

RAB MEETING MINUTES

Date/Time: Thursday, May 12, 2022, 6:30 p.m. to 8:20 p.m.

Location: Virtual meeting via Zoom

Attendees: Thomas Lineer, Steve Cardon, Bill Millar (U.S. Army)
Morgan McGrath, Zygmunt Osiecki, William Van Eck (U.S. Army Garrison Fort Devens)
Penny Reddy, Daniel Groher, Dabra Seiken (U.S. Army Corps of Engineers [USACE])
Carol Keating, ZaNetta Purnell (United States Environmental Protection Agency [USEPA])
David Chaffin (Massachusetts Department of Environmental Protection [MassDEP])
Roy Herzig (Massachusetts Development Finance Agency [MassDevelopment])
RAB Board Members: Chris Mitchell (Harvard Board of Health), Laurie Nehring and Julie Corenzwit (People of Ayer Concerned about the Environment [PACE]), Amy McCoy, Dave McCoy, Alix Turner
Richard Doherty, Zachary Gavel (PACE)
John Kastrinos (Haley & Aldrich)
Steve Passafaro (Sovereign Consulting)
Andy Vitolins, Steven Perry, Julee Jaeger, Heather Levesque, Sue Tauro, Ian Martz (SERES-Arcadis 8(a) Joint Venture 2, LLC [S-A JV])
Bill Duston, Marion Stoddart, and other attendees participating by phone or otherwise unidentified (citizens and guests)

Slides: RAB meeting slides are available on the project website at:

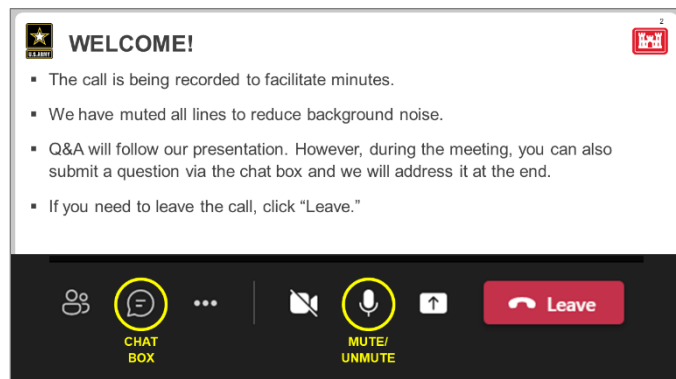
<https://www.nae.usace.army.mil/missions/projects-topics/former-fort-devens-environmental-cleanup/>.

Please Note: Discussions described in these minutes have been paraphrased as needed for clarity. The invitation for this meeting is provided for reference at the end of these meeting minutes.

WELCOME & OPENING COMMENTS



Steven Perry (S-A JV Community Involvement Specialist) opened the meeting and welcomed the attendees to the meeting. He announced that the group would hear a report about activities at the South Post from special guests as well as regular updates by Andy Vitolins (S-A JV Project Manager) and others.



Steven Perry indicated that the meeting was being recorded to generate minutes, which will be available after the meeting. He reminded everyone that microphones will be muted to avoid background noise; however, at the bottom of the participants' screens, there are controls for muting and unmuting microphones when needed. Video use is optional. He noted that there will be a presentation about the South Post with time after for a focused discussion about those activities. Then, the regular presentation will resume about the rest of the project activities, and there will be another period for questions after that.



WELCOME!

Thank you for joining us tonight.

Thomas Lineer
U.S. Army HQDA/ODCS G-9
Base Realignment and Closure (BRAC)
Environmental Coordinator (BEC)

Penny Reddy and Dan Groher
U.S. Army Corps of Engineers -
New England District

Andy Vitolins, Julie Jaeger,
Steven Perry, and Sue Tauro
SERES-Arcadis JV Team

Our Invited Speakers from Fort Devens:

Morgan M. McGrath, P.E., Chief, Environmental
Division, U.S. Army Garrison Fort Devens

Zygmunt V. Osiecki, Environmental Protection
Specialist, U.S. Army Garrison Fort Devens

Dabra I. Seiken, Engineering Technical Lead, U.S.
Army Corps of Engineers

Our Community Board Members:

Julie Corenzwit
Amy McCoy
Dave McCoy
Chris Mitchell
Laurie Nehring
Alix Turner

Steven Perry announced the list of the leaders and contributors for the call: Tom Lineer (U.S. Army); Penny Reddy (USACE New England District Project Manager); Dan Groher (USACE New England District Environmental Engineer); Steven Perry (S-A JV Community Involvement Specialist); Andy Vitolins (S-A JV Project Manager); Sue Tauro (S-A JV Community Outreach Manager); Julie Jaeger (S-A JV Meeting Coordinator); Morgan McGrath (U.S. Army Garrison Fort Devens); Zygmunt Osiecki (U.S. Army Garrison Fort Devens); Dabra Seiken (USACE); and community Restoration Advisory Board (RAB) members Julie Corenzwit, Amy McCoy, Dave McCoy, Chris Mitchell, Laurie Nehring, and Alix Turner.

WELCOME!

Tonight's topics

- 1 Community Involvement & RAB Update
- 2 South Post Overview
- 3 Project Updates
- 4 Q&A
- 5 Next Steps & Meeting

Steven Perry summarized the topics to be covered, which included updates about community involvement and the RAB members, a South Post overview with a question and answer (Q&A) session, project updates from Andy Vitolins, a second Q&A session, and next steps.

COMMUNITY INVOLVEMENT & RAB DISCUSSION

1 | COMMUNITY INVOLVEMENT

Implementing the Community Involvement Plan (CIP)

Feasibility Study (FS) fact sheet distributed

Information repository is at the Ayer Library and being updated with PFAS project documents

CIP is available on the Fort Devens Environmental Cleanup website at:
<https://www.nae.usace.army.mil/missions/projects-topics/former-fort-devens-environmental-cleanup/>

RAB meetings will continue on the second Thursday of the month through 2022

Discarded military munitions outreach efforts are being resumed for spring and summer 2022

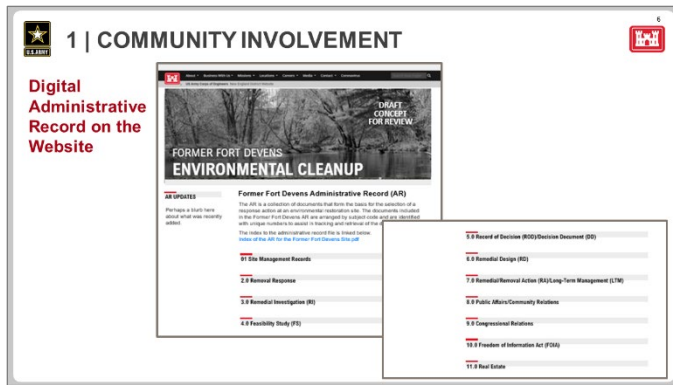
Website enhancements are continuing with the digital Administrative Record (AR) being programmed

Steven Perry started with an update on community involvement:

- The Community Involvement Plan (CIP) is on the website indicated on the slide. Steven Perry mentioned that the CIP is a good place for information on the project and what is going on at Fort Devens.
- Fact sheets are being distributed every quarter or so; the latest one is about Feasibility Studies (FSs).
- The information repository at Ayer Library is continuing to be updated with a focus on documents related to per- and polyfluoroalkyl substances (PFAS).
- The RAB meetings are continuing every 3 months, on the second Thursday of the month. The next meeting will be August 11, 2022.
- Another activity going on is outreach efforts for military munitions

especially around the Nashua River. There has been a lot of coordination with stake holders, such as the Nashua River Watershed Association, focused on where additional investigations can occur. Steven Perry mentioned that, before the meeting, Laurie Nehring (PACE) was talking about water chestnuts, an invasive species, and some activities regarding that around the river. In addition to those activities, there are also some other public outreach activities happening, which are very important for public safety.

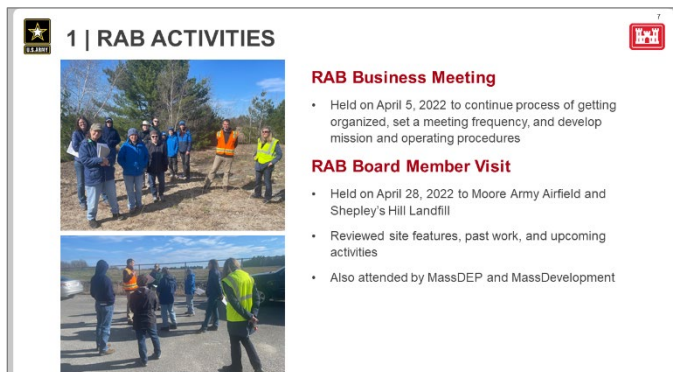
Steven Perry stated that there would be an update about the website next. He encouraged everyone to look at it periodically and share it with others. It has been recently reorganized in an effort to improve it and make it more accessible. The Administrative Record (AR) is in the process of being digitized and made accessible on the website. All of the materials discussed will be on the Fort Devens Environmental Cleanup website: <https://www.nae.usace.army.mil/missions/projects-topics/former-fort-devens-environmental-cleanup/>.



Sue Tauro (S-A JV Community Outreach Manager) announced that some time has been spent digitizing the AR and getting it uploaded to the website. She explained that the AR will have 11 divisions. Not all of the divisions may show up at first if there are not any documents under those divisions yet. Once the AR is live on the website, there will be two to five subdivisions under each division. A notification will be sent out when the website is ready to go. There are two things to note on the AR page: the AR updates column and the AR index. On the left side of the page, there will be a category called AR Updates, which will be updated monthly for what has been recently added. If the list is too long, there will be a link to a document with the list of recently added documents. There will also be a link on the page to a comprehensive index of the AR

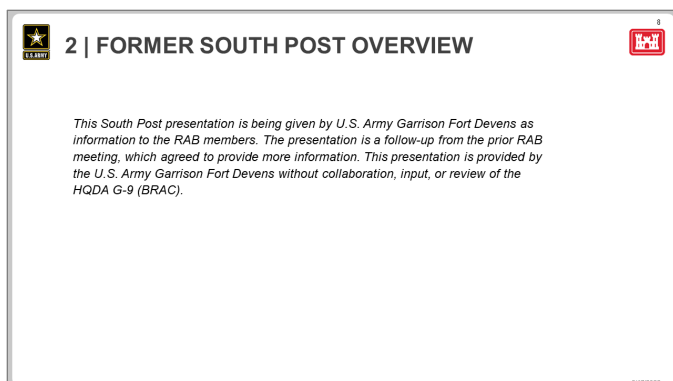
in a PDF file that can be searched. It will have about eight columns of information to be searched for, including the title of document, the author, the number of pages, and the date. This index should help people find documents.

Steven Perry mentioned at this point that if there are any questions during the meeting, they can be entered into the chat box. Carol Keating (USEPA) asked via the chat box how far back in time the AR goes. Sue Tauro replied that she would have to check that. Andy Vitolins stated that the PFAS documents will be added first and those are not as old. However, the idea is to eventually have the primary decision documents there, so it would likely go back as far as the 1990s when it is complete. Sue Tauro added that right now the focus is on the PFAS and the Shepley's Hill Landfill (SHL) documents, and everything else will come later. Laurie Nehring asked if the AR will be searchable by keyword. Sue Tauro replied that the index is searchable by keyword. Steven Perry mentioned that the index will have clickable links to find specific documents.



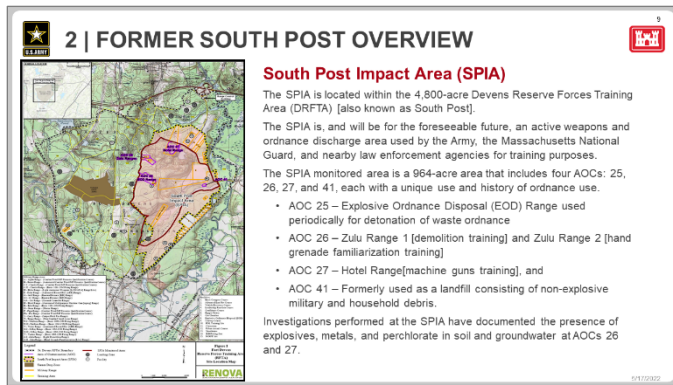
Steven Perry stated that the RAB had a business meeting on April 5, 2022, to continue the process of getting organized. He reminded the participants that there was a process last year to invite interested parties to be official board members. The board members had a site visit on April 28, 2022, at Moore Army Airfield and SHL, which was also attended by MassDEP and MassDevelopment. USEPA was invited as well, but Carol Keating and ZaNetta Purnell were not able to attend.

Penny Reddy (USACE) commented that it was great to meet in person and go over questions and thanked everyone for their participation. Andy Vitolins also commented that it was great to see everybody. Steven Perry agreed that meeting in person and being able to make the topics of the RAB discussions real by seeing the site was significant.



Steven Perry introduced the presentation about the South Post by reading the note on the slide to everyone.

Dan Groher noted at this point that Amy McCoy had a question. Amy McCoy commented via the chat box that the site visit was great and asked about the well that was paved over. Andy Vitolins asked if this was related to the area being used by drones. Amy McCoy confirmed this was what she was referring to. Andy Vitolins replied that he does not know if that well was paved over, but there are control boxes there now. This means that there will need to be coordination to get to the well now. He mentioned that there was sampling at the wells the previous week and no reports of issues there.



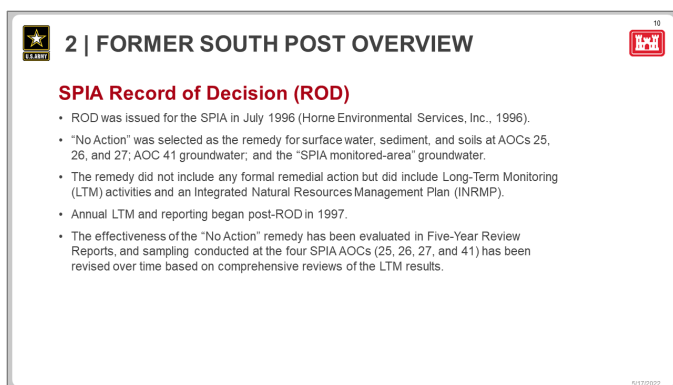
Steven Perry introduced Zygmunt Osiecki (U.S. Army Garrison Fort Devens) and Dabra Seiken (USACE). He reminded everyone that they could put questions in the chat and there would be time for a Q&A at the end of the presentation.

Dabra Seiken introduced the South Post Impact Area (SPIA), which is also known as the South Post. It is located west of Route 2 and is an active range that has been used for many years. It is used by the Army, the Massachusetts National Guard, and local law enforcement agencies for training. It is a very large area (964 acres), which includes four areas of concern (AOCs)—AOC 25, AOC 26, AOC 27, and AOC 41.

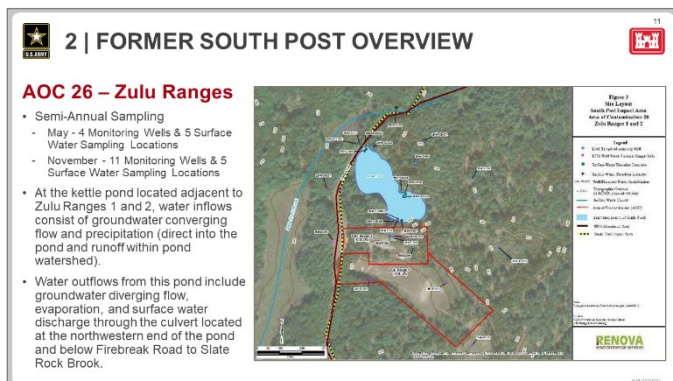
AOC 25 is an explosive ordnance disposal range used for detonation of waste ordnance. AOC 26 is used for demolition training (Zulu Range 1) and hand grenade training (Zulu Range 2). AOC 27 is known as Hotel Range and used for machine gun training. AOC 41 is a former landfill consisting of non-explosive military and household debris.

Laurie Nehring mentioned that the RAB has been involved with all the sites for many years but have never talked about the South Post. This is the first presentation on what is happening at the South Post. She commented that the map that was shared is hard to read, especially the area in brown on the map. She also noted that the RAB has no background on what was found at the site and would appreciate more information on that. Dabra Seiken replied that the site has been used for munitions training and ordnance discharge for many years, so the contaminants out there are associated with that—hexahydro-1,3,5-trinitro-1,3,5-triazine, metals, and perchlorate. The big brown area on the map is not part of the SPIA. The SPIA is shown with a black and yellow outline on the map, and the SPIA monitored area is shown with a red outline. The brown area is the Turner Drop Zone. Zygmunt Osiecki noted that the Turner Drop Zone is used for parachuting and is not an active range.

Laurie Nehring asked which metals were part of the contamination. Dabra Seiken replied that the metals have been at low levels. She noted she would follow up this question at the end of the presentation. Steven Perry commented that since this is all new information for the RAB, the RAB can generate questions and have some follow up after the meeting as well if needed.



Dabra Seiken noted that the Record of Decision (ROD) for this Superfund site was finalized in 1996. The remedy did not include dig and haul or any formal remedial action but did include long-term monitoring (LTM) activities and an Integrated Natural Resources Management Plan. After the ROD, the LTM and reporting began. There were work plans that were used and updated as concentrations changed. Overburden and bedrock groundwater were sampled as well as surface water.




Dabra Seiken noted that the Zulu Ranges (AOC 26) have semi-annual groundwater and surface water sampling in the spring and fall. Kettle Pond, a geological feature, is at the Zulu Ranges and is shown on the map. Kettle Pond is believed to be a flowthrough area. Groundwater flows in from the southern side of the pond and then flows out of the northern side.



2 | FORMER SOUTH POST OVERVIEW

AOC 27 - Hotel Range

- Biennial (every other year) Sampling of 4 monitoring wells in November [next November 2022]
- A proposed renovation to reorient the Hotel Range is currently in the permitting and construction contract solicitation phase
 - While most planned construction activities are slated to occur outside the SPIA Monitored Area, some tree clearing and site work (regrading) could take place within the area of AOC 27.
 - The current network of monitoring wells will not be impacted by the planned construction and reconfiguration.



Dabra Seiken noted that the Hotel Range (AOC 27) is sampled only every other year, and it will be sampled in 2022. There are some ongoing renovations to reorient the Hotel Range, which are currently being permitted.

Zygmunt Osiecki, the Environmental Protection Specialist for Fort Devens, described the renovation that is happening at the Hotel Range. The firing lanes will be realigned so that they have a safer area of fire. The ranges will be facing inwards towards the installation. The permitting situation as of 1 month ago is that the Order of Conditions from Lancaster was given, so those are being finalized and submitted. An Initial Environmental Assessment was done 2

years ago and, because of impacts to another wetland and mitigation measures, a Supplemental Environmental Assessment is now being conducted to make sure everything that needs to be done for the renovation is captured. Other permitting actions will be covered in the next coming months. There will be additional natural resources surveys and things of that nature being done so that everything is covered for the project.

Julie Corenzwit asked if the team could make high-resolution maps available at a later time so that the labels, legends, and text could be read. Steven Perry asked the team to make those maps available or perhaps identify the sources of the maps if from other technical documents.

Laurie Nehring asked why the ranges are called Zulu Ranges and Hotel Range. Zygmunt Osiecki commented that the ranges have been active since around 1917 or 1918 when the installation was created but that he did not know why they were named as they are. Another participant of the call commented that they are named that way because they are known as the H Range and the Z Range, in the military alphabet hotel and zulu stand for H and Z.

Carol Keating noted that the detected metals in the groundwater include arsenic, iron, manganese, and barium, but only arsenic has been detected above the maximum contaminant levels (MCLs).

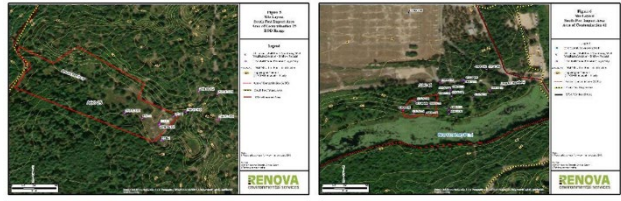
Laurie Nehring asked what the planned construction was. Zygmunt Osiecki replied that the range is outdated and does not meet Army standards for training. This means they need to improve the facilities, targeting, distances, etc. In doing so, they are going to be clearing trees and replanting them with native species. However, they are avoiding vernal pools and are also recreating wetlands that were disturbed in the initial construction of the Hotel Range 40 years ago. They are mitigating any other damages as well. There will be no additional major buildings; however, there will be a control building.

Andy Vitolins commented that Laurie Nehring's question on contaminants is probably related to this topic of environmental assessment. From the perspective of this discussion, environmental assessment refers to National Environmental Policy Act (NEPA) environmental assessments, which are typically done with permitting actions that involve the federal government. These would include cultural, biological, and natural resources. The most important things at the South Post that needed to be considered were the natural resources, like trees. Zygmunt Osiecki agreed and stated that every environmental aspect undergoes some sort of assessment for large scale projects like this. All of those are taken into account, including cultural resources, noise, traffic, etc. Laurie Nehring confirmed that that was what she had been interested in because it had sounded like they were building something large like a gymnasium. She asked if Lancaster was overseeing it. Zygmunt Osiecki stated that the Conservation Commission will issue the water permit.

2 | FORMER SOUTH POST OVERVIEW

AOC 25 and AOC 41

- AOC 25 groundwater sampling was discontinued after the 2004 annual LTM event.
- AOC 41 was removed from the LTM program in 2006.
- Water Level Gauging every 5 years as part of the 5-Year Review Process [Next in November 2024].




Dabra Seiken mentioned that Superfund projects have to conduct 5-Year Reviews to make sure the remedy is protective of human health and the environment. The Army has been doing these reviews, and based on those, the sampling and analysis has gotten updated. AOC 25 groundwater sampling was discontinued after 2004, and AOC 41 was removed from the program in 2006. The wells are maintained and gauged every 5 years so the direction of groundwater flow can be established every 5 years for the 5-Year Review.



2 | FORMER SOUTH POST OVERVIEW

South Post Monitoring (SPM)

- A subset of monitoring wells within the SPIA monitored-area to monitor the potential migration of COCs from individual AOCs.
- South Post Monitoring (SPM) Wells – Annual Sampling in November.
- No historic evidence exists to show that contaminants detected in groundwater within the SPIA pose a threat of migration to/or impact on drinking water wells located beyond the SPIA Monitored Area.

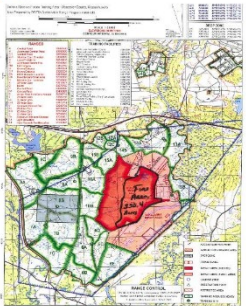


Dabra Seiken noted that a subset of the SPIA wells are the South Post monitoring wells. They are placed around the perimeter to monitor the potential migration of contaminants of concern (COCs) from the AOCs mentioned earlier. Those South Post monitoring wells are sampled every November. There is no evidence that contaminants within SPIA pose a threat of mitigation to groundwater wells located beyond the SPIA monitored area.

2 | FORMER SOUTH POST OVERVIEW

South Post Fire – March 21, 2022

- Devens Fire Department officials estimate the flames consumed roughly 300 acres at the Fort Devens South Post Range Complex.
- Caused when a munition round struck a metal object, resulting in a spark that ignited dried brush.
- Because the Range has live munitions on it, firefighters could only safely fight the fire from the roadways and light backfires to control where the blaze could spread.
- The fire reach the southeastern side of AOC 27, but AOC 26 was unaffected. The status of the remaining AOCs and the SPIA monitoring wells are being evaluated.



Zygmunt Osiecki stated that on March 21, 2022, there was a fire downrange. One of the munitions dropped a piece of metal that sparked some brush. The fire happened within the impact zone, and no trucks could be sent directly into the impact area because of safety issues with unexploded ordnance. Fire breaks were set up around the perimeter of the area where they were able to get vehicles. Within 24 hours, the entire perimeter had been burned so that the fire could not spread. It was contained, but roughly 300 acres were consumed. The fire reached the east side of AOC 27, but Renova staff and the branch patrol manager visited the area last week or the week prior and did not note any damage to the wells.

Laurie Nehring asked if foam was used in fighting the fire and if so, what kind of foam it was. Zygmunt Osiecki replied that no foam was used. Fire breaks were set up to keep the fire from escaping the impact area. They used water on the outskirts, but they could not go inside the impact area to put the fire out due to the potential presence of unexploded ordnance (UXO) in the active range area. It was allowed to burn, and no foam was used.

Steven Perry noted that Carol Keating pulled some data tables into the chat box. People participating via Microsoft Teams could click on those to see the tables from the 2021 Annual Long-Term Monitoring Report. Those tables give a thumbnail sketch of some of the COCs and their levels.


Bill Duston asked if the area was forested, brush, or open. Zygmunt Osiecki replied that it was a combination of all three. Fires within the impact area are not uncommon. Usually, they are smaller and are put out pretty quickly.

Laurie Nehring asked what the PFAS levels are in the SPIA. Dabra Seiken replied that PFAS is not a contaminant of concern; however, USEPA asked that it be sampled in SPIA perimeter monitoring wells in 2017. They were all nondetect except one. There was one detection at 2.5 parts per trillion (ppt). It was resampled in 2018 at USEPA's request, and it was nondetect. There are also water supply wells that the Army uses, and they were sampled for PFAS in 2019 and 2020. If there is an upgrade to a water supply system that requires a permit, there would be samples for PFAS as well. It has never been detected above reporting limits. Historically, firefighting foams have not been used at the South Post.


Laurie Nehring noted that Zygmunt Osiecki had stated that fires are not uncommon at the South Post. If there were a lot of fires, they would have needed to put out a lot of fires. It is her understanding that the Army did use foam when they were putting out fires. She has heard and read that, because foam works better even in a ground or grass fire, they would use foam because it was faster and put the fires out quickly. She finds it interesting that it is not being found anywhere. Zygmunt Osiecki replied that the impact area has unexploded ordnance so they could not directly fight the fire and did not use foam. The main option for firefighting in the impact area is to contain it and let it burn. There is one road that goes through the middle of the area, but not near where the fires were.



PROJECT UPDATES & UPCOMING WORK



3 | PROJECT UPDATES & UPCOMING WORK



Final Documents Posted Since Last RAB Meeting

- PFAS Area 3 Field Sampling Plan Addendum No. 1 (Former Fire Training Area) – Former Moore Army Airfield (MAAF) (posted to website 5 May 2022)
- Final Debris Removal Summary Report (AOCs 50, 57, 74) – Former MAAF and Main Post (posted to website 5 May 2022)

Draft Documents Submitted to Agencies Since Last RAB Meeting

- Draft PFAS Area 1 Phase 2 RI Work Plan – Main Post
- Draft Annual Monitoring Reports – SHL, Main Post, Former MAAF

8/1/2022

Andy Vitolins noted two final documents that have been posted since the last RAB meeting:

PFAS Area 3 Field Sampling Plan Addendum No. 1—soil and groundwater sampling plan for the former fire training area at the former Moore Army Airfield. This is the area that was visited inside the berms during the site visit. The intent of the work plan is to guide the collection of additional soil samples (and some groundwater samples) to characterize the vertical extent of PFAS in the soil and to help inform potential future work for removal, immobilization, or treatment.

Final Debris Removal Summary Report—report about debris that was discovered a few years back in AOCs 50 (former Moore Army Airfield), AOC 57 (Main Post), and AOC 74 (Main Post). This included pieces of metal, tires, rusted paint cans, old drums, etc. that were on the surface. The work there involved removal of the material on the surface and geophysical work to evaluate what material might remain in the subsurface. There were no indications of releases associated with that debris. The debris was from long before the Base Realignment and Closure process was established. At AOC 50, there were some areas that hadn't been discovered previously, so the Army will go back and address those areas as well.

Andy Vitolins noted the draft documents that have been submitted to agencies since the last RAB meeting:

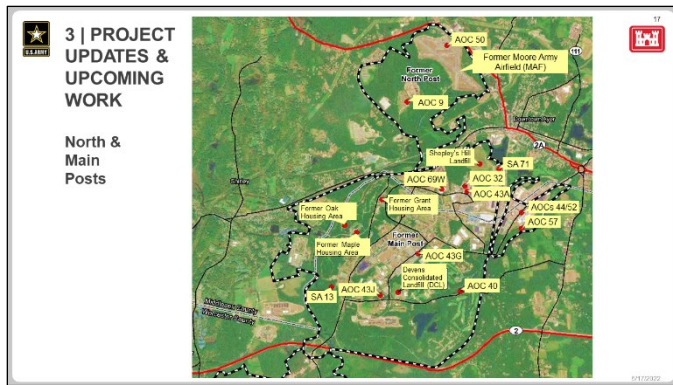
Draft PFAS Area 1 Phase 2 RI Work Plan—First of the work plans for the Phase 2 remedial investigations (RIs). It was submitted and is currently under review. Comments are due this month.

Draft Annual Monitoring Reports—Created for SHL, the Main Post, and the Moore Army Airfield. These reports cover the spring and fall sampling that is performed every year. These submitted reports have the results from last year's monitoring.

Richard Doherty (PACE) asked if any of the PFAS Area 3 work described in the Addendum has been conducted already and if so, which tasks. Penny Reddy commented that the work has not been conducted yet. Andy Vitolins added that they could not do the work until the document was finalized, so now that it is finalized, the Army has to contract the work out. Penny Reddy commented that the work should be done this spring or summer once it has been awarded. Carol Keating added that the USEPA's comments and the Army's responses to those comments are included in an appendix at the end of the document. Andy Vitolins clarified that this applies to all final documents—if they go to review, the comments and responses to comments are included as the last appendix in those final documents.

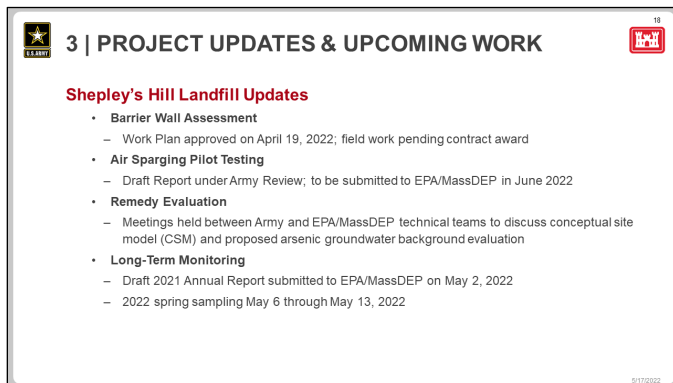
Carol Keating asked if the Army has received comments from the public after the issuance of the final documents. Andy Vitolins replied that Laurie Nehring had a question on the debris area report regarding whether PFAS was part of the debris removal or if that was addressed there. Andy Vitolins reported that the answer is no for the debris removal itself, but all three of the AOCs (50, 57, and 74) are part of the upcoming Phase 2 PFAS RIs. AOCs 57 and 74 are in Area 1, and AOC 50 is the whole airfield. Andy Vitolins pointed out that Richard Doherty mentioned in his comment in the chat box that AOC 31 is the fire training area within AOC 50, and those are part of what is termed Area 3.

Richard Doherty commented that it is known that the AOC 31 area has very high PFAS concentrations in soils within 15 feet of the surface, and it is known that PFAS in groundwater between AOC 31 and the river already exceeds both state and federal standards. On behalf of PACE, he encouraged the Army to focus efforts on conducting a removal action in this area as quickly as possible to limit further migration to the Nashua River. Andy Vitolins replied that the sampling being conducted this summer is the first step of that. The concentrations there are the highest seen at Fort Devens, but it is not known what the concentrations are between a depth of 15 feet and the depth of the groundwater table, which is much lower in that area. In order to make a decision about the removal technique, they need to see what the vertical distribution between the surface and the groundwater looks like. This is the first step along that path.



Andy Vitolins explained the map on this slide, which shows the Fort Devens former North Post and former Main Post. He briefly described each of the sites shown on the map:

- AOC 50—Former Moore Army Airfield
- AOC 31—Within the airfield footprint
- AOC 9—Fort Devens wastewater treatment plant
- SHL—Discussed on next slide.



Andy Vitolins discussed the following SHL updates:

A work plan for barrier wall assessment was approved on April 19, 2022. This was not listed with the other final documents because it was just submitted and will be added. Field work is pending the contract award. The barrier is a low-permeability wall that is installed on the east side of Shepley's Hill and prevents groundwater flow and associated iron and arsenic from reaching Plow Shop Pond (used to be called Red Cove but is no longer red). The USEPA has asked the Army to evaluate further if that wall is performing as intended, which will involve sediment sampling, pore water sampling, and groundwater flow evaluation.

- The air sparging pilot is a small-scale project to test whether adding oxygen (in this case air) that is blown into the subsurface could help with creating the right geochemical conditions such that the dissolved arsenic, iron, and manganese in the groundwater would come out of solution. This would mitigate some of the concentrations that are there. That pilot was completed in January and February. The draft report has been prepared and is under Army review right now. It is due to be submitted in draft form to USEPA in June.
- At the request of the USEPA, the Army is undertaking an evaluation of the existing remedy for the SHL, which is everything that is going on now, including the groundwater extraction and treatment system, barrier walls, cap, and other things happening downgradient in the north impact area. The purpose is to see if it can be improved or changed to make it more sustainable or more beneficial. There have been a few meetings in the last couple of months, and those will continue. There is also an FS that will also be starting for that remedy evaluation.
- The Draft 2021 Annual Report was submitted to the agencies this month. The spring sampling for the 2022 program was conducted.

Laurie Nehring noted that one of the bullets on the slide states that there is a proposed arsenic groundwater background evaluation. She commented that this issue has been a bit contentious and asked if that is something that the public and PACE will be involved in when it comes to how to determine what the background concentration of arsenic is. Andy Vitolins replied that the scope of the background study is still being discussed with the agencies. The Army prepared a proposal for it and the USEPA responded with their thoughts. It is still in the planning stages. If it is implemented, there will be a work plan, which will undergo the same review process as everything else. Laurie Nehring replied that she feels uncomfortable with this because this issue is so important and contentious. She stated that she hopes they can be involved in the technical discussions before a final version comes out because it is really important to them. Andy Vitolins commented that they could talk about it separately and discuss what might go into it.


Laurie Nehring asked if the steps could be fast tracked. Andy Vitolins replied that since this work is being done ahead of the RI and the ROD, it is being fast tracked from the perspective of investigations and contracting. By doing the sampling ahead of the RI, it is considered fast tracked in the world of Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) investigations. It is proceeding as fast as it can given the steps that it has to go through. Steven Perry mentioned that Penny Ready had stated earlier that contracting and getting things lined up would be happening soon.

Carole Keating noted that USEPA will be issuing updated regional screening levels (RSLs) later this month that are significantly lower than the current levels for a number of PFAS compounds. For all but one of the compounds, the numbers are in the single ppt. They are just screening levels, so they are not enforceable like MCLs, and they are not cleanup goals. They will impact ongoing work and possibly prior work at Fort Devens because the laboratories doing the analyses might have trouble meeting




the detection limits that are going to be required for these lower screening levels. USEPA is planning to issue a press release when they are released. The RSL calculator has been updated to include the relevant information to calculate site-specific RSLs. Some of the Department of Defense components have already been working on that, and there will be a comment on it in the draft work plan. She stated that they don't know how it will impact the work, but she wanted to share it with everyone. Tom Lineer (U.S. Army) added that the draft work plan that Carol mentioned will be discussed in a minute by Andy Vitolins.

Amy McCoy asked if the Town of Ayer will be given a report about Plow Shop Pond after the barrier wall assessment. Andy Vitolins replied that once the report is finalized, it will go out to the document repository on the website, following the same process as all the other documents.



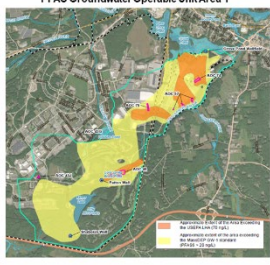
3 | PROJECT UPDATES & UPCOMING WORK



Former Main Post Updates

- **Area 1 Phase 2 PFAS RI Work Plan**
 - Submitted to EPA and MassDEP on March 2, 2022
 - Work Plan overview call held with EPA and MassDEP on March 23, 2022
 - Groundwater model overview call held with EPA and MassDEP on March 24, 2022
- **Supplemental Remedial Investigations (AOCs 69W, 57, 43G)**
 - Received follow-on comments on Draft AOC 69W Work Plan on April 15, 2022
 - Responses to comments and work plan revisions in May 2022

PFAS Groundwater Operable Unit Area 1



Andy Vitolins discussed the following former Main Post updates:

Area 1 Phase 2 PFAS Work Plan—called Phase 2 because there was already some work done here in the past. The results in Phase 1 were used to guide how Phase 2 was implemented. The figure on the slide shows Area 1. On the east side, Area 1 ends at the base boundary; that does not mean that the investigation ends at the base boundary and there are planned sampling points to the east of the base boundary. On the west side, the boundary is determined by the watersheds, or the way the groundwater flows, which is delineated by the top of the ridge that goes from southwest

to northeast. Within that area, AOCs are shown for PFAS that have been identified to date. This includes the Grove Pond wells, Patton Well, and Shabokin Well and AOCs 57, 74, 75, 43G, 43J, and 40 (former landfill). The colors on the map represent an interpolation, based on the Phase 1 data, of the extent of PFAS within Area 1. The yellow color is interpolated for results that exceed the MassDEP PFAS6 of 20 ppt. The orange color represents interpolated results that exceed the USEPA's lifetime health advisory for PFOS and PFAS of 70 ppt. This map shows where the work for Area 1 is going to be done: within the yellow and orange areas as well as to the east, off post near the residential properties that had their wells sampled in the past few years. It will help to determine if there is a known source associated with Fort Devens for what was found in those wells. Further to the west is Area 2, and farther north is Area 3, which is the airfield itself. The work plan was submitted in March, and the Army, USEPA, and MassDEP had a call on March 23, 2022, to go over the scope and strategy for the work plan. There also is a groundwater model that has been developed in draft form, and that modeling report was part of the work plan. An overview of that model was presented to USEPA and MassDEP on March 24, 2022. The model files have been provided as well under that review.

Supplemental remedial investigations—for the former petroleum release sites: AOC 69W (charter school, former Devens Elementary), AOC 57 (former stormwater discharge area), and AOC 43G (former gas station). Each site is associated with discussions that followed the 2020 5-Year Review and the protectiveness statements associated with that. There are work plans for those areas that are going forward and are in the draft or revised draft stage.

Laurie Nehring asked if the map could be enlarged. Andy Vitolins replied that they could provide a higher resolution copy of the map. Laurie Nehring clarified that she meant that comment just for when he was discussing that slide.

Roy Herzig noted that the drinking water wells shown have PFAS treatment systems in place. Andy Vitolins agreed and noted that those are the Grove Pond wells, Patton Well, and Shabokin Well.

Chris Mitchell asked if the Phase 2 RI would include investigation of the bedrock. Andy Vitolins replied that it would. The Phase 1 RI was meant to get an idea of the extents vertically and horizontally. Phase 2 will answer additional questions on the extents vertically and horizontally, and part of that includes going into bedrock in several locations.

Laurie Nehring noted that she wanted to discuss the orange area on the map near Grove Pond. She appreciated Roy Herzig's comment that there are treatment systems in place, but she thinks the high levels of PFAS should be paid attention and should be addressed. She would like to know more about the levels of PFAS that have been found there. She would also like to know when the groundwater model will be available so that they can look at it. They want to know when the PFAS arrived at the Grove Pond wells because Ayer residents and people at Fort Devens were probably drinking contaminated water at that time. She is curious how the remediation is going to happen and whether it will be dug up. She noted there is still a lot of vehicle action and other activities that she thinks is inappropriate for that area of Zone 1/Zone 2 for Ayer drinking water.



Andy Vitolins replied that cleanup of PFAS, beyond those at point sources like former fire training areas, is in its infancy, even more than so than the investigations themselves. There is a lot of research being done on what can be done and where it should be done. The Phase 2 RI focuses on all the areas around the drinking water wells, including Grove Pond. Near Grove Pond, there is flow that heads to Grove Pond, and there is flow that heads towards Cold Spring Brook. The modeling is just a groundwater flow model; it hasn't been developed to do contaminant transport. For PFAS, one can assume it will travel as the groundwater travels because it is highly soluble and does not slow down much as it goes through different geologic media. In this case, since the PFAS has already reached the well, the best the model can do is to indicate how long it took to reach the wells. In this case, since it is already a complete pathway, one wouldn't be able to determine when it first reached the well. If the release date was known and the time the flow took to get there was known, it could be calculated. But if the release date is not known, it couldn't be calculated; the model would just give an idea of the speed of the flow.

Dan Groher (USACE) noted that the orange areas are a little misleading because they can look like source areas or areas where there is much greater contamination, implying sources. There is nothing within those areas that indicates that that is where the PFAS entered the groundwater, making it the starting point. That kind of information is not available. There also isn't a lot of soil contamination there that would be dug and hauled away. This is very different from AOC 31, which is by the fire training area.

Laurie Nehring commented that that is what makes it scary because they know that the levels are over 70 and quite high all around the orange area on the map. The fact that they don't know makes it harder to clean up and pinpoint what the problem is and where it's coming from. She noted that it will continue to spread in the groundwater and that people wonder whether when Well #8 was turned on it made the situation worse.

Dan Groher replied that the model and data don't lend themselves to indicating when there was a release and how long it took to get to the wells. They can tell the latest it could have been released but not the earliest.

Laurie Nehring mentioned that she would appreciate hearing of any new ideas that come up. She noted they are focusing on some major fires that happened and the firefighting practices. She mentioned maybe there were other sources that were not related to the firefighting but were perhaps related to automotive use and maintenance. Since AOC 57 is being looked at, closer to Cold Spring Brook, there may be some other source.


Andy Vitolins commented that with any contaminant, especially with emergent contaminants like PFAS, the first priority under state and federal environmental laws is to protect the receptors, whether they are encountering it in drinking water or through contact. In this case, the first step was to put treatment system on the drinking water wells themselves. Once it is established that the receptors are protected, there is some time to be able to evaluate the extent of contamination and what can be done. Protecting receptors is just the first step; there are steps that follow.

Laurie Nehring asked if it could be assumed that they have tested beyond the yellow area and that that really is where the plume ends. Andy Vitolins replied that in some cases the answer is probably yes, but it still needs to be verified. For example, in the northeast, the plume is shown to end around Cold Springs Brook. The presumption there is that groundwater from that part of Fort Devens discharges to Cold Springs Brook. Part of the work that needs to be done on the other side of that boundary is to evaluate that data gap. In some areas, especially to the south and southwest, there is a more diffused area of concentration. Those boundaries are just interpretations between areas that have at least one point that doesn't have concentrations greater than the PFAS6 and another one that does. Part of the work is to refine those extents.


Laurie Nehring asked if they are testing Mirror Lake, Grove Pond, and Cold Spring Brook water and sediment. Andy Vitolins replied that surface water is being retested as part of the investigation, but the sediment has already been tested. There will also be an edible fish portion of the work that is proposed in the current work plan.

Laurie Nehring noted that PACE is sponsoring a small-scope study because of a water chestnut problem in Grove Pond. She took sediment and surface water samples. PACE is paying for their own tests for PFAS and metals. She will share the results. They will also test the plants when they are big enough.






3 | PROJECT UPDATES & UPCOMING WORK



Former Main Post Updates (continued)

- **Land Use Control Implementation Plans (LUCIPs, AOCs 44/52, AOC 69W, SA 71)**
 - LUCIP Work Plan approved and draft LUCIPs being prepared
- **Long-Term Monitoring**
 - Draft 2021 Annual Report submitted to EPA/MassDEP on May 2, 2022
 - 2022 spring sampling on May 4 and 5, 2022
- **Debris Removal (AOCs 57 and 74)**
 - Debris removal completed
 - Submitted responses to comments and final report on May 2, 2022
- **Discarded Military Munitions (Nashua River)**
 - Update at August RAB Meeting



Andy Vitolins continued discussing the following Main Post updates:


Land Use Control Implementation Plans (LUCIPs)—For all the sites that have been transferred from the Army to MassDevelopment, there are restrictions on the deeds. There are also formal land use controls (LUCs) that are implemented through LUCIPs. They will be putting together those plans for AOCs 44/52 and 69W and study area (SA) 71. The work plan for how the LUCIPs will be put together has been approved and the draft plans for each site are being prepared.

LTM—Draft report was submitted and the spring sampling, which is less extensive than the fall, was completed in early May.


Debris removal—Report is out and there is a response to comments summary at the end.

Discarded military munitions for the Nashua River—Army is working with the USEPA on contracting for that. There will be an update on that at the August RAB meeting.

Chris Mitchell asked if there is a best estimate on when the Phase 2 RI field work will start. Andy Vitolins responded that work plans have to go through the Federal Facility Agreement (FFA) review process, so the earliest it would be is late fall. There is some contracting that needs to be in there also, so sometime between late fall and next spring.




3 | PROJECT UPDATES & UPCOMING WORK



Former Moore Army Airfield Updates

- **Former Fire Training Area**
 - Field Sampling Plan (FSP) for additional soil and groundwater characterization approved on March 18, 2022
 - Field work pending contracting – likely summer/fall 2022
- **Long-Term Monitoring**
 - Draft 2021 Annual Report submitted to EPA/MassDEP on May 2, 2022
 - 2022 spring sampling May 2 and 3, 2022
- **Debris Removal (AOC 50)**
 - Received comments on Summary Report on March 24, 2022
 - Submitted responses to comments and final report on May 2, 2022
 - Contracting for removal of additional debris discovered following the completion of field work




Andy Vitolins discussing the following former Moore Army Airfield updates:


- Former fire training area—the field work will hopefully happen in the summer, so the results are available for the fall.

LTM—Draft report was submitted and the spring sampling, which is less extensive than the fall, was completed on May 2 and 3.


Debris removal—Debris was removed from areas that were known to have debris. There is one additional area that was discovered. The Army is in the process of contracting to have debris removed there as well.



3 | UPCOMING WORK



The Look Ahead for Anticipated Technical Work




Spring 2022

- Spring Annual Monitoring Event
- Supplemental Draft RI Work Plan Revisions (AOCs 69W, 57, 43G)
- Draft Area 1 Phase 2 PFAS RI Work Plan Responses to Comments
- Draft SHL Air Sparging Pilot Test Report

Summer 2022

- Area 3 (Airfield Former Fire Training Area) Additional PFAS Sampling (pending contracting)
- Spring Annual Monitoring Event Data Submission
- Submit Draft Final Area 1 Phase 2 PFAS RI Work Plan
- Submit Draft LUCIPs (AOC 69W and 44/52)



Andy Vitolins discussed the following upcoming work:

Spring annual monitoring event for all sites—Will finish tomorrow at SHL.

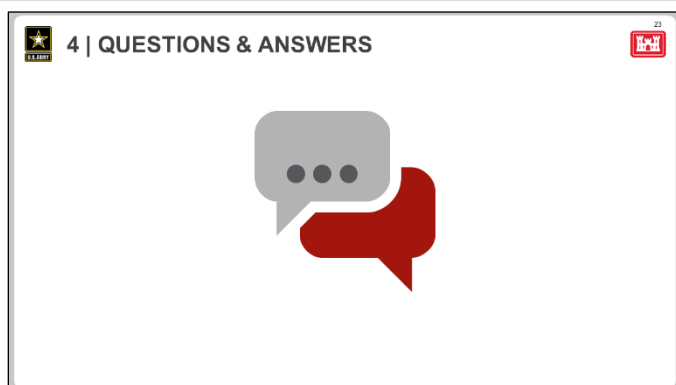
Supplemental Draft RI Work Plan for AOCs 69W, 57, and 43G—Draft for 69W has already been submitted. There is a revised draft that will be submitted and will be followed by AOCs 43G and 57. There will be comment responses for those.

Area 1 Phase 2 Work Plan—Comments will be given this month, and the Army will be preparing responses to the comments and submitting a revised work plan.

Report for air sparging for SHL will be submitted in draft form to the USEPA and MassDEP in June. Sampling should be happening in the former fire training area. The data from the spring event will be submitted in August after it is received from the laboratory and validated. Under the general FFA agreement there are draft, draft final, and final work plans. The draft final work plans will be submitted in summer 2022. The LUCIPs for AOCs 69W (charter school) and 44/52 (former motor pool) will be submitted in summer 2022.

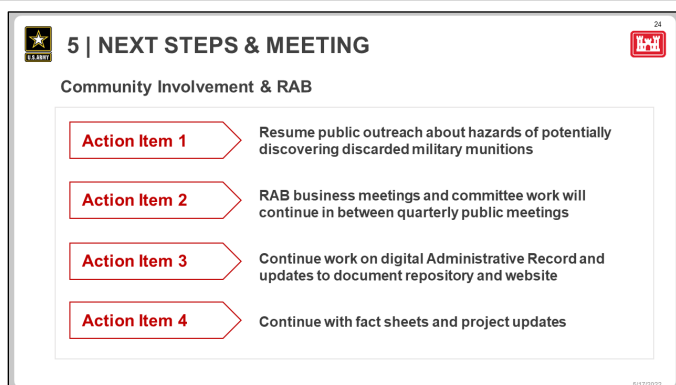


QUESTIONS & ANSWERS



Please see the list of questions and answers at the end of these meeting minutes.

NEXT STEPS & CLOSING



Steven Perry reminded everyone of the following action items:

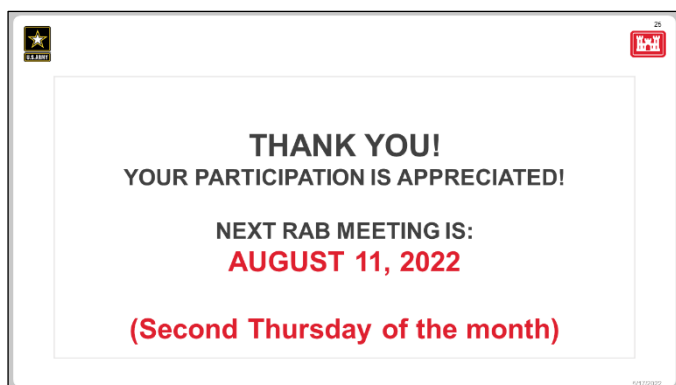
- Continuing to raise awareness and public outreach about discarded military munitions, especially now that the weather is improving and people are out recreating.
- Continuing to hold RAB business meetings; the next meeting will be targeted for some time in July, before the August RAB meeting.
- Digitizing the AR and updating the website.
- Completing the next fact sheets and outreach.

Laurie Nehring asked if signs could be re-installed for no

eating of fish at Grove Pond because it is a public health issue. She stated that most of the signs that the Army had put up many years ago have been taken down or are not readable. They were in multiple languages. There are people fishing at Grove Pond, and she is not sure if everyone knows not to eat them.

Bill Duston asked what the website is. Julee added the website to the chat:

<https://www.nae.usace.army.mil/missions/projects-topics/former-fort-devens-environmental-cleanup/>.



Steven Perry thanked everyone for attending. The next RAB meeting will be August 11, 2022.

QUESTIONS AND ANSWERS

Former Fort Devens Army Installation
Restoration Advisory Board (RAB) Meeting Minutes



Question	Answer
From Carol Keating—Not that this has anything to do with ongoing work at Devens, but Massachusetts Bay Transportation Authority (MBTA) has reached out to USEPA seeking information on potential overlap between proposed laying of fiber optic cables along Fitchburg commuter rail line and Devens; community should check out the MBTA website for more information.	Not applicable.
From Laurie Nehring—I was reviewing some documents that were sent to us at the last RAB, and on the list of the things that were going to be done was a human health risk screening for Devens Consolidated Landfill (DCL) contributor sites. Can you comment on that? Is that something that was completed. Is there a reason it wasn't included on this list?	Andy Vitolins replied that there was a risk screening work plan that had been submitted and several discussions on the scope. USEPA has recently, within the last couple of weeks, given the Army some options on ways to proceed with that. The Army is evaluating those options and may have a path forward for that at the next RAB meeting. Since there are so many things that are potentially in-progress, the list could probably fill a couple of slides. Since there is no definite date or time associated with it, it wasn't included on this list.
From Laurie Nehring—Does that mean that you are looking at all the sites where debris was pulled up and put into the DCL? Was something discovered that prompted this health assessment?	Andy Vitolins replied that USEPA had questions on three of the sites where debris was removed about their status with regard to LUCs. Those were Cold Spring Brook Landfill (AOC 40), the debris landfill adjacent to the airfield (AOC 9), and the debris area on the southwest side of the Main Post (SA 13). The work on those was completed in 2003 and closed out as part of the 5-Year Review. There is a protectiveness statement that is part of the 5-Year Review about the formalization of the LUCs for those.
From Laurie Nehring—Since the public and PACE have limited availabilities to make our comments, could there be some kind of clear statement to us that this is something we can make an official comment on so that it's clear that we pay more attention to it? Can the comments that we make be a reply in an email rather than a formal letter that gets drafted and signed off by everyone? I would like to streamline the process from our end so that when we have the ability to make official comments, we can do it efficiently and can be clear that we should be making comments on that particular document. Most of us are volunteering their time to try to keep up with all the documentation and are tight on time. When I have an hour or two to read through a document, I would like to comment right then rather than putting it off until another day when I can write a letter.	Andy Vitolins commented Laurie had a question on the debris removal report through email. He thought it was easier to respond to it at this meeting since it was so close and that sending an email like that was acceptable to him. Tom Lineer mentioned that the Army follows the same process as USEPA as far as draft documents and comments and who has access and who doesn't. USEPA's process is governed by federal law (CERCLA), and the comments on draft documents and pre-decisional and are not for public release. They are circulated among the regulators and the Army. He doesn't have the authority to provide permission to for her to get inside that process, even if it had been done in the past. What was done in the past was not consistent with federal law. The public review is the opportunity to make the comments.
From Laurie Nehring—As a clarification on the previous comment, I was referring to periods when it is a time for public comment.	Tom Lineer replied that emails are acceptable during public comment periods. It will be formalized and responded to in the document. If the comment warrants a change, then the document is changed. If not, then the comment is responded to. Steven Perry added that the team is also open to clarifying questions by email as well if something comes up while the documents are being reviewed, even if they are not formal comments. Tom Lineer agreed that they are open to questions and having those dialogues. Carol Keating commented that if members of PACE or others review a final document and have significant concerns, they should reach out to USEPA.



RAB MEETING INVITE

Former Fort Devens Army Installation
Notification



**Please join us for the next Former Fort Devens RAB Meeting,
Thursday, May 12, 2022, 6:30 pm**

Our next RAB meeting will be held via Microsoft Teams.

[Click here to join the meeting](#)

Or you can call in to hear the audio only:

+1 469-480-4641

Phone Conference ID:
934 442 337#

We hope you will join us to actively discuss the following topics and share your ideas:

Welcome to existing members and new participants!

Community Involvement & RAB Board Updates

Project Updates & Upcoming Work

South Post Presentation

Questions & Answers

Next Steps & Meeting

Bring your thoughts about the RAB and questions about the project. This meeting will be recorded and a meeting summary will be posted on the project website at:

<https://www.nae.usace.army.mil/missions/projects-topics/former-fort-devens-environmental-cleanup/>

If you have any questions, please send an email to and we will reply:

FormerFortDevensRAB@arcadis.com