

Many Voices Working for the Community

Oak Ridge Site Specific Advisory Board

Monthly Meeting of the Oak Ridge Site Specific Advisory Board

APPROVED June 9, 2021 Meeting Minutes

The Oak Ridge Site Specific Advisory Board (ORSSAB) held its monthly meeting virtually via Zoom on Wednesday, June 9, 2021 at 6 p.m. Copies of referenced meeting materials are attached to these minutes. A video of the presentation portion of the meeting was made and is available on the board's YouTube site at www.youtube.com/user/ORSSAB/videos.

Members Present

Andrea Browning Amy Jones Shell Lohmann, Chair Harriett McCurdy

Members Absent

Leon Baker Richard Burroughs Chris Hampel Noah Keebler Marite Perez Georgette Samaras Michael Sharpe Leon Shields, Vice Chair

Greg Malone Bonnie Shoemaker, Secretary Robert Whitaker Fred Swindler John Tapp Tom Tuck

Dennis Wilson Rudy Weigel Zach Wilkins

¹Third consecutive absence

Liaisons, Deputy Designated Federal Officer, and Alternates Present

Jay Mullis, OREM General Manager Dave Adler, ORSSAB Deputy Federal Designated Officer, DOE-OREM Melyssa Noe, ORSSAB Alternate Deputy Designated Federal Officer (DDFO), OREM Brian Henry, Y-12 Portfolio Federal Project Director, OREM Kristof Czartoryski, Tennessee Department of Environment and Conservation (TDEC) Connie Jones, U.S. Environmental Protection Agency (EPA)

Others Present

Shelley Kimel, ORSSAB Support Office Sara McManamy-Johnson, ORSSAB Support Office Roger Petrie, OREM Sam Scheffler, OREM Carl Froede, EPA Samantha Urquhart-Foster, EPA Heather Lutz, TDEC Chris Thompson, TDEC Steven Stout, TDEC Jared Brabazon, TDEC Conner Ingram, UCOR

Two members of the public were present.

Liaison Comments

Mr. Mullis – Mr. Mullis told members that OREM has finished the demolition work at the Biology Complex and all the material has been disposed of. He added there is still slab work to do, although it is already underway, and there is still sampling to be done once the slabs are removed. He said OREM is on track to having that project completed in the fall and to be able to turn the property over to Y-12 so they can start building their new facility. He said that project was the start of the major work at ORNL and Y-12. There are several facilities at ORNL and Y-12 have a lot of OREM crews working currently. He said at ORNL, crews are mainly at the old "Reactor Row area and the "Isotope Row" area. He said OREM is doing a lot of deactivation work in those facilities for demolition. At Y-12, OREM is doing deactivation work in Beta-1 and Alpha-2, and work is also underway at Building 9213, which is an old criticality experiments facility. He said OREM is on track to demolition that facility sometime in early 2022 and is on track to demolition Beta-1 in late 2022 or early 2023.

Mr. Mullis next told members that OREM is finishing up work at ETTP. He told members that TVA and Kairos Power in May announced plans to build a demonstration reactor at the site, and if that comes to fruition – and it looks like it will – it will be about a \$100 million investment that will create about 55 jobs and the facility will construct a 185 acre parcel. He said there are a couple of additional transfer packages for much smaller parcels that have gone to Congress for Congressional notification.

Regarding waste disposal capacity, Mr. Mullis told members that OREM is on track to submit the new disposal cell draft ROD to EPA and TDEC in July. He said once that is submitted, OREM plans to have some additional public outreach to go over elements such as waste acceptance criteria, site selection, and wastewater discharge limits.

Regarding the budget, Mr. Mullis said the President just released his budget request, and for Oak Ridge, it's one of the best President's requests in recent years. He said it would allow OREM to continue progress at the current pace.

Ms. Jones - None.

Mr. Czartoryski – None.

Presentation

Ms. Lohmann introduced Dave Adler, presenter for the evening's topic, ETTP Groundwater Remedies Update.

Mr. Adler began his presentation by giving new members an overview of the location being discussed, explaining that it generally refers to the area in the northwest corner of the reservation. He said OREM is getting close to the time when it should make decisions regarding groundwater at ETTP because at this point crews have completed with buildings that needed to be remediated and are nearing completion on soil that needed to be remediated. Much of the site has already been completely cleaned up. He said OREM's general commitment has been that it would begin making decisions regarding groundwater after the sources of contamination are cleaned up and are no longer degrading the situation. In addition, he said, companies are beginning to come to the site and it would

be helpful for planning purposes to know subsurface remediation plans at the site. He added that OREM has also collected enough data to where it is ready to make a decision. There have been monitoring wells at the site for about 30 years, so there is a lot of data.

He said OREM will likely be seeking public input on groundwater remedy selection over the next year.

Next, Mr. Adler gave members an overview of the two main areas of the ETTP site and detailed key plans and dates in the groundwater decision timeline. He said the K-31/K-33 area used to contain two uranium enrichment facilities, and those facilities have been removed and the soil cleaned up entirely. The property has been through certification by the State and the EPA as ready to reuse, and it has been sold to the Community Reuse Organization of East Tennessee (CROET). He said CROET may soon sell the property to an energy company that would like to develop some test facilities there. Next, Mr. Adler told members the Main Plant area – located southeast of the K-31/K-33 area – was the part of the site with most of the groundwater contamination. He told members there are additional areas at the ETTP site, but they generally are devoid of groundwater contamination. OREM will address any remaining areas after first addressing the K-31/K-33 area and the Main Plant area.

Mr. Adler then detailed highlights of investigation activities that have taken place in the K-31/K-33 area of ETTP since 1987 and said the data indicates that the water at the K-31/K-33 site is in good shape. He said most of the samples come back at measured values below drinking water standards. He added that the general goal for the site is bring the site's water quality to the point that groundwater restrictions would not be necessary and said the site is almost at that point, even without intervention. He said a little bit of chromium is present at some locations, as is a little bit of nickel. He said that although a formal proposal has not been made, it's likely that the solution will be to allow natural attenuation while monitoring. He said OREM is working with EPA and TDEC to finalize the necessary documentation.

Shifting focus to the Main Plant Area, Mr. Adler told members there had been a lot of solvent materials, typically called halogenated or halocarbon solvents, released in that area. He explained these solvents had been used for degreasing operations and had leaked down into the soil, and because they are heavier than water, ultimately made their way down into the rock below the water table.

Mr. Adler then gave members an overview of OREM's usage of monitoring wells at the site.

Next, he told members that OREM had completed a feasibility study to explore various technology alternatives that could be used to address the groundwater issues under the Main Plant Area. Options explored included lowering electrically powered probes into the ground to heat the ground up and drive the volatiles off; bioremediation, or systems that involve taking advantage of naturally occurring bacteria in the groundwater that can actually metabolize the contaminants; as well as conventional pump and treat operations. He said the preferred approach currently seems to be bioremediation. He added that given the complicated nature of the issue, OREM has worked with EPA and TDEC to develop an interim remedy.

He then gave members a visual overview of the groundwater issues in the Main Plant Area.

Mr. Adler told members in summary that OREM is finishing the surface and soil work at ETTP and beginning redevelopment of the site. He said OREM has put in a significant number of wells in the course of a few decades of groundwater studies, and while they may still put in more, they are at the point where they are ready to start taking that information generated and try to use it to advance cleanup activities at the site, although, he said, that is a conclusion that must be reached with everybody – OREM, experts, regulators, and the public.

After the presentation, board members asked the following questions:

- Ms. McCurdy asked what types of organisms would be involved if bioremediation were used.
 Mr. Adler said they would be using bacteria that occur naturally in the water column, so new organisms would not have to be introduced.
- Mr. Tapp asked whether surface water aquatic toxicity standards are taken into account.
 - Mr. Adler said they are. He said they must not only keep people safe, which is done by cleaning up the groundwater and preventing people from drinking contaminated groundwater, but they must also protect the stream, which is done by meeting standards in the stream that are protective of the aquatic biota. He added that it appears from the monitoring in the creek where the plume is daylighting that just a foot or so from the bank, readings are well below any level of concern.

Questions from the Public

None

Public Comment

None

Board Business/Motions

- 1. Ms. Lohmann asked for a motion to approve the meeting agenda.
 - a. 6.9.21.1 Motion to approve the agenda

Motion made by Mr. Tapp and seconded by Ms. Jones. Motion passed unanimously.

2. Mr. Shields asked for a motion to approve minutes from the February 12, 2020 meeting.

a. 6.9.21.2 Motion to approve May 12, 2021 meeting minutes Motion made by Mr. Shields and seconded by Ms. Jones. Motion passed unanimously.

3. Ms. Lohmann gave members an overview of proposed updates to the board bylaws. She said the majority of the recommended edits relate to the nomination of board officers, specifically removing the nominating committee nomenclature, updating the election procedures and rephrasing the student member section. She added that the proposed edits resulted from experiences over the past year and would provide more flexibility.

Ms. Lohmann asked for a motion to approve updates to the board bylaws as amended.

a. 6.9.21.3 Motion to approve updates to approve board bylaws as amended

Motion made by Mr. Shields and seconded by Ms. Jones. Motion passed unanimously.

- 4. Ms. Lohmann reminded members that officer elections would occur during the October 2021 board meeting, and she asked members to consider serving as board executive members. She emphasized the added learning opportunities inherent with the positions. Mr. Tapp added that four of the current five members of the executive committee will be going into their final terms, so new members are needed.
- 5. Ms. Lohmann gave members background information about charges requested of the board by headquarters. The first of the charges is to develop a best-practice white paper that DOE can use to augment existing practices and expectations for future outreach activities. The second charge is to identify

SSAB 10-year expectations and guiding principles that can be used as a complex-wide framework for DOE's EM interaction with stakeholders and communities.

Responses to Recommendations & Alternate DDFO Report

Ms. Noe said members should have received the DOE/OREM response to Recommendation 248 on FY 2023 Budget Priorities and they should also be receiving a response from headquarters.

Committee Reports

 $\underline{\text{Executive}}$ – Ms. Lohmann said the Executive Committee discussed the charges from headquarters, the bylaws, and the board officer elections.

<u>EM & Stewardship</u> – Ms. Jones said committee members discussed whether a recommendation was warranted for Waste Disposal Capacity and decided one was not warranted at the time. Mr. Tapp added that the issue group is still undecided on whether to make a recommendation.

Additions to the Agenda & Open Discussion

Ms. Lohmann reminded members that issue group signups are open, and she invited interested members to contact staff if they are interested in participating in a specific topic's issue group.

Action Items

Open

None

Closed

None

The meeting adjourned at 7:10 p.m.

I certify that these minutes are an accurate account of the June 9, 2021, meeting of the Oak Ridge Site Specific Advisory Board.

Michelle Lohmann, Chair

onie a. Shoemaker

Bonnie Shoemaker, Secretary

February 9, 2022

Oak Ridge Site Specific Advisory Board

ML/sm