



Nevada Site Specific Advisory Board (NSSAB)

Full Board Meeting

**Beatty Community Center
100 A Avenue South, Beatty, NV
5:00 p.m. – January 20, 2016**

Members Present: Amina Anderson, Michael Anderson, Michael D'Alessio, Pennie Edmond, Donna Hruska (Chair), Janice Keiserman (Vice-Chair), Steve Rosenbaum, Edward Rosemark, William Sears, Thomas Seley, Cecilia Flores Snyder

Members Absent: Michael Moore, Donald Neill, Jack Sypolt, Francisca Vega

Liaisons Present: Christine Andres (State of Nevada Division of Environmental Protection [NDEP]), Ralph Keyes (Esmeralda County Commission), John Klenke (Nye County Nuclear Waste Repository Project Office [NWRPO]), Phil Klevorick (Clark County), Jonathan Penman-Brotzman (U.S. National Park Service [NPS])

Liaisons Absent: Richard Arnold (Consolidated Group of Tribes and Organizations [CGTO]), Frank Carbone (Nye County Commission)

Department of Energy (DOE): Robert Boehlecke, Kelly Snyder (Deputy Designated Federal Officer [DDFO]), Bill Wilborn

Navarro (Contractor): Irene Farnham, Sharad Kelkar, Marc Klein, Ken Rehfeldt

Lawrence Livermore National Laboratory (LLNL): Andrew Tompson

Desert Research Institute: Chuck Russell

U.S. Geological Survey: Jeff Sanders

Facilitator: Barb Ulmer (Navarro)

Public Signed In: Erika Gerling (Beatty Town Advisory Board), Keith Halford (Carson City, NV)

Open Meeting/Chair's Opening Remarks

Chair Donna Hruska thanked the members, liaisons, and the public for their attendance and the community of Beatty, Nevada and Nye County for the use of the community center. Following the Chair's opening remarks, Vice-Chair Janice Keiserman moved to approve the agenda as presented. The motion was seconded and passed unanimously.

Public Comment

There was no public comment.

U.S. DOE Update *(Robert Boehlecke, DOE)*

Robert Boehlecke noted that Scott Wade was attending a meeting in Hanford, Washington for Environmental Management (EM) Managers from DOE sites.

Mr. Boehlecke explained that two tabletop exercises that focused on low-level waste (LLW) were held last fiscal year to bring together emergency responders from various stakeholder organizations within southern Nevada to practice activities in the event of a radiological incident. On January 28, 2016, training on basic radiation, information on the waste management complex at the Nevada National Security Site (NNSS), and information on waste transportation routing will be provided to Public Involvement Officers (PIOs) from Clark and Nye Counties and other entities within southern Nevada. During this training, a date will be determined for a follow-on tabletop exercise that focuses on PIOs and how they interact in the event of a radiological occurrence. Mr. Wade attended a recent Local Emergency Planning Committee meeting and announced this training to those in attendance.

Mr. Boehlecke announced that a meeting of the newly formed LLW Stakeholder Forum will be held on February 3, 2016 in Pahrump, Nevada for intergovernmental agencies to discuss and exchange information regarding the shipment and disposal of LLW at the NNSS. This group replaces the former Nevada Field Office (NFO) Transportation Working Group in order to provide opportunities for a broader dialogue on EM waste management activities at the NNSS, including transportation.

Mr. Boehlecke informed the Board that he and Mr. Wade will be attending the Waste Management Symposia 2016 in Phoenix, Arizona in March 2016.

Mr. Boehlecke described that the renewal of the application for the Resource Conservation and Recovery Act Part B permit for mixed LLW (MLLW) at the NNSS was issued by NDEP in December 2015. The NFO will be initiating the process this spring for a permit modification to replace the current MLLW cell in order to increase capacity at the NNSS.

Drilling at Well ER-20-12 at Pahute Mesa started in early October 2015 and was completed in early January 2016. The drilling of this well took longer than initially planned because of schedule delays and a number of technical challenges. In the last couple weeks, the demobilization of the well equipment to Yucca Flat occurred and drilling began on one of three wells (Well ER-2-2) on January 17, 2016. Drilling activities will take place 24/7 and will probably be complete in late spring or early summer depending on the schedule.

For fiscal year (FY) 2016, Mr. Boehlecke reported that the NFO has been operating under a continuing resolution, and the final budget was recently approved for almost \$62.5 million, which is consistent with funding for the past several years. The President's budget rollout for FY 2017 is scheduled for February 9, 2016. The Board will continue to receive updates on the 2017 budget at the next NSSAB meetings.

Liaison Updates

Clark County (*Phil Klevorick*)

Liaison Phil Klevorick noted that the target for reopening the Waste Isolation Pilot Plant in New Mexico is February 2017. He reported that he attended an Intergovernmental Meeting in New Orleans in November 2015 that was hosted by DOE and the Energy Communities Alliance. Mark Whitney, DOE EM's Principal Deputy Assistant Secretary, reported in a briefing that the Greater-Than-Class C Environmental Impact Statement is in the signature phase and is due this quarter. Clark County provided comments over four years ago and is awaiting its release. Liaison Klevorick reiterated from Mr. Boehlecke's update that the training is important for the PIOs to get the exposure and experience in briefing the media in situations of a radiological incident. Liaison Klevorick noted that he would also be attending the Waste Management Symposia 2016, and he is interested in the update from the NSSAB members who will be in attendance. The DOE held a webinar on January 20, 2016 to begin the consent-based approach to siting future nuclear waste management facilities for spent nuclear fuel and high-level radioactive waste. As a final comment, Liaison Klevorick noted that meetings for the I-11 corridor will be starting this summer. The scoping for the environmental impact statement has already been started for the final designation for the routing.

Esmeralda County Commission (*Ralph Keyes*)

Liaison Ralph Keyes stated that a draft hazard mitigation plan will be reviewed at the Local Emergency Planning Committee meeting on January 20, 2016 that will then be voted on at a future county commission meeting. He reported that he continues to coordinate bringing DOE's Transportation Emergency Preparedness Program training for emergency responders to northern Nye and Esmeralda counties.

NWRPO (*John Klenke*)

Liaison John Klenke thanked the NSSAB for participating in a field trip on December 16, 2015 to observe the sampling of wells in Nye County that are funded under a DOE grant.

NDEP (*Christine Andres*)

Liaison Christine Andres expanded upon Mr. Boehlecke's update on the MLLW permit. She signed the permit effective on December 10, 2015. The permit modification for a new MLLW cell is due to NDEP on March 15, 2016, that will start NDEP's review and oversight of the process. Liaison Andres reported that she is currently reviewing a solid waste permit that would allow disposal of additional LLW with asbestos at the NNSS, and she would sign the permit within the next week. Lastly, Liaison Andres stated that a town hall meeting will be held in Amargosa Valley on February 8, 2016, starting at 4:30 p.m., regarding the fire incident at the U.S. Ecology Site near Beatty, Nevada. The state fire marshal will be providing information from his final report regarding that incident and what the next steps will be in the process. The state fire marshal, the State Health Division, and the State Bureau of Waste Management will be available to answer questions.

NPS (*Jonathan Penman-Brotzman*)

Liaison Jonathan Penman-Brotzman reported that their hydrologists and meteorologists are calling the recent flooding in Death Valley National Park (DVNP) a maximum probable event, which is rated higher than a 100-year or 500-year flood. Several millions of dollars of damage have been sustained throughout the park with the majority in the Scottys Castle and Grapevine Canyon areas. The southern access route to Shoshone and Tecopah, California should be repaired by the end of the calendar year. However, the route from Scottys Castle into Nye County to Scottys Junction will take longer to repair. Liaison Penman-Brotzman thank Nye County for including DVNP in its disaster declaration. Inyo County, California also included the park in its disaster declaration. DVNP had 260 people from 62 national parks across the nation that helped with the cleanup and recovery efforts that are now nearing stabilization.

Frenchman Flat Long-term Monitoring Plan (Closure Report) ~ Work Plan Item #5

A draft recommendation letter regarding the Frenchman Flat Long-term Monitoring Plan (Closure Report) ~ Work Plan Item #5 was reviewed and discussed by the Board. Member Michael D'Alessio moved to accept the draft recommendation letter with the language included on the letter included in the member packet. The motion was seconded and passed unanimously.

Radioactive Waste Acceptance Program (RWAP) Assessment Process ~ Work Plan #7 (*Robert Boehlecke, DOE*)

Mr. Boehlecke provided a preview for the RWAP Assessment Process ~ work plan item #7. During the assessment process, a team of three-four auditors evaluates a generator's waste program for compliance to the NNSS Waste Acceptance Criteria, and it involves reviewing extensive paperwork and visiting the waste disposal site. Mr. Boehlecke noted that the surveillance will be conducted on an NNSS generator, scheduled for two full days on March 22 - 23, 2016. This work plan states that up to two members will observe the assessment process in order to understand and suggest improvements/enhancements to the RWAP process. Chair Hruska and Vice-Chair Keiserman participated in a similar work plan item two years ago and found the experience interesting and worthwhile.

The Full Board will receive a comprehensive briefing on the RWAP process at the March 16, 2016 meeting. For scheduling and planning purposes, Members Pennie Edmond and Steve Rosenbaum volunteered to observe the upcoming RWAP assessment, and Members Cecilia Flores Snyder and Edward Rosemark volunteered as alternates. At the May 18, 2016 NSSAB meeting, Members Edmond and Rosenbaum will provide a report on their observations that the Full Board will use to formulate a formal recommendation to DOE.

NNSS Storm Impacts to Closed Federal Facility Agreement and Consent Order (FFACO) Sites (*Robert Boehlecke, DOE*)

- **NNSS Storm Damage – October 2015**
 - On October 18, 2015, the NNSS experienced some of the worst flooding in the site's recent history
 - Although flash flooding is not uncommon to the area, the overall duration and extent of this storm was much more widespread than typical "single-cell" events, covering a broad swath of the NNSS
 - Primarily a rain and flash flooding event

- A factor contributing to the flash flooding event was the existing ground moisture from a previous storm
- Precipitation across the NNSS varied
- Areas experiencing the highest rainfall amounts were northern Area 14 (3.50 inches) and central Area 25 (3.43 inches)
- **Impacts to Closed FFACO Sites**
 - Within days of the event, inspections were conducted at several closed FFACO sites suspected to have been impacted
 - Three CAUs have precipitation triggers (i.e., inspection is required after a rainfall event that exceeds one inch in a 24-hour period)
 - CAU 547 (Miscellaneous Contaminated Waste Sites – Player and Mullet Sites) – inspectors noted erosion of the run-off control features, but no damage to the integrity of the closure system
 - CAU 111 (Retired Mixed Waste Cells) in Area 5 – inspectors noted erosion of the side slopes consisting of drainage rills, although no waste was exposed
 - CAU 92 (Area 6 Decon Pond Facility) - no damage was noted
 - Other sites were inspected throughout the month of November through mid-December 2015
 - Sites were prioritized based on location, radiological issues and access requirements
 - No radiological issues were identified through surveys conducted during the inspections
 - At many of the sites, postings are in need of repair
 - CAU 40 and CAU 44 in Area 25 require repairs to the closure caps due to erosion
 - Historic landfills used to dispose of non-radioactive, non-hazardous refuse, rubbish, and construction debris
 - CAU 40, Area 25 Cane Springs Landfill – inspectors noted the presence of large drainages cut into the northeast and northwest corners; minimal debris also observed
 - CAU 44, Area 25 Construction Landfills – inspectors noted a large erosion through the center of the landfill cap
- **CAU 44 Repair Plan**
 - Complete visual survey downgradient
 - Preliminary site walks have identified debris approximately 55 yards downgradient
 - Additional visual surveys will be conducted to 110 yards
 - If additional debris is located, surveys will extend another 110 yards until no debris is identified
 - Pick up debris and disposition
 - Complete cover repairs in 2016
- **Consequences**
 - The flooding event impacted roads, buildings, and areas where surface contamination exists
 - Most contaminated sites are within closed basins
 - In drainages that flow off-site, it is estimated that less than one percent of the total soil erosion is from contaminated areas

- During the last 40-50 years of seasonal flooding, radiological surveys have not identified any significant contamination in eroded sediments
- **Path Forward**
 - Perform repairs to affected CAUs
 - CAU 111 – February 2016
 - CAU 547 – February 2016
 - CAU 40 and 44 – May 2016
 - Repair or replace damaged postings – Fall 2016

In response to Board questions, the following clarifications were provided:

- Since the landfill monuments were placed before GPS coordinates were routinely utilized by the NNSS, the fallen monuments will be stood up or new ones put in place in locations that fully encompass the underground debris in the landfill.
- The monitoring plan requires visual inspection of all berms and drainage features to ensure that water is draining as designed. Any changes made to flow patterns would be included in the overall monitoring activity. The two historic landfills will require further evaluation on whether the wash needs to be redirected, which in turn may require specific language to be included in the closure document. NFO will work with NDEP to ensure that adequate documentation is included in the closure plan.
- There is not perimeter fencing around the entire NNSS; although there are other mechanisms in place to detract from any intrusion and are still in place and were not impacted by the storm event.
- The MLLW Cell 18 is the only cell that has a waterproof liner. The LLW cells have a vegetative cover that is designed so that precipitation runs off or is diverted back to the surface (evapotranspiration); therefore the water does not penetrate the landfill and reach the waste containers. With the historic landfills, the overland flow moved across the cover and eroded the soil and created a new channel after the storm event.
- In the Forty-mile Wash, there are no structures downgradient until the farms area about eight-ten miles south of the NNSS. The Tonopah Wash flows into Lathrop Wells and the storm results are visible in that area.
- Herbicide was applied last fall to kill unwanted vegetation on the CAU 111 cover.
- During a rain event on the land surface, contamination does not concentrate if it moves but spreads out. There has been no movement of soil contaminants that presents a concern outside the perimeter of the NNSS.

Path to Closure for Rainier Mesa/Shoshone Mountain ~ Work Plan Item #6 *(Bill Wilborn, DOE and Andrew Tompson, LLNL)*

- **NSSAB Work Plan Item 6**
 - The NSSAB will provide a recommendation, from a community perspective, on if the Board supports the plan to closure for Rainier Mesa/Shoshone Mountain and how it could be enhanced
- **Underground Test Area (UGTA) Activity CAUs**
 - Yucca Flat/Climax Mine – CAU 97
 - Frenchman Flat – CAU 98
 - Rainier Mesa/Shoshone Mountain (RM/SM) – CAU 99
 - Central Pahute Mesa – CAU 101
 - Western Pahute Mesa – CAU 102

- **RM/SM Legacy Tests**
 - Eight percent of total number of NNSS underground tests (828)
 - 0.7% of total NNSS underground radionuclide inventory, by curies (largest fraction is tritium)
 - All tests located above regional groundwater system, either in shallow “perched” groundwater or unsaturated rock
- **Goal – Develop a Closure Plan for RM/SM CAU 99 that is protective of human health and the environment**
 - Approach:
 - Collaboratively developed Technical Basis Agreement Document with NDEP
 - Provides the justification for the Alternative Modeling Strategy
- **Why Use an Alternative Modeling Strategy?**
- **Technical Basis Agreement Document Established Need for Alternative Strategy**
 - RM/SM CAU is remote and geographically isolated
 - RM/SM radionuclides inventory is low and separated from the deeper regional water table
 - RM/SM has geologic complexity and uncertain parameters
 - Initial simulations suggested radionuclide transport would not immediately challenge NNSS boundaries
 - Alternative Modeling Strategy appropriately reduces uncertainty consistent with the risk
 - Complex geological conditions make monitoring the optimal protective strategy – well locations are the key
- **Elements of the Alternative Modeling Strategy**
 - Alternative Modeling Strategy provides a mechanism to revise the Flow and Transport Modeling Report to reflect:
 - A broader range of transport alternatives
 - Simpler model analyses to bound alternatives (a lesson learned from Frenchman Flat External Peer Review)
 - Potential exposure pathways to support future monitoring strategies
- **RM/SM CAU Regional Flow Pathways**
 - Topographically elevated
 - Largest NNSS precipitation rates
 - Isolated regional groundwater mound
 - Regional flow pathways generally move west, southwest, and southeast into Pahute Mesa and Yucca Flat CAUs
 - Potential northeast path loops offsite to Nellis Range areas and then back to the south
- **Tunnels Offered Unique Testing Environment**
 - All but two of the tests were conducted in tunnels mined into the face of Rainier Mesa or Shoshone Mountain
 - CLEARWATER and WINESKIN were the only tests conducted in vertical shafts
- **RM/SM Closure Strategy**
 - Supplement the modeling work done to date
 - Address lateral flow and other scenarios in a simpler way
 - Conceptual model based approach
 - Regional flow using measured parameters
 - Simplified one-dimensional transport analyses
 - Monitoring program

- **Work Since Alternative Modeling Strategy was Adopted**
 - Completion of a new Conceptual Model Chapter
 - Revisit all available hydrogeologic data
 - Identifies bases for regional transport pathways and alternatives
 - Preemptive review
 - Updated Hydrogeologic Framework Model and associated documentation
 - Preemptive review
 - Modeling team review
 - Development of a path to closure for RM/SM
- **One-Dimensional Modeling**
 - Red area on map represents the approximate perched water area
 - Analyze the transport of radionuclides beginning from the edge of the red area (Conservative Assumption)
 - Consistent with the Alternative Modeling System
- **Work Remaining**
 - Flow and Transport modeling
 - Complete one-dimensional lateral flow models
 - Address residual comments from Preemptive Review as they relate to the Alternative Modeling Strategy
 - Flow and Transport Report
 - Simpler Flow and Transport Report that augments earlier work, yet is better aligned with the Alternative Modeling Strategy
- **Benefits**
 - Provides simplified, but technically defensible forecasts of maximum and minimum contaminant transport scenarios from Rainier Mesa as per the Alternative Modeling Strategy
 - Significantly reduces, or eliminates, the need to update existing models created prior to the adoption of the Alternative Modeling Strategy (will save years of effort and \$\$\$)
 - Allows for relatively rapid analysis of multiple scenarios
 - Protects human health and the environment
- **Proposed Path Forward**
 - Fiscal Year 2016:
 - Minor revisions to existing models and reports
 - Conceptual Model Based Approach (which honors the existing data)
 - Use one-dimensional analyses to assess radionuclides transport under a variety of scenarios per the Alternative Modeling Strategy
 - Monitoring strategy
 - Beyond Fiscal Year 2016:
 - Agreement from NDEP that model results and data are adequate
 - External Peer Review
- **NSSAB Path Forward**
 - NSSAB Discussion:
 - Are you in support of DOE's path forward?
 - Are there any enhancements to the path forward?
 - Are there any other questions or concerns?

In response to Board questions, the following clarifications were provided:

- Since RM/SM is unique from the other UGTA CAUs, the External Peer Review (EPR) will have a different concept in its approach. The team will be comprised of specialists with applicable knowledge, i.e., scientific, risk assessment, regulatory, and cost analysis experts. The risk assessment expert will look both at the overall risk from an environmental standpoint of an actual transport off-site to a public receptor to the technical risk of whether the team looked at all the conceptual technical risks that presented itself in the models.
- This alternate modeling strategy has not been used before by the UGTA Activity, but laboratories that do hydrological work have used this method extensively. UGTA has used one-dimensional modeling calculations as they are quite valuable because they can be performed quickly, but there is a risk of over-interpreting the data. The one-dimensional particle tracking can be used to understand the flow regime, the transport, but would not necessarily define the 1,000 year contaminant boundary. This may be included in the monitoring strategy for closure.
- Because of the unique characteristics of RM/SM (i.e. remote and geographically-isolated area, low radionuclide inventory, etc.), one of the benefits of the alternate modeling strategy is the ability to come to closure more quickly.
- The tunnels and the ponds will continue to be an integral part of the monitoring strategy. RM/SM has a complex perched groundwater mound that will at some point move; and due to the complexity, UGTA does not know exactly in what direction the transport will flow. A decision point would be if it would be more beneficial to expend resources on monitoring wells to track the flow and transport rather than additional modeling that would still leave a level of uncertainty that is irreducible to some degree.
- Earlier work done on the RM/SM Hydrogeologic Framework Models will be interfaced with the models from the adjacent Pahute Mesa. There has been an effort to better map the groundwater elevations in the greater mesa area that resulted from prior work done in Pahute Mesa.
- The one-dimensional transport modeling will supplement, not replace, the modeling work done to date for RM/SM.
- Factors that would initiate a reevaluation of the alternate modeling strategy approach would be if under reasonable conditions tritium above the maximum contaminant level would transport a long distance or be found at the boundary of the NNSS or other receptor, or flow to the north and not return.
- With a one-dimensional approach, there will be an ensemble of outcomes based upon the direction of the ultimate water flow.
- Several years ago, NDEP proposed the alternate modeling strategy to DOE with the thought for the protection of human health and the environment in the most cost-effective manner. If any significant unexpected issues arise, NDEP has the authority to halt the alternate process and have DOE return to the traditional UGTA groundwater closure strategy. The EPR is included in the alternative modeling strategy document. NDEP will have someone on the panel with regulatory experience and who will oversee that the intent of the FFAO is being followed and that the protection of human health and environment is paramount.
- The plugged tunnels are flooded by virtue of the fact that they are below the water table; therefore the fluid pressure is the same throughout the tunnel. If water could flow in the tunnels, the path of least resistance would be from one end of the tunnel to the other.

- The purpose of the ponds was to manage the flow of water during the testing days and is not currently used to manage water except for E-tunnel.
- The tunnels were plugged in the early 1990's, but the E-tunnel was not successful and is still draining into a sequence of ponds that requires a discharge permit issued by NDEP.
- DOE has not pursued reestablishing the plug for E-tunnel as the consensus is that water would find its way around the fractures due to the type of rock at that location. Due to the remoteness of E-tunnel, the conceptual models do not predict that any contaminated water will reach any receptors. Stringent monitoring of any transport will be performed for the E-tunnel proper, the ponds, and the plume below the ponds.
- The NFO seriously considered bringing in an EPR earlier in the process for closure for RM/SM. Based on lessons learned from Frenchman and Yucca Flat EPR, the decision was made that the EPR for RM/SM would be more beneficial later in the process. The NSSAB will receive updates at the Full Board meetings on the RM/SM EPR.
- The earlier conceptual and current one-dimensional models will both be used to determine if additional well locations are needed within the RM/SM monitoring plan.

After receiving a briefing on the Path to Closure at RM/SM, extensive questions, and Board dialogue, the NSSAB, from a community perspective, supports DOE's alternate path forward for RM/SM. At this time, the NSSAB did not have any recommendations for enhancements to the path forward, but requested that the Board be kept apprised on the progress to closure at RM/SM.

Member Rosemark made a motion that the items above be included in a recommendation letter and submitted to DOE. The motion was seconded and passed unanimously.

Other NSSAB Business (*Donna Hruska, Chair*)

Chair Hruska updated the Board on the National Nuclear Security Administration-focused tour that the NSSAB participated on December 15, 2015. Included was a tour stop at the U1a facility.

Chair Hruska thanked Liaison Klenke for coordinating the NSSAB tour of the Nye County sampling wells on December 16, 2015. She commented that she was not aware that there were so many different types of sampling wells.

The groundwater-focused public tour that was originally scheduled for January 13, 2016 will likely be rescheduled in the March 2016 timeframe. The NSSAB Office will let the Board know as soon as a new date is available.

Chair Hruska reported that a conference call including the chairs and vice-chairs from the eight boards of the EM Site-Specific Advisory Board (SSAB) was held on December 17, 2015. Topics of discussion were a reintroduction of Monica Regalbuto, Assistant Secretary for EM, a budget update, and planning for the next EM SSAB National Chairs' meeting to be held in April 2016 in Oak Ridge, Tennessee.

The NFO has invited a representative of the NSSAB to participate in the LLW Stakeholder Forum. This NSSAB representative would be charged with attending quarterly meetings and reporting back to the Full Board. Member D'Alessio volunteered to represent the NSSAB.

Four letters were provided to Board members for informational purposes:

- NSSAB Recommendation for LLW Transportation through Nevada (FY 2015) – dated September 16, 2015
- DOE Response to NSSAB Recommendation for LLW Transportation through Nevada (FY 2015) – dated December 7, 2015
- NSSAB Recommendation for Corrective Action Alternatives for CAU 573 (Work Plan #1) – dated November 10, 2015
- DOE Response to NSSAB Recommendation for Corrective Action Alternatives for CAU 573 (Work Plan #1) – dated January 14, 2016

Vice-Chair Keiserman provided an update on the Membership Committee. Minutes from the last meeting were emailed to the Board and are also available on the NSSAB website. The committee reviewed best practices for a student involvement program provided by EM SSAB Headquarters. Internships are currently used successfully at other SSABs. Vice-Chair Keiserman went on to report that she has been in contact with a professor from the University of Nevada, Las Vegas (UNLV), who has recently written a book on the history of the Nevada Test Site. She is working on scheduling a meeting with the internship coordinator at UNLV to set up the parameters for the program.

Vice-Chair Keiserman informed the Board that the committee has initiated the 2016 membership recruitment drive. Applications are currently being accepted now until March 31, 2016 and are available on the NSSAB's website at <http://www.nv.energy.gov/NSSAB/Documents/EM%20SSAB%20Application.pdf>. She encouraged members to recruit new members, especially in the rural areas surrounding the NNSS.

Communication Improvement Opportunities (Work Plan #10)

In response to providing recommendations on ways that DOE can improve/enhance communication to the public, Chair Hruska suggested that town officials/representatives be invited to the NSSAB meeting when scheduled in their community. DDFO Kelly Snyder asked for feedback on the presentation. Member D'Alessio noted that the background information is helpful for understanding, but a clear bottom line should be provided earlier in the presentation in order for the NSSAB to provide a more timely informed decision. Member Rosemark added that the briefings are at the right technical level, especially for members that have been on the Board for several years. Chair Hruska noted that tonight's presentation included a lot of information in the beginning. She went on to add that the presentation could have been structured differently by making it more focused for discussion by stating the activities that will be performed, estimated costs, and the estimated savings by using the alternate strategy.

Meeting Wrap-Up/Assessment/Adjournment

The next Full Board meeting will be held at 5 p.m. on Wednesday, March 16, 2016 at the National Atomic Testing Museum, 755 East Flamingo, Las Vegas, Nevada with an educational session by the U.S. Air Force on "Radioisotope Thermoelectric Generators," beginning at 4 p.m.

Due to the lateness of the hour, the Board chose to forgo the meeting assessment.

Member D'Alessio moved that the meeting be adjourned. The motion was seconded and passed unanimously.

Meeting adjourned at 9:00 p.m.