amendment, is discussed below.

Utah provided Senate Bill 173 (S.B. 173) – Financial Assurance Determination Review Process, and S.B. 244 – Department of Environmental Quality Modifications, to the NRC for compatibility review on February 25, 2015. In a letter dated March 18, 2015, the NRC provided three comments to Utah. Two comments identified that financial surety program elements contained in S.B. 173 could cause conflicts, duplications, or gaps in the orderly pattern of regulations on a nationwide basis. Additionally, the NRC made a third comment involving S.B. 244 limiting inspection authority to exclude inspections of facilities under the regulatory jurisdiction of the NRC or other Agreement States. As part of the legislative process, Utah provided input to reconcile the NRC's concerns and address the financial surety conflicts; however, that input was not included in the final bill. The Utah legislature passed S.B. 173 and S.B. 244 on March 4, 2015, and they became effective on May 12, 2015.

The 2015 IMPEP review concluded on July 31, 2015. The team found that Utah's legislation was in conflict with the federal regulations contained in *Title 10 Code of Federal Regulations 61.62* for financial surety of the LLRW disposal site. Utah was found unsatisfactory for the indicator Compatibility Requirements and a recommendation was made for the State to modify financial surety statutes for the LLRW disposal site, such that the statutes ensure adequate financial surety and do not conflict with Federal requirements. On October 21, 2015, the Division provided a response to the NRC's March 18, 2015, comment letter. In its response, Utah committed to working with the NRC to resolve the comments appropriately. The MRB met on October 29, 2015. The MRB agreed with the team's recommendations involving this legislation and found Utah unsatisfactory for this indicator.

In a letter dated February 25, 2016, Utah submitted draft legislation S.B. 231 – Waste Management Amendments, to the NRC for review. On March 9, 2016, the NRC responded to Utah with comments on the draft amendments. Utah was not able to

develop revised legislation in time for the 2016 legislative session, which ended on March 10, 2016. At the time of the November 3, 2016, periodic meeting, Utah planned to incorporate NRC comments and develop revised legislation for the 2017 legislative session.

Utah submitted Senate Bill 79 (S.B. 79) – Waste Management Amendment, to NRC for review in a letter dated January 12, 2017. This legislation was intended to resolve the incompatibilities previously noted by the NRC. The NRC responded to Utah in a February 14, 2017, letter. S.B. 79 was passed on March 7, 2017, and became effective May 8, 2017. The final legislation was provided to the NRC in a May 9, 2017, letter. The NRC responded with a June 27, 2017 letter noting that the legislation addressed all previous NRC comments. The team determined that Utah resolved the compatibility issues noted during the previous review and the recommendation made by the 2015 team in this performance indicator, regarding financial surety statutes for the LLRW disposal site, should be closed (as noted in Section 2.0).

One outstanding issue was noted by the team during the followup review. Comment #3 from the NRC's March 18, 2015, letter, pertaining to S.B. 244, specified that "Utah needs to indicate that the State provision will limit the inspection authority to exclude inspections of facilities under the regulatory jurisdiction of the NRC or other Agreement States." In an October 21, 2015, letter, Utah provided an initial response to this comment. However in its November 25, 2015, letter, the NRC stated that "Utah needs to provide an Attorney General opinion specifically stating whether the legislation limits the inspection authority to exclude inspections of facilities under the regulatory jurisdiction of the NRC or other Agreement States." As of December 13, 2017, Utah had not submitted the Attorney General opinion to the NRC. During the followup review, Utah indicated that it would submit an Attorney General opinion to the NRC in order to resolve this issue. Subsequent to the on-site review, Utah provided a January 12, 2018, letter to the NRC addressing this issue. The NRC staff reviewed the letter and in a February 16, 2018, response formally closed this previously unresolved comment (Accession Number ML18019A108).

With regard to regulations, the State's regulation development process usually takes three to four months, depending on the complexity of the regulations and level of stakeholder involvement. For regulations impacting uranium mills and the LLRW disposal site, there has been a significant level of stakeholder involvement in the regulation development process. In accordance with Utah law, the Waste Management and Radiation Control Board (the Board) is authorized to perform all administrative rulemaking functions for the radioactive materials program. The Division normally takes approximately a month to draft new rules for the Board's consideration and action. After receiving approval from the Board, the rules are published in the Utah Bulletin to initiate formal public notice of the rulemaking action and to allow for a public comment period.

Final adoption of a rule that does not require any further amendments following the public comment period, as well as setting an effective date must be completed no later than 120 days from the Utah Bulletin publication date. If the rule is not completed within 120-day timeline, then the rulemaking process must be repeated and completed within a new 120-day time period. The public has an opportunity to comment on new or

amended rules. A 30-day comment period begins when the new or amended rule is published in the Utah Bulletin. The team noted that the State's rules and regulations are subject to sunset review. By state law (UCA 63G-3-305), each State Agency is required to review each of its administrative rules every 5 years. Agencies file a "5-Year Notice of Review and Statement of Continuation" to meet the requirement.

During the review period, Utah submitted six proposed regulation amendments, eight final regulation amendments, and the aforementioned legislation to the NRC for review. Two regulation amendments were overdue for State adoption at the time of submission. The two amendments (Regulation Action Tracking System identification 2011-1 and 2013-2) were approximately one month and four months overdue, respectively. At the time of the review, no amendments were overdue for adoption.

## c. Evaluation

The team determined that, during the review period, Utah met the performance indicator objectives listed in Section 4.1.a, and recommended that Utah's performance with respect to the indicator, Compatibility Requirements, be found satisfactory.

### d. MRB Conclusion

The MRB agreed with the team's recommendation and found Utah's performance with respect to this indicator to be satisfactory.

# 5.0 SUMMARY

As noted in Sections 3.0 and 4.0 above, Utah's performance was found to be satisfactory for the two performance indicators reviewed. The team did not make any new recommendations regarding Utah's performance and the MRB agreed that the recommendation from the 2015 IMPEP review should be closed.

Accordingly, the team recommended, and the MRB agreed, that the Utah Agreement State Program is adequate to protect public health and safety and compatible with the NRC's program. Based on the results of the current IMPEP review, the team recommended, and the MRB agreed, that the next full IMPEP review should take place in July 2019.

# LIST OF APPENDICES

Appendix A IMPEP Review Team Members

Appendix B Periodic Meeting Summary

# APPENDIX A

# IMPEP REVIEW TEAM MEMBERS

Name	Areas of Responsibility
Lance Rakovan, NMSS	Team Leader Technical Quality of Incident and Allegation Activities Compatibility Requirements
Binesh Tharakan, NRC Region IV	Technical Quality of Incident and Allegation Activities
Kristen Schwab, WA	Compatibility Requirements

#### APPENDIX B

# PERIODIC MEETING SUMMARY FOR THE UTAH AGREEMENT STATE PROGRAM DATE OF MEETING: DECEMBER 13, 2017

U.S. Nuclear Regulatory Commission	Utah Department of Environmental Quality
(NRC) Attendees	Attendees
Binesh Tharakan, State Agreements Officer,	Scott Anderson, Director, Division of Waste
Region IV	Management and Radiation Control
Mark Shaffer, Director, Division of Nuclear	Rusty Lundberg, Deputy Director, Division of
Materials Safety, Region IV	Waste Management and Radiation Control
Lance Rakovan, Senior Health Physicist,	Phil Goble, Manager, Uranium Mills and
Agreement State Program Branch, NMSS	Radioactive Materials Section
Kristen Schwab, Washington State	Otis Willoughby, Environmental Scientist,
Department of Health	Low-Level Radioactive Waste Section

#### DISCUSSION:

This periodic meeting was conducted during the followup Integrated Materials Performance Evaluation Program (IMPEP) review of the Utah Agreement State Program. The Utah Agreement State Program is administered by the Uranium Mills and Radioactive Materials Section (UMills/RAM Section) and the Low-Level Radioactive Waste Section (LLRW Section) within the Division of Waste Management and Radiation Control (the Division). The Division is part of the Utah Department of Environmental Quality.

The most recent full IMPEP review was conducted the week of July 27-31, 2015. The Management Review Board (MRB) met on October 29, 2015, to discuss the results of this IMPEP review. Utah's performance was found satisfactory for six of the eight performance indicators reviewed. The Technical Quality of Incident and Allegation Activities performance indicator was found to be satisfactory, but needs improvement. The Compatibility Requirements performance indicator was found to be unsatisfactory. The cause of the unsatisfactory finding was due to revisions to Utah statutes addressing financial surety that were not compatible with NRC requirements. The revisions were made by the Utah State Legislature during the 2015 General Session and became effective on May 12, 2015. The review team made one new recommendation and determined that the three recommendations from the previous 2011 IMPEP review should be closed. The review team recommended that the State modify financial surety statutes for the LLRW disposal site, such that the statutes ensure adequate financial surety and do not conflict with federal requirements.

Accordingly, the review team recommended to the MRB that the Utah Agreement State Program be found adequate to protect public health and safety, but needs improvement, and not compatible with the NRC's program. The review team also recommended that the NRC initiate a period of heightened oversight for Utah. However, the MRB found the Utah Agreement State Program adequate to protect public health and safety and not compatible with the NRC's program, but without a period of heightened oversight. The review team recommended, and the MRB agreed, that a periodic meeting be held within one year and that a followup IMPEP review take place approximately one year following the periodic meeting. The following is the summary of the periodic meeting conducted during the followup IMPEP review.

# **Program Challenges**

The Division of Solid and Hazardous Waste and the Division of Radiation Control merged on July 1, 2015. The previous challenges of the merger into a new division no longer exist. Management techniques, staff roles and responsibilities, and organizational processes are well established. With more than two years of experience since the merger, the Division Director stated that he believes the Division has evolved past the initial challenges of the merger. The Division continues to adapt to changes, both internally and externally. The Division Director indicated that these changes are a program evolution, rather than a challenge for their program.

A significant amount of external stakeholder interactions in the uranium recovery and LLRW program areas continues to challenge the staff and management of the Division. The additional work required to respond to stakeholders reduces staff resources available to complete routine inspection and licensing work in these areas. The Division continues to manage these resources without any negative impacts to the implementation of the Agreement State program thus far.

A potential challenge is that some key members of the Division's staff are near the end of their careers (i.e., an aging workforce). Therefore, time off and retirements could adversely impact the Division's capability to keep up with its current workload because of the long period of time it takes to train and qualify new staff. The Division has been meeting this challenge by cross-training staff in multiple disciplines to reduce or mitigate the effects of retirements and attrition. The Division has the option to hire new staff and double encumber positions in anticipation of retirements if there are adequate budget resources.

## **Program Reorganizations**

There have been no reorganizations since the 2015 IMPEP.

# Program Budget/Funding

No changes or issues with funding were reported by the Division. The funding for the Division remains steady and is adequate to implement the Utah Agreement State Program. The UMills and LLRW programs are funded by a monthly flat fee charged to the licensees in each program. The RAM program is funded by license fees charged to RAM licensees and Utah's general fund. Any noncompliance issues that result in fines or civil penalties received by the Division are returned to Utah's general fund.

# Feedback on NRC's Program

The Division expressed gratitude for the cost-free training provided by the NRC. The cost-free training reduces the burden on Utah and helps their staff become qualified in a timely manner. The Division also complimented the blended learning classes and webinars offered by the NRC as an effective and efficient method to train their staff.

The Division continues to request that the NRC provide advanced notification or stagger requests for comments that are solicited from the Agreement States. The Division believes there are still a significant number of working group documents, regulations, and information requests sent to the Agreement States for review and comments. The Division was informed that NMSS closely monitors these requests and coordinates with the Organization of Agreement

States to ensure that the pace of these requests do not place an overwhelming burden on the Agreement State programs around the country.

# Technical Staffing and Training (2015 IMPEP Satisfactory)

Technical staffing and training for the radioactive materials portion of the UMills/RAM Section is described below. The uranium recovery and LLWR programs will be presented later.

At the time of the 2015 IMPEP, there were 4.5 Full-Time Equivalent (FTE) positions dedicated to the RAM program. There were no changes to staffing levels since the 2015 IMPEP review. The RAM program included four qualified technical staff and the Section and Division managers. Since the 2015 IMPEP, two staff members retired. The vacancies existed for a period of five to seven months. Two new staff members were hired during the review period. One was a qualified inspector from another Agreement State. The other individual is going through the training and qualification program.

At the time of the periodic meeting, there were no vacancies. The Division reported that the staffing level is adequate to implement the radioactive materials program; however, that could be challenged if personnel become absent for extended periods, retire, or leave the Division.

Utah's RAM training and qualification program is equivalent to NRC's Manual Chapter 1248 training requirements including the requirements for periodic refresher training.

# Status of Materials Inspection Program (2015 IMPEP Satisfactory) Technical Quality of Inspections (2015 IMPEP Satisfactory)

The Division conducted 207 inspections since the last IMPEP. Six of the inspections were conducted overdue. At the time of the periodic meeting, no inspections were overdue and no initial inspections were overdue. The Division's management attributed the overdue inspections to the retirement of one qualified inspector and extended absences of other inspectors. The Division has also completed greater than 20 percent of reciprocity candidate inspections each year since the last IMPEP.

The Division reported that annual supervisory accompaniments of all inspectors are being completed as required, and inspection reports are being issued within 30 days of the end of the inspection. After an inspection, the inspector debriefs the inspection observations to management and staff; the Section Manager reviews the inspection report and it is signed out by the Division Director.

# Technical Quality of Licensing Actions (2015 IMPEP Satisfactory)

At the time of the periodic meeting, the Utah RAM program regulated 210 specific licensees. This figure is 10 more than the number of active licensees at the last full IMPEP. Since the last full IMPEP, the Division completed 218 licensing actions, which included 15 terminations and 17 initial license applications, with the rest being license amendments. Two licenses are under timely renewal. The Division issues new licenses for a five-year period and renews licenses for a ten-year period.

The Division performs onsite pre-licensing visits for all new license applicants that are unknown entities. The Division verifies that an applicant has a valid business license in Utah and then

performs an onsite visit. Once the pre-licensing actions are completed, the Division mails the license to the new licensee.

# <u>Technical Quality of Incident and Allegation Activities (2015 IMPEP Satisfactory but Needs Improvement)</u>

This indicator was reviewed in detail during the 2017 followup IMPEP review. The results are documented in the followup IMPEP review report.

# Compatibility Requirements (2015 IMPEP Unsatisfactory)

This indicator was reviewed in detail during the 2017 followup IMPEP review.

# Low-Level Radioactive Waste Program (2015 IMPEP Satisfactory)

The LLRW Section is allocated 9 FTE to license and inspect the Energy Solutions Clive Facility located approximately 80 miles west of Salt Lake City. The LLRW Section is composed of 10 technical staff members and the Section Manager. There were no vacancies in the LLRW Section.

One inspector is permanently assigned to the Clive Facility. The inspector travels to the site on a daily basis to conduct RAM transportation inspections. In 2017, the inspector completed over 2,300 inspections at the Clive Facility.

The LLRW Section is also responsible for licensing/permitting and inspecting the mixed waste management operations (wastes containing both Resource Conservation and Recover Act hazardous waste and radioactive waste constituents) and the 11e.(2) byproduct material disposal operations at the Clive Facility.

# Since the 2015 IMPEP:

- (1) The LLRW Section reported that supervisory accompaniments had been performed annually for all inspectors.
- (2) The facility license was renewed in 2017.
- (3) There was one license amendment issued to the Clive Facility prior to the license renewal. The amendment addressed security and organizational changes.
- (4) There were no incidents or allegations reported directly to the Division. There were two allegations referred to the Division by the NRC associated with the Clive Facility. The Division reported that both allegations were reviewed and closed. Responses were provided where applicable or when requested.

#### Uranium Recovery Program (2015 IMPEP Satisfactory)

The uranium recovery program is administered by the UMills staff in the UMills/RAM Section. The RAM program was discussed above in detail. For the UMills part of the Section, there are 5.5 FTE allocated to implement the uranium recovery program. The UMills staff includes two groundwater hydrologists, one health physicist, and two professional engineers. One engineer retired since the last IMPEP. The associated vacancy has been filled by a new engineer who is in the training and qualification program. Utah has a training and qualification program equivalent to IMC 1248. The program conducts cross-training in health physics for new engineers to ensure continuity of the program should there be any staff departures.

The UMills Section performed 50 field inspections since the 2015 IMPEP. None of the inspections were conducted overdue, and there were no overdue inspections at the time of the periodic meeting.

The UMills Section has three conventional uranium mill sites in various stages of operation. The UMills Section is currently processing license renewals for two of the three: the idle Anfield Resources Shootaring Canyon site and the active Energy Fuels White Mesa site. The license for the Shootaring Canyon site, which has been idle (standby status) since 1982, has been transferred from Uranium One to Anfield Resources. The Rio Algom Lisbon Valley site license, which is currently in the decommissioning phase, was renewed in 2017.

There were three transportation incidents associated with shipments to the White Mesa facility since the last IMPEP. All three were investigated and closed by the UMills Section. The UMills Section also reported these incidents to the NRC. There were two uranium recovery related allegations referred to Utah by the NRC since the last IMPEP and four received directly by the program. The UMills Section reviewed and closed the allegations.

The Division has an ongoing dialogue with the environmental staff of the Ute Mountain Ute Tribe to address and discuss matters of concern and interest regarding the White Mesa Uranium Mill Facility located in San Juan County (southeastern Utah). Areas of interest include the tailings disposal embankments, ground water monitoring, and ore and alternate feed management. This joint effort has proven to be an important vehicle for addressing such key items.

# Information Exchange

# **Current State Initiatives**

Web-Based Licensing (WBL) – After studying Colorado's use of WBL further, Utah is
considering using WBL in the future. As of the 2017 periodic meeting, Utah is continuing
to study the feasibility of incorporating WBL into their program. Utah would be interested
in hearing more about WBL's benefits and suggested a webinar on the system could
help them understand the system better.

# **Current NRC Initiatives**

Topics discussed included:

- Status of Project Aim activities
- Military and Non-military uses of radium
- Response to Government Accountability Office licensing audit
- Status of the Commission Staff Requirements Memorandum instructing staff to review the feasibility of tracking Category 3 sources
- Inspection Manual Chapter 2800 changes
- Temporary management changes at NRC

#### **CONCLUSIONS:**

NRC staff recommends that a full IMPEP review be conducted as scheduled in July 2019.